

Factors Predisposing to Teenage Pregnancy Among Female Adolescents in Isoko South Local Government Area, Delta State, Nigeria

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Abstract

Background: Pregnancy among female adolescents is the cause of death among adolescents 15-19 years' old which makes it a public health problem. Therefore, this study sought to determine the factors predisposing to teenage pregnancy among female adolescents in Isoko South Local Government Area, Delta State, Nigeria.

Methodology: A descriptive cross sectional study design guided by a behavioral theory was adopted. Multistage sampling was used to select 260 female adolescents that participated in the study. A semi-structured questionnaire of 45 items validated at 0.70 Cronbach alpha was used for data collection.

Results: The result showed that majority of the respondents fall between the age group 14-16 years (67.7%); and (49.2%) of the respondents had good knowledge of teenage pregnancy with a mean of 6.40 ± 1.02 measured on 8-point rating scale. The result also showed that 80.0% of the respondents are negatively influenced by environmental factors with a mean of 61.67 ± 10.50 measured on a 104-point rating scale. About (77.3%) of the respondents had poor practice predisposing to teenage pregnancy with mean 35.58 ± 4.12 measured on a 44-point rating scale. Knowledge and environmental factors showed a statistical relationship with practices predisposing to teenage pregnancy where $p=0.048$ and $p=0.000$ respectively.

Conclusion: Knowledge and environmental was shown as the major factors predisposing to teenage pregnancy. Health promotion intervention and policy formulation can be geared towards empowering adolescents to reduce the occurrence of teenage pregnancy.

Keywords: Teenage Pregnancy, Adolescents, Knowledge, Environmental factors, Practices.

Introduction

Teenage Pregnancy among female adolescents is the conception of adolescents between the ages of ten to nineteen years old ^[1]. Adolescents face the same pregnancy related issues as other mature women, thus there is need for concern as adolescents are not physically ready for childbirth. This can lead to irreparable complications such as vesico-vaginal fistula, sexually transmitted diseases, anemia, premature labor, preeclampsia, obstructed labor, and even death ^[2,3].

The risks of low birth weight, still birth and neonatal death was found to be greater in adolescents than in mature women; making teenage pregnancy a public health problem ^[3]. According to World Health Organization (WHO), about 16 million adolescent girls between the ages of 15-19 years and 2 million girls under the age of 15 give birth each year ^[4]. In Nigeria, the

prevalence of teenage pregnancy among adolescents was 14% and 19% prevalence in Delta State aged 15-19. About 70,000 teen mothers died each year because they had children before they were physically and mentally ready for parenthood ^[1,5].

Unprotected sex puts adolescents at a high risk of unplanned pregnancy. Therefore, teenage pregnancy can be prevented by having an adequate knowledge and access to contraceptive services ^[6]. A study conducted by Rivera et al., stated that when used correctly, condoms can be highly effective in preventing pregnancy and can be used in conjunction with oral contraceptives. Also, adolescents should be health educated by their parents on abstinence as it is the best method to prevent unplanned pregnancy and avoid negative consequences ^[7, 8].

Studies showed that adolescents faced barriers to accessing contraceptives; barriers such as

restrictive laws and policies, health worker bias regarding provision of contraceptives based on age of the individual; marital status of adolescents, lack of knowledge and financial constraints ^[9]. Adolescents who want contraceptives may encounter discouraging attitudes and practices from providers which may limit their ability or willingness to seek care ^[10].

The environment, peer influence, media, parental support and practice are also factors predisposing to teenage pregnancy ^[11,12]. Adolescents are influenced by their peers to engage in sexual activities. Exposure to media among adolescents was associated with early sexual activities ^[13,14]. Substance use including the use of contraceptives influence adolescents' sexual behaviors and make them less likely to practice safe sex ^[12]. This study was further guided by the Social Cognitive Theory (SCT) which is a behavioral theory that is considered to be suitable for studying health behavior and social influence.

The objective of this study was to determine the knowledge, environmental factors, and practices predisposing to teenage pregnancy among female adolescents in Isoko South Local Government Area, Delta State, Nigeria.

