

*Full Length Research Paper*

# Reproductive health awareness among urban and rural secondary school students in Cross River State, Nigeria: A comparative study

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The main purpose of the study was to assess and compare reproductive health awareness among urban and rural secondary school students in Cross River State, Nigeria. A comparative descriptive survey design was used for the study. The sample size consisted of one thousand, one hundred and ninety-nine (1199) Senior Secondary School Students drawn from 87 out of 229 Public Schools using multistage proportionate sampling technique. The instrument for data collection was a self developed validated 20 items questionnaire with a reliability coefficient of .80. Data collected were coded for entry and analysis was done using population t-test and independent t-test. The findings revealed a statistical difference of t-test calculation of 2.81 of awareness of family planning practices between urban and rural school students. Also results on prevention of STI and HIV/AIDS, prevention of unwanted pregnancy and harmful traditional practices revealed a non statistical calculated t value of 1.13, 1.88, 0.600 which was less than critical value of 1.98. In the light of this study, students from rural schools had limited knowledge on reproductive health issues. This calls for intensive reproductive health awareness by parents and teachers in rural schools. Also, government should include reproductive health education in formal secondary school curriculum.

**Keywords:** Awareness, Reproductive Health, Family Planning, STI/HIV/AIDS, Unwanted Pregnancy and Harmful Traditional Practices.

## INTRODUCTION

Reproductive health as defined at the International Conference on population development (1994:9) is "a state of complete physical, mental and social well-being and not merely the absence of disease or infirmity in all matters related to the reproductive system and to its functions and processes". It covers a wide range of services such as family planning practices, prevention of sexually transmitted diseases including HIV/AIDS, prevention of unwanted pregnancy and active discouragement of harmful traditional practices such as, female genital mutilation. There have been frightening reports by World Health Organization (2003) on Nigeria's

reproductive health statistics. Available statistics shows that Nigeria's maternal mortality has remained one of the highest in the world. The 1999 multiple indicators Cluster Survey (MICS) conducted by the Federal Office of Statistics in collaboration with United Nations Children's Fund (UNICEF), puts the maternal mortality ratio as 704 deaths per 100,000 live birth, with a wide geographical disparity ranging from 166 per 100,000 live births in the South-West to 1,549 per 100,000 live births in the Northeast. More than 70 percent of all maternal deaths are due to five major complications: hemorrhage, infections, unsafe abortion, hypertensive disease of

pregnancy and obstructed labour with 15 percent of them suffering serious or long term complication, such as pelvic inflammatory disease and infertility (UNICEF, 2002).

Currently, there seem to be a low level of access to quality reproductive health information and services especially to some vulnerable groups such as adolescents. Adolescents in Nigeria as in other developing countries have little access to adequate and current information on reproductive health from friends, mass media, novels, internet. Parents refused to discuss issues on reproductive health because of culture, morals and religious reasons (Onifade, 2009). About two fifth of teenage pregnancies in Nigeria were believed to end up in induced abortion with majority being carried out by quacks and in unsafe environment. On the whole, about 610,000 induced abortions were believed to take place in Nigeria annually (WHO, 2007). The above is as a result of low level of utilization of modern contraception as reported by (WHO, 2003). Also various harmful practices which seem to contribute to reproductive ill health exist in Nigeria, and constitute a violation of reproductive rights. Female Genital Mutilation is practiced in every state in Nigeria in various forms, from infancy to adulthood (WHO, 2003). A recent National survey by WHO (2007), revealed that the prevalence of female mutilation/cutting varies widely from the lowest rate of 0.6 percent to the highest at 98.7 percent.

The formal school system is tailored according to traditional values that see sex as a topic best left alone. Kotwal et al (2006) conducted a study on awareness of reproductive health in Jammu (A comparative study of rural and urban school going girls in Jammu). The data was collected between the month of April and May 2006; with the result showing that the highly scored aspect of reproductive health issue was in identification of family planning methods. 64% of urban students, and 36% of rural students could identify family planning methods. The areas where both urban and rural school girls scored low were; prevention of HIV/AIDS/STI, urban 31% and rural 30%. In prevention of unwanted pregnancy, urban girls score 24% and rural girls 22%. On knowledge of traditional harmful practices, urban girls scored 34% and rural girls 30%. The result of the study was at variance with study conducted on awareness of AIDS, in Harryara by Aggrawal and Kumar (1997). The result indicated high level of knowledge but misconception of transmission and prevention were also present. Rural girls had significant more knowledge as well as misconception regarding AIDS than urban girls. In a study by Ajuwon et al (2006) on influence of gender on Adolescents' reproductive health, the result shows that on prevention of abortion among urban and rural student, prevention of abortion was actually higher in urban areas than in rural cities. By implication, 80% of abortions were said to occur due to sexual intercourse among rural dwellers. It could mean that the youths in the rural areas were more sexually

