



ADDIS ABABA UNIVERSITY
COLLEGE OF HEALTH SCIENCES
SCHOOL OF PUBLIC HEALTH

**ASSESSMENT OF SUBSTANCE USE AND RISKY SEXUAL BEHAVIOUR
AMONG HARAMAYA UNIVERSITY STUDENTS**

BY

ANDUALEM DERESE

Advisor

Dr. ASSEFA SEME (MD, MPH)

**A THESIS SUBMITTED TO SCHOOL OF GRADUATE STUDIES OF
ADDIS ABABA UNIVERSITY, IN PARTIAL FULFILMENT OF THE
REQUIREMENTS FOR THE DEGREE OF MASTER IN PUBLIC
HEALTH (MPH)**

MAY, 2011

ADDIS ABABA, ETHIOPIA

ADDIS ABABA UNIVERSITY
COLLEGE OF HEALTH SCIENCES
SCHOOL OF PUBLIC HEALTH

**ASSESSMENT OF SUBSTANCE USE AND RISKY SEXUAL BEHAVIOUR
AMONG HARAMAYA UNIVERSITY STUDENTS**

By

Andualem Derese

School of Public Health, College of Health Sciences, Addis Ababa University

Approved by the Examining Board

Dr. Getnet Mitike_____

Chairman, SPH

Dr. Assefa Seme_____

Advisor

Dr. Wakgari Deressa_____

Examiner

Ato Worku Tefera_____

Examiner

Acknowledgments

First and foremost, I would like to thank my advisor Dr Assefa Seme for his invaluable comments and suggestions throughout the thesis work.

I would also like to extend my thanks to the School of Public Health, College of Health Sciences of Addis Ababa University for financing to prepare my thesis work.

My special thanks and sincere appreciation also go to Haramaya University administration and health center staff as well as supervisors and study participants for contribution to the success of the data collection.

Finally, I would like to forward my gratitude to my instructors and all other staff of the School of Public Health, my friends and my family for their support and contribution in any ways in my study.

Table of Contents

Acknowledgments.....	ii
Table of Contents.....	iii
List of Tables	v
List of Abbreviations	vi
Abstract.....	vii
1. Introduction.....	1
2. Literature review	3
2.1 Substance use and risky sexual activity	3
2.2 Drinking and unsafe sex.....	4
2.3 Drugs and health risks.....	4
2.4 Sexual behaviour among students.....	6
Conceptual framework.....	8
3. Objectives	9
3.1 General objective	9
3.2 Specific objectives	9
4. Materials and methods	10
4.1 Study area.....	10
4.2 Study design and period.....	10
4.3 Source population	10
4.4 Study population	10
Inclusion criteria:.....	10
Exclusion criteria:	10
4.5 Sample size determination	11
4.6 Sampling procedures.....	11
4.7 Method of data collection	11
4.8 Study variables.....	12
4.9 Data quality assurance	12
4.10 Data processing and analysis	12
4.11 Ethical considerations	13
4.12 Operational definitions.....	13

5.	Result	15
5.1	Socio-demographic characteristics	15
5.2	Substance use behaviour	17
5.3	Reasons for substance use.....	18
5.4	Factors associated with substance use	18
5.4	Sexual behaviours of respondents.....	22
5.5.	Factors associated with risky sexual behaviour	25
6.	Discussion	28
6.1.	Substance use	28
6.2.	Risky sexual behaviours	29
7.	Strength and limitation of the study	31
7.1.	Strength of the study	31
7.2.	Limitation of the study	31
8.	Conclusions and recommendations.....	32
8.1.	Conclusions.....	32
8.2.	Recommendations.....	32
9.	References	34
	ANNEX I: Schematic representation of sampling procedure	36
	ANNEX II: Questionnaire (English).....	37
	ANNEX III: Amharic Questionnaire	48

List of Tables

Table 1: Socio demographic characteristics of Students, Haramaya University, 2010/11.....	14
Table 2: Proportion of students who ever used substances, Haramaya University	15
Table 3: Prevalence of current substance use (in the last 3 months) among Haramaya university students.....	16
Table 4: Lifetime Substance use variation with Socio-Demographic variables, Haramaya University, 2010/11.....	17
Table 5: Lifetime Substance use variation with Socio-Demographic variables, Haramaya University, 2010/11.....	19
Table 6: percentage distribution of respondents by reported sexual practice, Haramaya University, 2010/11.....	22
Table 7: Association of socio-demographic variables with risky sexual behaviour of Haramaya university students.....	24
Table 8: Association of substance use with risky sexual behaviour of Haramaya University students.....	25

List of Abbreviations

AAU	Addis Ababa University
AOR	Adjusted Odds Ratio
AIDS	Acquired Immune Deficiency Syndrome
COR	Crude Odds Ratio
CSW	Commercial Sex workers
DALYs	Disability Adjusted Life Years
EDHS	Ethiopian Demographic and Health Survey
GCMS	Gondar College of Medical Sciences
HIV	Human Immunodeficiency Virus
IRB	Institutional Review Board
Km	Kilometres
MSc	Master of Science
MSP	Multiple Sexual Partner
PhD	Doctor of Philosophy
PI	Principal Investigator
RH	Reproductive Health
SPH	School of Public Health
STI	Sexually Transmitted Infections
STD	Sexually Transmitted Disease
VCT	Voluntary Counselling and Testing
WHO	World Health Organization

Abstract

Background: Substance use and problems arising from it are increasing all over the world, and currently together with HIV/AIDS epidemic, become one of the most threatening and challenging social and public health problems. University students are more vulnerable to wider sexual and reproductive health (SRH) and HIV/AIDS problems due to new environment with poor protection, age and the need to explore life, peer pressure and absence of proactive programs.

Objectives: This study assessed the prevalence of substance use and its association with risky sexual behaviour among Haramaya University students.

Methods: A cross-sectional survey was carried out among 725 randomly selected Haramaya University undergraduate students from December 2010 to January 2011 using a self-administered questionnaire. Students are stratified first by campus and then by year of study. Sampling with probability proportional to size was used to select students from each year of study using students list as a sampling frame. Descriptive statistics was used to describe the study population and cross-tabulation was done to see the association between dependent and independent variables. Logistic regressions with 95% confidence intervals were calculated to determine independent predictors of risky sexual behaviour.

Result: Among 725 participants, 390 (53.8%) reported having used at least one substance in their lifetime. The most commonly used substance was alcohol (41.7%), followed by khat (30.3%), cigarette (11.3%) and illicit drugs (3.9%). Of the total respondents, 243 (33.5%) had sexual experience in their lifetime. Among sexually active, 28(11.5%) had multiple sexual partners in the last three months and 29(16.3%) of males had sex with commercial sex workers. One hundred forty nine (61.6%) of sexually active students used condoms during the last sex but its consistent use was 55.7%. Use of khat, alcohol and cigarette was significantly and independently associated with risky sexual activities with AOR (95% CI) of 2.58 (1.58, 4.22), 2.46 (1.52, 3.98) and 2.22 (1.19, 4.14) respectively.

Conclusion: The prevalence of substance use among Haramaya university students was high. Use of khat, alcohol and cigarette was significantly associated with risky sexual activities. Awareness raising about safer sex and consequences of substance together with taking the necessary disciplinary measure for those who break the rule and regulation set by the university is highly advisable.

1. Introduction

Natural chemical stimulants have long been used by people of diverse cultures. They may mitigate fatigue and drowsiness, instil a sense of well-being and exhilaration, or facilitate fantasies of personal supremacy. Some people may drink or use drugs to gain courage, relieve pressure, or justify behaviour they might otherwise feel is uncomfortable or unwise – without considering the potential consequences(1). However, their use may come at the cost of various socio-economic problems at the collective level, while the individual user may face increased agitation, apprehension, anxiety, mania, and possibly increased tolerance and thus dependency(2).

In recent years, researchers have begun to explore the intersection of alcohol or drug use and sexual “risk behaviours” – activities that put people at increased risk for sexually transmitted diseases (STDs), unintended pregnancy, and sexual violence. Studies conducted indicate that drinking and illicit drug use often occur in association with risky sexual activities (1).

A study done on cigarette smoking and khat chewing among college students in North West Ethiopia revealed 13.1 % lifetime prevalence of cigarette smoking and 26.7 % life time prevalence rate of khat chewing. In the study, prevalence of cigarette smoking was found to be 8.1 % and that of khat chewing was 17.5 %. Forty six (31.7 %) of the life time smokers and 134 (45.6 %) of the life time chewers started smoking and chewing while they were senior secondary school students(3).

The rapid economic, social, and cultural transitions that most countries in sub-Saharan Africa are now experiencing have created a breeding ground for increased and socially disruptive use of alcohol and drugs. Given the high prevalence of human immune deficiency virus/acquired immune deficiency syndrome (HIV/AIDS) in the region and the increasing number of adolescents infected with HIV, an understanding of the role substance use plays in the spread of HIV/AIDS is crucial to prevention efforts of the disease among adolescent population(4).

Students at higher institutions are considered to be fully aware of HIV /AIDS risks/preventive mechanisms and reproductive health (RH) issues. As a result, they are neglected of HIV/AIDS and RH interventions. However, on arrival at university, many students encounter new independence and freedom life and are at risk of HIV infection (5).

The aim of this study was to estimate the prevalence of substance (alcohol, khat, cigarette and illicit drugs) use, and assess its association with risky sexual behaviours among Haramaya University students. The findings of this study will be used to initiate proper educational and intervention programs among university students.

2. Literature review

2.1 Substance use and risky sexual activity

The global burden of substance use is substantial, accounting for 8.9% of productive life lost annually due to disability and premature mortality, as measured in disability-adjusted life-years (DALYs)(6). The main health burden is due to licit rather than banned substances. Among the ten leading risk factors in terms of avoidable disease burden, tobacco was fourth and alcohol fifth in 2000 and both remain high on the list in the 2010 and 2020 projections. Tobacco and alcohol contributed 4.1% and 4.0%, respectively, to the burden of ill health in 2000, while illicit substances contributed 0.8% (6).

Substance use has been documented as a contributing factor to sexual risk-taking, whereby substance use impairs individual judgment and decision-making and increases a one's risk for a sexually transmitted infection. Several major observations were emerged from a study done in America on adolescent students . It showed that both casual and chronic substance users are more likely to engage in high-risk behaviors such as unprotected sex when they are under the influence of drugs or alcohol. This study further revealed that substance use was significantly associated with unprotected sexual behaviors. Adolescents who reported alcohol or drug use before their last sexual intercourse, smoking ≥ 3 days during the past 30 days, ever using marijuana, ever using cocaine, drinking alcohol ≥ 3 days during the past 30 days and binge drinking during the past 30 days were more likely not to use condoms at their last sexual intercourse(7).

A study done in Afghanistan to determine HIV risk behaviors among freshman students in four universities showed that HIV high risk behaviors were significantly associated with age group, gender, hometown, drinking alcohol, exposure to pornographic media and level of knowledge; while group of faculties, marital status, living status, monthly living allowance and general awareness and level of perception/attitude were not (8).

2.2 Drinking and unsafe sex

Increased alcohol use seems to be associated with an increased likelihood of sexual activity. When men aged 18 to 30 were asked to report their episode of heaviest drinking in the last year, 35 % said that they had sex after consuming five to eight drinks and 45 % had sex after consuming eight or more drinks, compared with 17 % of those who had one or two drinks. Among women aged 18 to 30, 39 % had sex while consuming five to eight drinks and 57 % had sex when consuming eight or more drinks, compared with 14 % of women who had one or two drinks(9).

Research done on Slovak students showed that the risk of multiple sexual partners was associated with more psychological factors among females. It also showed that males reporting having been drunk at least once in the preceding month or reporting sexual experience before age 16 were more likely to have had more than three sexual partners in their life time. It also added that one behavioural factor in males (being drunk) and one in female (smoking) was associated with inconsistent condom use(10).

