

Parent-Adolescent Communication on Sexual and Reproductive Health Issues and Affecting Factors in Asella Town, Arsi Zone, Ethiopia; A Community Based Cross-Sectional Study.

Daniel Bekele (✉ bekeled46@gmail.com)

Arsi University

Abdi Deksis

Arsi University College of Health Sciences

Wondu Abera

Arsi University College of Health Sciences

Getu Megersa

Arsi University College of Health Sciences

Research

Keywords: Adolescent, communications, parent, reproductive health

Posted Date: May 15th, 2020

DOI: <https://doi.org/10.21203/rs.3.rs-28486/v1>

License: © ⓘ This work is licensed under a Creative Commons Attribution 4.0 International License.

[Read Full License](#)

Abstract

Background: Parents' communication on sexual and reproductive health (SRH) issues with their adolescent plays a great role in preventing morbidity and mortality associated with sexual behavior. However lack of parent to adolescent communication was a serious problem in Ethiopia resulted in teenage pregnancy, unsafe abortions, sexually transmitted infections (STIs), school problems, and other sexual risk behaviors. Therefore, the aim of this study was to investigate the level of parent-adolescent communication and affecting factors on SRH issues in Ethiopia.

Methods: A community based cross-sectional survey was conducted on 347 randomly selected parents of 10–19 year old teenagers. A random sampling was used to sample the study participants. A pre-tested and structured questionnaire as used to collect data. A binary and multivariable logistic regression analysis was conducted for adjusted odds ratio (AOR) at 95% confidence interval (CI), variables at a *P-value* < 0.05 were considered as significant association.

Results: The study showed that, 23.1% of parents had communication on SRH issues with their adolescents. Factors computed for adjusted odds ratio [AOR], such as parents completed some form of education (being grades 9–12 [AOR = 2.42, 95% CI: 1.06–5.53]; diploma and above [AOR = 4.78, 95% CI: 2.03–11.21]; having good knowledge [AOR = 3.08, 95% CI: 1.89–5.39]; and being having positive attitudes [AOR 3.03, 95% CI: 1.37–6.70] were significantly affect the communication.

Conclusion: This study revealed that a low proportion of parents' communication on SRH issues with their adolescents and multifaceted factors appear to determine their discussion. Thus, promotion of parent to adolescent communication, parents training and addressing the importance of parent to young people communication to all parents along with health care providers was important.

Plain English summary Parent-adolescent sexual and reproductive health (SRH) communication is one of the potential sources of information for adolescents on the issues. Agreed that adolescents in Ethiopia are faced with increasing SRH-related risks, it is important to understand how parents communicate about SRH to their adolescents from the parents' perspectives. A community based cross-sectional study targeting parents was conducted at eight kebeles of Asella town, Arsi zone, Ethiopia based on interview survey. Three hundred forty seven (347) parents having children of 10-19 years in selected household were included. The majority of the parents 82.4%, agreed on the need of discussions with their adolescents and 72% had the good knowledge of SRH issues. However in this study, the level of parent-adolescent discussion on SRH issues was very low, 23.1%. The find showed that the main reason for not talking with their adolescents; perceived it may initiate adolescent for sexual practice, culturally unacceptable, shame/taboo, lack of awareness and being too busy. Also, the probability of discussion was found to be significantly higher among parents who had completed some form of education, parents who had good knowledge and positive attitude towards SRH issues as compared with those who didn't have good knowledge and positive attitude on the topic. This study suggests for conducting qualitative research investigating the socio-cultural context within which the SRH communications happen.

Introduction

The World Health Organization (WHO) defines an adolescent as an individual in the age group 10 to 19 years old [1]. Adolescence is the stage of transition from childhood to adulthood, which is characterized by physiological, psychological and social changes. In addition, adolescence is an occasion to consider health promotion efforts on reducing the risk of negative sexual and reproductive health (SRH) outcomes, such as teen births and sexually transmitted infections (STIs) [1, 2]. Evidences have shown that when adolescents mostly girls communicate to their parents about sexual behaviors, pregnancy prevention (contraception) and STIs they are more likely to engage in safe sexual behaviors, including abstinence and protective behaviors that prevent pregnancy and STIs [2, 3]. In Ethiopia, more than 35% of the total population comprises from adolescents. This big number is still suffer from life threatening of sexual and reproductive health (SRH) risks related to early marriage, unwanted pregnancies, unsafe abortions, STIs including HIV/AIDS [4]. Parent-teenager communication may be particularly important, especially when it comes to reducing engagement in sexual risk behaviors [2, 4]. It is believed that, family often has the power to guide teenagers' development in sexual health issues, encouraging them to practice reasonable sexual behavior and develop good personal decision-making skills [4].

Adolescent who live in a stable family and discuss sexuality and reproductive health issue is more likely to remain sexually abstinent, postpone intercourse, have one partner, and use contraception [5]. Findings showed that, in Ethiopia many of adolescents often lack strong and stable relationships with their parents to openly talk about SRH issues. Consequently, many teenagers do not have access to reliable information regarding their SRH needs [6]. Even though parents are the main sources of information for SRH issues, there remains a silence between many parents and their adolescent children to discuss on these issues. Studies have shown that only 27%, 19%, and 35.0% of parents in the Tanzania, Rwanda and Ethiopia, respectively, had communicated about SRH with their adolescents [7–9].

