

How Parental Training Influence Parent-Adolescent Discussion on Adolescent Sexual and Reproductive Health: A One Year Quasi Experimental Study in Benue State, Nigeria

Rimamunra, G N¹; Odumu, G O²; Bitto, T T¹; Akwaras, N A³; Ukpabi, D E¹; Ogwuche, J I¹; Bako, I A⁴; Utoo, P M¹; Swende, T Z⁵; Olasupo, S A⁶

¹Department of Epidemiology and Community Health, College of Health Sciences, Benue State University, Makurdi, Benue State.

²Department of Surgery, Benue State University Teaching Hospital Makurdi, Benue State. ³ Department of Family Medicine, Federal

Medical Centre Makurdi, Benue State. ⁴ Department of Epidemiology and Community Medicine, College of Medicine, Federal University of

Lafia, Nasarawa state, Nigeria. ⁵ Department of Obstetrics and Gynaecology, College of Health Sciences, Benue State University, Makurdi,

Benue State. ⁶ Department of Physiology, Faculty of Basic Medical Sciences, Benue State University, makurdi, Benue State Nigeria.

ABSTRACT

Background: Discussions between parents and adolescents on Adolescent Sexual and Reproductive Health (ASRH) are vital in tackling the rising problems associated with ASRH. **Objectives:** This study was designed to determine the effect of parental training on parent-adolescent discussion on ASRH in Benue State, Nigeria. **Materials and Methods:** A one year quasi-experimental study with pre and post design was conducted from May 2019 to June 2020 among students in public secondary schools and their parents with the study group in Makurdi and control group in Gboko Local Government Areas in Benue State. The study objective was to determine the effect of the study intervention (training) on parents' discussions on ASRH with their adolescents and the effect on parent's knowledge. An interviewer-administered instrument was used to collect data from 250 parents and 250 adolescents each in the study and control group. The training was given after the first phase of data collection to only parents in the study group. Post intervention data was collected after 3 months from both study and control groups which was analyzed using descriptive statistics and Chi-square tests at P=0.05. The ASRH knowledge was assessed among the adolescents and parents via an 18-point knowledge scale and questions on ASRH knowledge in the questionnaire. Knowledge scores <9, >9-18 were categorized as poor and good, respectively for both parents and adolescents. **Results:** The mean age of the adolescents were 15.15±1.82 years (study group) 15.37±1.78 years (control group) while parents' mean ages were 43.96±10.99 years (study group) and 45.51±9.32 years (control group). Parent's knowledge scores had a statistically significant difference at post intervention ($\chi^2 = 4.620$, $p = 0.032$ and $\chi^2 = 17.997$). There was an increase from 85.9% at pre-intervention to 99.2% at post intervention in parents' discussions on ASRH among the participants in the study group whereas there was no statistically significant difference in knowledge in the control group. **Conclusion:** There is a

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*Correspondence:

Dr Rimamunra Grace

Nwumuji.

Tel: +237030680151

Email: rivinrimam@gmail.com

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positive effect of parental training on parent-adolescent discussion about Adolescent sexual and reproductive health and improvement in parents' knowledge in Benue State Nigeria as proven by this study.

Keywords: Adolescent, Parents, Reproductive health, Secondary school students, Sexuality education, Training

INTRODUCTION

Sexuality is a vital component of human life and development which commences during childhood and increases through adolescent period [1]. Many adolescents rely on their peers and social media for information about sex that may be inaccurate and often have to bear with negative consequences. More than half of the 17 year olds have been found to have engaged in sexual intercourse and by the end of adolescence, majority of them were involved in risky sexual behaviors [1]. Also, one-third of the adolescents who had ever had sexual intercourse reported that their first sexual intercourse was unplanned partly due to their ignorance [2]. Adolescents will develop different risky sexual behaviors, if they are unaware of healthy sexual behavior [3,4,5]. Some of these risky sexual behaviors include, having multiple sexual partners, sexual intercourse with commercial sex workers, unprotected sexual intercourse, coerced sexual intercourse and sexual intercourse for reward [6].