2.3 Drugs and health risks

Some studies have indicated that substance misuse is associated with psychological distress, suicide attempts functional impairment, physical ill-health and risk taking behaviour. Khat (an evergreen plant with amphetamine-like properties) and alcohol are among those substances widely consumed among the youth of Ethiopia. In a study of over 10,000 adults in Butajira, a higher prevalence of mental distress and suicide attempt was found in those using alcohol and khat.(11) In a case-control study, khat use has also been found to be a risk factor for HIV infection.(12) In study of over 20,000 in school and out-of school youths, daily khat intake was also associated with unprotected sex. There was also a significant and linear association between alcohol intake and early initiation of sex, with those using alcohol daily having a three-fold increased odds compared to those not using alcohol. In this study use of substances other than khat was also strongly associated with sex initiation (13).

Illicit drug users are also more likely than non-users to have multiple sex partners. A research on substance use and sexual behaviour in adolescents of South Africa found that substance use, as measured by lifetime alcohol and marijuana use, is strongly predictive of adolescent sexual behaviours even after controlling for the relevant social and economic background characteristics of the adolescents. In relative terms, smoking marijuana is a stronger predictor of lifetime sexual activity than lifetime alcohol use(14).

A study done on cigarette smoking and khat chewing among college students in North West Ethiopia revealed 13.1 % life time prevalence rate of cigarette smoking and 26.7 % lifetime prevalence rate of khat chewing. The current (2001) prevalence of cigarette smoking was found to be 8.1 % and that of khat chewing 17.5 %. Forty six (31.7 %) of the life time smokers and 134 (45.6%) of the life time chewers started smoking and chewing while they were senior secondary school students(3).

A research on association between substance abuse and HIV among voluntary counselling and testing (VCT) users in Addis Ababa showed that age 25 years and above, ever use of “hard” drugs, ever drinking alcohol and khat chewing were positively and significantly associated with HIV seropositivity in the bivariate analysis (15). A significant association of khat chewing with HIV seropositivity in the bivariate analysis disappears when controlled for other variables in the study. Thus, the lack of significant association of khat chewing and serum HIV positivity, when controlled for alcohol intake, in the study supports those earlier findings of reduced desire for sex among khat chewers. This implies that khat chewing alone may not predispose to risky sexual behaviours and hence to HIV infection unless alcohol is indulged in following khat chewing. Concomitant use of khat and alcohol could probably be one of the risk factors for exposure to HIV infection. The study indicated that people who were both drinkers and chewers were 6 times more likely to be HIV seropositive compared to both non-drinkers and non-chewers (15).

A life time history of illicit drugs consumption decreased the probability of condom use at last sexual intercourse by half in a study done in Lima, Peru on sexual behaviour and drug consumption. Among men, the use of illicit drugs doubled the probability of intercourse

with a casual partner during the last year and tripled the probability of reported sexually transmitted infection (STI) symptoms (16).

Substance misuse is a growing problem in Ethiopia, as in many developing countries. A review of alcohol and drug abuse in Ethiopia revealed that, alcohol and khat are the two most frequent substances of abuse, followed by cannabis and solvents. Hard drugs such as heroin and cocaine are rarely used (17).

Students and staff at institutions of higher education are considered to be at high risk of substance use. Among 479 students at Gondar College of Medical Sciences in north-western Ethiopia, the leading substance of abuse were alcohol, cigarette and khat with a prevalence rates of 31.1%, 26.3% and 22.3%, respectively. The combined prevalence for that time (1984) for the three drugs was about 11.5%. Alcohol was used more often to overcome the stimulation from khat (18).

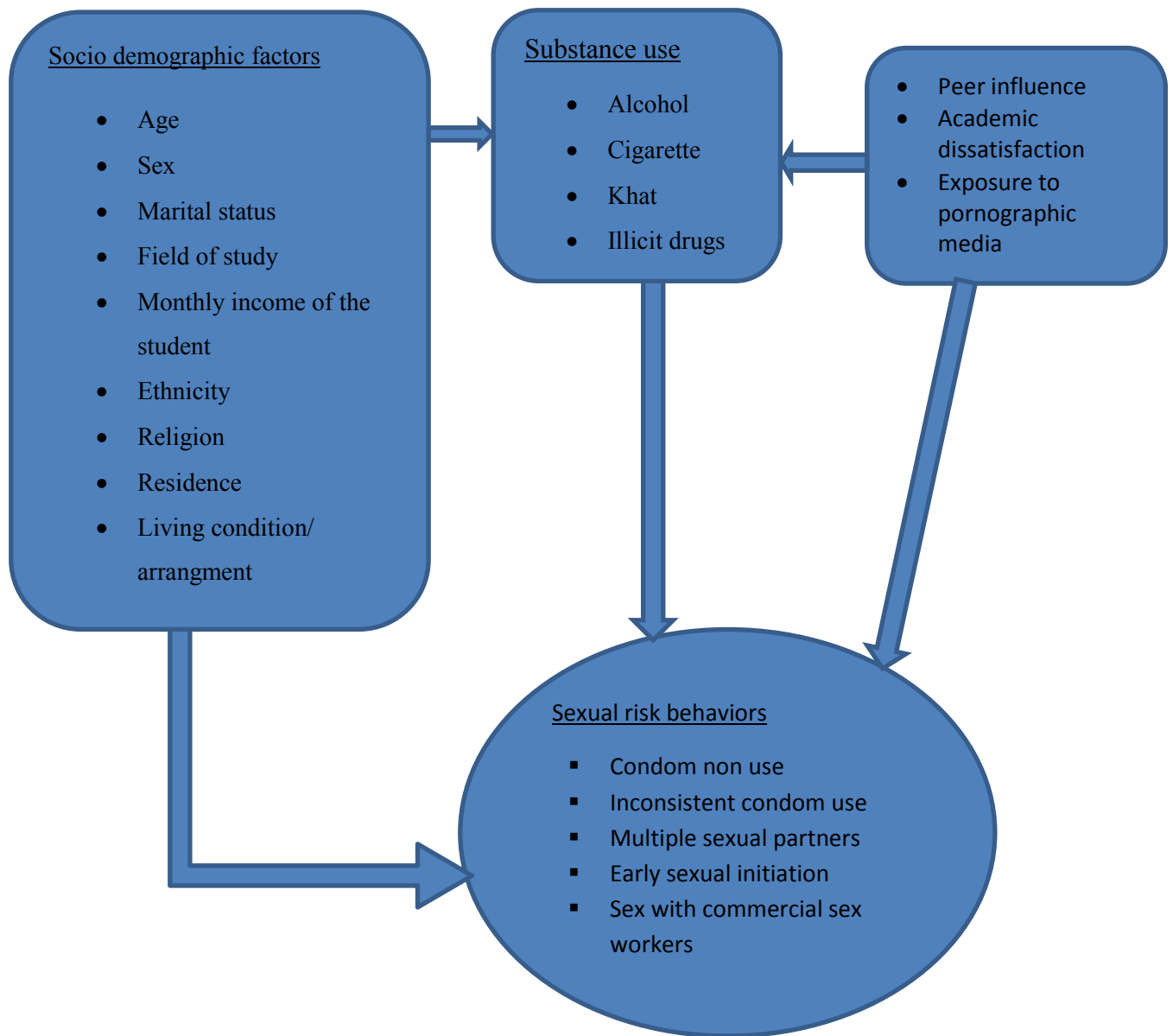
2.4. Sexual behaviour among students

It is slightly over 30 years since the first cases of AIDS were identified. During this period, there is progress in prolonging and improving the quality of life of those infected with HIV. But there is still neither a vaccine nor cheap, assured and effective treatment for HIV/AIDS.

Researchers have reported risky sexual behavior in African youths. For example, Nigerian university students indicated an average of 3.5 sexual partners at the time they were surveyed. Approximately 63% of Togolese university students had more than one sexual partner at the time of the survey, and some 38% reported regular condom use. Among Malagasy women, more than one-third had premarital sex, but only 3% reported condom use during their last premarital sexual intercourse(19). A study conducted among high school students in Gondar, Northwest Ethiopia indicated that 14.9% reported to have had sexual intercourse at least once in the past. 11.9% of the sexually active respondents had sex with commercial sex workers (CSW) in the past six months and 10.7% had contracted sexually transmitted diseases (STDs). Out of the sexually active respondents, 54.8% did not use condoms. From the respondents who used condoms, only 68.4% used always while the other 31.5%) reported that they use condoms only sometimes(20). The EDHS 2005 reported that condom use during last sexual intercourse in the last 12 months with a non-regular partner was 51.9% and 23.6% among 15-49 years old males and females,

respectively. The 2005 EDHS also showed that condom use with a non-regular partner in the 12 months preceding the survey is much greater in 15-24-year-old men (50.2%) than 15-24-year-old women (28.4%). Between the 2000 and 2005 EDHS, condom use has increased from 30.3% to 51.9% among males, whereas a smaller increase was observed among females (from 13.4% to 23.6%). Use of condoms in sexual episodes involving non-regular partners was higher in the urban areas than in the rural areas for both males and females in both 2000 and 2005(21). A study conducted on Sexual behavior HIV infection among university students in china indicated that of all respondents, 17.6% of males and 8.6% of females were sexually active and the proportion of male students who had experienced sex before university was significantly greater in lower- than higher-grade students. The same trend, although involving a smaller proportion, was evident among female students. The mean age of first sexual experience was 19.4 (SD = 1.8) and 19.7 (SD = 1.6 for males and females, respectively ($t = -3.37$, $P = 0.001$). Of sexually active respondents, 71.5% of males and 62.2% of females reported having sex in the previous year. Among those who had been sexually active in the previous year, males were significantly more likely to have had non-regular partners, including casual partners and commercial partners ($\chi^2 = 40.80$, $P < 0.001$) than were females; non-regular partnership was more common for lower than higher-grade students in both gender. Males were also significantly more likely to have had multiple partners than were females ($\chi^2 = 10.21$, $P = 0.001$); multiple partners per year were more common for lower- than higher-grade male students, but not for female students. Condom was never/rarely used by 35% of sexually active students in both genders. Among male students, proportions of those who never or rarely used condom declined from first graders to fourth grade students (P value for trend analysis < 0.001). However, no significant trend in condom use was found between high and low grade female students (P value for trend analysis = 0.08). About 57% of male and 49% of female students never or rarely used contraceptive pills in the previous year(22).

Conceptual framework



A conceptual frame work for factors affecting risky sexual behaviour

3. Objectives

3.1 General objective

To assess the prevalence of substance use and magnitude of risky sexual behaviour and its association with substance use among Haramaya University students

3.2 Specific objectives

- To determine the prevalence of substance use among Haramaya University students
- To assess the magnitude of risky sexual behaviour among Haramaya University students
- To identify factors associated with risky sexual behaviour
- To assess the association between substance use and risky sexual behaviour among Haramaya University students

4. Materials and methods

4.1 Study area

The study was conducted in Haramaya University, which is located 510 Km to the East of Addis Ababa in between Harar and Dire Dawa towns. It is one of the oldest Universities next to Addis Ababa University in the country. There are two campuses in the University (main campus and College of Health Sciences). The main campus is located 5 Km from Haramaya town and College of Health Sciences is found in Harar town. Currently the University has 11 Colleges and 55 departments with 12,759 students in the undergraduate programme. There are also post graduate programs with 32 MSc and 7 PhD programs. The total students enrolled in the university in 2010/2011 academic year were about 13,800 in both undergraduate and post graduate programs (23).

4.2 Study design and period

A cross-sectional study was conducted to determine the prevalence of substance use and its association with risky sexual behaviour among Haramaya University undergraduate students from December 2010 to January 2011.

4.3 Source population

All undergraduate students who are registered for 2010/11 academic year in Haramaya University (both campuses) were the source population for the study

4.4 Study population

All students who were selected randomly from source population

Inclusion criteria: Regular undergraduate students, who were not blind and who were not critically sick (to the extent of unable to read and write) during the time of data collection

Exclusion criteria:

- Postgraduate, extension, summer and distance education students

4.5 Sample size determination

Sample size was determined using single population proportion formula for cross-sectional study. Taking current prevalence of khat chewing 17.5% from study done among college students in north west Ethiopia(3) to obtain maximum sample size at 95 % certainty and a maximum discrepancy of $\pm 4\%$ between the sample and the population, an additional 10 % was added to the sample size as a contingency for non response. The following formula was used to calculate the sample size:

$$n = \frac{(Z_{\alpha/2})^2 \cdot P(1-P) \cdot D}{d^2}$$

Where; **n**=the desired sample size

p= Prevalence of khat chewing among college students (17.5 %)

$Z_{\alpha/2}$ = critical value at 95% confidence level of certainty (1.96)

d= the margin of error between the sample and the population = 4%

D=design effect =2

Using the above formula, sample size for the single population proportion was 347. Since the sampling was multistage, design effect of 2 was taken, and the total sample size was 764.