Materials and methods

This study was carried out in Isoko South Local Government Area, Delta State of Nigeria. The total population for Isoko South Local Government Area, Delta State as at 2006 was estimated at 235,147. There are 11 wards in the Local Government. The area produces a large component of the oil and gas resources of Delta State. The Local Government covers a low-lying section of the larger Niger Delta Basin, interspersed with streams, canals and rivers. The traditional occupation of the people of Isoko South is fishing and agriculture ^[15].

This study adopted a descriptive cross sectional study design guided by a behavioral theory. Multistage sampling was used to select 260 female adolescents that participated in the study. Purposive sampling was used to select 7 secondary schools for the study. A semi-structured questionnaire of 45 items validated at 0.70 Cronbach alpha was used for data collection. Data analysis was based on descriptive and inferential statistics at $p < 0.05$.

Instrument for the study

The questionnaire contained four sections; each section represented a variable to be studied and was developed from the objectives of the study. Section A addressed Socio-demographic characteristics of respondents such as age, gender, marital status, class, and ethnic origin, section B assessed knowledge on teenage pregnancy among female adolescents, section C determined the environmental factors which was divided into three constructs (peer influence, media, and family support), section D assessed the practice predisposing to teenage pregnancy.

The Social Cognitive Theory (SCT) was considered as a theoretical framework during the development of questionnaire for this study. Data was analyzed using SPSS version 23, and presented in frequency distribution tables. Correlation and regression was used to determine the relationships between variables of different sections in the instrument.

Measures of variables

The Socio-demographic characteristics of participants were determined using 5-items with options to be chosen. The first item had 4 options, the second item had 2 options, the third item had 2 options, the fourth item had 3 options, and the fifth item had 5 options.

In Section B, eight (8) questions having Dichotomous answers (true or false) were used to measure the respondent's knowledge of teenage pregnancy on 8-point rating scale. The answer "true" was coded as one (1) while the answer "false" was coded as zero (0).

In Section C, 26 questions were used to collect information on environmental factors predisposing to teenage pregnancy on 104-point rating scale. Peer influence was measured on a Likert scale with responses ranging from *Strongly Agree*, *Agree*, *Undecided*, *Disagree*, and *Strongly Disagree* coded from 0, 1, 2, 3, and 4. Media and Family support was also measured on a Likert scale with responses ranging from *Not at all*, *Rarely*, *Undecided*, *Occasionally* and *Very often* coded from 0, 1, 2, 3, and 4 respectively depending on the nature of the question.

The Practice predisposing to teenage pregnancy was measured on a 44-point rating scale having 11 questions and a Likert scale

ranging from *Not at all*, *Rarely*, *Undecided*, *Occasionally* and *Very often*. Responses were assigned scores of 0, 1, 2, 3, and 4 to highlight the practice of respondents.

Inclusion Criteria: Female adolescents willing to participate were included in the study.

Exclusion Criteria: Male adolescents and Female adolescents who refused to grant a consent for the study.

Ethical consideration

Ethical approval for the study was obtained from the Babcock University Health Research Ethics Committee (BUHREC). An informed consent was obtained from the participants to participate in the study.

Results

Socio-demographic characteristics of respondents

The demographic characteristics of the respondents on Table 1 showed that majority 176 (67.7%) of the respondents fall between the age group 14-16 years, followed by 17-19 years 66 (25.4%). A total of 258 (99.25%) of the respondents are single and only 2 (0.8%) were married. For class, respondents from SS1 class were 128 (49.23%) and respondents from SS2 class were 132 (50.77%). As regard the ethnic origin, majority of the respondents were Isoko 244 (93.8%).

