ADDIS ABABA UNIVERSITY

COLLEGE OF HEALTH SCIENCES

SCHOOL OF MEDICINE

DEPARTMENT OF OBSTETRICS AND GYNECOLOGY

RESEARCH REPORT

Knowledge, Attitude, and Practice of Emergency Contraception among female high school students in Lideta sub-city, Addis Ababa, Ethiopia, 2020/21 G.C.

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Sep, 2021 G.C.

Addis Ababa, Ethiopia

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Knowledge, Attitude, and Practice of Emergency Contraception among female high school students in Lideta sub-city, Addis Ababa, Ethiopia, 2020/21 G.C.

Thesis to be submitted as partial fulfillment of the requirements for the specialty certificate in Obstetrics and Gynecology, Addis Ababa University, College of Health Sciences, Department of Obstetrics and Gynecology, Addis Ababa, Ethiopia

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APPROVAL SHEET

ADDIS ABABA UNIVERSITY

COLLEGE OF HEALTH SCIENCES, SCHOOL OF MEDICINE, DEPARTMENT OF OBSTETRICS AND GYNECOLOGY, POSTGRADUATE PROGRAM

I, Dr. Binyam Esayas, hereby declare that this thesis entitled "Knowledge, Attitude, and Practice of Emergency Contraception among female high school students in Lideta sub-city, Addis Ababa, Ethiopia, 2021 G.C." in line with the requirement of graduate studies was fully undertaken by me under the guidance of my advisors and that I have, to the best of my knowledge and effort, avoided plagiarism or duplication of materials unless and otherwise cited and/or acknowledged and that it has not been so far submitted for any form of publication or consideration before the final approval.

Binyam Esayas (M.D) _____ _____

Principal investigator Signature Date

We hereby certify that we have read and evaluated this research thesis relating to Knowledge, Attitude, and Practice of Emergency Contraception among female high school students in Lideta sub-city, Addis Ababa, Ethiopia, 2021 G.C. under our guidance from its inception up to its current format and that it can be submitted for final approval in partial fulfillment to the specialty certificate in Obstetrics and Gynecology.

_____ _____ _____

1. Advisor Signature Date

_____ _____ _____

2. Advisor Signature Date

As a member of the postgraduate research open defense examination, I certify that I have read and evaluated the thesis prepared by Binyam Esayas (M.D), and examined the candidate. I recommend that the thesis be accepted as fulfilling the thesis requirements for the specialty certificate in Obstetrics and Gynecology.

_____ _____ _____

Examiner Signature Date

Acknowledgment

I would first like to thank the department of Obstetrics and Gynecology for giving me this chance to do this research and also I would like to thank Addis Ababa University College of Health Sciences for giving me the chance to attain the specialty program in Obstetrics and Gynecology.

My deepest gratitude also goes to my advisors Dr. Shiferaw Negash, Dr. Yirgu G/Hiwot, and Dr. Semir Sultan, for their unreserved, constructive comments and guidance throughout the work in preparing the proposal, conducting the data collection, and report writing.

Abbreviations and Acronyms

AA	Addis Ababa
AAU	Addis Ababa university
AOR	Adjusted Odd Ratio
B.Sc.	Bachelor of science
CI	Confidence Interval
COC	Combined oral contraceptive
DC	Data Collector
Dr.	Doctor
Dej.	Dejeazemach
ETH	Ethiopia
E.C.	Ethiopian calendar
EC	Emergency Contraceptive
FDA	Food and drug administration
G.C.	Gregorian calendar
IHRERC	Institutional Health Research Ethics Review Committee
IUD	Intrauterine device
IUCD	Intrauterine contraceptive device
KAP	Knowledge attitude and practice
LAFP	Long acting family planning
M.D	Medical Doctor
OTC	Over the counter
PI	Principal Investigator
QDA	Qualitative data analysis
SD	Standard deviation
SPSS	Statistical Package for Social Science
TV	Television
USA	United states of America
WHO	World Health Organization

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Summary

Background: Each year, around 210 million women throughout the world get pregnant, of which 21 million girls aged 15–19 years in developing regions become pregnant. More than half of the teenage pregnancy in developing countries are unintended(1, 2). Emergency contraception is among the different methods for prevention of unintended pregnancy. Despite the existence of different modern and effective contraceptives methods worldwide, the problem of unintended pregnancy is still high (3).

Objectives: To assess knowledge, attitude, and practice of Emergency Contraception in female high school students in Lideta sub-city, Addis Ababa, 2020/21 G.C.

Methods: A mixed study was used. A cross-sectional, institution-based study was conducted from September 1 to November 30, 2020 E.C., and a systematic sampling technique was used for the quantitative study whereas for the qualitative study, an in-depth interview and purposive sampling techniques was used. Quantitative data were cleaned, coded and entered into, and analyzed using SPSS version 25. Data from in-depth interview was transcribed and translated to English then coded using QDA software, and categorized into similar themes. Descriptive statistics like frequency, measures of central tendencies were used to describe study participants and to summarize the results of the study. The association of the independent variables was done using logistic regression and chi-square test. Variables with P-value of ≤ 0.05 were declared as statistically significant.

Result: A total of 257 female students have participated in the study with 100% total response rate. The finding of our study showed that 37.4% of the respondents have good knowledge and 47.9% have positive attitude towards the use of EC. The main source of information about EC was TV. Of the total respondents, only 8.2% have ever practiced sexual intercourse at least once in their lifetime. Of those respondents who had sexual intercourse, 66.6% have ever used EC. In the in-depth interview, when asked about the reason "why they don't take or recommend EC ", most mentioned ineffectiveness of post-pill in preventing pregnancy.

Conclusion: The result indicates that most of the respondents have heard about EC but the cumulative knowledge score is low and only around half having positive attitude about EC. Only a few of the respondents have used EC in their lifetime. We recommend a continuous information delivery to high school students and a separate and scaled-up study should be done to assess the knowledge, attitude, and utilization of EC among high school students.

1. INTRODUCTION

1.1. Background

Each year, around 210 million women throughout the world get pregnant, of which more than half of the pregnancy is unintended. Proportion of unintended pregnancies that end in abortion has been estimated at 58% worldwide(1, 4). Every year, an estimated 21 million girls aged 15–19 years in developing regions become pregnant and approximately 12 million of them give birth. At least 777,000 births occur to adolescent girls younger than 15 years in developing countries(4). In Ethiopia, the total fertility rate ranges from 1.8 in Addis Ababa to 7.2 in the Somali region with the percentage of women aged 15-19 who have begun childbearing ranging from 3% in Addis Ababa to 23% in the Affar region(4).

Results indicated that 53% of women aged 18 to 19 and nearly 27% of women aged 20 to 24 reported such pregnancies. This proportion is much higher in the developing world, 73%, where the majority of abortions are performed in unsafe conditions. Out of 46 million abortions performed annually, 19 million are estimated to be unsafe. Each year between 4.7% – 13.2% of maternal deaths can be attributed to unsafe abortion. An estimated 43% of the population of Africa is under age 15. Because of this largest generation of African adolescents' girls are at high risk of early, unsafe sexual activity, unwanted pregnancy. Data from hospitals across Africa reveal that young women constitute up to one-third of patients treated for abortion complications, and up to one-half of those with the most severe complications Moreover, 59% of all unsafe abortions in Africa are among young women aged 15-24 years(1, 2).