4.6 Sampling procedures

First, students were divided into main campus (Haramaya) and Harar campus (College of Health Sciences). Then, they were further stratified based on year of study. Finally, systematic sampling technique was applied to select individuals in each year of study from the list of students' name in their respective batch. Students from each year of study were selected proportionally to their class size.

4.7 Method of data collection

Data was collected using structured self-administered questionnaire prepared in English and translated to Amharic and retranslated to English to ensure its consistency. The questionnaire had three parts: socio-demographic variables, substance use behaviours and sexual behaviour questions. The questionnaire was pretested prior to the actual data

collection on 40 students of the nearby Dire Dawa University. Participation was on voluntary basis and confidentiality was maintained to encourage accurate and honest self-disclosure. The questionnaire was distributed to the selected students in the classroom and collected in the same day to avoid information contamination. When the instructors are willing to allow the students to complete the questionnaire in the classroom, then the filled questionnaires were collected immediately. (See Annex II and III).

4.8 Study variables

Independent variables:

- Socio-demographic characteristics: age, sex, year of enrolment, faculty, residence of the parents of the study subjects, religion, religiosity, ethnicity, marital status, living arrangement, monthly income (expenditure) of the student and family history of substance use
- Substance use (khat, alcohol, cigarette or other illicit drugs)

Dependent variables: consistent condom use, number of sexual partner, age at first sexual intercourse and sex with commercial sex workers

4.9 Data quality assurance

In order to assure data quality, high emphasis was given to minimize errors using the following strategies: the questionnaire was pretested and subsequent correction and modification has been done; facilitators were trained and proper instruction was given before the survey as to the importance of the study for the selected students. The collected data was reviewed and checked for completeness before data entry. Five percent of the data was double-entered in order to compare and assure the quality of the data.

4.10 Data processing and analysis

Data was entered and cleaned using Epi-Info version 3.5.1. SPSS version 16 was used for statistical analysis. Descriptive statistics was used, mean and standard deviation for continuous variables and frequency for categorical variables. Bi-variate and multivariate analysis were employed in order to infer associations and predictions. Odds ratio with 95% confidence interval was computed to assess the level of association and statistical significance.

4.11 Ethical considerations

Ethical clearance was obtained from the SPH, College of Health Sciences IRB and permission to conduct the study in the university was secured from Haramaya University. The students were given any information they needed, verbally and in writing. Participation was voluntary and they can withdraw from the study at any time without explanation. Confidentiality was assured and no personal details was recorded or produced on any documentation related to the study. Full written informed consent was obtained from all participants. (See annex II and III for information sheet and consent form)

4.12 Operational definitions

Substances: Any non-medical drugs used by study subjects such as alcohol, khat, tobacco, cannabis, heroin, cocaine, and marijuana to alter their mood or behaviour.

Life time prevalence of smoking: the proportion of students who had ever smoked at least one cigarette in his/her life time

Alcoholic drinks: any drink like „Tela“, „tej“, „katicala/areke“, beer, wine or other drinks that can cause intoxication

Lifetime prevalence of alcohol drinking: the proportion of students who had ever used alcoholic drinks in their life time irrespective of the amount and type

Life time prevalence of khat chewing: the proportion of students who had ever chewed khat in their life time

Current prevalence of cigarette smoking: the proportion of students who are smoking cigarettes within 3 months preceding the study

Current prevalence of Khat chewing: the proportion of students who are chewing khat within 3 months preceding the study

Current prevalence of alcohol drinking: the proportion of students who are drinking alcohol within 3 months preceding the study

Illicit (illegal) drugs: Drugs which are forbidden by law such as cocaine, heroin, hashish, cannabis, ganja, and marijuana.

Ever users of illicit drugs: the number of students who ever used any substances like hashish, pat, kaya, cannabis, ganja, heroin or others

Current users of illicit drugs: the number of students who use any substances like hashish, pat, kaya, cannabis, ganja, heroin or others within 3 months preceding the study

Ever smoker: An individual is considered as ever smoker even if he/she had smoked only once in his/her life time

Ever khat chewer: An individual is considered as ever khat chewer even if he/she had chewed khat only once in his/her life time

Ever illicit drug user: An individual is considered as ever illicit drug user even if he/she had used only once in his/her life time

Sexual risk behaviour: sexual risk behaviours that students do. In this study it is defined as one of the following: not using condom (inconsistent use of condoms), having multiple sexual partner, starting sex before age 18 years and sex with commercial sex workers.

Consistent condom use: use of a condom during every sexual encounter

5. Result

5.1 Socio-demographic characteristics

Out of the total 764 students participated in the survey, questionnaires from 725 respondents were considered for analysis making the response rate 95%.

Of the total 725 respondents, most 706(97.6%) were youths and their age ranged from 18 to 27 years with a mean age of 21 and SD of 1.68 years (Table 1). From the total participants, 438 (60.4%) were males, 86% (625) were from Haramaya (main) campus and 33.9% (246) were first year students. About half of the study subjects, 51.7% (375) were followers of Orthodox religion. The previous place of residence for majority of respondents, 71% (519) were from urban setting and majority (85.2%) attended a public/governmental high school. Forty percent (294) of the students reported a monthly pocket money of 100 to 299 birr.

Table 1: Socio demographic characteristics of Students, Haramaya University, 2010/11

Characteristics	Frequency (n=725)	Percentage
Sex		
Male	438	60.4
Female	287	39.6
Age group		
≤ 18	36	5.0
19-24	670	92.4
>24	19	2.6
Mean $\pm$ SD	=21 $\pm$ 1.68	
Year		
Year I	246	33.9
Year II	197	27.2
Year III	201	27.7
Year IV or above	81	11.2
Religion		
Orthodox	375	51.7
Muslim	176	24.3
Protestant	142	19.6
Other	32	4.4
Ethnicity		
Oromo	307	42.3
Amhara	209	28.8
Tigre	59	8.1
Wolaita	23	3.2
Somale	22	3.0
Gurage	44	6.1
Others	61	8.4
Marital status		
Never Married	670	92.4
Ever Married	55	7.6
High school attended		
Public high school	618	85.2
Private high school	78	10.8
Missionary high school	29	4.0
Pocket money(birr)		
None	47	6.5
<100	160	22.1
100-299	294	40.6
300-499	154	21.2
≥500	70	9.7
Residence before joining university		
Urban	519	71.6
Rural	206	28.4

5.2 Substance use behaviour

The study revealed that 30.3% of the students chewed khat at least once in their lifetime and 20.3% reported that they were current khat chewers (in the last 3 months). The prevalence among males (39.7%) was higher compared to females (16.0%). The respondents were further asked their chewing pattern. The response indicated that about half of them (49.5%) chew khat occasionally (2-3 times per week) and 28.2% of them claimed chewing khat always (everyday).

Concerning alcohol drinking habits, 41.7% reported that they drank alcohol at least once in their lifetime while 17.5% said that they drank alcohol in the last three months. Among alcohol users, the majority (81.5%) were using alcoholic drinks occasionally. (See Tables 2 and 3)

Eighty two, (11.3%) of the respondents used cigarette at least once in their life time. The current prevalence of cigarette smoking was 9.1% and about half of the smokers were occasional smokers. Furthermore, 28 (3.9%) of the study participants used illicit substances like hashish at least once, with the majority of them being occasional users.

Among the participants, 390 (53.8%) reported having used at least one substance in their lifetime. From those who used at least one substance in their life time, 281 (72.1%) started using the drugs before joining the university while 109 (27.9%) started after joining the university.

Table 2: Proportion of students who ever used substances (khat, alcohol, cigarette and illicit substances) Haramaya University, 2010/11

Type of substance	Number (n=725)	Percent
Khat	220	30.3
Alcohol	302	41.7
Cigarette	82	11.3
Illicit substance	28	3.9

Table 3: Prevalence of current substance use (in the last 3 months) among Haramaya university students, 2010/11

Type of substance	Number (n=725)	Percent
Khat	147	20.3
Alcohol	127	17.5
Cigarette	66	9.1
Illicit substance	13	1.8

5.3 Reasons for substance use

Different reasons were mentioned by students for the use of drugs. The reasons mentioned for khat ever use were: To increase work performance (27.5%), to get personal pleasure (20.5%), to stay awake (17.5%), due to peer pressure (8.9%), to get relief from tension (7.5%) and other reasons (18.1%).

Among 302 students who reported taking alcohol, 220(66.9%) used alcohol to get personal pleasure, 56(18.5%) to get relief from tension and 51(16.9%) took it due to peer influence.

Reasons for cigarette smoking were: to get personal pleasure (43.9%), to get relief from tension (39.0%), to stay awake (30.5%), to increase academic performance (30.5%) and peer influence (22.0%).

Reasons for illicit drug use were: to get personal pleasure (57.2%), peer influences (32.1%), to stay awake (14.3%) and to increase pleasure during sexual intercourse (10.7%).

5.4 Factors associated with substance use

Bivariate association showed a statistically significant association between lifetime prevalence of substance use and sex, year of study, religion and frequency of going to church or mosque. See table 4. Variables which are significantly associated in the first model are taken and analyzed together by multivariate logistic regression.

Table 4: Lifetime substance use variation with socio-demographic variables, Haramaya University, 2010/11

Characteristics (n=725)	Lifetime substance use		Crude OR (95% CI)
	YES	NO	
Campus			
Main	341	284	1.25 (0.81, 1.90)
Harar	49	51	1.00
Age			
<18	20	16	0.44 (0.13, 1.50)
18-24	356	314	0.40 (0.14, 1.13)
>24	14	5	1.00
Sex			
Male	281	157	2.92 (2.14, 3.97)*
Female	109	178	1.00
Year of study			
1 st year	121	125	1.00
2 nd year	93	104	0.92 (0.63, 1.34)
3 rd year	122	79	1.59 (1.09, 2.32)*
4 th year or above	54	27	2.06 (1.22, 3.49)*
Religion			
Orthodox	234	141	1.00
Muslim	92	84	0.66 (0.45, 0.94)*
Protestant	41	101	0.24 (0.16, 0.37)*
Others	23	9	1.54 (0.69, 3.42)
Church/mosque frequency			
Everyday	134	122	1.00
At least once a week	199	191	0.94 (0.69, 1.30)
At least once a month	22	10	2.00 (0.91, 4.39)
At least once a year	12	6	1.82 (0.66, 5.00)
Never	23	6	3.49 (1.37, 8.85)*
Marital status			
Never married	364	306	1.00
Ever Married	36	29	0.67 (0.26, 1.72)
Ethnicity			
Oromo	160	147	1.00
Amhara	126	83	1.39 (0.97, 1.99)
Tigre	32	27	1.08 (0.62, 1.90)
Gurage	26	18	1.32 (0.69, 2.52)
Others	46	60	0.70 (0.45, 1.09)
Residence			
Urban	284	235	1.14 (0.82, 1.57)
Rural	106	100	1.00
School type			
Public High school	333	285	1.75 (0.83, 3.70)
Private High school	45	32	2.10 (0.89, 4.98)
Missionary High school	12	18	1.00
Monthly living allowance			
None	20	27	1.00
<100	79	81	1.31 (0.68, 2.53)
100-299	162	132	1.65 (0.88, 3.08)
300-499	90	64	1.89 (0.98, 3.67)
>500	39	31	1.69 (0.80, 3.58)

After controlling for the effects of potentially confounding variables using multivariate logistic regression, sex, year of study and religion were found to be statistically significant predictors of lifetime substance use. Being male had strong association with life time substance use of at least one substance [AOR (95% CI) =5.06 (3.44, 7.43)]. The odds of substance use behaviour increases with year of study; fourth year and above students having a greater odds [AOR (95% CI) =2.46 (1.33, 4.58)] followed by third year students [AOR (95% CI) =1.56 (1.02, 2.41)]. There was no statistically significant association between first and second year students with respect to substance use.