Knowledge on teenage pregnancy

The level of knowledge of teenage pregnancy was measured on 8-point reference scale and the mean score for all respondents is 6.40 ± 1.02 valid for 260 respondents ($n=260$) with a prevalence of 80%. The score translates to the fact that majority 128 (49.2%) of the respondents had good knowledge as regards teenage pregnancy, and 121 (46.5%) had fair knowledge. Majority of the respondents 224 (86.2%) knew that teenage pregnancy is the conception of a female below 20 years old. Almost all the respondents 256 (98.5%) and 252 (96.9%) knew that unprotected sex can lead to teenage pregnancy and can lead to bad health consequences. In all, 156 (60.0%) of the respondents knew that contraceptives can prevent teenage pregnancy. Despite the percentage of good knowledge reported in this study, 189 (72.7%) of the respondents agreed that the risk of diseases and unplanned pregnancy is not a good reason to avoid sex before marriage. Also, 161

(69.9%) of the respondents were of the view that birth control/condom is not important (Table 2).

Environmental Factors Predisposing to Teenage Pregnancy among Female Adolescents

The environmental factors of respondents were measured on a 104-point reference scale. The mean score for all respondents is 61.67 ± 10.50 valid for 260 respondents ($n=260$). This translates to the fact that majority of the respondents 208 (80.0%) were negatively influenced by environmental factors.

Furthermore, 223 (89.6%) of the respondents were negatively influenced by their peers. The result also revealed that 25.0% of the respondent strongly disagreed that their peers can change their decision to avoid sex, while 31.9% disagreed and 23.8% stayed undecided to the same fact. Also, 36.2% of the respondents strongly disagreed that their peers advised them to use contraceptives, 11.9% disagreed and 16.5% stayed undecided to the same fact (Table 3).

As regards media as an environmental factor, 196 (75.4%) of the respondents were negatively influenced by media. More than half (61.5%) of the respondents occasionally viewed pornographic contents on the internet while 30.0% occasionally obtained information about sex from books. Also, 76.9% sometimes imitate sexual activities displayed on media (Table 4).

The result of this study also showed that family support as an environmental factor was highly significant. More than half 149 (57.3%) of the respondents were negatively influenced by their family. About one third (34.2%) of the respondents revealed that their parents do not educate them on sexual/reproductive health. Also, two fifths (40.0%) of the respondents revealed that their parents do not tell them to stay away from risky behaviors that could lead to unplanned pregnancy (Table 5).

Practices predisposing to teenage pregnancy among female adolescents

The practices predisposing to teenage pregnancy were measured on a 44-point rating scale. The mean score for all the respondents is 35.58 ± 4.12 valid for 260 respondents ($n=260$). This translates to the fact that majority of the respondents 201 (77.3%) had poor practice predisposing to teenage pregnancy (Figure 1). The research hypotheses for this study proposed a

significant association between knowledge and practices predisposing to teenage pregnancy ($r=0.063$; $p=0.048$), among female adolescents in selected secondary schools in Isoko South LGA, Delta State, Nigeria. There was also a significant relationship between environmental factors and practices predisposing to teenage pregnancy ($r=0.374$; $p=0.000$), among female adolescents in selected secondary schools in Isoko South LGA, Delta State, Nigeria.

Discussion

The findings of this study revealed that 128 (49.2%) of the respondents had a good knowledge of teenage pregnancy. This is in tandem with a study where they reported a good knowledge of respondents^[16]. This study also showed that about half of the respondents 121 (46.5%) had a fair knowledge of teenage pregnancy. This is line with a study which stated that ignorance on basics of sexuality and pregnancy was 60%^[17]. The result of this study further revealed that 156 (60%) of the respondents agreed that contraceptives can prevent teenage pregnancy, but 161 (61.9%) of the respondents believed that condom is not important. This is similar to a study carried out where 81.6% of the respondents were of the opinion that thorough contraceptives can prevent adolescent pregnancy and 38.1% believed that condom use is an attempt to prevent teenage pregnancy^[16]. Respondents in this study agreed that adolescents are not physically ready for pregnancy and childbirth. This is supported by

studies where it was revealed that adolescents under 15 years old are not physically ready for pregnancy and childbirth^[2,3].