Despite the fact that different modern contraceptives exist worldwide, the problem of unintended pregnancy still exists, which could be due to gap in awareness, negative attitudes towards contraception, low accessibility or as a result of sexual assault. At times, the knowledge and practice might be there but no contraceptive is 100% effective, and it is always very vital to have EC as a backup method(5).

Emergency contraception is therapy used to prevent pregnancy after an unprotected or inadequately protected act of sexual intercourse. EC plays a vital role in preventing unintended pregnancy, which in turn helps to reduce unintended child birth and unsafe abortion.
Emergency contraception types include,

- oral combined estrogen–progestin,
- progestin only pills
- selective progesterone receptor modulators and
- copper intrauterine device (IUD).

progestin-only pill consists of 1.5 mg of levonorgestrel. This product can be purchased over the counter. The levonorgestrel regimen is labeled for use for up to 72 hours after unprotected sex but is best used as soon as possible after unprotected sex.

Selective progesterone receptor modulator, or anti-progestin is a pill containing 30 mg of ulipristal acetate, has demonstrated effectiveness up to 120 hours after unprotected sex. The copper IUD also can be used for emergency contraception, although the FDA has not labeled it for this indication. The IUD is highly effective if placed within 5 days of sexual intercourse and in some studies was used as many as 10 days later(3).

1.2. Statement of the problem

Knowledge, attitude and use about EC in reproductive women in developed countries has been shown to be very good and almost all are aware about EC, two third approve use of EC and one third use EC(6-8). However, in resource limited countries, the knowledge of women about EC is often limited with only one third to half have good knowledge, almost half approve practice of EC and less than one fourth use EC. This will result in increased incidences unintended pregnancy with resultant unsafe abortion and its complication. Possible reasons for limited awareness, attitude and use in such countries are due to lack of access to health services, high percentage of illiteracy and cultural barriers(5, 9-11). This study will assess knowledge, attitude, and practice about EC among the female high school students in Lideta sub city.

1.3. Justification of the study

Assessment of knowledge attitude and practice of EC in reproductive women is important especially in countries like Ethiopia where the incidence of unsafe abortion and its complication is high because of unintended pregnancy. In Ethiopia about 20% of the population are aged 15-24, of whom nearly half are sexually active and the median age for first sexual intercourse being 17yr (12). Although there are few studies done assessing knowledge attitude and practice of EC among female university students, very few studies done to assess knowledge among female high school students. The purpose of this study is to assess the knowledge, attitude and practice of high school female students.

The findings of this study may inform health workers, educators and policy makers in designing appropriate programs and guidelines that would increase awareness and use of EC to decrease unintended pregnancy in Ethiopia.

2. LITRATURE REVIEW

Emergency Contraceptive pills (EC) can be used after sexual intercourse, offering a second chance to prevent unwanted pregnancy. It is a safe, effective and relatively inexpensive way to prevent pregnancy, after unplanned or unprotected sexual intercourse, preventing approximately 80-85% of pregnancies that would otherwise occur(3).

2.1 Women's Knowledge of EC

Study done in 2001 among Swedish Teenagers' showed that 79.7% were aware of the existence of EC and 78.3% knew where to obtain EC if necessary(6).
In study done in USA, most respondents, 94.1% knew something could be done after intercourse to prevent pregnancy and 98.2% had heard something about EC prior to participation in the study. Women seemed fairly knowledgeable about where to get EC. The majority knew EC could be obtained from a pharmacy OTC.(8)Another study done among Female College Students' in New York USA Nearly all participants (98%) responded that they had heard of EC(7). Studies done in India and Trinidad showed that the knowledge about emergency contraception ranges from 41% to 78%(13-15).

Study done among students of public secondary schools in Ilorin, Nigeria in 2016, 27.8% of the respondents had good knowledge of emergency contraception.(9) In another study done among female undergraduates in the University of Lagos, Nigeria findings revealed that one third of the respondents had good knowledge about emergency contraception(16).

In study done by P R Mamabolo in the rural area of Moletji-Mashashane, Limpopo Province, South Africa secondary school learners did not have good knowledge of emergency contraceptives; 47.5% reported that they had heard of emergency contraceptives. The majority of learners had misperceptions about the details and safety of EC(11).

Studies done in other African countries show that knowledge about EC 63%-95% states that they have heard of EC and only about third have good knowledge about EC(17-22).

Among female university students in Addis Ababa, Ethiopia (2007) About 43.5% of the students said that they have heard about emergency contraceptives. When asked about specific types of emergency contraceptives, among those who have ever heard of emergency contraceptives, 82.8% mentioned pills and 34.1% mentioned intrauterine contraceptive devices(23). Another study conducted in 2012 among 368 women of undergraduate students of Addis Ababa Ethiopia, 84.2% had ever heard of EC(5).

Among health Science and Medical Students of Arba Minch University, of 216 respondents, 208 (95.9%) had heard about emergency contraceptives 41.2% reported from mass media followed by health professionals 29.4% and 13.4% from teacher being their source of information about emergency contraceptives. Out of these who heard about emergency contraceptives(10).

Of the few studies done in undergraduate students in Ethiopia i.e. in Wollo, Adama, Dire dawa, Harar on knowledge about EC results are varied and range from 34.1% to 70%. Being above the age of 20 years old, father's and mother's literacy educational status were found to be determinants of knowledge of EC(24-27).

The most recent Study done in high school students in wolkite showed 54% of the study participants have good knowledge. Other studies done in other parts of Ethiopia show knowledge score of 21% to 74%(28-31).

2.2 Attitudes About EC

In study done among Swedish Teenagers' Seventy-five percent of teens stated that they themselves would use EC or would recommend it to a partner(6). When asked about their beliefs surrounding EC and its uses, 57% of Female College Students' in New York USA said

they approve of EC; 28% approve of its use ‘‘sometimes.’’ Nearly 96% approve of EC in cases of rape or sexual assault and 82% approve in the case of a failed method of birth control(7).

Overall positive attitude toward EC was observed among 73.8% of the respondents among medical undergraduate, interns and postgraduate students towards emergency contraception in India(14).

Studies done in Ghana, Tanzania, Botswana, Nigeria, South Africa, Cameroon more than half (40%- 75%) of university students have good attitude towards the use of EC(9, 16-22).
Among female university students in Addis Ababa, Ethiopia About 53% (95% CI 49.1-56.1%) of the students had positive attitude towards emergency contraceptives(23).

In study done in Arbaminch, 84.7% students supported the idea of making available emergency contraceptives for all females. And 88.4% respondents said they are willing to use emergency contraceptive if need arises and they will recommend emergency contraceptive for other females if need arises(10).

The overall summary index for attitude assessment towards emergency contraceptive few studies done in Ethiopia in undergraduate students revealed that 51.3% to 61.3% of the respondents had positive attitude towards use of EC(24, 25).

Compared to the undergraduate student’s overall index of attitude among high school students, in most of the studies done in Ethiopia showed, attitude score of 61% to 71%(28-31).

2.3 EC Use or practice

In study done among Swedish Teenagers’ with the mean age of 16.5 years, almost half (45.4%) of the teenagers had had sexual intercourse and of those, 28.3% stated that they themselves or their partner had used EC(6).
Among Female College Students’ in New York USA 28% reported previously using EC; 15% of those who have used it have done so only once(7).