In the bivariate analysis, being a follower of Muslim and protestant religions was showed to have less odds of having substance use. This was reversed in the multivariate analysis and being a follower of Muslim religion had an increased odds of using substances [AOR (95% CI) =2.26 (1.49, 3.42)] while being a follower of protestant religion was protective against substance use [AOR (95% CI) =0.35 (0.20, 0.59)]. The association between frequency of going to church or mosque and lifetime substance use disappears in the multivariate analysis. (See table 5)

Table 5: Lifetime substance use variation with socio-demographic variables, Haramaya University, 2010/11

Characteristics		Lifetime substance use			
		YES	NO	Crude OR (95% CI)	AOR (95% CI)
Campus	Main	341	284	1.25 (0.81, 1.90)	1.20 (0.74, 1.95)
	Harar	49	51	1.00	1.00
Sex	Male	281	157	2.92 (2.14, 3.97)*	5.06 (3.44, 7.43)*
	Female	109	178	1.00	1.00
Year of study					
	1 st year	121	125	1.00	1.00
	2 nd year	93	104	0.92 (0.63, 1.34)	0.89 (0.58, 1.35)
	3rd year	122	79	1.59 (1.09, 2.32)*	1.56 (1.02, 2.41)*
	4th or above	54	27	2.06(1.22, 3.49)*	2.46 (1.33, 4.58)*
Religion	Orthodox	234	141	1.00	1.00
	Muslim	92	84	0.66 (0.45, 0.94)*	2.26 (1.49, 3.42)*
	Protestant	41	101	0.24 (0.16, 0.37)*	0.35 (0.20, 0.59)*
	Others	23	9	1.54 (0.69, 3.42)	2.66 (0.62, 11.43)
Frequency of going to church/mosque					
	Everyday	134	122	1.00	1.00
	At least once a week	199	191	0.94 (0.69, 1.30)	0.24 (0.06, 1.87)
	At least once a month	22	10	2.00 (0.91, 4.39)	0.33 (0.09, 1.15)
	At least once a year	12	6	1.82 (0.66, 5.00)	0.68 (0.15, 3.02)
	Never	23	6	3.49 (1.37, 8.85)*	0.42 (0.08, 2.03)
Marital status					
	Never married	364	306	1.00	1.00
	Ever Married	8	10	0.67 (0.26, 1.72)	1.29 (0.67, 2.49)
Residence	Urban	284	235	1.14 (0.82, 1.57)	1.37 (0.92, 2.03)
	Rural	106	100	1.00	1.00
School type					
	Public High school	333	285	1.75 (0.83, 3.70)	0.96 (0.39, 2.31)
	Private High school	45	32	2.10 (0.89, 4.98)	1.14 (0.42, 3.10)
	Missionary High school	12	18	1.00	1.00

* Statistically significant at 95% CI

5.4 Sexual behaviours of respondents

Out of the total respondents, 243 (33.5%) of students had sexual experience. Of the 243 sexually active students, 179 (73.7%) were males and 64 (22.3%) were females. The median age at first sex for both males and females were 18 years with ranges from 14 to 24 years and with a mean age of 18.56 years.

From the 243 sexually experienced respondents, 177(72.8%) had their first sex before joining the university and the rest 66(27.2%) respondents after joining the university. Among the respondents who had sex after joining the university, 51(77.3%) had their first sex outside the university compound and the rest 15(22.7%) inside the university compound. The main reasons for initiating sex were related to personal interest or curiosity 103(42.4%), promising word from partner for marriage 58(23.9%), peer pressure 52(21.4%), marriage 18(4.9%), sex for exchange of money 5(2.1%), forced sex 4(1.6%), to pass examination 3(1.2%) and other reasons 8(2.5%).

The majority of the sexually experienced students (83.1%) had their first sex with their girlfriends/ boyfriends, 18(7.4%) with stranger, 18(7.4%) with their spouse, 6(2.5%) of males with commercial sex workers and 4(1.6%) of the respondents had their first sex with their teachers.

From 243 sexually active students, 160 (65.8%) had at least one of the risky sexual behaviours. i.e. 28(11.5%) had multiple sexual partners in the last three months, 108 (44.3%) respondents use condom inconsistently, 86 (35.3%) had started sexual intercourse before the age of 18 years and 29(16.3%) of males had sex with commercial sex workers. The most common reason cited for not using condom was trust on partner (38.3%), followed by hating condoms (27.7%) and in love with partner (21.3%).

Among the sexually active students who were asked if they had symptoms of STI (genital discharge or ulceration), 10(4.1%) responded that they had the symptoms. From these students that had these symptoms, 6 sought medical care for the symptom they had and 4 of them ignored it.

Regarding use of contraceptive methods last time they had sexual intercourse, majority, 199 (72%) had used and the remaining 44(18.0 %) didn't used any. Pertaining the type of contraceptive methods, 132(54.3%) used condom, 25(10.3%) used pills, 18(7.4%) used Depo-Provera and 24(9.9%) used other methods. Among 64 sexually active female students, 15(23.1%) had once been pregnant and 1 student became pregnant twice. Concerning the outcome of pregnancy, 13(81.2%) ended in abortion whilst the rest 3 gave birth.

Table 6: Percentage distribution of respondents by reported sexual practice, Haramaya University, 2011

Characteristics	Number	Percent
Ever had sex (n=725)		
Yes	243	33.5
No	482	66.5
When was first sex (n=243)		
Before joining university	177	72.8
After joining university	66	27.2
Age at first sex (n=243)		
<18 years	86	35.4
≥18 years	157	64.6
Reasons for first sex (n=243)		
Marriage	12	4.9
Personal desire	103	42.4
Peer pressure	52	21.4
Promising word from partner	58	23.9
For financial purpose (for money)	5	2.1
For passing examination	3	1.2
Other	10	4.1
First sex with whom (n=243)		
Spouse	13	5.3
Boy/Girl friend	202	83.1
Teacher	4	1.6
Stranger	18	7.4
CSW (for males only)	6	2.5
Number of sexual partners (lifetime) (n=243)		
1 person	134	55.1
2 persons	45	18.5
3 or more people	64	26.3
Contraceptive method used during last intercourse (n=243)		
None	44	18.1
Pills	25	10.3
Condoms	132	54.3
Injectable	18	7.4
Other methods	24	9.9
Number of pregnancy (females) [n=64]		
Never been pregnant	49	75.4
1 or more	16	24.6
Outcome of pregnancy (n=16)		
Live birth	3	18.8
Abortion	13	81.2
Genital symptom of STI (n=243)		
Yes	10	4.1
No	233	95.9
Sex with casual partner (243)		
Yes	45	18.6
No	197	81.4
Sex with commercial sex worker (males) (n=178)		
Yes	29	16.3
No	149	83.7
Sex for economic benefit (females) [n=64]		
Yes	10	15.6
No	54	84.4

5.5. Factors associated with risky sexual behaviour

Bivariate association was made among different variables and showed a statistically significant association between sexual experience and sex. In addition use of substances like Khat, alcohol, illicit drugs and cigarette smoking were found to be significantly associated with having sex. Cigarette smokers had seven times more chance of having multiple sexual partners when compared to non smokers (COR=6.96, 95%CI=2.69, 18.00). No factor had statistically significant association with age of sexual initiation.

All variables that have association (at significance level of 0.05) with the outcome variables in bivariate analysis were included in the multivariate regression model. After controlling for the effects of potentially confounding variables using multivariate logistic regression, being male and substance use such as khat chewing ,alcohol drinking and cigarette smoking were found to be significant associated with risky sexual behaviour. The odds of performing risky sex among males were 1.9 times higher than that of females (AOR=1.89, 95% CI=1.18, 3.04) .There was no significant association between risky sex and other socio-demographic variables in this study. Khat chewing had a higher odds of risky sexual behaviour with (AOR= 2.58, 95% CI=1.58, 4.22). Alcohol drinking and cigarette smoking also increase the odds of risky sexual behaviour with odds of (AOR=2.46, 95% CI=1.52, 3.98) and (AOR=2.22, 95% CI=1.19, 4.14) respectively. (Table 6 and 7)

Table 7: Association of socio-demographic variables with risky sexual behaviour of Haramaya university students,

Variables		Risky sexual behavior		COR (95% CI)	AOR (95% CI)
		Yes (%)	No (%)		
Campus					
	Main	147 (91.9)	72(86.7)	1.63 (0.95, 2.80)	1.23 (0.65, 2.33)
	Harar	13 (8.1)	11 (13.3)	1.00	1.00
Sex					
	Male	123(76.9)	56 (67.5)	2.56 (1.75, 3.75)*	1.89 (1.18, 3.04)*
	Female	37(23.1)	27 (32.5)	1.00	1.00
Year of study					
	1 st year	53 (33.1)	21 (25.3)	1.00	1.00
	2 nd year	44 (27.5)	24 (28.9)	1.04 (0.67, 1.62)	1.23 (0.73, 2.05)
	3 rd year	41(25.1)	24 (28.9)	0.99 (0.64, 1.53)	0.81 (0.48, 1.35)
	4 th & 5 th year	22 (13.1)	14 (16.9)	1.58 (0.91, 2.73)	0.84 (0.42, 1.68)
Religion					
	Orthodox	68 (42.5)	51 (61.4)	1.00	1.00
	Muslim	45 (28.1)	16 (19.3)	1.38 (0.91, 2.09)	1.27 (0.71, 2.27)
	Protestant	30 (18.8)	11 (13.3)	1.16 (0.73, 1.83)	1.76 (0.99, 3.12)
	Others	17 (10.6)	5 (6.0)	2.55 (0.88, 7.36)	5.52 (0.95, 15.6)
School type					
	Public high school	138 (86.2)	76 (91.6)	1.00	1.00
	Private high school	19 (11.9)	3 (3.6)	0.93 (0.54, 1.62)	2.42 (0.66, 8.90)
	Missionary high school	3 (1.9)	4 (4.8)	0.44 (0.15, 1.28)	0.58 (0.11, 2.97)

Table 8: Association of substance use with risky sexual behaviour of Haramaya university students

Variables	Risky sexual behaviour		COR (95% CI)	AOR (95% CI)
	Yes (%)	No (%)		
Khat ever use				
Yes	91 (56.9)	42 (50.6)	4.99 (3.49, 7.15)*	2.58 (1.58, 4.22)*
No	69 (43.1)	41 (49.4)	1.00	1.00
Alcohol ever use				
Yes	93 (58.1)	26 (31.3)	2.92 (2.06, 4.13)*	2.46 (1.52, 3.98)*
No	67 (41.9)	57 (68.7)	1.00	1.00
Tobacco ever use				
Yes	43 (26.9)	15 (18.1)	6.77(4.15,11.04)*	2.22 (1.19,4.14)*
No	117 (73.1)	68 (81.9)	1.00	1.00
Illicit substance ever use				
Yes	19 (11.9)	5 (6.0)	12.2 (4.8, 30.6)*	2.60 (0.87, 7.73)
No	141 (88.1)	78 (94.0)	1.00	1.00

6. Discussion

In this study an attempt has been made to assess the prevalence of different substance, magnitude of risky sexual behaviours and the association between substance use and risky sexual behaviour.

6.1. Substance use

The overall prevalence of "ever used drug" for at least one "drug" is 53.8%. The most commonly used drugs in descending order are: alcohol (41.7%), khat (30.3%), cigarette (11.3%) and other illicit substances (3.9%). This is lower than a similar study on four Kenyan universities which was 69.8% (24) and Nigerian high school students.(25)

In this study the current prevalence of khat chewing was found to be 20.3%, which is comparable with study done among university students in North West Ethiopia,17.5% (3) but lower than the study among Jimma University staffs which was 30.8%. (26)

The reasons given by the study participants for chewing khat were to increase academic (work) performance, to get personal pleasure, to stay awake and due to peer pressure. This is in line with other research done in Jimma, Gondar and Butajira. (3, 11, 26)

The lifetime prevalence of khat chewing was 30.3%. This result is slightly lower than the result of study done on Jimma university medical students (27), but higher than college students in north west Ethiopia (3) and Jazan district of Saudi Arabia (28).

The prevalence rate of lifetime alcohol use in this study was 41.7%, which is slightly higher than Jimma university medical students (27). It is apparent from the lifetime prevalence data that very few students had tried illicit drugs. This might be due to students didn't get these illicit drugs easily, and the possession and use of these drugs results in penalty under the law of the country.