Regarding SRH many adolescents discuss with their peers who may not have a proper knowledge on these matters and as a result gain defective knowledge. This misinformation can make adolescents vulnerable to unprotected sex, unwanted pregnancy, sexually transmitted diseases, and unsafe abortions [10]. Most of people become sexually active during adolescence. However, the use of contraceptives and condoms among these people is low and unprotected sex is the second largest contributor to health risk in terms of the burden of disease in young people [11]. As a result, each year there are at least hundred million cases of STIs among adolescent people, as well as more than 2.5 million unsafe abortions reported for adolescents [12]. Particularly in Ethiopia, 13% adolescents face challenge of early marriage, among this 10% of age 15–19 have begun childbearing this teenage childbearing is more common in rural than in urban areas 15% and 5%, respectively. Consequently, Teenage mothers are more likely to experience adverse pregnancy outcomes and are more constrained in their ability to pursue educational opportunities than young women who delay childbearing [13, 14]. Because of an increased incidence of STIs including HIV infection and unwanted pregnancy which leads to unsafe abortion in adolescents, it is important to examine factors that influence young people's sexual behaviors. One of these factors is parent adolescent communication about sexuality [15]. Parent-adolescent discussions regarding of

sexuality or SRH issues are more likely to reduce adolescent risk-taking sexual behaviors when combined with effective parent–adolescent communication of adolescents’ SRH matters [16]. Even though parent-adolescent sexual communication is a primary means of transmitting sexual values, beliefs, expectations, and knowledge between parents and children, proportion of adolescents who discussed with their parents was low and parent’s involvement in the discussion was limited. Instead, the most important sources of information on SRH were none family members like friends [17]. The rationale for the study was since adolescence is a critical developmental period when they begin to develop their romantic and sexual identities and is an important time to learn about how to engage in healthy idealistic and sexual behavior. Parent-adolescent communication regarding SRH issues is an important and effective means of encouraging adolescents to adopt responsible sexual and reproductive behaviors [3, 17]. Despite of the importance, parent-adolescent communication on SRH issues remains low. And factors affecting parent-adolescent discussions on SRH issues are not well investigated. Especially, there has not been a study done related to parent adolescent communication on sexual and reproductive health issues in our area. Hence, this study was conducted to investigate parent-adolescent communication on SRH issues and factors associated with. The study was used to provide base line information for policy makers, program planners and implementers to design appropriate interventions to address the sexual and reproductive health issues of adolescents.

Methods And Materials

Study setting and period

The study was conducted in Asella town, Arsi zone, Ethiopia from May 1–30, 2019. Asella is capital town of West Arsi Zone located 175 kilometers from Addis Ababa. According to the information obtained from the town statistics office report, the total population of the town was 67,269, of whom 33,826 were men and 33,443 were women and having 6050 households. For the administrative purpose, the town was divided into 8 administrative units (kebele). In the town there are 1 teaching public hospital with 2 health centers and 1 private hospital with one youth clinic family guidance association of Ethiopia (FGAE).

Study design

A community based cross-sectional study design was conducted quantitatively.

Study participants

All parents/guardians living in Asella town having children of 10–19 years in selected households (HHs) were study populations whereas parents in selected house hold having at least one adolescent during data collection period was considered as study unit.

Inclusion and exclusion criteria

Parents/guardians having at least one adolescent in the study area were included whereas parents who were severely ill and unable to hear and speak were excluded from the interview.

Sample Size determination and Sampling procedure

Sample size was calculated using single population proportion formula with the following assumptions: proportion of parent to adolescent communication 28.76% in previous study in Ethiopia [18], confidence interval 95%, margin of error 5%, and with 10% non-response rate and the final sample size was 347. The study was conducted on totally 8 kebeles (smallest administrative unit in Ethiopia). The number of households (HHs) to be included in each kebele was determined in proportion to the total number of HHs in each kebele. A systematic sampling method was then employed to select the HHs and HHs heads (parents) were interviewed based on the objective of the study. In case no eligible candidate was identified in a selected HHs, the interview was conducted in the next HHs where there was eligible candidate.

Data collection procedure and measurement

Trained midwives have collected the data by face to face interview using a structured standard questionnaire that was previously used in Ethiopia using the Regional language (Afan oromo).^{18,21} The questionnaire consisted of socio-demographic characteristics, knowledge about SRH, attitude towards SRH, and discussion of SRH related question. The interview was conducted in a private place and under supervision of the principal investigators. The data collectors were trained for two days about the objective of the study, the handling of study participants, and other ethical issues.

The questionnaires were pre-tested on 5% of participants out of the study participants 1 week ahead of actual data collection and further refined based on the results.