Majority of the respondents 208 (80.0%) in this study, were negatively influenced by environmental factors. This is in correlation with a study which showed that teenage pregnancy was associated with social environment such as family influence, peer group influence and media promoted sexual behaviors that could easily influence adolescents^[11]. The findings in this study showed that majority of the respondents 233 (89.6%) were negatively influenced by peer pressure, 196 (75.4%) by media, and 149 (57.3%) by family support. This is supported by studies which revealed that 71.8% of adolescents were pressured to have sex, 57% surf the internet for sexually related advice and 53.4% of respondents identified reluctance of parental involvement as a factor predisposing to teenage pregnancy^[17, 18, 19].

In this study, majority of the respondents 201 (77.3%) had poor practice predisposing to teenage pregnancy. Another study conducted showed a contradictory result where 60% of the single participants utilized contraceptive as a means of preventing unplanned pregnancy^[20]. Also, substance use related behavior among adolescent respondents who smoked cigarettes was 22.5% with 53.4% having used alcohol, 28.5% admitted to binge drinking, 14.6% of adolescents smoke marijuana, 10.3% sniffed glue, 7.3% take heroine, and 6.6% use injectable drugs^[12].

Table 1. Socio-demographic characteristics for quantitative respondents

Variables	Respondents in the study N=288	
	Frequency (N)	Percentage (%)
Age		
• 11-13 years	18	6.9
• 14-16 years	176	67.7
• 17-19 years	66	25.4
Marital status		
• Single	258	99.2
• Married	2	0.8
Class		
• SS1	128	49.23
• SS2	132	50.77
Ethnic Origin		
• Isoko	244	93.8
• Urhobo	5	1.9
• Igbo	7	2.7
• Yoruba	1	0.4
• Others	3	1.2

Table 2. Knowledge of respondents about teenage pregnancy

S/N	Knowledge	TRUE	%	FALSE	%
1	Teenage pregnancy is the period of conception of a female below 20 years old	224	86.2	36	13.8
2	Unprotected sex can lead to teenage pregnancy	256	98.5	4	1.5
3	Contraceptives cannot prevent teenage pregnancy	104	40.0	156	60.0
4	The risk of diseases and unplanned pregnancy is not a good reason to avoid sex before marriage	189	72.7	71	27.3
5	Teenage pregnancy can lead to bad health consequences	252	96.9	8	3.1
6	Birth control/condom is not important	161	61.9	99	38.1
7	Teenage pregnancy can lead to school drop-out	251	96.5	9	3.5
8	Adolescents are not physically ready for pregnancy and childbirth	226	36.9	34	13.1

Table 3. Frequency distribution of peer influence

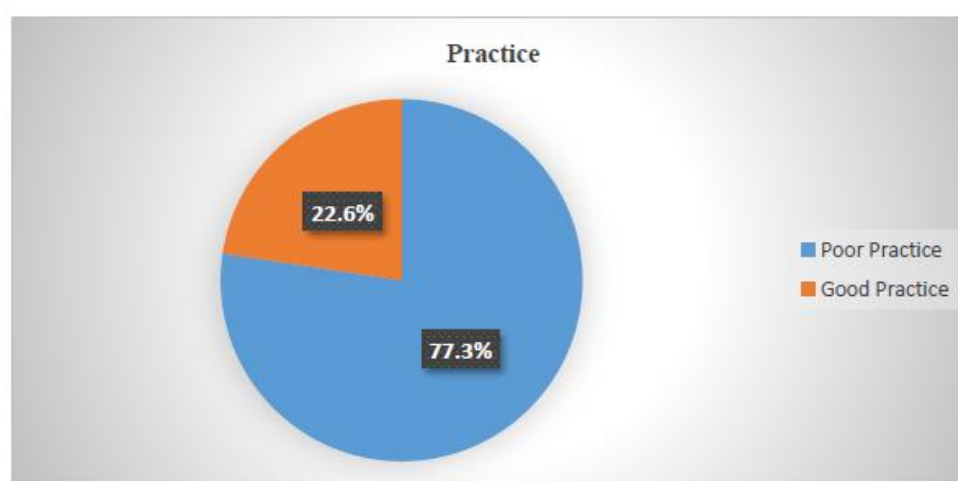
S/N	PEER INFLUENCE	Percentages of Respondents (%) N=260				
		SA	A	UD	D	SD
1	I have sex because my friends have all tried it	1.9	3.5	37.7	51.5	5.4
2	My peers do not encourage me to have sex	14.6	3.5	28.8	37.3	15.8
3	My peers say that sex makes me more matured	13.7	4.6	25.0	48.8	7.7
4	My peers advise me to use contraception/condoms	31.2	4.2	16.5	11.9	36.2
5	Peer influence cannot result to teenage pregnancy	24.2	5.8	26.5	29.2	14.2
6	Peer pressure to have sex is very common	7.3	1.5	41.2	39.6	10.4
7	My peers cannot change my decisions to avoid sex	11.9	7.3	23.8	31.9	25.0
8	I feel sex is safe because my peers say so	3.1	5.8	32.3	55.4	3.5
9	I give in to what my peers do to be part of the group	6.5	10.0	26.2	48.8	8.5