6.2. Risky sexual behaviours

The mean age of sexual initiation (18.2 years) were comparable with other studies done among youths in Dire Dawa town and AAU students. (29, 30) However, the median age at first sexual debut of this study is greater almost by two years than the national survey result of EDHS (2005) which is 16.1 years.(31). This might be due to the difference in educational status of students with the general population. In this study, 33.5% of the participating students admitted having sexual experience which accounts 40.9% for males and 22.3% for females. This result is much lower than study done in GCMS but similar to the study among AAU students (29, 32).

The condom use rate during last intercourse among those sexually active students is 61.6%, but consistent condom use was reported by 55.7%. The result is much higher when compared to a study done among students of Gondar college of medical sciences, where 6.4% students used condom consistently (32).

Sex with commercial sex workers is reported by 16.3% of male students, which is higher than the study among Gondar College of Medical Science students which was 7.8%.

There was a significant and linear association between alcohol intake and risky sex with those using alcohol having about 2.4 times higher odds compared to those not using it. This might be due to the nature of alcohol in decreasing inhibitions, altering rational decision making and increasing risk taking behaviour. This result is consistent with the study done among in-school and out-of-school youths in Ethiopia (13). Use of substances other than illicit drugs also associated with risky sexual activities. Khat chewing and tobacco use were significantly associated with risky sex. This result is similar to the findings of similar studies done in different setup (2, 13, 16, 27). Studies showed that there

is a strong association between khat chewing and alcohol consumption, and the combined use of both drugs had an amplifying effect on sexual risk behaviours that predispose to HIV and other STIs(12). The association between illicit substance use and risky sexual behaviour disappears in the multivariate analysis. The relationship of risky behaviour and illicit substance use was strong in many literatures.(1, 4, 15) But absence of relationship between illicit drug use and sexual behaviour in this study could be as a result of small sample size which leads to small number of users of illicit substance or under-reporting of the use of these substances by students because of cultural or legal issues.

7. Strength and limitation of the study

7.1. Strength of the study

A high response rate of 95%

7.2. Limitation of the study

- All students might not give genuine answers to the questions they were asked. This might underestimate the prevalence of both substance use and risky behaviours.
- Cross-sectional nature of study, difficult to show causal association
- Self-reported information is subjected to reporting errors, missed values and biases

8. Conclusions and recommendations

8.1. Conclusions

The prevalence of substance use among Haramaya university students is high. In this study 41.7% of students drunk alcohol, 30.3% chew khat, 11.3% smoked cigarette and 3.9% of students used illicit drugs at least once in their lifetime.

The study also showed that the majority of the students who were sexually active engaged in unsafe and risky sexual practices. About 65.8% of sexually active students had one of the risky sexual behaviours and risky sexual practice is high among males than females.

The use of Khat, alcohol and tobacco products is significantly and independently associated with risky sexual behaviour among Haramaya University students.

8.2. Recommendations

Based on the findings of the study the following recommendations are made:

1. Universities should inform their students, especially freshman students, about the health and socioeconomic problems associated with substance use.
2. Haramaya University administration should improve the security in the campus compounds to control the use of substances inside the campuses and take the necessary measures to minimize and prevent sexual activities in the campus compounds.
3. Intervention activities to bring about behavioural changes among the students on the danger of use of Khat, alcohol and other drugs are recommended.
4. Students should be encouraged to practice premarital abstinence

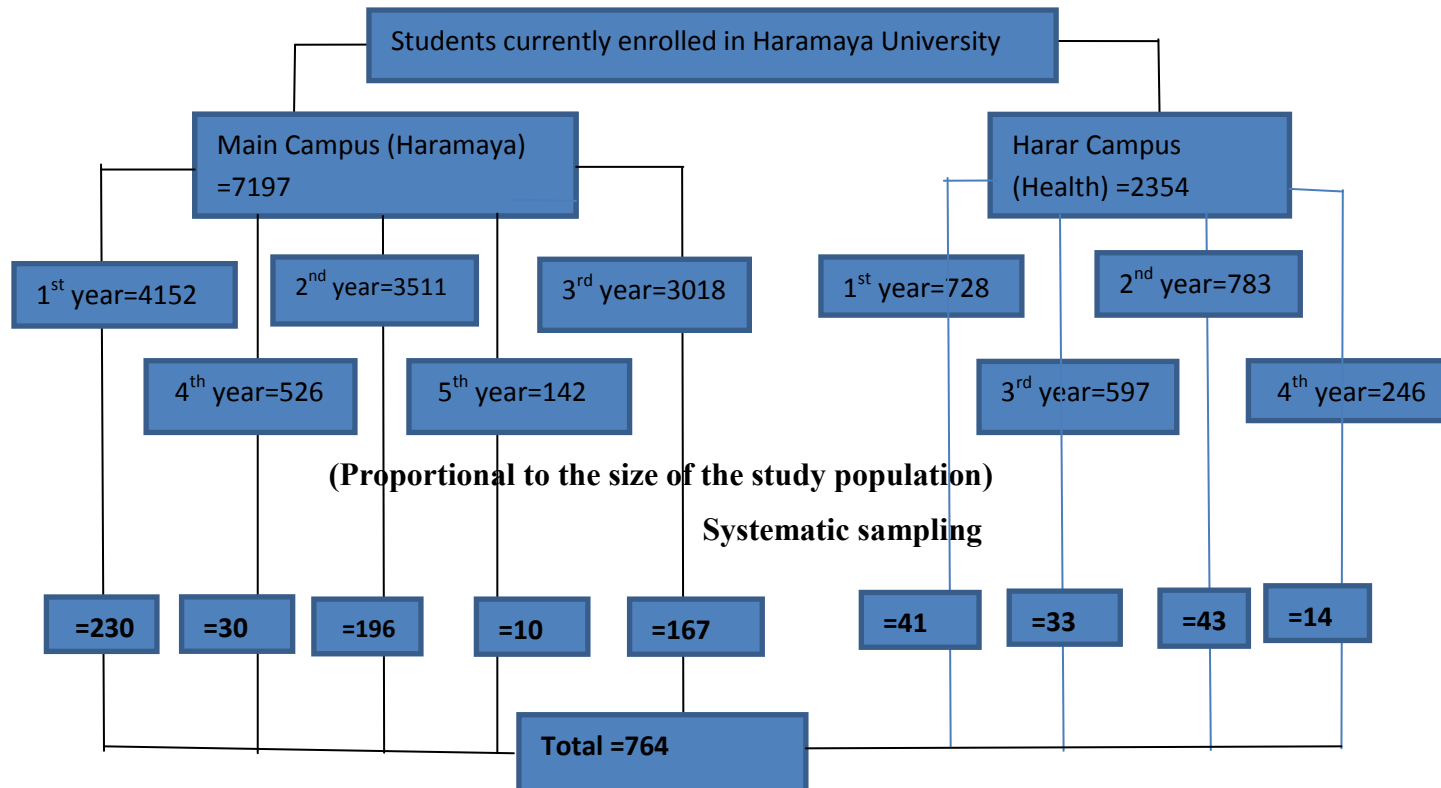
5. Consistent use of condom for sex before marriage regardless of partner characteristics should be encouraged among students.
6. Further study needs to be conducted to explore in to the association between substance use and HIV infection among different groups in Ethiopia.

9. References

1. Substance Use and Risky Sexual Activity: The Henry J. Kaiser Family Foundation 2002.
2. Dawit A, Debela A, Dejene A, Abebe A, Mekonnen Y, Degefa A, et al. Is khat-chewing associated with HIV risk behaviour? A community-based study from Ethiopia. *African Journal of AIDS Research*2006;5(1):61-9.
3. Kebede Y. Cigarette smoking and Khat chewing among college students in North West Ethiopia. *Ethiopian Journal of Health Development*2002;16(1):9-17.
4. John-Lengba J, Ezech A, Guiella G, Kumi-Kyereme A, Neema S. Alcohol, Drug Use, and Sexual-risk Behaviors among adolescents in four Sub-Saharan African countries. 2004.
5. UNFPA Ethiopia. Preventing HIV / AIDS. 2007; Available from: http://countryoffice.unfpa.org/ethiopia/2008/12/30/278/preventing_hiv_aids/.
6. World Health Organization. *Reducing risks, promoting healthy life*. Geneva2002.
7. Alice FY, Yu-Wen Chiu, Carolyn A, Min Qi Wang. STD/HIV-Related Sexual Risk Behaviors and Substance Use among U.S. Rural Adolescents. *Journal of The National Medical Association*2007;99(12):1386-94.
8. Abdul Basir M. Factors influencing HIV/AIDS risk behavior among freshman students in Afghan Universities. 2008.
9. Graves K. Risky sexual behavior and alcohol use among young adults: Results from a national survey. *American Journal of Health Promotion*1995;10.
10. Kalina O, Gerckova MA, Jircuska P, Orosova O, Van Dijk J, Reijneveld S. Psychological and behavioural factors associated with sexual risk behaviour among Slovak students. *BMC Public Health*2009;9(15).
11. Alem A, Kebede D, Kullgren G. The prevalence and socio-demographic correlates of khat chewing in Butajira, Ethiopia. *Acta Psychiatrica Scand*1999;100:84-91.
12. Abebe D, Debella A, Dejene A, Degefa A, Abebe A, Urga K, et al. Khat chewing habit as a possible risk behaviour for HIV infection: A case-control study. *Ethiopian Journal of Health Development*2005;19(3):174-81.
13. Kebede D, Alem A, Mitike G, Enquselassie F, Berhane F, Abebe Y, et al. Khat and alcohol use and risky sex behaviour among in-school and out-of-school youth in Ethiopia. *BMC Public Health*2005;5:109.
14. Yaw Amoateng A, Kalule-Sabiti I, Narayanan P. Substance use and sexual behavior among African adolescents in the North West province of South Africa *African Journal of Drug & Alcohol Studies*2007;6(1):27-37.
15. Seme A, Haile Mariam D, Worku A. The association between substance abuse and HIV infection among people visiting HIV counselling and testing centers in Addis Ababa, Ethiopia. *Ethiopian Journal of Health Development*2005;19(2):116-25.
16. Gálvez-Buccollini J, DeLea S, Herrera P, Gilman R, Paz-Soldan V. Sexual behavior and drug consumption among young adults in a shantytown in Lima, Peru. *BMC Public Health*2009;9(23).
17. Fekadu A, Alem A, Hanlon C. Alcohol and Drug Abuse in Ethiopia: Past, Present and Future. *African Journal of Drug & Alcohol Studies*2007;6(1):39-53.
18. Zein A. Polydrug abuse among Ethiopian University students with particular reference to khat (*catha edulis*). *American Journal of Tropical Medicine and Hygiene*1988;91:1-5.
19. Onja H, Michele R, Madelein R. Sexual behavior and condom use among university students in Madagascar. *Journal of Social Aspects of HIV/AIDS*2008;5(1):28-35.

20. Gashaw A, Afework K, Feleke M. Low prevalence of HIV infection, and knowledge, attitude and practice on HIV/AIDS among high school students in Gondar, Northwest Ethiopia. *Ethiopian Journal of Health Development* 2007;21(2):179-82.
21. (FHAPCO) FHAPaCO. Report on progress towards implementation of the UN Declaration of Commitment on HIV/AIDS. March, 2010.
22. Qiaoqin M, Masako O, Li Ming C. Sexual behavior and awareness of Chinese university students in transition with implied risk of sexually transmitted diseases and HIV infection: A cross-sectional study *BMC Public Health* 2006;232(6).
23. Haramaya University Registrar. 2010.
24. Atwoli L, A Mungla P, N Ndung'u M, C Kinoti K, Ogot E. Prevalence of substance use among college students in Eldoret, western Kenya. *BMC Psychiatry* 2011;11(34).
25. Oshodi O, Aina O, Onjole A. Substance use among secondary school students in an urban setting in Nigeria: prevalence and associated factors. *African Journal of Psychiatry* 2010;13:52-7.
26. Gelaw Y, Haile-Amlak A. Khat chewing and its socio-demographic correlates among the staff of Jimma University. *Ethiopian Journal of Health Development* 2004;18(3):179-84.
27. Meressa K, Mossie A, Gelaw Y. Effect of substance use on academic achievement of Health Officer and medical students of Jimma University, SouthWest Ethiopia. *Ethiop Journal of Health Sciences* 2009;19(3):155-63.
28. Ageely H. Prevalence of Khat chewing in college and secondary (high) school students of Jazan region, Saudi Arabia. *Harm Reduction Journal* 2009;6(11).
29. Regasa N, Kedir S. Attitudes and practices on HIV preventions among students of higher education institutions in Ethiopia: The case of Addis Ababa University. *International Research Journals* 2011;2(2).
30. Hiwot A. Assessment of factors contributing to voluntary counselling and testing (VCT) utilization among youth in Dire Dawa Administrative Council. MPH thesis presented to the School Of Graduate Studies Of Addis Ababa Universty 2008.
31. Central Statistics Agency. Ethiopia Demographic and Health Survey: CSA, A.A Ethiopia 2005.
32. Fitaw Y, Worku A. High-risk sexual behavior and pattern of condom utilization of the Gondar Collage of Medical Sciences (GCMS) Students, North-west Ethiopia. *Ethiopian Journal of Health Development* 2002;16(3):335-8.