Negative consequences of risky sexual behaviors among adolescents include complications from unplanned pregnancies and unsafe abortions. In addition, adolescents have the highest rate of unmet need for contraception and high risk of HIV infections [7]. They therefore need the facts and correct information on their sexual and reproductive health. Parents as primary educators have key role to play in ensuring reduction in sexual-risk taking behaviors among adolescents. Furthermore, other sources of information on ASRH such as Family Life Health Education (FLHE) have not been able to bridge this knowledge gap successfully particularly the Nigerian secondary school FLHE curriculum is notably weak, being mainly focused on abstinence and omitting other

core contemporary sexual health issues related to young people such as abortion, contraception use, masturbation, and sexual diversity [8]. This therefore necessitates parental training to enhance parent-adolescent discussion which is essential for effective sexual and reproductive health education of adolescents. This is even more imperative because whatever young people are taught becomes part of them for life. However, a lot of parents lack the necessary knowledge and skills to play this role. Also, socio cultural and religious factors have led to negative perception on parental discussions with adolescents about sexual and reproductive health [9]. Sexuality education training for parents tends to improve their knowledge as seen in the findings from an interventional research program in South Africa has proven the outcome of sex education of parents [10]. This Intervention with Microfinance for AIDS and Gender Equity (IMAGE) in rural area designed to reduce levels of HIV and intimate partner violence also included a component which aimed to promote communication between adults and young people via training of parents. The quantitative and qualitative findings from this study indicated that women who participated reported improvement in their knowledge significantly [10]. On the contrary, parental sexuality education could be ineffective due to their perception of what the contents should be as the case was in Canada where parents wanted sexual health education and its' content to be age-relevant, focusing on abstinence-only or abstinence-plus based on the adolescent's mental maturity [11, 12]. Parents as primary educators could be the key people in decreasing adolescents' sexual-risk taking by parent-adolescent communication about sex but

many parents lack the knowledge and skills [13]. Thus, parents must be empowered with the necessary knowledge and skills to talk to their children about sexual and reproductive health issues. This study seeks to assess how training of parents will influence their discussions with their adolescents on ASRH and its effect on adolescents' knowledge and behavior in Benue State, Nigeria.

MATERIALS AND METHODS

Study Design And Settings

This was a quasi-experimental study designed to assess the effect of parents training on their knowledge about adolescent sexual and reproductive health and their discussions. The study was conducted among parents in 5 public Schools in Benue State. Three schools in Makurdi Local Government Area (LGA) and 2 schools in Gboko LGA. Benue State has 29 LGAs and this was conducted in this two because they are most urban and geographically some distance apart. The official language in Benue State is English with two major tribes Tiv and Idoma. Other tribes include Igede, Etulo and Jukun. The major occupation in the state is farming hence the moniker of the state, 'Food basket of the Nation'. Other occupations include civil service and trading. The predominant religion is Christianity [14].

Sampling Technique

A multi-stage sampling technique was used to select the students for the study. The first stage was the selection of two LGAs via non probability, purposive sampling technique. The second stage involved the selections of three Secondary Schools out of the public schools in Makurdi via simple random sampling method (balloting) to achieve the sample size. Same applied in Gboko LGA. For the third stage, out of the four classes in each arm in each school, one class was picked by simple random sampling technique (balloting). The final stage was done by a systematic random sampling technique was used. The list of students in the selected schools were used as the

sampling frame. A sampling interval of 2 was derived by dividing the number of students in the classes (between 35-40 per class) by the proportionate sample size for each school. Seventeen students were picked from each of the five classes in the three schools to make up the sample size population of 250 students. The parents of the selected students were used for the study. The choice of parent (Father or Mother) was influenced by the availability of the parent for the training.

Study Procedure

The study was conducted in three phases (Pre-intervention, intervention and post-intervention). However data collection was done at pre and post intervention phase of the study.

Pre-intervention

A courtesy visit was made to the Principals of the schools. The students were selected from the 5 classes of JSS1-SS2 in each of the selected schools (SS 3 students were left out because of their exams).