Data management and analysis

The data was collected through the structured questionnaire was compiled, reviewed, coded and entered in to Epi- Info version 7.1.2 and exported to SPSS version 23 for analysis. Data was checked and cleaned for its completeness and errors in coding and entering before analysis. To explain the study population in relation to relevant variables, frequencies tables, graphs and text was used. Dependent variables were computed from responses to SRH communications and were dichotomized as “Yes” (coded as “1”) and “No” (coded as “0”). Then, All variables having P value < 0.25 had significant association from binary logistic regression was entered to multiple logistic regression analysis to determine independent associated factor of parent-adolescent communication on SRH issues by controlling the effect of possible confounder, significant statistical association was determined by using AOR at 95% confidence interval(CI) and P value < 0.05 .

Operational definition

- **Adolescent:**

Individual's teenagers between the age group of 10 to 19 years old [1].

- **Parents:**

Biological parents/guardian parent but it does not include elder siblings [11].

- **Communications on SRH issues:**

Parents/guardian who discussed at least two SRH issues (condom, STIs /HIV/AIDS, sexual intercourse, menstruation, unwanted pregnancy, contraception, physical and psychological changes during puberty) with their adolescents in the last 12 months [11,18].

- **Knowledgeable on SRH:**

Parents who scored above summed mean score value of the knowledge questions whereas those who scored below or equal calculated mean value was considered as not knowledgeable[11,18].

- **Positive attitude:**

Respondents who scored above the mean of the attitudinal questions while those who scored below or equal the mean value was considered as negative attitude [11, 18].

Results

Socio-demographic characteristics of respondents

In this study a total of 347, parents were interviewed giving 100% response rate. The mean age of study participants was 45.9 (± 11 sd) years. As shown in (Table, 1) below, among the study participants, 173 (49.9%) were Oromo by ethnic group and 151(43.5%), of them were orthodox in religion. Majority of the respondents were females 205 (59.1%), regarding marital status majority, 282 (81.3%) was live together and housewives 139 (40.1%), and 128 (36.9%) educated primary school and 162(46.7%) had (3–5) family size.

Table 1
Socio-demographic characteristics of respondents, Asella town, Ethiopia, June, 2019

Variable /Categories	Frequency	Percentage
Age	64	18.4
< 35 years	128	36.9
35–45 years	155	44.7
> 45 years		
Sex	142	40.9
Male	205	59.1
Female		
Educational level	85	24.5
Illiterate	128	36.9
Primary[1–8]	46	13.3
Secondary[9–12]	88	25.4
Diploma and above		
Marital status	282	81.3
Married/Live together	39	11.2
Divorced	26	7.5
Widowed		
Family size	122	35.2
[1–2]	162	46.7
[3–5]	63	18.2
> 5		
Religion	151	43.5
Orthodox	114	32.9
Muslim	80	23.1
Protestant	2	.6
*Others		

Key= *Others (Wakefata, Adventist & Catholic) **Others could be (Tigire, & walyita)

Variable /Categories	Frequency	Percentage
Ethnicity	173	49.9
Oromo	117	33.7
Amhara	56	16.1
Gurage	1	.3
**others		
Occupation	139	40.1
Housewife	73	21
Government employer	60	17.3
Farmer	62	17.9
Merchant	13	3.7
Daily laborer		
Monthly income	70	20.2
< 500Birr	87	25.1
500-1000Birr	190	54.8
1000 and above Birr		
Key= *Others (Wakefata, Adventist & Catholic) **Others could be (Tigire, & walyita)		

Knowledge on sexual reproductive health issues

Parents' knowledge of reproductive health issues was assessed by asking a set of closed ended questions adapted from previous study to identify their knowledge of SRH issues. Out of these 250 (72%) had the good knowledge of SRH issues. Specific components of SRH mentioned by the parents were; family planning 93.7%, STDs 73%, and early marriage 52.4%. When asked about the behavioral and physical changes during adolescence, majority 92.8% breast enlargement and 90.5% beginning of menses on females and change in voice for males 84.7%. Among parents asked about knowledge contraceptives methods, majority had awareness of pills 91.6%, injection 92.5%, implant 82.4%, Natural /calendar 8.1%, IUCD 79.5%, condom 79.5%, emergency contraceptives 33.4%.(Fig,1). Regarding of the consequences of unprotected sex, the majority reported that leads for STD /HIV 75%, unwanted pregnancy 66%, unsafe abortion 28.2%, and school drop 90.2%.

Parent's attitude and suggestions on SRH discussion

Attitude of parents towards SRH issues discussion was measured by a set of questions using the liker scale. The majority of the parents 82.4%, agreed on the need of discussions with their adolescents, 89.6%

strongly agree to encourage adolescents to ask about SRH information, and 76.4% agreed abstinence of sex rather than other contraceptives. Around 4.3% of parents think that discussion about sexuality will make adolescents promiscuous and 22.8% of parents approved the use of condom by their adolescents. In general a combined score for the five questions indicated that 77.5% of parents had positive attitude towards reproductive health and its discussion (Fig: 2). Among parents asked their suggestions of SRH communication with their adolescents, majority of parents recommended that adolescents should get adequate information of SRH issues at school 95.4%, through mass media 87%, at home 13.8% and 15% at religious area. Out of parents asked about their adolescents future sexual behaviors 79.5% were worried about it and 93.4% of them did not accept premarital sex.