ANNEX I: Schematic representation of sampling procedure



ANNEX II: Questionnaire (English)

I. Study Information sheet

In ensuring the health of adolescents the understanding of existing problems and related behaviors of this group of the population is important. You are cordially invited to participate in the study entitled “Assessment of substance use and risky sexual behaviors among Haramaya University students”. The study attempts to assess prevalence of substance use and its association with sexual risk behaviour. The research will help us understand the magnitude and relationship between substance use and sexual risk behaviors.

Title: Assessment of substance use and risky sexual behaviour among Haramaya University students

Purpose of the study: This study is planned to generate information on substance use and sexual behaviour of the university students that can be used to design effective health intervention programs.

Procedure: The choice is made randomly using lottery method. If you are willing to participate in this study, you will fill the attached questionnaire. We would expect you to complete the questionnaire yourself, during your class hour. The completion time is about 20 to 30 minutes and you may find some of the questions asked sensitive in nature.

Risks and benefits of the study: By participating in this study, and answering our questions, you will not receive any direct benefit. However, you will help to increase our understanding of the needs of the university adolescents in terms of sexual and reproductive health. We hope that the results of the study will improve and make more acceptable the services currently available to you. Your participation in this study will not involve any risks to you.

Rights: Your participation in this study is voluntary and you have the right to refuse to participate or to answer any questions that you feel uncomfortable with. If you change your mind about participating during the course of the study, you have the right to withdraw at any time. The decision to not to participate or to withdraw will not affect any aspects of your university life, any future medical care you should require or any other benefits to

which you would be entitled. If there is anything that is unclear or you need further information, we shall be delighted to provide it.

Confidentiality: Please do not write your name and provide as sincere answers as you possibly could. The information that you provide during the study will be kept confidential. Only the researchers will have access to the questionnaires and the information that you provide.

If you have any question you can contact the principal investigator at any time convenient for you using the following address:

Name: Andualem Derese

Phone number: 0911-05 33 69

Address: Addis Ababa, Ethiopia

E-mail: andudere@yahoo.com

II. Informed consent form

Students self-reporting questionnaire

I have got sufficient information through description of the study entitled “Assessment of substance use and risky sexual behaviors among Haramaya University students” by reading the information sheet.

I know that I can refuse to participate in the study without penalty or loss of benefit to which I would have been otherwise entitled. I have the right to withdraw from this study any time I want, without any negative impact on me. Hereby, I voluntarily participate in this study.

Signature: _____

Date: _____

III. Questionnaire for Cross-sectional assessment

Assessment of substance use and risky sexual behaviors among Haramaya University students

Questionnaire SN _____ Name of data collector _____

Date of data collection _____ Department _____

Please read the following questions very carefully and then answer them by circling the code.

Part I: SOCIODEMOGRAPHIC INFORMATION

No.	Questions	Coding categories	Code
Q101	How old are you?	Age in years _____	
Q102	Sex of the respondent	Male Female	1 2
Q103	What is your current level of study year?	1 st year 2 nd year 3 rd year 4 th year 5 th year	1 2 3 4 5
Q104	What is your religion?	Orthodox Islam Protestant Catholic I have no religion Others (Specify _____)	1 2 3 4 5 6
Q105	How often do you go to church or mosque?	Everyday At least Once a week At least Once a month At least once in a year Never	1 2 3 4 5

Q106	How important is religion in your life?	Very important Somewhat important Not important	1 2 3
Q107	What is your marital status now?	Never married Married Cohabiting Divorced Widowed Separated	1 2 3 4 5 6
Q108	What is your ethnicity?	Oromo Amhara Tigre Wolaita Harari Somale Gurage Others	1 2 3 4 5 6 7 8
Q109	Residence (where you lived before):	Urban Rural	1 2
Q110	Where did you attend your high school?	Public/governmental high school Private high school Religious/missionary high school Others(specify)_____	1 2 3
Q111	What is your average monthly pocket money you get from family/relatives in Birr? (excluding expenditure for food item)	None <100 100-299 300-499 >500	1 2 3 4 5

Part II: SUBSTANCE USE

The following questions focuses on khat chewing practice, alcohol drinking, cigarette smoking and other substance use like hashish, so you are requested to give answers genuinely about your personal behaviour on the use of these substances and circle on your choice.

No.	Questions	Yes	No
1. The following three questions are specific to khat chewing practice			
201	Have you ever used khat in your life?	Yes	No, Go to Q 206
202	How often do you chew khat? Never Occasionally Always I used to (but not now)	1 2 3 4	
203	Have you used khat in the last 3 months?	Yes	No
204	If your answer is yes for Q201 or Q203, when did you start chewing khat?	1.Before joining the university 2.After joining the university	
205	If your answer is yes for Q201 or Q203, what was your reason(s) to use khat? (Multiple answers are possible)		
	a. To increase work or academic performance	Yes	No
	b. To get relief from tension	Yes	No
	c. To stay awake	Yes	No
	d. Due to religious practice	Yes	No
	e. To get acceptance from others (to be like others)	Yes	No
	f. To be sociable	Yes	No
	g. To get personal pleasure	Yes	No
	h. To increase pleasure during sexual practice	Yes	No
	i. Due to peer influence	Yes	No
	j. Due to academic dissatisfaction	Yes	No

	k. Other (specify)	Yes	No
2. The following five questions are specific to Alcohol drinking habits			
206	Have you ever used alcoholic drinks (like „äreke“, „tela“, „tej“, beer, draft, wine or other alcohol drinks) in your life?	Yes	No, Go to Q211
207	How often do you drink alcoholic drinks? Never Occasionally Always I used to (but not now)	1 2 3 4	
208	Have you used any kind of alcoholic drinks in the last 3 months?	Yes	No
209	If your answer is yes for Q208, when did you start drinking alcohol?	1.before joining university 2.after joining university	
210	If your answer is yes for Q208, what was your reason(s) to use alcohol? (Multiple answers are possible)	Yes	No
	a. To increase work or academic performance	Yes	No
	b. To get relief from tension	Yes	No
	c. To stay awake	Yes	No
	d. Due to religious practice	Yes	No
	e. To get acceptance from others (to be like others)	Yes	No
	f. To be sociable	Yes	No
	g. To get personal pleasure	Yes	No
	h. To increase pleasure during sexual practice	Yes	No
	i. Due to peer influence	Yes	No
	j. Due to academic dissatisfaction	Yes	No
	k. Other (specify)	Yes	No
The following five questions are specific to cigarette (tobacco) use			
211	Have you ever used tobacco products such as cigarette, wrapped tobacco leaf, pipa or chewable tobacco products in your life?	Yes	No, Go to Q216
212	How often do you use tobacco products?		

	Never	1	
	Occasionally	2	
	Always	3	
	I used to (but not now)	4	
213	Have you used any kind of tobacco products in the last 3 months?	Yes	No
214	If your answer is yes for Q215, when did you start using tobacco products?	1.before joining university 2.after joining the university	
215	If your answer is yes for Q215, what was your reason(s) to use tobacco products? (Multiple answers are possible)	Yes	No
	a. To increase work or academic performance	Yes	No
	b. To get relief from tension	Yes	No
	c. To stay awake	Yes	No
	d. Due to religious practice	Yes	No
	e. To get acceptance from others (to be like others)	Yes	No
	f. To be sociable	Yes	No
	g. To get personal pleasure	Yes	No
	h. To increase pleasure during sexual practice	Yes	No
	i. Due to peer influence	Yes	No
	j. Due to academic dissatisfaction	Yes	No
	k. Other (specify)	Yes	No
The following five questions are specific to illicit substances such as Hashish and others			
216	Have you ever used illicit substances like hashish, pat, gaya, cannabis, ganja, heroin or others in your life?	Yes	No,Go to Q301
217	How often do you use substances like hashish, cannabis etc? Never Occasionally Always I used to (but not now)	1 2 3 4	
218	Have you used such illicit substances in the last 3 months?	Yes	No

219	If your answer is yes for Q222, when did you start using substances like hashish?	1.before joining university 2.after joining the university	
220	If your answer is yes for Q222, what was your reason(s) to use these substances? (Multiple answers are possible)	Yes	No
	a. To increase work or academic performance	Yes	No
	b. To get relief from tension	Yes	No
	c. To stay awake	Yes	No
	d. Due to religious practice	Yes	No
	e. To get acceptance from others (to be like others)	Yes	No
	f. To be sociable	Yes	No
	g. To get personal pleasure	Yes	No
	h. To increase pleasure during sexual practice	Yes	No
	i. Due to peer influence	Yes	No
	j. Due to academic dissatisfaction	Yes	No
	k. Other (specify)	Yes	No

Part III: RISKY SEXUAL BEHAVIOR

The following questions assess the sexual risk behaviours.

No	Question	Coding categories	Code
301	Have you ever had sexual intercourse?	Yes No	1 2
302	If your answer is yes for Q301, when did you have your first sexual intercourse?	1. Before I joined the University 2. After I joined the university a. In the university campus b. Outside the university campus	
303	How old were you when you had sexual intercourse for the first time?	I have never had sexual intercourse _____ years of age	
304	What was the reason for your first sex?	1. I have never had sexual intercourse 2. In a marriage 3. Personal desire (curiosity) 4. Peer pressure 5. Promising word from partner(for marriage) 6. For financial purpose(to get money) 7. For passing examination(for grade)	

		8. By force against my will 9. Others(specify)_____	
305	With whom did you make your first sexual intercourse?	1. I have never had sexual intercourse 2. Spouse 3. Boy/girl friend 4. Teacher 5. Stranger 6. Commercial sex worker 7. Other(specify)_____	
306	During your life, with how many people have you had sexual intercourse?	I have never had sexual intercourse _____ number of partners	
307	During the past 3 months , with how many people did you have sexual intercourse?	I have never had sexual intercourse	1
		I have had sexual intercourse, but not during the past 3 months	2
		1 person	3
		2 people	4
		3 or more people	5
308	Did you use alcohol, before you had sexual intercourse the last time?	I have never had sexual intercourse	1
		Yes	2
		No	3
309	Did you use khat, before you had sexual intercourse the last time?	I have never had sexual intercourse	1
		Yes	2
		No	3
310	Did you use cigarette, before you had sexual intercourse the last time?	I have never had sexual intercourse	1
		Yes	2
		No	3
311	Did you use illicit drugs like hashish, ganja, heroin etc before you had sexual intercourse the last time?	I have never had sexual intercourse	1
		Yes	2
		No	3
312	The last time you had sexual intercourse did you or your partner use a condom?	I have never had sexual intercourse	1
		Yes	2
		No	3
313	What were the reasons for you not to use condom during sexual intercourse?	1.I used condoms always 2.I was intoxicated with drugs 3.Dislike condoms 4.Couldn't find condom	