Intervention

Intervention was conducted in the study group (Schools in Makurdi) for 45 minutes with the aid of a simple manual. The training session specified basic anatomy and physiology of adolescent sexual developments, psychological changes in adolescents, sexual behaviors among adolescents, negative consequences of adolescent behaviors, HIV and AIDs, STIs modes of transmission and prevention, teenage pregnancy, abortion, approaches to communicating with adolescents on reproductive health, challenges associated with parent-adolescent communication and confidence building. This training module was adopted and adapted from some components of the Parents Matter Program (PMP) and the Collaborative HIV Prevention and Adolescent Mental Health Project (CHAMP). It involved lectures, small groups work, experience sharing and case studies.

To ensure proper communication between parents and their adolescents post intervention, Incentives (copies of the training manual and mathematical set respectively) were given to all the study participants. No training was done for the control group until post intervention data collection after 3 months.

Post-intervention

Post intervention data collection was done three (3) months after the intervention using the same pre-intervention questionnaire and a qualitative protocol tool for the study and control groups. Feedback was given to the control group after the second data collection by educating the parents on how to communicate with adolescents on reproductive health issues such as sexuality education.

Data Analysis

Data was analyzed using the IBM Statistical Package for Social Science version 21 software. Chi square and t-test was used to determine the association between the dependent variables and independent or exposure

variables. The sample was calculated to detect the difference between the intervention groups at power of 80% at 0.05 level of significance (two tail).

The knowledge grading

Each correctly answered question on knowledge earned a score of 1 point. The maximum score on the knowledge was 18 points and all wrong answers were scored zero. Scores of 9 points and above were graded as good knowledge on reproductive health, while poor knowledge means a score of less than 9 points.

Ethical Clearance

Ethical clearance was obtained from Benue State University Teaching Hospital (BSUTH) Health Research Ethics Committee (HREC). Informed consent was obtained from each school authority and parent before enrolment into the study. For those above 18 years, their consent was sought. The data collected from this study was anonymized by removing name, addresses and other direct identifiers. Participation was voluntary.

RESULTS

Table 1: Socio-demographic characteristics of the adolescents by study status

Variable	Study Status		t-test	P value
	Study *Freq(%)	Control Freq(%)		
Age				
=15	150(60.0)	142(56.80)	-0.72	0.47
=16	100(40.0)	108(43.20)		
Gender				
Male	79(31.60)	90(36.30)	-19.89	0.001*
Female	171(68.4)	160(64.00)		
Class				
JSS1	44(17.60)	8(3.200)		
JSS2	64(25.60)	36(14.40)		
JSS3	31(12.40)	45(18.00)	-5.23	0.001*
SS1	50(20.00)	99(39.60)		
SS2	61(24.40)	62(24.80)		
Tribe				
Tiv	160(64.0)	165(66.0)	0.60	0.55
Idoma	37(14.80)	37(14.8)		
Igede	9(3.60)	11(4.40)		
Others	44(17.60)	37(14.80)		

*freq =Frequency, *figures= statistically significant

Majority of the adolescents were between 10-15 years in both study and control group (60.0% and 56.8% respectively) with a mean age of 15±2 years (for both study and control group). There were more females than male participants seen in both study (68.4%) and control group (64.0%.) with a male to female ratio of 1.7:1 and 2.2:1 for study and control group respectively.

