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### ORIGINAL ARTICLE

Knowledge, Attitude and Practice of Emergency Contraception among Female Bahir Dar University Students, Northwest Ethiopa

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# **Abstract**

*Background*: Unwanted pregnancy has many negative consequences on the health and wellbeing of women. Emergency contraception (EC) plays an important role in the prevention of unwanted pregnancy and contributes in the reduction of unnecessary maternal deaths due to complications of unsafe abortion.

**Objective**: The aim of the study was to assess knowledge and practice (KAP) of female students in Bahir Dar University.

*Method*: A cross-sectional study was conducted from May 6 to 11, 2008 among female students in Bahir Dar University. Data was collected using a pre-tested, structured questionnaire. A total of 400 female female students were enrolled in this study. The collected data was cleared manually and analyzed using Epi-Info version 3.4.3 software package. The result of the study was presented by tables and percentage.

**Results**: Among the total of 400 respondents 386 (96.5 %) have knowledge about family planning, 334 (83.5%) heard about EC. Awareness about EC was found relatively higher among natural than social students (OR 1.82, X<sup>2</sup> 3.54). The main source of information on EC and family planning was dominantly from family member and mass media. Out of 334 respondents, who were aware about EC, only 129 (73.4 %) used EC. Two hundred forty-nine (62.3%) of the respondents believe that their religion has influence to their attitude towards EC use.

Conclusion: Majority of the respondents heard about EC and family planning, however there is a great knowledge and attitude gap among respondent as they lacked detailed information and specific knowledge about EC. In order to increases knowledge about EC and to bring attitudinal change among female University students there should be continuous education on family

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planning and specific information about EC and establishment of family planning club is recommended.

*Keywords*: Emergency contraception; knowledge, attitude and practice; female university students; Bahir Dar University; Ethiopia.

# Introduction

Emergency contraception (EC) is a drag administered after unprotected sex to prevent pregnancy. It is also known as "post-coital contraception", is less effective than regular contraception, and it is intended for occasional or emergency use only and not as a regular contraception. It is associated with a failure rate of 0.2% to 3 % (1). There are various methods of EC. They include hormonal contraceptive pills, intrauterine contraceptive devices and mifepristone. Formerly, EC pills were thought to be effective only within 72 hours, but recent studies have confirmed that they are effective for up to 120 hours (2, 3).

Any pregnancy whether intended or unintended is known to have some risk and expose the women to a variety of hazards which might even threaten her life (4). Unintended pregnancy poses a major challenge to the reproductive health (RH) of young adults in developing country(50. With decreasing age of menarche and onset of sexual activity, young people are exposed early to unplanned and unprotected sexual intercourse leading to unwanted pregnancy and invariably abortions.

The World Health Organization (WHO) estimates that 84 million unwanted pregnancies occur annually worldwide (6). On average, 46 million abortions take place every year, out of which 20 million are performed under unsafe conditions (6, 7). Approximately 13% of pregnancy-related mortality worldwide is due to unsafe abortions and the majority of these deaths (and morbidity) occur in low-and middle-income countries (9).

Accordingly, to the national survey an abortion conducted by Ethiopian Society of Obstetricians and Gynecologist (ESOG), the low status of women, poor access to family planning service, lack of information about available RH service and RH rights are major factors that aggravated the prevailing unacceptable situation (9).

A study conducted in Durban, South Africa to assess the KAP of EC among tertiary students with a total of 436 students, showed that 56.5 % had heard about EC, few know the correct time limit in which it must be used, only 60 students (7.8 %) know how effective EC was in preventing

pregnancy, 91 students (11.8 %) had used EC and 50 % responded that if they had to, they want use it and recommended to others (10). They survey showed the need for a carefully designed education program and promotion of EC.

In Ethiopia 15-60 % of adolescent pregnancies are unwanted or unintended, resulting from unprotected sexual intercourse. Unintended pregnancy is one of the enormous problems female youth face due to early most often unprotected and unsafe sexual practices. Emphasis is made on EC. Thus, the objective of this study is to assess the knowledge, attitude and practice (KAP)of female university students on EC.

### Subjects and Methods

The study was conducted at Bahir Dar University in Bahir Dar town which is a capital city of Amhara Regional State from May 6 to 11, 2008. Bahir Dar town is located in Northwest part of the country and it is 555 km from Addis Ababa. The town has one specialized hospital, two health centers, two governmental clinics, six higher privet clinics and four medium private clinics. It has also one university, five colleges, one vocational training center, two precollege schools and three high schools. Bahir Dar University has two campuses and this study was conducted in both campuses.

It is a cross sectional study conducted to assess KAP of female university students towards EC. All students enrolled in Bahir Dar University during the year 2008 were the source of the study population. Few studies in the country showed a knowledge and attitude prevalence of 47 %. Thus, the sample size was calculated by using the prevalence rate of 50 % and 95 % level of significance, marginal error of 5 % and none students. Samples were taken from two campuses by proportion.

Data collection was carried out by pre-tested self-administered questionnaires, which covered sociodemographic information and KAP on EC. The questionnaires were distributed to the study subjects randomly at their dormitory in the two campuses. The collected data was cleaned, coded, entered and analyzed by using Epi-Info version 3.4.3 statistical software package. Ethical clearance was obtained after the objective of this study and procedure was discussed with concerned bodies of Bahir Dar University and verbal consent Privacy and confidentiality was ensured during the study.

### Results

A total of 422 students were planned to be enrolled in this study, but with 5 % non response rate 400 respondents were involved in this study, The age of study participants ranged from a minimum of 18 years to maximum of 29 years.