Slightly less than half (47.4%) of the students reported having ever used at least one type of contraception while feeling embarrassed to buy or ask for contraception (64.6%) and differing religious beliefs (32.3%) were among the reasons reported by students for not using contraception. Among Female Undergraduates in Dodoma, Tanzania(18).

Other studies done in Cameroon, Ghana, Nigeria, show that the use of EC ranges from 4.2% to 36% of the study population(9, 16, 19, 22). In study done in AAU among female undergraduate students those who had unprotected sexual intercourse 23% of total responders, 75% had ever used EC(5). In Ethiopia, other studies show that the EC practice is low ranging from 4.2% to 58.8%(10, 23-26).

Conceptual framework

Health belief model as applied to emergency contraceptive (32)

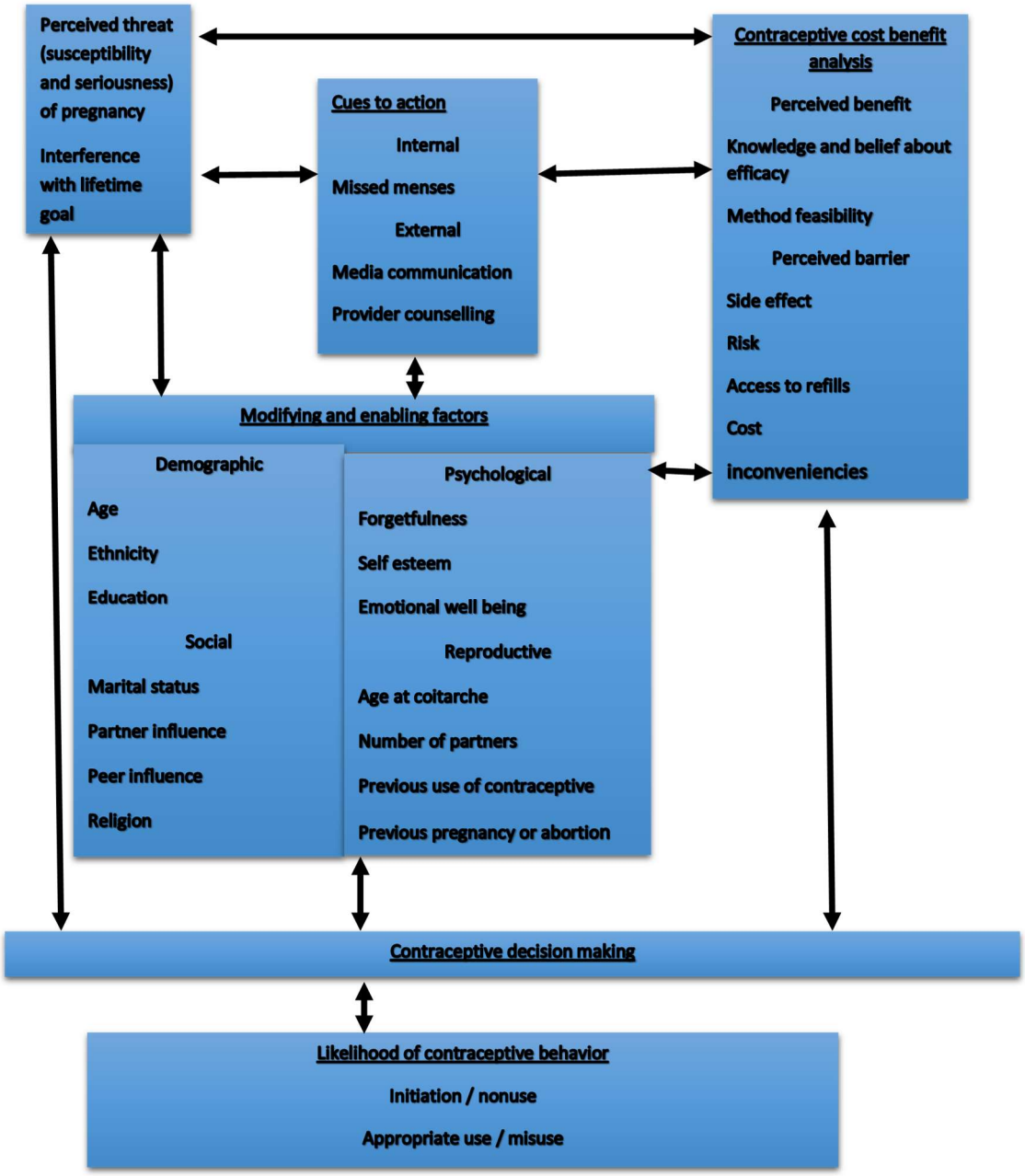

Figure 2. 1:- Conceptual framework

3. OBJECTIVE

3.1. General objectives

To assess knowledge, attitude, and practice of EC in high school students in Lideta sub-city, Addis Ababa, 2020/21 G.C.

3.2. Specific objectives

1. To assess knowledge on EC
2. To assess attitude towards EC
3. To assess practice on EC
4. To assess factors associated with EC use

4. METHODOLOGY

Study design

We used a Mixed study. For the quantitative study, an institution based descriptive cross-sectional study design, and for the qualitative study, an in-depth interview was used to assess knowledge, attitude, and practice (KAP) of high school female students

Study area and period

The study was undertaken in Dejazmach Balcha Abanebso preparatory school in Lideta sub-city AA, Sep 1 – Nov 30, Ethiopia in 2020 G.C.

Reference Population

All female high school students living in Addis Ababa

Study population

All female high school students in Dejazmach Balcha Abanebso preparatory school, Addis Ababa.

Study subjects

All Individual female high school students in Dejazmach Balcha Abanebso preparatory school in the study period

Sampling procedures

Systematic random sampling procedure was used to include the study participants in the cross-sectional study, and Purposive sampling was used for the in-depth interview.

Inclusion and exclusion criteria

All female high school students in Lideta sub-city Ethiopia and who give their consent to fill the questionnaire were included.

Sample size

The sample size determination according to Mugenda & Mugenda, (2003) was used:

$n=Z^2 P(1-p)/d^2$, where

n=the desired sample size (if the target population is > 10,000).

$Z\alpha/2$ = Standard normal distribution corresponding 95% level significance= 1.96

d=the level of statistical significance set = 5%

P=the proportion in the target population estimated to have characteristics being measured.

Taking the most recent study done in wolkite, the knowledge score of 54% and that gives the highest sample size. i.e. P=54%(30).

Thus: $n = (1.96)^2 (0.54) (1-0.54)/ (0.05)^2 = 381.7$

Since the total population of female high school students in lideta sub city Addis Ababa is < 10,000

Using finite population correctional formula

$N_{final} = n/1+n/N$

Where the sample is going to be taken from 700 female preparatory school students N = 600

And n = 382

$N_{final} = 382$

$$1+\frac{382}{600} = 233.4 = 234$$

The minimal sample population of female high school students required for the study is 234
Adding 10% non-response rate gives us; N=234 + 23 = 257
For the in-depth interview, 6 participants were selected. i.e. Female students who have ever used emergency contraceptive were included.

Data collection procedure

Data collection tools were prepared both in English and Amharic. The primary version of the questionnaire is developed through an extensive literature review in English language. Later, the relevance of the questions was commented by experts. Before the actual data collection, the questionnaire was pre-tested on 30 female students. The instrument was tested for reliability. Accordingly, the Cronbach's alpha coefficient was found to be 0.73.
For the qualitative data, semi-structured Interview guide was prepared containing about 16 questions to guide the in-depth interview and all questions were exhausted (table 1). The interview was made in Amharic and later the audiotaped data from in-depth interview was transcribed and translated to English and then the written data were coded. Then, subsequently themes were formed from the coded data. Finally, some quotes were identified and presented in the respondents' own words to give more insight.
The data collection was done by the trained one data collector with B.Sc. degree in midwifery.