Parent-adolescent communication and hindering reasons on SRH matters

Even though majority, 78% of parents have positive attitude towards parent-adolescents SRH discussion, this study showed that only, 23.1% of the respondents had discussed at least two components of SRH issues in the last 12 months. Out of the discussions had been made 60%, and 40.3% were done with their daughter and son respectively. The find showed that the majority of female parents prefer to communicate with their daughters 50.7% while male parents had been discussed with sons and daughters, 53.1%. The major topics of the discussions were about STIs/HIV/AIDS 90.2%, abstain 74.2%, early marriage 63.89%, condom 40.02%, and unwanted pregnancy, 40.5%. As seen in (Figure: 3), the most common reason for not talking with their adolescents; majority 77.5%, perceived it may initiate adolescent for sexual practice, culturally unacceptable 47.3%, difficult to explain 58.2%, shame/taboo 53%, lack of awareness 53.9% and lack of time/too busy 25.6%

Factors associated with SRH communication

As indicated in Table: 2, below. A binary logistic regression analysis showed that parents' educational status, marital status, religion, occupations, family size, attitude and knowledge of parents were significantly associated with parent-adolescent discussion. In multivariate logistic regression all significant variables mentioned above and those with P-value less than 0.25 in the crude analysis were again entered in to multivariate logistic model to control confounding effect. Hence, the probability of discussion was found to be significantly higher among parents who had completed some form of education: grades 9– 12 (AOR = 2.423, 95% CI: 1.062–5.529), diploma and above (AOR = 4.775, 95% CI: 2.034–11.213). However parents' marital status divorced was 69% had lower tendency to discuss on SRH issues (AOR = .314, 95% CI: .117-.842). Parents who have good knowledge and positive attitude towards SRH issues are almost similarly three times (AOR = 3.086, 95% CI: 1.886 5.395; AOR = 3.034, 95% CI: 1.373–6.704) higher in discussing about SRH than their counterparts, respectively.

Table 2

Predictors of parent – adolescent discussions on reproductive health issues, Asella town, Arsi zone, Ethiopia, June, 2019 (n = 347).

Variables		Discussion on SRH issues		COR (95% CI)		AOR (95%CI)	
		Not	Yes				
Educational status	Illiterate	48	37	1		1	
	Primary(1–8)	100	28	1.31	(.44, 3.95)	1.22	(.39, 3.77)
	Secondary(9–12)	40	6	2.45	(1.097, 5.50)	2.42	(1.06, 5.53)
	Diploma & above	79	9	6.76	(3.00, 15.24)	4.77	(2.03, 11.2)
Marital status	Widowed	198	34	1		1	
	Single/guardian	35	15	2.49	(1.23, 5.05)	2.41	(1.13, 5.15)
	Divorced	23	16	4.05	(1.94, 8.44)	3.21	(1.47, 7.01)
	Live together	11	15	7.94	(3.36, 18.74)	3.36	(1.26, 8.89)
Family size	1–2	87	35	1		1	
	3–5	135	27	.49	(.28, .87)	.64	(.34, 1.22)
	> 5	45	18	.99	(.50, 1.94)	1.08	(.50, 2.31)
Knowledge on SRH issue	Poor	38	59	1			
	Good	42	208	3.19	(1.88, 5.39)	3.001	(1.66, 5.44)
Attitude on SRH discussion	Negative	72	197	1		1	
	Positive	70	8	3.19	(1.46, 6.97)	3.03	(1.37, 6.70)
Key =*COR = Crud Odd Ratio, AOR = Adjusted Odd Ratio							

Discussion

A parent-adolescent discussion about SRH issues is a primary means for transmitting sexual values, beliefs, information and knowledge between parents and adolescents through communication. This kind of discussion is most likely to promote healthy sexual development and reduce sexual risks when parents

are openly discussed, skilled, and comfortable in their discussion of sex related topics.¹⁸ In this study, even though the majority of the parents (82.4%) accepted the importance of communication with their adolescents, the study has showed that only, 23.1% of parents had discussed on at least two topics of SRH issues in the last 12 months. This level of communication is also similar in other studies conducted in Ethiopia [18–20] which revealed that the discussion rarely occurs despite accepting its importance). But it is lower than other findings from Southern Ethiopia and abroad USA [10, 21] and higher than the study conducted in Dera Town.⁵ all these discrepancy may be due to social-economic, cultural difference and difference in accessing of SRH information. The greatest percentage of parent communication was about STIs/HIV/AIDS which accounts 90.2%, this finding is similar to other studies conducted in Ethiopia [18, 20]. Different authors argued that most parents are focusing on the negative aspects of SRH rather than working on the preventive aspects. The study shows that, parents who attended higher level and secondary level education were more likely to discuss reproductive health issues with their adolescent children when compared to parents who received none formal education [AOR = 2.423[1.063,5.529] and AOR = 4.775[1.062, 5.529] respectively. This finding is consistent with the another studies in Gojjem and Hawassa has revealed that adolescents whose mother or father was able to read and write were more likely to communicate SRH issues with their parents than those teenagers' parents unable to read and write [23]. This may be due to adolescents prefer to discuss with their peers/friends rather than their parents because they think that their parents are not knowledgeable about the subject matter or both parent and adolescents may face challenges because of fearing or embarrassing to communicate about the sexuality.