Table 4. Frequency distribution of media

S/N	MEDIA	Percentages of Respondents (%) N=260				
		NA	R	UD	O	VO
1	I obtain information about sex from TV	18.1	1.5	23.5	45.0	11.9
2	I sometimes view pornographic contents on the internet	7.7	5.8	16.5	61.5	8.5
3	I obtain information about sex from books	11.5	6.2	33.8	30.0	18.5
4	I obtain information about sex from social media	23.5	3.5	17.3	41.9	13.8
5	Adolescents are influenced negatively on social media	41.5	11.2	0	34.2	13.1
6	I sometimes imitate the sexual activities displayed on media	4.2	9.6	4.2	76.9	5.0
7	Exposure to sexual content on media have negative effects	30.8	11.5	0	42.3	15.4
8	Early sexual initiation on TV shows is portrayed as normal	26.2	17.7	0	28.1	28.1

Table 5. Frequency distribution of family support

S/N	FAMILY SUPPORT	Percentages of Respondents (%) N=260				
		NA	R	UD	O	VO
1	My parents educate me on sexuality/reproductive health	34.2	3.8	0	31.2	30.8
2	My family does not frown against sex before marriage at all	11.5	18.8	0	23.1	46.5
3	My family encourages me to use birth control/condoms	10.4	15.8	0	9.2	64.6
4	My parents tell me to stay away from risky behaviors that could lead to unplanned pregnancy	40.0	3.5	0	48.8	40.0
5	My parents set rules on late night movement	36.2	3.1	0	54.6	6.2
6	My parents feel uncomfortable talking to me about sexuality/reproductive health	6.9	11.9	12.7	40.8	27.7
7	Parents do not have the time to teach their children about sexuality/reproductive health	31.9	8.8	0	28.5	30.8
8	My parents set rules on my choice of entertainment	38.1	5.0	0	35.8	21.2
9	My parents give me advice on my choice of friends	35.0	0.8	0	57.7	6.5

**Figure 1.** Practice of respondents predisposing to teenage pregnancy

Conclusion

Factors predisposing to teenage pregnancy is complex. The study was carried out among female adolescents in selected secondary schools in Isoko South Local Government Area, Delta State. The study revealed that although there was an average knowledge of teenage pregnancy among the respondents, more than half of the respondents were negatively influenced by environmental factors such as peer influence, media, and family support that could lead to teenage pregnancy among female adolescents. This is evident from their responses showing that 89.6% were negatively influenced by their peers, 75.4% by media and 42.7% by parental support such that

parents do not educate their children about sexuality/reproductive health, the risky behaviors and consequences of teenage pregnancy. Therefore, parents have a major role to play in the mental regulation of their adolescents on improving and taking control of their own health. There is need for health programs to aid policy formulation that would be geared towards empowering adolescents so as to reduce the occurrence of teenage pregnancy.

Acknowledgements

The authors acknowledge Mr. and Mrs. Udoma-Edoka E.A, as well as the research assistants for their contributions to the success of this study.

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