Table 4. 1 :- Interview guide

1. Have you ever heard about contraception?
2. Before today, have you ever heard of emergency contraception, or the morning-after pill?
    - Types
    - Source of information
    - Dose
3. Do you know how it works?
    - Mechanism of action
    - Time frame for use
4. Who are adults in your life that you go to for help or advice?
5. What makes you feel comfortable when you go to them for advice?
6. What other sources are there, from which you can get information about this?
7. Do you know anyone around your age who's been pregnant?
8. What did you think about her?
9. How would you feel if you got pregnant within the next year?
10. What have you heard about emergency contraception?
11. Have you ever used it before?
    - How many times
    - how many hours after sex?
    - Any pregnancy before
    - Side effect
12. What do you think are some good things about using emergency contraception?
13. What worries might you have about using emergency contraception?
14. If you want emergency contraception, what might make it hard for you to get it?
    - Cost
    - Accessibility
    - Refusal to sale
15. Would you consider using emergency contraception?
16. what should be done to improve EC use?

Variables

Dependent variables

Knowledge, attitude, and practice of EC. These variables have been defined below under "operational definitions".

Independent variables

Age
Religion
Ethnicity
Grade
Marital status
Parents' educational status

Operational definitions

Emergency Contraception: A kind of contraception indicated after unprotected sexual intercourse to prevent unintended pregnancy.
Sexually active: having a previous history of vaginal sexual intercourse.
Unintended pregnancy: pregnancy occurred with no plan.
Knowledge: awareness of the existence of EC, its importance, and effectiveness. Students whose cumulative score is above median were considered as with ''good knowledge''; while those who score below were considered as with ''poor knowledge ''.
Attitude: Intention of using or recommending EC when a need arises. Students who scored above median are considered as having ''positive attitude ''and those who score below were considered as having ''negative attitude ''.
Practice: Any previous history of EC usage.
Media: Radio, Television.
High school students: those in grade 11 and 12

Data quality and Management

Data quality was assured through careful design of structured questionnaire and interview guide and data collection procedure for the clarification of data collection instruments and familiarization of data collectors with instruments as well as to estimate the time required for one study participant. Pretest was done on 30 students.

Data entry and Analysis

First data were checked for completeness and consistency before entry to the computer. Then it was coded and entered into SPSS statistical software and then analyzed. Descriptive statistics like frequency, measures of central tendencies were used to describe study participants and to summarize the results of the study. Association of the independent variables was done using logistic regression and chi-square test; a significant association of variables with outcome was determined using adjusted odds ratio (AOR) together with 95 % confidence interval. Variables with P-value of ≤ 0.05 were declared as statistically significant.

QDA miner software was used to code and analyze the in-depth interview. Descriptive statics like frequency was used to describe the participants and summarize the result.

Ethical consideration

To ensure the safety of respondents and to prevent the violation of human rights, permission to carry out the study was sought from the department of obstetrics and gynecology and the college's IRB committee.

Since majority of students are minors, age < 18, we need assent from them and parental or guardian consent. Because that the research topic is sensitive, assent with a waiver of consent was requested from the department of obstetrics and gynecology and from the college's IRB committee, which is in accordance with Ethiopian national research ethics review guideline(33).

Finally, before starting the study, school approval was requested. Any private information was kept confidential; The data will not be used for purposes other than that are needed for this study.

Expected outcome

The study will show the knowledge, attitude, and practice of EC in high school students in Lideta sub-city, A.A.

Dissemination of the results

The results of this study will be presented for Addis Ababa University, College of Health Sciences, School of Medicine, Department of Obstetrics and Gynecology, and for other concerned bodies working on maternal health quality care in the study area. All possible efforts will be made to publish the findings on peer-reviewed journals.

5. RESULT

5.1. Quantitative data

Sample characteristics

A shapiro-wilk's z test ($p>0.05$), visual inspection of histogram and skewness, and kurtosis Z score show that the distribution of data is not normal with shapiro-wilk's z test $p<0.05$ and z score of value below – 1.96 and above +1.96.

Socio-demographic characteristics

A total of 257 female students have participated in the study with 100% total response rate. Among this study participants, 156(60.7%) of them were grade 12 students and 101(39.3%) were grade 11. 201(78.2%) were followers of orthodox Christianity and 70(27.2%) are from Amhara ethnic group. Of the total study participants, 177(68.8%) of them were within the age group of 16–18 years and the mean age of the participants was 18.08 (SD ± 0.985) years. Of the total study participants, 238 (92.6%) of them mentioned that they are currently living with their parents. Majority 107(41.1%) of the student said that their mothers had primary education, furthermore, most of the students 141 (55.5%) mentioned that their fathers attended primary education and above.

Table 5. 1:- Sociodemographic characteristics

Variable	Answer	Frequency	Percentage
Age	16-18	71	27.6%
	18	106	41.2%
	18-22	83	30.7%
Grade	11	101	39.3%
	12	156	60.7%
Religion	Orthodox	201	78.2%
	Muslim	39	15.2%
	Protestant	14	5.4%
	Other	3	1.2%
Ethnicity	Amhara	70	27.2%
	Oromo	45	17.5%
	Tigre	22	8.6%
	Other	97	37.8%
Residency	Parents	238	92.6%
	Alone	4	1.6%
	Relatives	15	5.8%
Marital status	Married	1	0.4%
	Single	256	99.6%
Mothers educational status	Can't write and read	41	16.1%
	Can write and read	106	41.7%
	Primary school and above	107	41.1%
Fathers educational status	Can't write and read	18	7.1%
	Can write and read	95	37.4%
	Primary school and above	141	55.5%
* the total number of respondents is 257 but frequency here mentioned doesn't include missing data.			

Reproductive characteristics

Of the total respondents, only 21(8.2%) had sexual intercourse. Among those respondents stating that they have sexual intercourse previously, 16(91.8%) stated that it was unprotected sex. Of those who had unprotected sex, 3(76.2%) were pregnant.

Table 5. 2:- Reproductive characteristics

Variable	Answer	Frequency	Percentage
Did you have sex before?	Yes	21	8.2%
	No	236	91.8%
Was it unprotected?	yes	16	91.8%
	No	5	8.2%
Have you been pregnant before?	Yes	3	23.8%
	No	18	76.2%
Was it unplanned pregnancy?	Yes	3	100%
	No	0	0
Reason for unplanned pregnancy	Forget to take	1	33.3%
	Pressure from partner	1	33.3%
	Didn't know what to do	1	33.3%
* the total number of respondents is 257 but frequency here mentioned doesn't include missing data.			

Knowledge

To assess the level of actual knowledge of EC, first respondents were asked if they ever heard about EC, then those who answered "yes" were asked a series of six knowledge questions about EC. To generate the summarized level of knowledge, response on each question was first scored, tallied and then the total of each respondent score ranged from 0-14 (0%-100%). Total score was calculated and then respondents were classified as; poor, and good with respect to their level of EC knowledge. Hence, respondent's data is skewed, we will use the median as a cut of point to score them as poor or good knowledge. The median being 4. Based on the summary index, only 73(37.4%) of respondents had good knowledge of EC. 37(19.2%) think that the effectiveness of EC is >75%. Majority of the respondents 135(70.3%) stated that they don't know how effective it is. The most frequently mentioned source of information about EC was TV 165(66%), followed by Radio 59(23.5%) and other social media 63(25.1%).