Table 2: Socio-demographic characteristics of the parents

Variables	Study (n=245) Freq(%)	Control (n=245) Freq(%)	χ^2	df	P-value
Age group (years)					
Mean age ± SD	44(±11years)	46(±9years)			
=30	27(11.0)	12(4.9)			
31-40	71(29.0)	66(26.9)			
41-50	92(37.6)	103(42.0)			
=51	55(22.4)	64(26.1)	7.253	3	0.064
Gender					
Male	108(44.1)	130(53.1)			
Female	137(55.9)	115(46.9)	3.954	1	0.047
Marital status					
Single	10(4.1)	12(4.9)			
Married	215(87.8)	214(87.3)			
Others	20(8.2)	19(7.8)	0.210	2	0.900
Religion					
Christianity	234(95.5)	236(96.3)			
Muslim	11(4.5)	9(3.7)	0.209	1	0.648
Occupation					
Civil servant	108(44.1)	79(32.2)			
Business	97(39.6)	93(38.0)			
Farming/fishing	27(11.0)	67(27.3)			
Others	13(5.3)	6(2.4)	24.182	3	0.001*
Tribe					
Tiv	144(58.8)	181(73.9)			
Idoma	46(18.8)	31(12.7)			
Igede	7(2.9)	2(0.8)			
Others	48(19.6)	31(12.7)	13.570	3	0.004*
Educational Level					
No education	10 (4.1)	21 (8.6)			
Primary	37 (15.1)	39 (15.9)			
Secondary	31 (12.7)	93 (38.0)			
Tertiary	167 (68.2)	92 (37.6)	56.674	3	0.001*

Majority of the parents in the study group are between 41-50 years (37.6%) with the mean age of 44±2 years and mostly female gender (55.9%) while in the control group, more were within the age range of 41-50years (42.0%) with the mean age of 46 ±9 years and they were mostly males (53.1%). There was a statistically significant difference ($\chi^2=24.182$, $p<0.001$) observed in the occupation of parents between the study and control group.

Table 3 : Parent’s Socio-demographic characteristics and regularity of parent-adolescent discussion on ASRH by study group at baseline and post-intervention

Demographic Characteristics	Baseline		Post-Intervention	
	Regular	Irregular	Regular	Irregular
	Freq(%)	Freq(%)	Freq(%)	Freq(%)
Age group				
=30	4(33.3)	8(66.7)	7(63.6)	4(36.4)
31-40	25(37.9)	41(62.1)	31(43.1)	41(56.9)
41-50	45(43.7)	58(56.3)	34(37.8)	56(62.2)
>50	24(37.5)	40(62.5)	26(38.8)	41(61.2)
χ^2 , df, P	1.10; 3; 0.78		2.97; 3; 0.39	
Gender				
Male	62(47.7)	68(52.3)	64(48.1)	69(51.0)
Female	36(31.3)	79(68.7)	34(31.8)	73(68.2)
χ^2 , df, P	6.83;1;0.018*		6.56; 1; 0.01*	
Religion				
Christianity	92(39.0)	144(61.0)	92(40.2)	137(59.8)
Islam	6(66.7)	3(33.3)	6(54.5)	5(45.5)
χ^2 , df, P	2.77; 1; 0.10		0.89; 1; 0.34	
Educational level				
Primary	23(43.4)	30(56.6)	15(28.8)	37(71.2)
Secondary	34(35.4)	62(64.6)	40(42.1)	55(57.9)
Tertiary	41(42.7)	55(57.3)	43(46.2)	50(53.8)
χ^2 , df, P	1.39; 2; 0.49		4.28; 2; 0.12	
Occupation				
Civil servant	37(46.8)	42(53.2)	32(43.8)	41(56.2)
Business	31(33.3)	62(66.7)	35(39.3)	54(60.7)
Farming/finishing	28(41.8)	39(58.2)	30(40.0)	45(60.0)
Others	2(33.3)	4(66.7)	1(33.7)	2(66.7)
χ^2 , df, P	3.46; 3; 0.33		0.45; 3; 0.93	
Tribe				
Tiv	73(40.3)	108(59.7)	74(40.4)	109(59.6)
Idoma	12(38.7)	19(61.3)	11(40.7)	16(59.3)
Igede	0(0.0)	2(100.0)	1(33.3)	2(66.7)
Others	13(41.9)	18(58.1)	12(44.4)	15(55.6)
χ^2 , df, P	1.41; 3; 0.70		0.23; 3; 0.97	

*Regular- Parent-adolescent discussions on ASRH given daily and weekly

*Irregular- Parent-adolescent discussions on ASRH given monthly

*Statistically significant figures

From the findings on table 3 above, on the regularity of parent-adolescent communication, on sexuality education among parents according to their socio-demographic characteristics, the fathers were more regular (47.7%) in their conversations than the Mothers (31.3%) and was statistically significant ($p < 0.018$) difference in regularity.