In this study, parents also indicated various reasons highlighting why they do not communicated about reproductive health issues with their children. Out of parents interviewed majority 77.5%, of them perceived that discussing about sexual issues with their adolescents might encourage the children to engage in premarital sex. This finding is proportionately higher than the findings of the study conducted in the selected region of Ethiopia.^{5,18} Additionally (53.9%) of respondents claimed lack of awareness regarding SRH issues as a reason followed by difficulty to initiate discussion due to fear and shyness (53%). Also, 47.3% of parents worried about their culture/cultural taboos, which is lower as compared to study conducted in other Sub-Saharan region [24]. However, it is similar to study conducted in Ethiopia¹⁸. The reason might be claimed that most parents are focusing on the negative aspects of SRH rather than working on the preventive aspects. The finding shows that parents who has good knowledge of SRH issues were three times more likely participated in discussion with their adolescents than their counter parts [AOR = 3.008, (1.662, 5.446)]. This is similar to the study conducted a previous that showed the reason for not discussing on SRH issues are parents lack of lack of knowledge followed by parents lack of communication skills [25].

Regarding communication of contraceptive methods in this study the most the frequently discussed between parent and adolescent was about the abstinence while the least discussed was about the use of condom. This is similar with study conducted in Ethiopia [10, 9] the reason behind might be thinking of that talking about the utilizations of condoms may initiates the adolescent for sexual practices. In this study, most of parents have positive attitude towards the importance of parent-teen discussion on SRH

issues. The find showed that those parents who are more educated have more positive attitude towards SRH issues discussion with their adolescents than the counterpart. Additionally, majority 95.4% and 87% have suggested that adolescents should get adequate information and knowledge regarding their sexuality and reproductive health issues at school and through mass media respectively. The study recommends that adolescent-parent communication on sexual and reproductive health issues and associated factors helps for policy makers, health care providers and any concerned bodies to design appropriate intervention strategies to tackle young generation reproductive health problems. Information obtained here can be used for planning of intervention programs in different part of the country.

Strength and limitation of the study

The sampling technique employed was the achievement of high response rate, the use of appropriate methods to minimize bias and the factors affecting communication could be mentioned as the strength of the study, because it is not much studied and explored particularly in the study area. However the limitations of the study was, communication on SRH issues and attitude outcomes are based on self-reported information, which is subject to reporting errors and missed values. The study was a cross-sectional study and hence it was difficult to imply cause effect relationship to explore parents view more.

Conclusion And Recommendation

Discussion from parents on sexual and reproductive health issues with their adolescent children plays a great role in preventing morbidity and mortality associated with. However, this study showed that the proportion of parent-adolescent communication about sexual and reproductive health was found to be low and was affected by traditional norms, lack of information, and limited skills of discussion and fear of initiation for premarital sexual practices. Thus, parents should be equipped with essential SRH information for improving their communication skills. Also, to engage the parents in sexual communication of the adolescents, improving underlying beliefs and norms, and improve the adolescent-parent communication, the socio-cultural norms and traditions about discussion on SRH among families should be considered for better SRH outcomes.

Abbreviation

AOR, adjusted odds ratio; CI, confidence interval; COR, crude odds ratio;

EDHS, Ethiopian Demographic and Health survey; HHs, Households;

HIV/AIDS, Human Immune Virus/Acquired immunodeficiency Syndrome

SPSS, Statistical package for social science; SRH, Sexual and Reproductive health

STIs, Sexually Transmitted Infection; USA, United State of America; WHO, World Health Organization

Declarations

Acknowledgments

Our special thanks go to Arsi University health sciences for cooperation and support in different stage of the research process. We would like to extend our gratitude to Asella municipality unit for supporting us by providing available information, and thanks also go to study participants, data collectors, and supervisors.

Author contributions

Daniel Bekele Wakjira, conceived the study, obtained ethical clearance and permission for study, participated in the design of the study, performed the statistical analysis and Draft the manuscript. Abdi Deksisia guided the research, involved in the design of the study, and performed the statistical analysis. Wendu Abera and Getu Megersa involved in the design of the study and statistical analysis, and drafted the article and rechecked it critically for important intellectual content. All authors read and approved the final manuscript. All authors contributed toward data analysis, drafting and revising the paper and agree to be accountable for all aspects of the work.

Funding

This study was funded by the Arsi University. The funders have not been involved in the study, data analysis and the preparation of this paper.

Availability of data and materials

All of the main data has been included in the results. Incase additional materials with details may be obtained from the corresponding author.