Table 5. 3:- Knowledge about EC

Variable	Answer	Frequency	Percentage
Have you ever heard about EC?	Yes	195	75.8%
	No	62	24.2%
What options are there after unprotected sex?	Post-pill	45	23.4%
	Abortion	4	2%
	wait and see	2	1%
	consult Doctor	64	33.3%
	Post pill and consult doctor	65	33.8%
	Wait and see & consult doctor	6	3.1%
	I don't know	3	1.6%
Which type of EC do you know?	Post-pill	41	21.3%
	IUD	61	31.7%
	Implant	15	7.8%
	Condom	9	4.6%
	I don't know	33	17.1%
	Post-pill & IUD	33	17.1%
When can you take EC pill?	Any time	14	7.2%
	Within 1 day	53	27.6%
	Within 3 day	9	4.6%
	After delayed menses	1	0.5%
	I don't know	113	58.8%
	Can be within 1 or 3 days	5	2.6%
When can you take EC IUD?	Any time	39	20.3%
	Within 1 day	10	5.2%
	Within 5 day	4	2%
	After delayed menses	3	1.6%
	I don't know	132	68.7%
	Can be taken within 1 to 5days interval	3	1.6%
Where can you find EC?	Clinic / hospital	35	18.2%
	Health worker	5	2.6%
	Pharmacy / drug store	54	28.1%
	Super market	1	0.5%
	I don't know	22	11.4%
	Both clinic and pharmacy	72	37.5%

How effective is EC?	99%	11	5.7%
	>75%	26	13.5%
	50%	12	6.25%
	<50%	6	3.1%
	I don't know	135	70.3%
	Both >75% and 99% are correct	2	1%
* the total number of respondents is 257 but frequency here mentioned doesn't include missing data.			

Table 5. 4:- Source of information

Variable	Frequency	Percentage
Hospital	34	13.6%
TV	165	66.0%
Radio	59	23.5%
Parents	43	17.1%
Friends	40	15.9%
Books	36	14.5%
others social medias	63	25.1%
formal education	55	21.9%

Attitude

To determine the attitude of students, those who haven't heard about EC were given information about EC and five questions were asked. The response in each question was scored, tallied and then the total score was calculated for each respondent in the range of 0-5 (0-100%). Those who scored above the median were considered to have positive attitude and those who score below the median were considered to have negative attitude. The median was calculated to be 2. Based on this assumption, the proportion of respondents with positive and negative attitude towards the use of EC was 123(47.9%) and 134(52.1%) respectively. Only 17.4% of the respondents think that it is safe to use EC and more than half of the respondents said they wouldn't take EC if need arises. When asked about, why they don't take or recommend EC, majority 87(33.9%) said concern about side effect was the reason why, and 42(16.3%) mentioned that it is not allowed in their religion.

Table 5. 5:- Attitude about EC

Variable	Answer	Frequency	Percentage
EC use is safe	Agree	42	17.4%
	Neutral	126	52.1%
	Disagree	74	30.5%
Would you take EC?	Yes	110	44.5%
	No	137	55.5%
Would you recommend EC?	Yes	138	56.3%
	No	107	43.7%
EC can prevent from unplanned pregnancy	Agree	94	34.9%
	Neutral	118	49%
	Disagree	39	16.2%
If women knew about EC, LAFP use will decrease	Agree	42	17.3%
	Neutral	153	63%
	Disagree	48	19.8%
* the total number of respondents is 257 but frequency here mentioned doesn't include missing data.			

Practice

Concerning usage of EC, out of 21 girls who practice sexual intercourse, 14(66.6%) responded that they have used EC at least once in their lifetime and 8(38%) used in the last 1 year. 13(92.8%) used post-pill as EC. When asked about the reason why they used EC, 7(50%) stated that they were not on any contraceptive.

Table 5. 6:- Use of EC

Variable	Answer	Frequency	Percentage
Have you ever used EC?	Yes	14	66.6%
	No	7	33.3%
Have you used EC in the last 1 year?	Yes	8	38%
	No	13	62%
Have you used EC in the last 2 weeks?	Yes	3	14.3%
	No	18	85.7%
* the total number of respondents is 257 but the frequency here mentioned doesn't include missing data.			

Factors associated with EC use

Binary logistic regression and chi-square were done, but there is no association between the independent and dependent variable with the P value ≤ 0.05.

5.2. Qualitative data

Characteristics of respondents

Five of the respondents were grade 12 and one was grade 11. All of them had sexual intercourse and used post-pill as an emergency contraceptive. Most were from Oromo ethnic group and orthodox Christian. The age of respondents ranges from 19-21yr.

Almost all mentioned that the first sexual experience they had was with their boyfriend and It was planned but they weren't on any contraceptive or not prepared for it. Except one who was forced to have sex.

Respondent 3: - "… I was 15-year-old when I had sex for the first time that day I had a quarrel with my family and went out. During this time one of my friends helped me to stay with him. But he forced me to have sex and raped me. I didn't have much to do about it but I went to my uncle who we were close and he is a teacher.so he helped me buy post-pill that I took 2 tabs 12hrs apart..."

Knowledge about EC

All the respondents heard something about contraception and mentioned pos-pill as the emergency contraceptive.

Respondent 3: - "…Emergency contraception is a medication that is taken if there is unplanned sex and it can be taken within 72hrs…"

When asked about the mechanism of action almost all mentioned that they don't know how it works.

Respondent 5: - "Once pregnancy occurs it is like blood so when you use EC it prevents the blood to form clot-like structure..."

When asked about the time frame to take EC, most mentioned that it can be taken within 72hr after having intercourse.

Respondent 1: - "…it should be taken within 72hours but I heard that there is a pill that can be taken within 24hr. the pill that I took was ordered to be taken within 72hrs…"

Considering the effectiveness, almost all didn't know how effective it is.

Respondent 1: - "… From what I heard, it is not effective. My friend got pregnant. There is a commercial sex worker that I know of, she told me that it is not effective to prevent pregnancy and most women don't use it. So because of this, I did stop using it…"

Some of them mentioned menstrual irregularity as side effect of emergency contraceptive.

Respondent 5: - "…it has side effect… It can result in menstrual irregularity. So menstrual irregularity has its effect on the women…"

Practice or use of emergency contraceptive

When asked, how many times they used EC, most of the respondents said they used it three times and above. They stated that they used it with 72hrs of sex. when asked how long it took them to get emergency contraceptive most said, they got it the day after having sexual intercourse.

Respondent 5: - "…yes I took many times… more than 5 times…"

Respondent 2: - "… I took two times. The first one, on the next day after I had sex. Other time, took on the third day just an hour before 72hr…"

Respondent 3: - "…My uncle brought the medication and I took it once 4 years back after I was forced to have sex..."

Among the respondents, most stated they would prefer not to have sex than take emergency contraceptive.

Respondent 3: - "no I won't use it. After I get married I am planning to use implant or depo as family planning method till I am ready to have baby…"

Respondent 1: - "I don't know; I might not use EC ever. I heard that it is not effective in preventing pregnancy. One of my friends told me that she got pregnant after she used EC. In fear of this, I decided not to use EC and even I hadn't had sex after that."