Table 4: Parent’s Socio-demographic characteristics and regularity of parent-adolescent discussion on ASRH by control group at baseline and post intervention

Demographic characteristics	Beginning of study		End of study	
	Regular	Irregular	Regular	Irregular
	Freq(%)	Freq(%)	Freq(%)	Freq(%)
Age group				
=30	7(25.9)	20(74.1)	11(45.8)	13(54.2)
31-40	30(42.3)	41(57.7)	36(50.7)	35(49.3)
41-50	38(41.3)	54(58.7)	43(46.7)	49(53.3)
>50	20(36.4)	35(63.6)	21(37.5)	35(62.5)
χ^2 , df, P	2.97;3;0.39		2.27; 3; 0.52	
Gender				
Male	42(38.9)	66(61.1)	53(46.5)	54(50.5)
Female	53(38.7)	84(61.3)	58(42.6)	78(57.4)
χ^2 , df, P	6.55;1;0.01*		1.14;1;0.29	
Religion				
Christianity	90(38.5)	144(61.5)	106(45.5)	127(54.5)
Islam	3(37.5)	5(62.5)	3(42.0)	4(57.1)
Others	2(66.7)	1(33.3)	2(66.7)	1(33.3)
χ^2 , df, P	0.89;1;0.34		0.56; 2; 0.76	
Educational level				
Primary	17(37.8)	28(62.2)	15(42.9)	20(57.1)
Secondary	12(37.5)	20(62.5)	18(42.9)	24(57.1)
Tertiary	66(39.3)	102(60.7)	78(47.0)	88(53.0)
χ^2 , df, P	4.28;2; 0.12		0.36;2; 0.84	
Occupation				
Civil servant	43(39.8)	65(60.2)	48(44.4)	60(55.6)
Business	38(39.2)	59(60.8)	49(52.7)	44(47.3)
Farming/finishing	11(40.7)	16(59.3)	11(36.7)	19(63.3)
Others	3(23.1)	10(76.9)	3(25.0)	9(75.0)
χ^2 , df, P	0.45; 3;0.93		4.96;3; 0.18	
Tribe				
Tiv	55(38.2)	89(61.8)	61(41.8)	85(58.2)
Idoma	18(39.1)	28(60.9)	20(50.0)	20(50.0)
Igede	2(28.6)	5(71.4)	4(40.0)	6(60.0)
Others	20(41.7)	28(58.3)	26(55.3)	21(44.7)
χ^2 , df, P	0.23; 3; 0.97		3.09;3;0.38	

From the findings on table 4 above, majority (above 50%) of parents with different socio-demographic characteristics had more irregular conversations with their adolescents in the control group at the beginning and end of the study. There was a statistically significant difference in regularity among the parents' gender ($\chi^2 = 6.55$; $df=1$; p -value = 0.01).

From the FGD, some adolescents said the talk was helpful as it improves their knowledge on how to behave and control themselves. It also helps them to know what to do and what not to do. Among the female discussant, one stated that;

“It helps me because it has enabled me to know how to associate better with the opposite sex and to avoid unwanted pregnancy, it also helps me to dress well unlike my classmates that do dress indecently and do not behave themselves”.

All of the adolescents who said that their parent's talk on sexual matters helped them by adding to their knowledge and did not promote trying out negative behaviors.