Ethics approval and consent to participate

This study was conducted in accordance with the Declaration of Helsinki. Ethical clearance and permission was obtained from Arsi university health science college institutional review board (IRB) with ethical clearance letter Ref No/A/U/H/C/S/237/06 /2019 and permission was secured from Asella town administrative office. Written informed consent was provided to the parents of participants prior to data collection for this study. Participants were told the objective of the study and their right to refuse completion of the questionnaires and this would not affect any support that they will get. Questionnaires were coded instead of using names as identification and confidentiality was assured throughout the study.

Consent for publication

Not applicable.

Competing Interests

All we authors declare no personal or financial conflicts of interest in this work.

References

1. Organization WH. Programming for adolescent health and development: Report of a WHO/UNFPA/UNICEF study group on programming for adolescent health: *World Health Organization*;
2. Martin JA, HamiltonBE, OstermanMJK, Driscoll AK, Drake P. Births: Final Data for 2016; National Center for Health Statistics: Hyattsville, MD, USA, 2018.
3. Widman L, Choukas-Bradley S, NoarSM, NesiJ, Garrett K. Parent-adolescent sexual communication And adolescent safer sex behavior: A meta-analysis. *JAMA Pediatr.* 2016, 170, 52–61. [crossref] [pub med]
4. United Nations Department of Economic and Social Affairs. World Population Prospects: The 2015 Revision, DVD Edition. NewYork; 2015.Available from: <http://www.un.org/en/development/desa/publications/world-population-prospects-2015-revision.html>
5. Tegegne AW, Ademasu E, Demewozu H. Parent to Young Communication on Sexual and Reproductive Health and Associated Factors among Parents Living with Young in Dera Woreda, North West Ethiopia . *J Community Med Health Educ.* 2019 ; 9: 655.
6. Shiferaw K, Getahun F, Asres G. Assessing communication on sexual and reproductive health issues among secondary and preparatory students with their parents in Debremarkos. *Reprod Health.* 2014; 11(1):2.
7. Williams CM. Sexual violence at first intercourse against women in Moshi, Northern Tanzania: prevalence, risk factors, and c onsequences, *Population Studies.* 2008;2(1):2
8. Bushaija E, Sunday FX, Asingizwe D, OlayoR, Abong’oB.. Factors that Hinder Parents from the communicating of Sexual Matters with Adolescents in Rwanda. *Rwanda j. Health sci.*, 2013; 2.
9. Kusheta et al. Adolescent-parent communication on sexual and reproductive health issues and Its factors among secondary and preparatory school students in Hadiya Zone, Ethiopia *BMC Pediatrics* (2019) 19:9 <https://doi.org/10.1186/s12887-018-1388-0>
10. Muluken F, Seblewengel L, Getu G S, and Mengistu M. Factors associated with adolescent–parent communication of reproductive health issues among high school and preparatory students in Boditi town, Southern Ethiopia: a cross-sectional study. *Patient Intelligence*, 2016; 8: 57-70.

11. Niguse H, AbulieM , MulusewA. Parent-adolescent Communication on Sexual and Reproductive Health Matters and Associated Factors among Secondary and Preparatory School Students in Robe Town, Bale zone, Southeast Ethiopia, 2017. *JOURNAL OF PUBLIC HEALTH INTERNATIONAL ISSN NO: 2016; 2641-4538*
12. WHO. Strengthening the health sector response to adolescent health and development. 2009
13. Ethiopia Demographic and Health Survey(EDHS).. Central Statistical Agency (CSA) [Ethiopia] and ICF, Addis Ababa, Ethiopia, and Rockville, Maryland, USA;2016
14. AbebeN, Mullub G. Assessment of Parent Adolescent Communication on Sexual and Reproductive Health Issues and Associated Factors in Alamata High School, Northern Ethiopia,International Journal of Sciences: Basic and Applied Research (IJSBAR) .2013;7, 83-92
15. Lehr S, diiorio C, Dudley W, Lipana J. The relationship between patient- adolescent communication and safer sex behaviors in college students. *J of Fam. [Nurr,]. 2000;6 (2):180-96.*
16. Burgess V, Dziegielewski FS, Green E.C. Improving Comfort About Sex communication between Parents and Their Adolescents: Practice-Based Research Within a Teen Sexuality Group. *The Journal of Brief Treatment and Crisis Intervention, :2005;5:379-90.*
17. Jerman P, Constantine N. Demographic and psychological predictors of parent-adolescent communication about sex: A representative statewide analysis *J Youth Adolescence.2010; 39:1164-74.*
18. YadetaTA, BedaneHK, TuraAK. Factors Affecting Parent-Adolescent Discussion on Reproductive Health Issues in Harar, Eastern Ethiopia:.A Cross-Sectional Study. *Journal of Environmental and Public Health. 2014, Article ID 102579, 7 pages <http://dx.doi.org/10.1155/2014/102579>*
19. Gebre Yesus D, Fantahun Assessing communication on sexual and reproductive health issues among high school students with their parents, Bullen Woreda, Benishangul Gumuz Region, North West Ethiopia. *Ethiop J Health Dev. 2010; 24(2)*
20. TessoW D, FantahunM., Enquselassie F. "Parent-young people communication about sexual and reproductive health in East Wollega Zone, West Ethiopia: implications for interventions," *Reproductive Health,2012. vol. 9, article 13, 2012.*
21. LaginaN. "Parent-child communication: promoting sexually healthy youth," *Advocates for Youth Washington, DC, 20036 USA, 2002*
22. Ayalew M, Mengistie B, Semahegn A. Adolescent - parent communication on sexual and reproductive health issues among high school students in Dire Dawa, Eastern Ethiopia: a cross sectional study. *Reproductive Health2014; 11(77).*
23. Abajobir A , SemeA . Reproductive health knowledge and services utilization among rural adolescents in east Gojjam zone, Ethiopia: a community-based cross-sectional study *BMC Health Services Research 2014, 14:138<http://www.biomedcentral.com/14726963/14/13824>.*
24. Fatusi A. Youths in sub- Saharan Africa. Adolescent Reproductive Health and Development Workshop. Ghana: Akosombo2007