The mean age was 20+1.6 years. Majority of the students were single, Orthodox in religion and Amhara in their ethnic group i.e. 92 %, 75% and 62.5 %, respectively (Table 1). From the total of 400 respondents 386 (96.5 %) of students know about family planning.

Regarding knowledge on method of family planning, about one fourth of respondents 107 (27.7 %) knew about pills followed by 62 (16.1 %), injectables, 42(10.9 %) intra-uterine device (IUD) or loop and 38 (9.8 %) of the respondents had knowledge for pills, injectables and implants (Table 2)

Table 1: Socio-demographic characteristics among femal university students at Bahir Dar University,

Northwest Ethiopa, May 2008 (N=400).

Socio-demographic	Characteristics	Frequency (n)	Percent (%)
Age	18-21	313	78.3
	22-25	81	20.2
	>	6	1.6
	25	300	75
Religion	Orthodox	46	11.5
	Muslim	44	11
	Protestant	6	1.5
	Catholic	4	1
Ethnicity	Amhara	251	62.8
	Oromo	70	17.5
	Tigire	45	11.3
	Other	34	8.5
Marital Status	Single	368	92
	Married	31	7.8
	Divorced	1	0.3
Educational Level	First year	127	31.8
	Second year	161	161
	Third year	96	24
	Fourth Year	16	4

Table 2: Knowledge of female university student's bon family planning methods in Bahir Dar University

Northwest Ethiopa, May 2008 (n=386).

Methods	Frequency (n)	Percent (%)
Pill	107	27.7
Injectable	62	16.1
Loop	42	10.9
Implant	27	7
Those who knew two methods	66	17.6
Those who knew tree methods	60	15.4
All	20	5.2

Among the respondents, 334 (83.5%)of the ever heard about EC, 165 (49.4 %)and 28 (8.4 %) know about pills and loop, respectively the rest, 141 (42.2 %)know both loop and pills. Awareness about EC was found relatively higher among natural than social science students (OR 1.82, X<sup>2</sup> 3.54). The major sources of information is females who heard about EC responded correctly about EC never reduce the change of contracting a sexually transmitted infection, and nausea was the most major common sid-effect5 of EC 87 (26 %) and 31 (9.3 %), respectively

Of the 334 women who were aware of EC, only 129 (38.6) correctly identified 72 hour as the time limit for the method use. Concerning the time on which condition EC is needed, 117 (35 %) responded that it can be used during sexual intercourse without family planning, followed by either of two conditions happened 87 (26.1 %) and during condom rupture 66 (19.8 %). Few respondents knew use of EC in all conditions (Table 3).

Concerning attitude question of EC from the total respondents 381 (95.3%) of students think that family planning is important and 324 (81 %) of respondents also believe that EC can prevent unwanted pregnancy. More than half of the students 234 (58.5 %) believe that couples have equal

awareness about EC and most of the respondents 287 (71.8 %) agree that EC is effective in reducing morbidity and mortality of females due to unwanted pregnancy.

Regarding the negative influence of their religion towards use of EC 249 (62.3 %) of the respondents believes use of EC 249 (62.3 %) of the respondents believe t5hat religion has influence to their attitude towards EC use (Table 4).

Among the respondent 124 (31 %) had practiced unsafe sex in their life time. Of those practiced unsafe sex 32 (25.8 %) encountered unwanted pregnancy.

Table 3: Knowledge of female university students on which conditions EC can be used in University of Bahir Dar, North Ethiopia, May 208 (n=334)

Characteristics on which condition EC can be used		Frequency (n) Percent
When sex performed without family planning	117	35
If condom rupture during intercourse	66	19.8
If there is rape	52	15.6
Those who knew either of the two above conditions	87	26.1
In all condition	12	3.6

Table 4: Response of family university students on attitude questions towards EC use, at Bahir Dar University, Northwest Ethiopia, May 2008.

Attitude questions	Yes n (%)	No n (%)
Do you think planning is important?	381 (95.3 %)	19 (4.8)
Do you believe that EC can prevent un wanted pregnancy	324 (81 %)	76 (19 %)?
Do you believe that couples have equal awareness about EC	234 (58.5%)	166 (41.5 %)?
Would you like to discuss about EC with your friend or husbar	138 (34.5 %)?	

Do you agree that EC is effective in reducing mortality and	287 (71.8 %)	113 (28.3 %)?
morbidity of females from unwanted pregnancy?		
Does your religion influence your knowledge on family planning	ng 249 (62.3 %)	151 (37.8 %)?

Ninety-one (73.4 %) used EC 33 (26.6 %)did not take EC after unprotected sex. Of those who used EC more than half of them used pills to prevent unwanted pregnancy. The students obtained E3C commonly from pharmacy, clinics and family planning agents.

### Discussion

Female Bahir Dar university students seemed to have quit adequate knowledge of family planning in general and EC in particular. However, they don't have clear information with regard to were to get EC, when to take it and information about the time interval between the two doses. Unprotected sex was reported by almost 27 % of the respondents.

This piece of information is vitals it is detrimental in order to prevent unwanted pregnancy among these students.

The study findings indicate that the female students EC source of information were their family members and the media. This indicates that there are very limited activities in the campus towards improving their RH information and services.

In conclusion, there is an urgent need to educate young people in universities about RH and family planning and skills on how to prevent HIV/STIs including unwanted pregnancy. Awareness creation activates have to be designed with IEC/BCC materials that are attractive and innovative to yang people.

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