Table 5: Parents’ knowledge score on A SRH by study status at pre and post intervention

Variables	Study		Control	
	Pre-intervention (n=245)	Post-intervention (n=243)	Beginning of the study (n=245)	End of the study (n=240)
	Freq (%)	Freq (%)	Freq (%)	Freq (%)
Good	174 (71.0)	193 (79.4)	110 (44.9)	106 (44.2)
Poor	71 (29.0)	50 (20.6)	135 (55.1)	134 (55.8)
	$\chi^2 = 4.620$; df = 1; p = 0.032*		$\chi^2 = 0.026$; df = 1; p = 0.871	

*=Statistically significant

The findings on the table 5 above, on the knowledge score of the reproductive health (Pubertal changes, STI and adolescent sexual behaviors) among Parents in the study group showed a significant difference at pre and post intervention by statistical significance ($\chi^2 = 4.620$; df = 1; p = 0.032) whereas none seen in the control group.

Table 6; Pre and post parent-adolescent discussion on ASRH by study status among adolescents

Variables	Study Status			
	Study		Control	
	Pre-intervention n= 250	Post-intervention n= 250	Beginning of the study n= 250	End of the study n=250
	Freq (%)	Freq (%)	Freq (%)	Freq (%)
Parent-adolescent communication			N= 250	
Yes	213(85.9)	248(99.2)	217(86.8)	240(96.0)
No	35(14.1)	2(0.8)	33(13.2)	10(4.0)
	$\chi^2 = 13.460$; df = 1; p-value = 0.001*		$\chi^2 = 32.082$; df = 1; p-value = 0.001*	
Regularity				
Regular	130 (52.0)	160 (64.0)	145 (58.0)	156 (62.4)
Irregular	120 (48.0)	90 (36.0)	105 (42.0)	94 (37.6)
	$\chi^2 = 7.389$, df = 1, P-value = 0.007*		$\chi^2 = 1.010$ df = 1, P-value = 0.315	

*=Statistically significant

The findings on table 6 above, show that majority of the adolescents in both groups (85.9% study and 86.8% in control) received sex education from their parents at baseline. However, almost all those in the study group (99.2%) received sex education at post intervention with some statistically significant difference (p<0.001). For regularity there was a statistically significant difference (P<0.007) at post intervention in the study group whereas for the control group, there was no difference observed.

From the FGD report, when adolescents were asked what parent's should do more to help their communication get better, some said parents should make the talk consistent for instance, monthly and parents should talk to them more on how to make the right friends.

“Providing the training for parents will help them because most parents find it difficult to communicate these to their children but if they are trained on how to talk to their children on sex matters it will really help the children.”

DISCUSSION

Majority of the adolescents who participated in the study were between 10-15 years in both study (60.0%) and control group (56.8%). Among the parents, more females than male participants were seen in both study (68.4%) and control group (64.0%). Although more females participated in this study, the males were more involved in sexuality education at base line and at post intervention with a statistically significant difference between the study and control group. This however disagrees with another study done in Port Harcourt which reported mothers more effectively and frequently teaching their sons about sexuality [18].

This disparity could be as a result of the locality where the study was conducted and the level of female empowerment and exposure. This result still disagrees with the study in Northern Tanzania young people living in rural areas reported more frequent communication about HIV/AIDS with both mothers and fathers than those living in urban areas [19].

Another research in Australia, which agrees with this study showed that the relationship boys have with their fathers or other male role models plays a crucial role in their sexual health [20]. This included reducing sexual risk taking and delaying initiation of sexual intercourse, especially in those boys with a connection to their fathers, whether they live in the same home or not [20].

This study finding may imply that more males than females are educated and empowered to interact with their adolescents therefore, female empowerment is much needed in this locality as this clearly affects their communication on sexuality education among other benefits.

The adolescents and their parents who participated in this study mostly had good knowledge of reproductive health issues and their number improved significantly at post intervention in the study population which can be attributed to the training given during the study.

However, a study in Ibadan agrees with this finding on parents' and adolescents' good knowledge on Adolescent Reproductive Health but practice and quality of communication was poor [21].