Source of information

Close friends or internet was mentioned as the source of information about emergency contraception for majority of the respondents. Some mentioned TV as a source. They stated it is comfortable to talk to friends for advice than parents.

Respondent 3: - "…sometimes I hear from friends talking. Usually, I do google and see from the internet. I didn't even tell my parents and also my fiancé about the rape incident."

Respondent 2: - "I don't talk to my family but sometimes I do talk to my friends."

Barriers to get emergency contraception

Of the common barriers to get emergency contraception, cost and feeling ashamed to ask for the pill from the pharmacy are the reasons mentioned. One respondent mentioned that some pharmacists refuse to sell.

Respondent 3: - "… Since I am a student unless my boyfriend brings money it is difficult to get it.in addition, in our culture, it is not acceptable to have sex before marriage so going to pharmacy and to ask for EC makes me feel ashamed…"

Respondent 5: - "…Some places it is 50 birr and some other places 100birr. As a student it is difficult to get it. On occasion, I went to EC and the pharmacist said she doesn't have the pill. even though she had it. Maybe it is because she thought repeated use has effect…"

Bad and Good things about emergency contraception

Most mentioned that the good thing about emergency contraception is it can prevent unplanned pregnancy. On the contrary what worries them is its effectiveness, and infertility issue after use.

Respondent 2: - "it can prevent unplanned pregnancy… but I heard that it can result in infertility if you use it. This is what worries me when I think of it."

Respondent 3: - "…the good thing about EC is, it can prevent pregnancy but I don't know how effective it is…. I heard that it can result in infertility. Since I am going to get married within the next 2month this the worrying thing that I have…"

6. DISCUSSION

A total of 257 female students have participated in this study with 100% total response rate. From the total study participants, 68.8% of them were within the age group of 16–18 years and the mean age of the participants was 18.08 (SD ± 0.985) years. Of the total respondents, only 8.2% had sexual intercourse. The response rate was higher than research done in Wolkite and Mizan Tapi that can be explained by the culture in this urban region. But it was the same as the study done in Harrari, Mekelle, and Sweden. The mean age for the participants is comparable to studies done in Mizan, Mekelle, and Wolkite but higher than studies done in South Africa and Sweden(6, 11, 28-31). This is because they start school at late age than those in South Africa and Sweden.

In this study, about 75.8% of participants heard about emergency contraceptive before. Based on the cumulative summary index only 37.4% of the respondents had good knowledge about EC. Also in qualitative study, almost all didn't know how effective is EC. Compared to study done in Wolkite town which is 54.8% the overall knowledge score is low.(30) Another study done in Mekelle shows that 75.7% of the respondents have good knowledge and 90.7% have heard about EC before, which is much higher than this study(29). Other studies done in Mizan and Harari show comparable result on overall knowledge score(28, 31). Study done in south Africa Limpopo province shows that only 47.5% heard about it. Other similar studies done in other African countries show comparable findings (16-22). Studies done in USA show that almost all of the students heard about something about EC(7, 8). The result shows that the respondents have some awareness about EC. But the cumulative summary index about knowledge about EC was lower than other studies done in Ethiopia and other African countries which can be because of poor information delivery about reproductive health.

The commonest source of information about EC mentioned by majority was TV followed by other social media. Only 21.5% mentioned formal education as a source. Result from in-depth interview shows most mentioned friends and internet. The same as qualitative study, study done in Wolkite shows that most of them (34.1%) got information about EC from their peers followed by health institutions (30). Other similar studies done in Mekelle, Mizan and Harari showed

mass media as the commonest source of information (28, 29, 31). The source of information in this study and other studies in Ethiopia was mass media, which can be used as a major information delivery mode about EC, to increase knowledge about EC.

According to the findings of the current study, respondent cumulative score of positive attitude towards the use of EC was 47.9% of the cases. The result of this report was comparable to the study done in Mizan and Mekelle(29, 31). A meta-analysis conducted in Gondar showed a comparable cumulative score with a value of 42.6%(34). Another study done in Botswana showed 45% that the cumulative score was comparable to this study(20).

Based on this study result, 8.5% of respondents practiced sexual intercourse before. Among those who had sexual intercourse, 66.6% had ever used EC. Compared to other studies done in Harari, Mizan Tapi , Mekelle, and Wolikite, the number of sexually active high school students is lower(28-31). But the number of students who utilized EC is higher (28-31). Similarly, study done in USA and Sweden shows higher number of sexually active teenagers and lower number of EC utilization than this study(6, 8). Due to the very sensitive nature of this topic, respondents may not have told their sexual practice honestly, that could be the reason why the number of students who have sexual intercourse in this study is lower than other similar studies.

7. STRENGTH AND LIMITATION

Strength

This study used a mixed method to strengthen and support the quantitative cross-sectional study. Since the study focuses on sensitive issues, having a response rate was 100%, is the strength of the study. It is one of few mixed studies conducted in Ethiopia among high school students, so it can be used as a baseline to other researches.

Limitation

Since it touches on sensitive issues, under reporting could be there. Problem related to translation of respondents' own words could also be another limitation of the study. Since the study is cross-sectional, it is difficult to declare cause and effect relationship. Another limitation of the study is, respondents are selected on voluntary basis, which can result in selection bias.

8. CONCLUSION

The result indicates that most of the respondents have heard about EC but the cumulative knowledge score is low and only around half having positive attitude about EC. Only a few of the respondents have used EC in their lifetime. Major source of information was TV and other social media.

9. RECOMMENDATION

To increase knowledge about EC, to bring attitudinal change, and increase utilization of EC among female secondary school students, ministry of health and city heath bureau should deliver continuous information delivery about EC to high school students should be given. Since TV and other mass media were mentioned as major sources of information, so appropriate and adequate knowledge can be delivered through route.

Based on this study, generalization can't be made. Because the study was done in one sub-city of Addis Ababa and the number of respondents was not inclusive of governmental and non-governmental students. So, a separate and scaled-up study should be done to assess the knowledge attitude and utilization of EC among high school students, which the result can be generalized.

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11.APPENDICIES

11.1. Annex I: Assent form

Assent form

My name is _____. I am working as a data collector for the study being conducted in this School by Dr.Binyam Esayas who is studying for specialty of Obstetrics and Gynecology at Addis Ababa University, College of Health Sciences. I kindly request you to give me your attention to explain about the study and about you being selected as the study participant.

The Study Title: Knowledge, Attitude and Practice of Emergency contraception among female high school students in Lideta sub-city, Addis Ababa, Ethiopia, 2020

Importance and Purpose of The Study: The findings of this study will have a paramount importance to plan a necessary intervention program for women to decrease unintended pregnancy and its aftermath. Moreover, the aim of this study is to write a research paper as a partial requirement for the fulfillment of a specialty program of obstetrics and gynecology for the principal investigator.

Procedure and Duration: It will be self-administered questionnaire, there are 30 questions to answer where I will be there to help you guide through. It will not take more than 30 minutes of your time.

Risks and Benefits: The risk of being participated in this study is negligible, but only taking a few minutes of your time. There would not be any direct payment for participating in this study. However, the findings from this research may reveal important information for the health planners working on improving maternal health care.

Confidentiality: The data you will provide us will be confidential. There will be no information that will identify you. The findings of the study will be general for the study population and will not reflect anything particular of individual person. The questionnaire will be coded to

exclude showing names. No reference will be made in oral or written reports that could link participants to the research.