25. Kiragu K, Obwaka E, Odallo D, Van Hulzen C. Communicating about sex: adolescents and parents in Kenya. AIDS STD Health Promot Exch. 1996;(3):11–13.

Figures

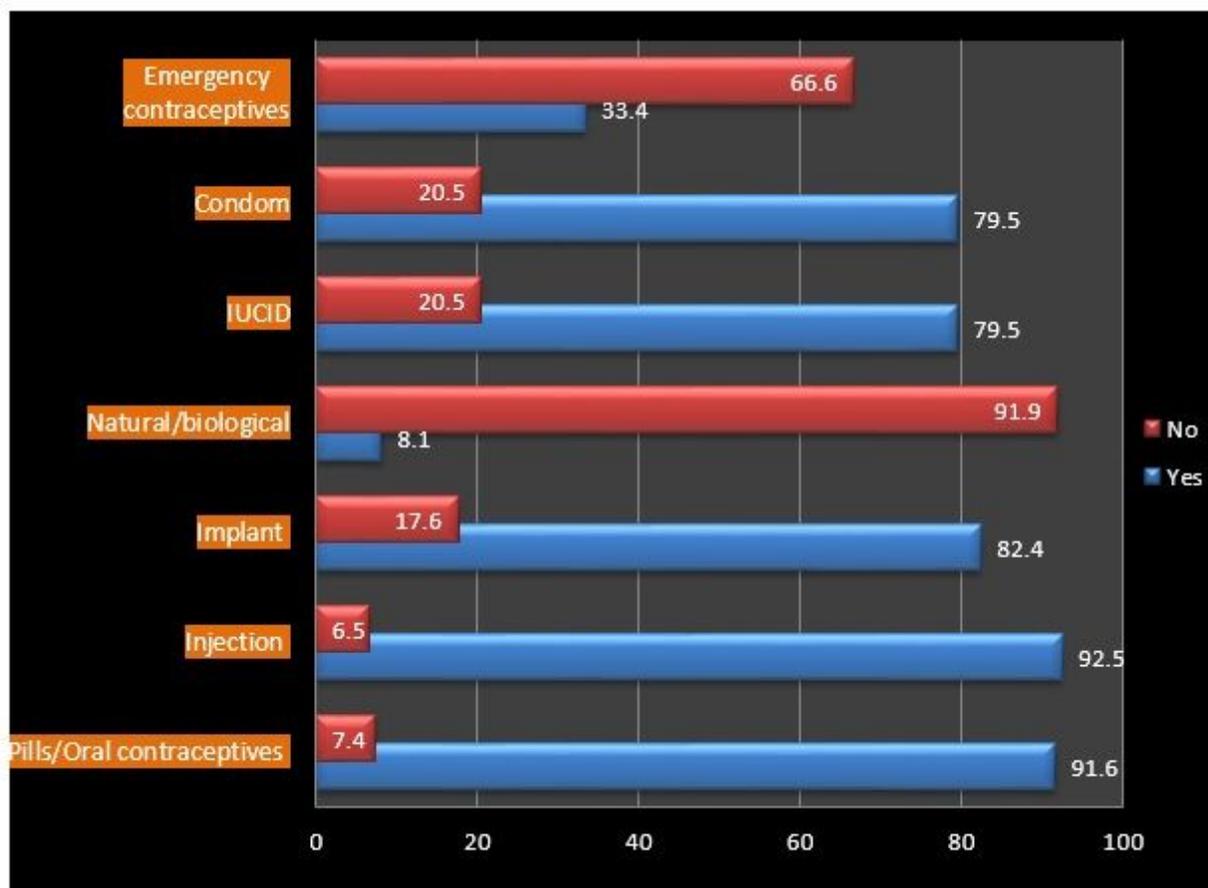


Figure 1

Parents' knowledge of family planning methods available in Asella town, Arsi zone, Ethiopia, June,2019