		5.I was in love with my partner 6.I have trusted my partner 7.My partner didn't like condom to be used 8.Didn't have reason to use 9.Others (specify)	
314	The last time you had sexual intercourse, what one method did you or your partner used to prevent pregnancy? (Select only one response.)	I have never had sexual intercourse No method was used to prevent pregnancy Birth control pills Condoms Depo-Provera (injectable birth control) Withdrawal Some other method(specify)_____ Not sure	1 2 3 4 5 6 7 8 9
315	How many times have you been pregnant? (FOR FEMALE RESPONDENTS ONLY)	0 times 1 time 2 or more times	1 2 3
316	What was the outcome of the pregnancy?	I have never been pregnant Currently pregnant Abortion Live birth	1 2 3 4
317	Have you ever experienced forced sexual intercourse?	Yes No	1 2
318	Have you ever forced someone to engage in sexual intercourse with you?	Yes No	1 2
319	Have you ever had genital symptoms of STIs (ulceration or discharge from your genitalia)	Yes No	1 2
320	If yes for Q315, did you seek medical care from a health institution?	Yes No	1 2
321	Have you ever had sex with the Person you have known for a period of less than 3 weeks (casual partner)?	Yes No	1 2

322	Do you always use condom for sex with casual partner (person you have known for less than 3 weeks)?	Yes No	1 2
323	Males only: Have you ever had sex with commercial sex worker?	Yes No	1 2
324	Have you ever had sex in exchange for economic or other benefit?	Yes No	1 2
325	If you have never had sex, what was the reason for not practicing sex?	1. Haven't get sexual partner 2. Religion prohibition 3. Fearing pregnancy 4. Fearing Sexually transmitted disease 5. Not mature 6. Others(specify) _____	1 2 3 4 5 6

ANNEX III: Amharic Questionnaire

የአደንዛዥ እፅ አጠቃቀምን እና ለኤች ኦይ ቪ የሚያጋልጡ ወሲባዊ ባህርያትን ለመዳሰስ የተዘጋጀ መጠይቅ

ይህ ጥናት ጠቃሚ እንዲሆን እያንዳንዱ ጥያቄ በጥንቃቄ መመለስ አለበት፡፡ የሚመለሱት መልሶች በአስተማማኝ ሁኔታ በሚጠየቁ ይጠበቃሉ፡፡ በመጠይቁ ላይ ስም አይፃፍም፡፡ ለእያንዳንዱ ጥያቄ መልስ ከመስጠትዎ በፊት መመሪያውን በትክክል ስለማንበብዎ እርግጠኛ ይሁኑ፡፡

ይህ መጠይቅ ፈተና አይደለም፡፡ ትክክለኛ ወይም ስህተት መልሶች የሉም፡፡ ነገርግን እያንዳንዱን ጥያቄ በጥንቃቄ በማንበብ ለእርስዎ ትክክለኛ የመሰለዎትን ቁጥር በማክበብ መልስ ይስጡ፡፡

የመጠይቅ መ.ቁ _____ የሚጀምሩ ስብሰባው ስም _____

ሚጀምሩ የተሰበሰበበት ቀን _____ የት/ት ክፍል (Department) _____

ክፍል 1፡ - ማህበራዊና ደምግራፊያዊ ሁኔታ

ከዚህ በታች ያሉትን ስለእርስዎ ማህበራዊናደምግራፊያዊ ሁኔታ የሚጠይቁ 11 ጥያቄዎችን በጥንቃቄ በማንበብ ለእያንዳንዱ መልስ ይስጡ፡፡

ተ.ቁ	ጥያቄዎች	የኮድ ክፍሎች	ኮድ
101	ዕድሜ	_____ ዓመት	
102	ፆታ	ወንድ ሴት	1 2
103	ስንተኛ ዓመት ተማሪ ነህ/ሽ?	1ኛዓመት 2ኛዓመት 3ኛዓመት 4ኛዓመት 5ኛዓመት	1 2 3 4 5
104	ሃይማኖት	ኦርቶዶክስ እስላም ፕሮቴስታንት ካቶሊክ ሃይማኖትየ ሌላው ሌላ (ይጠቀስ) _____	1 2 3 4 5

105	ወደ ቤተክርስቲያን ወይም መስጅድ መቼ መቼ ትሄዳለህ/ሽ?	በየቀኑ ቢያንስ በሳምንት አንዴ ቢያንስ በወር አንዴ ቢያንስ በዓመት አንዴ በፍጹም ሄጄ አላወቅም	
106	በህይወትህ/ሽ ውስጥ ሃይማኖት ምን ያህል ጠቃሚ ነው?	በጣም ጠቃሚ በመጠኑ ይጠቅማል ምንም አይጠቅምም	
107	ባህት ጊዜ የጋብቻ ሁኔታ	ያላገባ /ያላገባች ያገባ /ያገባች ሳይጋቡ አብረዉ በመኖር ላይ ያሉ በፍቺየ ተለያዩ አግብቶ በሞት የተለያዩ	1 2 3 4 5
108	ብሔር	ኦሮሞ አማራ ትግሬ ወላይታ ሀረሪ ሰሜኤ ጉራጌ ሌላ (ይገለፅ) _____	1 2 3 4 5 6 7
109	ወደ ዩኒቨርሲቲ ከመግባትዎ በፊት የኖሩበት ቦታ	ከተማ ገብር	
110	የከፍተኛ ሁለተኛ ደረጃ ትምህርት የተከታተልከዉ/የተከታተልሽዉ በምን አይነት ትምህርት ቤት ነዉ?	በህዝብ/በመንግስት ት/ቤት በግል ት/ቤት በሃይማኖታዊ/missionary ት/ቤት በሌላ (ይገለጽ) _____	
108	ከቤተሰብ/ከዘመድ የምታገኘዉ/የምታገኘዉ ወርሃዊ ገቢ ምን ያህል ነ ወ? (የምግብ ወጪ ሳይጨምር)	ምንም የለም ከመቶ ብር በታች ከ100 እስከ 299 ብር ከ300 እስከ 499 ብር 500 ብር እና ከዛ በላይ	

ክፍል ሁለት፡ - (Substance use)

ከዚህ ቀጥሎ የሕመሙ ምልክቶች ሲጋራ እና አደንዛዝ ያላቸው ሕመምተኞች የሚከተሉት ጥያቄዎችን መሙላት ይጠበቃቸዋል፡ ስለእርስዎ ምትክ ከሐኪም ወይም ሌላ ሰው ማግኘት ይገባል፡፡

ተ.ቁ	ጥያቄዎች	አዎ	አይደለም
1. ቀጥሎ ያሉት አምስት ጥያቄዎች የሕመሙ አጠቃቀምን ይመለከታሉ			
201	በህይወት ዘመንዎ ሕመሙ ቅመሙ ያወቃሉ?	አዎ	አላወቅም
202	ሕመሙ በምን ያህል ጊዜ ትቅማለህ/ትቅሚያለሽ? ○ በጭራሽ ሕመሙ ቅመሙ አላወቅም ○ አልፎ አልፎ ○ ሁል ጊዜ ○ በፊት እቅም ነበር (አሁን ግን አቁሜያለሁ)		
203	ባለፉት 30 ቀናት ሕመሙ ቅመሙ ያወቃሉ?	አዎ	አላወቅም
204	ለጠያቂ ቁጥር 201 መልስህ/ሽ አዎ ከሆነ ሕመሙ መቃም የጀመርከዉ/የጀመርሽዉ መቼ ነዉ?	○ የኒቨርሲቲ ከመግባቱ በፊት ○ የኒቨርሲቲ ከገባሁ በኋላ	
205	ለጠያቂ ቁጥር 201 መልስህ/ሽ አዎ ከሆነ ሕመሙ ለመቆም ምክንያትዎ ምን ነበር? (ከአንድ በላይ መልስ በመክበብ መስጠት ይቻላል) ሀ. የሥራ ወይም የጥናት ትጋትን ለመጨረሻ ለ. ከመንፈስ ጭንቀት ለማረፍ ሐ. ንቁ ሆኖ ለመቆየት መ. የሃይማኖት ልማድ ስለሆነ ሠ. በሌሎች ተቀባይነት ለማግኘት/ ሌሎችን ለመመከል ረ. ተግባቢ ለመሆን ሰ. ለመጽናንት ሸ. በግብረሰጋ ግንኙነት ጊዜ ደስታን ለመጨረሻ ቀ. በጓደኛ ግፊት በ. በትምህርት ዉጤት ባለመርካት ምክንያት ተ. ሌላ ይጠቅስ		
2. የሚከተሉት አምስት ጥያቄዎች የአልኮል መጠጦች አጠቃቀምን የሚመለከቱ ናቸው፡፡			

206	በህይወት ዘመንዎ የአልኮል መጠጥ ጠጥተው ያወቃሉ? (ማለትም አረቄ፣ ጠላ፣ ጣጅ፣ ቢራ ወይን የመሳሰሉትን)	አዎ	አላወቅም
207	የአልኮል መጠጥ በምን ያህል ጊዜ ትቅማለህ/ትቅሚያለሽ? ○ በጭራሽ የአልኮል መጠጥ ጠጥቼ አላወቅም ○ አልፎ አልፎ ○ ሁል ጊዜ ○ በፊት የአልኮል መጠጥ እጠጣ ነበር (አሁን ግን አቁሜያለሁ)		
208	ባለፉት 30 ቀናት የአልኮል መጠጥ ጠጥተው ያወቃሉ?	አዎ	አላወቅም
209	ለጥያቄ ቁጥር 206 መልስህ/ሽ አዎ ከሆነ ጫት መቃም የጀመርከዉ/የጀመርሽዉ መቼ ነዉ?	○ ዩኒቨርሲቲ ከመግባቴ በፊት ○ ዩኒቨርሲቲ ከገባሁ በኋላ	
210	ለጠያቂ ቁጥር 206 መልስህ/ሽ አዎ ከሆነ የአልኮል መጠጥ ለመጠቀም ምክንያትህ/ሽ ምን ነበር? (ከአንድ በላይ መልስ በማክበብ መስጠት ይቻላል) ሀ.የሥራ ወይም የጥናት ትጋትን ለመጨመር ለ.ከመንፈስ ጭንቀት ለመሄፍ ሐ.ንቁ ሆኖ ለመቆየት መ.የሃይማኖት ልመድ ስለሆነ ሠ.በሌሎች ዘንድ ተቀባይነት ለመግኘት/ ሌሎችን ለመማከል ረ.ተግባቢ ለመሆን ሰ.ለመፍሰት ሸ.በግብረሰጋ ግንኙነት ጊዜ ደስታን ለመጨመር ቀ.በጓደኛ ግፊት በ.በትምህርት ዉጤት ባለመርካት ምክንያት ተ.ሌላ ይጠቁስ		
3. የሚከተሉት አምስት ጥያቄዎች የትምህርት ዉጤቶች አጠቃቀምን የሚመለከቱ ናቸው፡፡			
211	በህይወት ዘመንዎ የትንባሆ ውጤት የሆነ ነገር ማለትም ሲጋራ፣ ጥቅል ትንባሆ፣ ፒፓ ወይም የሚታኘክ ትንባሆ አጭሰው ወይም አላምጠው ያወቃሉ?	አዎ	አላወቅም
212	የትንባሆ ውጤት የሆነ ነገር በምን ያህል ጊዜ ትቅማለህ/ትቅሚያለሽ? ○ በጭራሽ የትንባሆ ውጤት የሆነ ነገር ተጠቅሜ አላወቅም ○ አልፎ አልፎ ○ ሁል ጊዜ ○ በፊት የትንባሆ ውጤት የሆነ ነገር እጠቀም ነበር (አሁን ግን አቁሜያለሁ)		
213	ባለፉት 30 ቀናት የትንባሆ ወጠኑ የሆነ ነገር ተጠቅመዉ ያወቃሉ?	አዎ	አላወቅም