The good knowledge among parents and adolescents at baseline maybe due to increase information on social media, at school among other places. However at post intervention, their knowledge improved further which was attributed to the study intervention. But this study finding disagrees with a situation analysis of adolescent reproductive health in selected Pacific Island countries revealed that adolescents were not adequately informed about family planning, reproductive and sexual health as well as services available for young people [22]. They therefore lacked negotiation skills for safe sex, had low motivation for preventing teenage pregnancies through contraceptive methods and sexuality education was going at a slow pace[22]. This could be as a result of poor educational background of the respondents and also poor parent-adolescent communication on sexuality education.

The result from the adolescents' in this study narrowed down to their knowledge as it relates to their decisions and behavior on matters such as abstinence, contraceptives, avoiding masturbation, pornography, homosexual relationships and prevention of teenage pregnancy and parent's knowledge and perception was also analyzed. At post intervention, there was a statistically significant difference parents' knowledge which can be attributed to the training the parents received. This is similar to the findings in the CHAMP intervention in the United states with positive results reported among parents [23]. This intervention attempted to strengthen what it identified as key family processes which influence youth risk-taking behavior such as parents monitoring their children, effectiveness of discipline, and parent-youth frequency and comfort

in communicating about sensitive topics [23]. This differed from the findings in Rwanda where lack of knowledge on sexual matters was a major factor of whom 88% of care takers found it difficult to communicate with their wards [24]. This result also differs from a parent-child communication needs assessment in six states in India which points to the growing concern around parent-child sexual health communication as this centered around menstruation (often when it had already started) and general messages about abstaining from sexual activity that were often cryptic statements such as, “stay away from boys or girls”. The paucity of information in communication was said to be due in most cases to lack of knowledge on the part of the parents [24]. This implies that building the parent's reproductive health knowledge is an advantage to their wards and those who relate with them. Whereas, similar studies in the US showed that talking to teens on STIs among other topics, is a positive parenting practice [25].

The advent of multiple information channels has helped to improve ARH knowledge among parents and their adolescents. There was almost a hundred percent increase reported by the adolescents at post intervention on their parents engaging them in sexuality education communication observed in this study. There was more regularity of the conversations at post intervention in the study group compared to the control group.

At the FGD, the importance of frequent parent-adolescent communication was emphasized by the adolescent participants when asked what parents should do more to help their communication get better. One of the adolescents said,

“parents should make the talk consistent for instance, monthly and parents should talk to us more on how to make the right friend.”

Similar studies suggest an association between frequent, straight-forward parent-adolescent communications about reproductive health and

protective practices such as delaying sexual initiation, condom use, and reducing the number of sex partners [26, 27]. The reason for this is that more frequent parent-adolescent communication, reinforces their knowledge and comprehension of the subject matter.

On the contrary, some studies in Nigeria have been shown to relegate reproductive health issues to the domain of the dangerous, unpleasant and unclean thereby perceiving sex education as morally inappropriate and scarcely talked about [28].

The implication of this intervention was to promote parent-adolescent communication on sexuality education in order to build the capacity of parents such that they know what sexuality education is all about and how to communicate with their children. The views of some communities are still dominated by the cultural perspective of issuance of warnings, threats and discipline of erring adolescents. There is need for a reorientation of the parents on adolescent's reproductive health. To be effective, sex education programs targeting adolescents need to be comprehensive, provide unbiased and scientifically based information, emphasize the risks of unprotected sex, explain the various practices and methods that can reduce the risks of pregnancy and of acquiring a sexually transmitted infection during intercourse, discuss values about sex and condoms and other contraceptives. Based on the findings from this study on influence of parental training, there is a need for parents to improve their skills for initiating and discussing on ASRH issues in ways that are meaningful and address the information needs of adolescents.

CONCLUSION

Parents are expected to play a crucial role in transferring appropriate sexual and reproductive health information to their adolescents to ensure that adolescents grow up to lead safe reproductive and sexual lifestyle. Parents' knowledge on ASRH and

their communication improved in the study group after the intervention which was not so in the control group. Therefore, with more parental sexuality training intervention, parent-adolescent discussions on ASRH will help minimize unhealthy decisions and risky sexual among adolescents as regards their reproductive health because of better knowledge.

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Competing Interests

The authors declare that they have no competing interests.

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