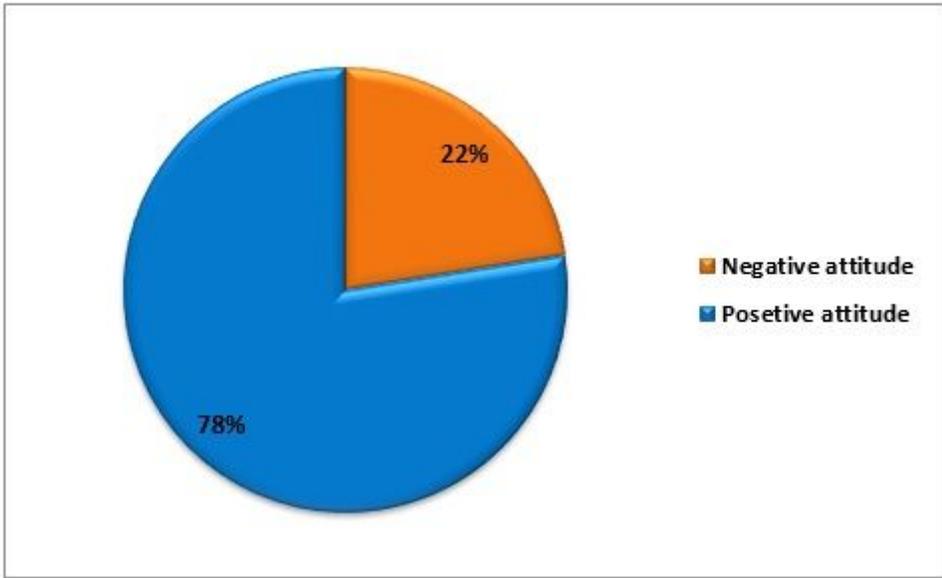


Figure 2

Over all parents attitude of SRH discussion with their adolescents, in Asella town Arsi zone, Ethiopia, June 2019

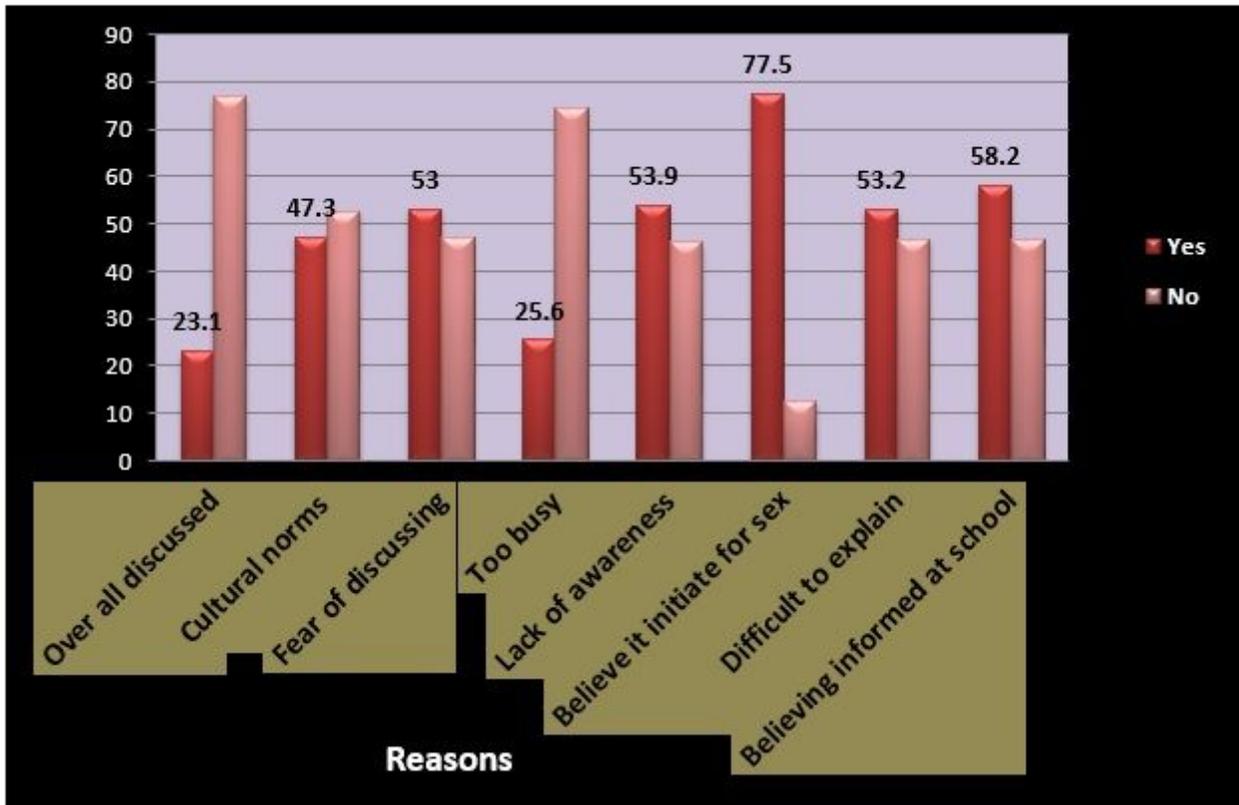


Figure 3

Respondents of overall discussion and reasons for not discussed, in Asella town, Ethiopia June, 2019.