214	ለጥያቄ ቁጥር 211 መልስህ/ሽ አዎ ከሆነ የትንባሆ ውጤት የሆነ ነገር መጠቀም የጀመርከዉ/የጀመርሽዉ መቼ ነዉ?	○ የኒቨርሲቲ ከመግባቴ በፊት ○ የኒቨርሲቲ ከገባሁ በኋላ	
215	ለጥያቄ ቁጥር 211 መልስህ/ሽ አዎ ከሆነ የትንባሆ ወጠክ ለመጠቀም ምክንያትህ/ሽ ምን ነበር? (ከአንድ በላይ መልስ መስጠት ይቻላል)		
ሀ .የሥራወይም ጥናት ትጋትን ለመጨረር ለ . ከመንፈስ ጭንቀት ለመሄድ ሐ .ንቁሆኖ ለመቆየት መ.የሃይማኖት ልማድ ስለሆነ ሠ.በሌሎች ተቀባይነት ለማግኘት/ ሌሎችን ለመግዛል ረ .ተግባብሎ መሆን ሰ .ለመደሰት ሸ .በግብረሰጋግን ፍን ትጊዜ ደስታን ለመጨረር ቀ .በጓደኛ ግፊት በ .በትምህርት ባለመርካት ምክንያት ተ .ሌላ ይጠቀስ			
4 . የሚከተሉት ጥያቄዎች ስለ አደንዛዥ ዕዎች አጠቃቀም የሚጥሉ ክፍሎች ናቸው :			
216	በህይወት ዘመንዎ አደንዛዥ ዕዎችን መለትም ሃሺሽ፣ ሀይት፣ ካናበስ፣ ጋንጃ ወይም ሄሮይንና የመሳሰሉትን ተጠቅመው ያወቃሉ?	አዎ	አላወቅም
217	አደንዛዥ ዕዎችን በምን ያህል ጊዜ ትቅማለህ/ትቅሚያለሽ? ○ በጭራሽ አደንዛዥ ዕዎችን ተጠቅሜ አላወቅም ○ አልፎ አልፎ ○ ሁል ጊዜ ○ በፊት አደንዛዥ ዕዎችን አጠቀም ነበር (አሁን ግን አቁሜያለሁ)		
218	ባለፉት 30 ቀናት አደንዛዥ ዕዎችን ተጠቅመው ያወቃሉ?	አዎ	አላወቅም
219	ለጥያቄ ቁጥር 216 መልስህ/ሽ አዎ ከሆነ አደንዛዥ ዕዎችን መጠቀም የጀመርከዉ/የጀመርሽዉ መቼ ነዉ?	○ የኒቨርሲቲ ከመግባቴ በፊት ○ የኒቨርሲቲ ከገባሁ በኋላ	
219	ለጥያቄ ቁጥር 211 መልስህ/ሽ አዎ ከሆነ አደንዛዥ ዕዎችን ለመጠቀም ምክንያትዎ ምን ነበር? (ከአንድ በላይ መልስ መስጠት ይቻላል)		
ሀ .የሥራወይም ጥናት ትጋትን ለመጨረር ለ . ከመንፈስ ጭንቀት ለመሄድ			

	ሐ.ንቁሆኖለመቆየት መ.የሃይማኖትልማድስለሆነ ሠ.በሌሎችተቀባይነትለማግኘት/ ሌሎችንለመመከል ረ.ተግባብለመሆን ሰ.ለመደሰት ሸ.በግብረሰጋግንኙነትጊዜደስታንለመጸጸጥ ቀ.በጓደኛግፊት በ.በትምህርትባለሙያነትጥንቃቄ ተ.ሌላይጠቀስ		
--	---	--	--

ክፍል ሦስት፡- Risky sexual behaviors (ለHIV/AIDS የሚጋልጡ ወሲብ ነክ ባህሪያትን የሚጥክኩ ጠያቂዎች)

ተ.ቁ	ጥያቄዎች	የኮድ ክፍሎች	ኮድ
301	የግብረሰጋግ ግንኙነት አድርገህ/ሽ ታውቃለህ/ሽ?	አዎ አድርጌ አላወቅም	1 2
302	ለጥያቄ ቁጥር 301 መልስህ/ሽ አዎ ከሆነ፤ ለመጀመሪያ ጊዜ የግብረሰጋግ ግንኙነት የጀመርከው/የጀመርሽው መቼ ነው?	1. የኒቨርሲቲ ከመግባቴ በፊት 2. የኒቨርሲቲ ከገባሁ በኋላ ○ በየኒቨርሲቲው ቅጥር ግቢ ውስጥ ○ ከየኒቨርሲቲው ቅጥር ግቢ ውጭ	
303	ለመጀመሪያ ጊዜ የግብረሰጋግ ግንኙነት ሲያደርጉ አድሚዎ ሥንት ነበር?	■ የግብረሰጋግ ግንኙነት አድርጌ አላወቅም ■ ዓመት	
304	የግብረሰጋግ ግንኙነት ለመጀመር ምክንያትህ/ሽ ምን ነበር?	• የግብረሰጋግ ግንኙነት አድርጌ አላወቅም • ባል/ሚስት ሳገባ • በግል ፍላጎት(ለማወቅ) • በጓደኛ ግፊት • በፍቅር ጓደኛዬ ለጋብቻ ቃል ስለተገባልኝ • ገንዘብ ለመማግኘት ስል • በፈተና ለማለፍ (ለግፊት ብዬ) • ከፍላጎቴ ውጪ ተገድጄ • ሌላ (ይጠቀስ)_____	
305	ለመጀመሪያ ጊዜ የግብረሰጋግ ግንኙነት ያደረግከው/ያደረሽኩ ከማን ጋር ነበር?	1. የግብረሰጋግ ግንኙነት አድርጌ አላወቅም 2. ከባል/ሚስት ጋር 3. Boyfriend/Girlfriend 4. ከአስተማሪዬ ጋር 5. ከማላወቀው ሰው ጋር 6. ከቡና ቤት ሴት ጋር 7. ሌላ (ይገለጽ)_____	

306	በህይወት ዘመን ያህል ሰዎች ጋር የግብረሰጋ ግንኙነት አድርገዋል?	የግብረሰጋ ግንኙነት አድርጌ አላውቅም ሰዎች ጋር	
307	ባለፉት 3 ወራት ከስንት ሰዎች ጋር ግብረ ሰጋ ግንኙነት አድርገዋል?	- ግንኙነት አድርጌ አላውቅም - ግንኙነት አድርጌ አውቃለሁ ነገር ግን ባለፉት 3 ወራት አይደለም - ከ 1 ሰው ጋር - ከ 2 ሰው ጋር - ከ 3 እና ከዛም በላይ ሰዎች ጋር	
308	በቅርብ ጊዜ (ለሜጄሻ ጊዜ) ግንኙነት ከማድረግዎ በፊት ጫቶ ቅመው ነበር?	○ ግንኙነት አድርጌ አላውቅም ○ አዎ ቅመኔ ነበር ○ አይ አልቃዎኝም	
309	ለሜጄሻ ጊዜ የግብረሰጋ ግንኙነት ከማድረግዎ በፊት አልኮል ነክ መጠቀሙን ማለትም ጠለ፡ አረቄ፡ ጠጅ፡ በራ፡ ወይን የመሳሰሉትን ጠጥተው ነበር?	- ግንኙነት አድርጌ አላውቅም - አዎ ጠጥቼ ነበር - አይ አልጠጥኳም	
310	ለመጨረሻ ጊዜ የግብረሰጋ ግንኙነት ከማድረግዎ በፊት ሲጋራ ተጠቅመዉ ነበር?	- ግንኙነት አድርጌ አላውቅም - ተጠቅመኔ ነበር - አይ አልተጠቅመኝም	
311	ለመጨረሻ ጊዜ የግብረሰጋ ግንኙነት ከማድረግዎ በፊት አደንዛኸፀዎችን ማለትም ሃሺሽ፡ጋንጃ፡ሄሮይን የመሳሰሉትን ተጠቅመዉ ነበር?	○ ግንኙነት አድርጌ አላውቅም ○ ተጠቅመኔ ነበር ○ አይ አልተጠቅመኝም	
312	ለሜጄሻ ጊዜ የግብረሰጋ ግንኙነት ሲያደርጉ እርስዎ ወይም የፍቅር ጓደኛዎ ኮንዶም ተጠቅመው ነበር?	- ግንኙነት አድርጌ አላውቅም - አዎ ተጠቅመኔ ነበር - አይ አልተጠቅመኝም	
313	በግብረሰጋ ግንኙነት ጊዜ ኮንዶም ላለመጠቀም ምክንያቱ ምን ነበር? (ከአንድ በላይ ማልስ ይቻላል)	1. ሀልጊዜ ኮንዶም አጠቃላይ 2. ግንኙነት አድርጌ አላውቅም 3. ኮንዶም ስለሞጠለ ነው 4. ኮንዶም በቀላሉ ማግኘት ስላልቻልኩ ነው 5. ጓደኛዬን ስለሚቀረው/ረት ነው 6. ጓደኛዬን ስለማማወጥ ነው 7. ጓደኛዬ ኮንዶም እንደጠቀመ ስለማይፈልግ / ስለማይፈልግ ነው 8. ላለመጠቀም ምክንያት አልነበረኝም 9. ሌላ (ይገለፅ)	
314	ለሜጄሻ ጊዜ ግንኙነት ሲያደርጉ እርስዎ ወይም የፍቅር ጓደኛዎ ተጠቅመውት የነበረዉ የእርግዝና መከላከያ ዘዴ ምን ነበር? (አንዱን ብቻ ይምረጡ)	1. ግንኙነት አድርጌ አላውቅም 2. ምንም ዓይነት የእርግዝና መከላከያ አልተጠቀምኝም 3. የወሊድ መቆጣጠሪያ ከኒን 4. ኮንዶም 5. በሚፈጽሙ የሚገኙ የወሊድ መቆጣጠሪያ 6. ምን እንደተጠቀምኩ እርግጠኛ አይደለሁም 7. ሌላ (ይገለፅ)	
315	<u>ለሴት ተሜዎች ብቻ</u>	እርግጠኛ አላውቅም	1
		1 ጊዜ	2

	1. ስንት ጊዜ አርግዘሽ ታውቂያለሽ?	2 እና ከዚያ በላይ	3
	2. የእርግዝናዉ ዉጤት ምን ነበረ?	አርግዜ አላወቅም አሁንም ነፍሰጡር ነኝ አስወርጄአለሁ ወለጄአለሁ	1 2 3 4
316	በህይወት ዘመንዎ አስገድደው የግብረሰጋ ግንኙነት አድርገው ያወቃሉ?	አዎ አይ / አላወቅም	1 2
317	በህይወት ዘመንዎ ተገደው የግብረሰጋ ግንኙነት አድርገው ያወቃሉ?	አዎ አይ	1 2
318	በህይወት ዘመንዎ የአባላዘር በሽታ ምልክቶች (የብልት አካባቢ ቁስል ወይም ከብልት ሽታ ያለዉ ፈሳሽ መመዝን) አጋጥሞ/ሽ ያዉቃል?	አዎ አይ	1 2
319	ለጠያቂ ቁጥር 318 መልስህ/ሽ አዎ ከሆነ፤ ለህመሙ ወደ ህክምና ተቋም በመሄድ ታከመሃል/ታከመሻል?	አዎ አይ	1 2
320	በህይወት ዘመንዎ ከ 3 ሳምንት ላነሰ ጊዜ ከሚያውቁት ሰው ጋር የግብረ ሥጋ ግንኙነት አድርገው ያዉቃሉ?	አዎ አይ	
321	ከ 3 ሳምንት ላነሰ ጊዜ ከሚያውቁት ሰው ጋር የግብረ ሥጋ ግንኙነት ባደረጉ ጊዜ ሁሉ ኮንዶም ተጠቅመዉ ነበር?	አዎ አይ	
322	ለወንዶች ብቻ በህይወት ዘመንህ ከቡና ቤት ሴት ጋር የግብረሰጋ ግንኙነት አድርገህ ታዉቃለህ?	አዎ አይ	
323	የገንዘብ ጥቅም ለማግኘት ብለህ/ሽ የግብረሰጋ ግንኙነት አድርገህ/ሽ ታዉቃለህ/ታዉቂያለሽ?	አዎ አይ	
324	የግብረሰጋ ግንኙነት አድርገህ/ሽ የማታወቅ/ቂ ከሆነ፤ ላለማድረግህ/ሽ ምክንያትህ/ሽ ምን ነበር?	1. የሚስማማኝን ተጣማሪ ስላላገኘሁ 2. በሃይማኖት ስለሚከለክል 3. እርግዝናን በመፍራት 4. የአባላዘር በሽታ በመፍራት 5. ለአካለመጠን ስላልደረሰኩ 6. ሌላ (ይገለጽ)_____	