I understand all the above explanations and I will give my consent to participate in this study.

☐ (Mark X if you agree)

11.2. Annex II. Questionnaire

11.2.1. English version

Knowledge, Attitude, and Practice of Emergency contraception among female high school students in Lideta sub-city, Addis Ababa, Ethiopia, 2020/21 G.C.

	Part 1: - Socio demographic characteristics	
A1	How old are you?	
A2	Which grade are you?	
A3	What is your religion? A) Orthodox B) Muslim C) Protestant D) Other (Adventist, Catholic…)	
A4	Which Ethnic group are you from? A) Amhara B) Oromo C) Tigre D) Other (Somali, Afar, SNNP…)	
A5	With whom do you Live? A) Parent B) Husband C) Friend D) Alone	
A6	Your marital Status A) single B) Married	
A7	What is Your Mother's educational status? A) Can't write and read B) Can write and read C) Primary School and above	
A8	What is Your Father's educational Status? A) Can't write and read B) Can write and read C) Primary School and above	

	Part 2: - Reproductive characteristics	
B1	Did you have sex before? A) Yes B) No	
B2	If the answer to question B1 is yes, Was it unprotected sex? A) Yes B) No	

B3	Have you been pregnant before? A) Yes B) No	
B4	If the answer to question B3 is yes, Was it Unplanned Pregnancy? A) Yes B) No	
B5	If the answer to question B3 is yes, What is the Reason for unplanned Pregnancy? A) Contraceptive failure B) Forget to take contraceptive C) Pressure from partner D) Forced to have sex E) condom slipped/broke	

	Part 3: - Knowledge	
C1	Have you ever heard of emergency contraception? Yes B) No	
C2	What options are there after unprotected sex to prevent pregnancy? A) post-pill B) Abortion C) wait and see D) consult Doctor E) No alternative D) I don't know	
C3	Which Type of Emergency contraceptive methods do you know? post pill B) Intrauterine device (ሉፕ) C) Implant(በክንድ የሚቀበር) D) condom E) I don't know	
C4	When can you take Emergency contraceptive pills? With time limit A) Any time B) within 1 day after sex C) within 3 days after sex D) within 5 days after sex E) After delayed menses F) I don't know	
C5	When can you take IUD as Emergency Contraceptive? With time limit A) Any time B) within 1 day after sex C) within 3 days after sex D) within 5 days after sex E) After delayed menses F) I don't know	

C6	From where did you get information about Emergency Contraceptive? A) Hospital B) TV C) Radio D) Parents E) Friends F) Books G) others social media H) formal education	
C7	where can you find Emergency Contraceptive? A) Clinic/hospital B) Health worker C) pharmacy/drug store D) supermarket E) It is impossible to obtain F) Others G) Don't know	
C8	How effective Is Emergency contraceptive at preventing women from getting pregnant? A) 99% B) 75% C) 50% D) < 25% E) I don't know	

	Part 4: - Attitude	
D1	How safe do you think Emergency Contraceptive is for most women? A) strongly agree B) neutral C) strongly disagree	
D2	Would you yourself take Emergency Contraceptive? A) Yes B) No	
D3	Would you recommend Emergency Contraceptive? A) Yes B) No	
D4	If the answer to question D3 is no, why don't you recommend or use of Emergency contraceptive? Because A. they could have side effect B. brings about irresponsible sexual behavior C. use of condom decreases D. it is not allowed in my religion E. its use may be illegal	
D5	Emergency contraception will prevent pregnancy from unprotected sex A. agree B) neutral C) disagree	
D6	Women don't use long term contraception if they know presence of EC A. agree B) neutral C) disagree	

	Part 5: - Use	
E1	Have you ever used Emergency Contraceptive? A) Yes B) No C) No response If the answer to question E1 is yes,	
E2	Ln the last year, did you use Emergency Contraceptive? A) Yes B) No C) No response	
E3	In the last 2 weeks, did you use Emergency Contraceptive? A) Yes B) No C) No response	
E4	Which method did you use? A) post pill B) Intrauterine device (ሉፕ) C) Combined oral contraceptive(የእርግዝና መከላከያ ክኒን) D) Depo (ሞርፌ) E) Implant (በክንድ የሚቀበር)	
E5	What was the reason for using that? A. No use of other contraceptive B. Timing miscalculation C. Condom broke D. Missed pills E. You were forced to have sex F. Other(specify) G. I don't remember	

THANK YOU!!!

11.2.2. Amharic version

መጠይቅ

በልደታ ክፍለ ከተማ በሚገኙ ሴት የሁለተኛ ደረጃ ት/ቤት ተማሪዎች ድንገተኛ የእርግዝና መከላከያ እውቀት አመለካከት እና አጠቃቀም 2013 ዓ.ም.

	ክፍል ፡-1	
A1	እድሜሽ ስንት ነው?	
A2	ስንተኛ ክፍል ነሽ?	
A3	ሀይማኖትሽ ምንድን ነው? ሀ) ኦርቶዶክስ ለ) ሙስሊም ሐ) ፕሮቴስታንት መ) ሌላ	
A4	ከየትኛው ጎሳ ነው የተወለድሽው? ሀ) አማራ ለ) ኦሮሞ ሐ) ትግሬ መ) ሌላ (ሶማሌ ፣ አፋር ፣ ደቡብ ክልል…)	
A5	ከማን ጋር ነው የምትኖሪው? ሀ) ከቤተሰብ ጋር ለ) ከባለቤቴ ጋር ሐ) ከጓደኞቼ ጋር መ) ለብቻዬ	
A6	አግብተሻል? ሀ) አግብቻለሁ ለ) አላገባሁም	
A7	የእናትሽ የትምህርት ደረጃ ምንድ ነው? ሀ) መፃፍ እና ማንበብ አትችልም ለ) መፃፍ እና ማንበብ ትችላልለች ሐ) የመጀመሪያ ደረጃ ትምህርት ቤት እና ከዚያ በላይ	
A8	የአባትሽ የትምህርት ደረጃ ምንድነው? ሀ) መፃፍ እና ማንበብ አይችልም ለ) መፃፍ እና ማንበብ ይችላል	

	ሐ) የመጀመሪያ ደረጃ ትምህርት ቤት እና ከዚያ በላይ	

	ክፍል፡-2	
B1	የግብረስጋ ግኑኝነት አድርገሽ ታውቂያለሽ? ሀ) አዎ ለ) አላውቅም	
	ለጥያቅ ቁጥር B1 መልሱ አዎ ከሆነ፤	
B2	ጥንቃቄ የጎደለው የግብረ ስጋ ግኑኝነት ነበር? ሀ) አዎ ለ) አይደለም	
B3	ከዚህ በፊት አርግዘሽ ታውቂያለሽ? ሀ) አዎ ለ) አላውቅም	
	ለጥያቄ_ቁጥር B3 መልሱ አዎ ከሆነ ፤	
B4	ያልታቀደ እርግዝና ነበር? ሀ) አዎ ለ) የለም	
	ለጥያቄ¨ቁጥር B4 መልሱ አዎ ከሆነ፤	
B5	ያልታቀደ የእርግዝና ለመፈጠሩ ምክንያት ምንድ ነው? ሀ) የእርግዝና መከላከያ ያለመስራት ለ) የእርግዝና መከላከያ መውሰድ ረስቼ ሐ) ከጓደኛ የሚመጣ ግፊት መ) የፆታ ግንኙነት እንድፈፀም ተገደጄ ሠ) ኮንዶም መቀደድ	

	ክፍል፡-3	
C1	ስለ ድንገተኛ የወሊድ መከላከያ ሰምተሽ ታውቂያለሽ? ሀ) አዎ ለ) አላውቅም	

C2	ጥንቃቄ የጎደለው የግብረ ስጋ ግኙኝነት ከተደረገ በኃላ ምን አማራጮች አሉ?(ከአንድ በላይ መልስ ይቻላል) ሀ) በ24 ሰአት ውስጥ የሚወሰድ የእርግዝና መከላከያ እንክብል ለ) ውርጃ ሐ) የሚሆነውን መጠበቅ መ) ሃኪም ማማከር ሰ) ምንም አማራጭ የለም	
C3	ምን አይነት ድንገተኛ የእርግዝና መከላከያ ታውቂያለሽ? (ከአንድ በላይ መልስ ይቻላል) ሀ) ፖስትፒል (post pill) ለ) ሉፕ(ማህፀን ውስጥ የሚቀበር) ሐ) በክንድ የሚቀበር / የሚቀመጥ መ) ኮነዶም ሠ) አላውቅም	
C4	ድንገተኛ የእርግዝና መከላከያ ክኒን መወሰድ ያለበት መቼ ነው? (ከአንድ በላይ መልስ ይቻላል) በጊዜ ገደብ ይጠቀስ ሀ) በየትኛውም ግዜ ለ) ግብረ ስጋ ግኙኝነት በተደረገ በአንድ ቀን ውስጥ ሐ) ግብረ ስጋ ግኙኝነት በተደረገ በሶስት ቀን ውስጥ መ) ግብረ ስጋ ግኙኝነት በተደረገ በአምስት ቀን ውስጥ ሠ) የወር አበባ ሳይመጣ ከቀረ ሸ) አላውቅም	

C5	ድንገተኛ የእርግዝና መከላከያ ሉፕ(ማህፀን ውስጥ የሚቀበር) መወሰድ ያለበት መቼ ነው? (ከአንድ በላይ መልስ ይቻላል) በጊዜ ገደብ ይጠቀስ ሀ) በየትኛውም ግዜ ለ) ግብረ ስጋ ግኙኝነት በተደረገ በአንድ ቀን ውስጥ ሐ) ግብረ ስጋ ግኙኝነት በተደረገ በሶስት ቀን ውስጥ መ) ግብረ ስጋ ግኙኝነት በተደረገ በአምስት ቀን ውስጥ ሠ) የወር አበባ ሳይመጣ ከቀረ ሸ) አላውቅም	
C6	ስለ ድንገተኛ የወሊድ መከላከያ መረጃ ከየት አገኘሽ?(ከአንድ በላይ መልስ ይቻላል) ሀ) ሆስፒታል ለ) ቲቪ ሐ) ራዲዮ መ) ወላጆች ሠ) ጓደኞች ረ) መጽሐፍት ሰ) ሌሎች ማህበራዊ ሚዲያዎች ሸ) መደበኛ ትምህርት	
C7	ድንገተኛ የወሊድ መከላከያ ከየት ማግኘት ይቻላል? (ከአንድ በላይ መልስ ይቻላል) ሀ) ከሆስፒታል/ጤናጣቢያ ለ) ከጤና ባለሙያ ሐ) ከመድሃኒት መሸጫ መ) ገበያ ማዕከል ሠ) አላውቅም	
C8	ድንገተኛ የወሊድ መከላከያ ምን ያህል ውጤታማ ነው? (ከአንድ በላይ መልስ ይቻላል) ሀ) 99% ለ) 75% ሐ)50% መ) < 25% ሠ)አላውቅም	

	ክፍል፡-4	
D1	ለአብዛኞቹ ሴቶች የድንገተኛ ጊዜ የወሊድ መከላከያ ምንም ጉዳት የለውም?(ከአንድ በላይ መልስ ይቻላል) ሀ) በጣም እስማማለሁ ለ) ገለልተኛ ሐ) በጣም አልስማማም	
D2	ድንገተኛ የወሊድ መከላከያ እንደአስፈላጊነቱ ትወስጂያለሽ? ሀ) አዎ ለ) አልወስድም	
D3	ድንገተኛ የወሊድ መከላከያ ለሌሎች እንዲጠቀሙት ትመክርያለሽ? ሀ) አዎ ለ) አልመክርም	
D4	ድንገተኛ የወሊድ መከላከያ ለምን አትመክሪም ወይም አትጠቀሚም? ሀ) የጎንዮሽ ጉዳት ሊኖረው ስለሚችል ለ) ሃላፊነት የጎደለው ወሲባዊ ባህሪ ያመጣል ሐ) የኮንዶም መጠቀም ይቀንሳል መ) በሃይማኖቴ አይፈቀድም ሰ) መጥቀሙ ህገወጥ ነው	
D5	ጥንቃቄ ከጎደለው ወሲብ የሚከሰት እርግዝና ድንገተኛ የወሊድ መከላከያ ይከላከላል ሀ) እስማማለሁ ለ) ገለልተኛ ሐ) አልስማማም	
D6	ሴቶች የድንገተኛ መከላከያ መኖርን ካወቁ የረጅም ጊዜ የእርግዝና መከላከያ አይጠቀሙም ሀ) እስማማለሁ ለ) ገለልተኛ ሐ) አልስማማም	

	ክፍል፡-5	
E1	ከዚህ በፊት የድንገተኛ የወሊድ መከላከያ ተጠቅመሽ ታውቂያለሽ? ሀ) አዎ ለ) አላውቅም	

E2	ባለፈው 1 ዓመት ውስጥ የድንገተኛ የወሊድ መከላከያ ተጠቅመሽ ታውቂያለሽ? ሀ) አዎ ለ) አላውቅም	
E3	ባለፈው 15 ቀን ውስጥ የድንገተኛ የወሊድ መከላከያ ተጠቅመሽ ታውቂያለሽ? ሀ) አዎ ለ) አላውቅም	
E4	የትኛውን አይነት ድንገተኛ የወሊድ መከላከያ ነው የተጠቀምሽው? ሀ) ፖስትፒል(post pill) ለ) ሉፕ ሐ) አላስታውስም	
E5	የድንገተኛ የወሊድ መከላከያ ለመጠቀምሽ ምክንያቱ ምንድነው? ሀ) ሌላ የእርግዝና መከላከያ አለመጠቀም ለ) የተሳሳተ የጊዜ ስሌት ሐ) የኮንዶም መቀደድ መ) ውሲባዊ ግኑኝነት እንድፈፅም ተገድጄ ሰ) አላስታውስም	

እመሰግናልሁ!!!

DECLARATION

By my signature below, I declare and affirm that this thesis is my own work. I have followed all ethical principles of scholarship in the preparation, data collection, data analysis and completion of this thesis. All scholarly matter that is included in the thesis has been given recognition through citation. I affirm that I have cited and referenced all sources in this document. Every serious effort been made to avoid any plagiarism in the preparation of this thesis.

This thesis is submitted in partial fulfilment of the requirement for the specialty certificate in Obstetrics and Gynecology in Addis Ababa University School of Medicine. I would like to declare that this thesis has not been submitted to any other institution anywhere for the award of any academic specialization, degree, diploma or certificate.

Name: _____ Signature _____ Date _____