active than their counterparts in the urban cities. Thus, the environment an individual dwells can affect his/her sexual behavior positively or negatively. Also, the life style of urban dwellers may be quite different from the life style of rural dwellers. The urban dwellers may benefit from abundance of information available, while the rural dwellers are disadvantaged because they understand less preventive act against reproductive health issues and these exposed them to devastating conditions such as abortions and HIV/AIDS. There is need for the Government to integrate reproductive health education in the formal secondary school curriculum.

### **Purpose of the study**

The purpose of the study was to assess and compare reproductive health awareness among urban and rural secondary school students in Cross River State, Nigeria.

### **Hypothesis:**

1. Secondary school students in Cross River State are not significantly aware of reproductive health issues namely: Family Planning Practices, Prevention of STI/HIV/AIDS, prevention of unwanted pregnancy and discouragement of harmful traditional practices.
2. Urban secondary school students in Cross River State are not significantly aware of reproductive health than rural secondary school students.

### **METHODOLOGY**

**Research Design:** A comparative descriptive survey design was used for the study.

**Setting:** The study was conducted in Cross River State, Nigeria. Public secondary schools located in urban and rural areas from the 3 education zones were used for the study.

**Population:** A multistage proportionate sampling was used to select 12 Local Government Areas from the 3 education zones. Thereafter, 35 urban and 52 rural secondary schools were located in the study. The sample size for the study comprised of 1199 school students with 600 from urban schools and 599 from rural schools selected from sampled schools. The inclusion criteria were senior secondary school students who form the bulk of adolescent's age bracket of 13 – 19 years. The exclusion criteria was students from JSS 1 – JSS 3.

**Data Collection tools:** The instrument for data collection was a self developed questionnaire titled Reproductive Health Awareness among urban and rural schools in Cross River State. The questionnaire was a 20 item questionnaire which was divided into two sections.

Section A sought information on socio-demographic data of the students while section B, sought information on reproductive health awareness on family planning practices, prevention of STI and HIV/AIDS, prevention of unwanted pregnancy and discouragement of harmful traditional practices.

**Procedure for data collection:** The researchers administered the questionnaire personally to the targeted respondents with the help of research assistants and teachers in the school selected for the study.

**Reliability of the instrument:** This was conducted using 30 secondary school students that were not part of the study. The outcome was collected and necessary corrections were modified. A test-retest reliability was conducted and cronbach coefficient alpha reliability method was used with a reliability coefficient of 0.80.

**Administrative design:** An official permission was obtained, then informed consent was obtained from the students who participated in the study.

**Human right and ethical consideration:** The subjects were chosen according to criteria, questionnaire was administered after informed consent was obtained. Researchers explained the purpose and objective of the study to the students in groups and reassured them of the protection of their privacy and also assured them that any information obtained would be strictly confidential.

**Limitation of the study:** The topic is concerned with aspect of sex, unwanted pregnancy, HIV/AIDS and cultural practices, respondents expressions on these sensitive issues brought about variations which could not be controlled.

**Statistical Design:** Data generated were coded for entry and analyzed using descriptive and inferential statistics like populations t-test and independent t-test.

**Table 1.** showing result of one-sample (population) t-test analysis of secondary school students awareness of productive health (n = 1199) test value = 15.00

Awareness of productive health issues	$\bar{X}$	SD	t	df
Family planning practices	19.36	3.3980	44.449*	1198
Prevention of STI & HIV/AIDS	20.13	3.2989	53.796*	1198
Prevention of unwanted pregnancy	18.90	3.5686	37.817*	1198
Traditional harmful practices	18.28	3.2462	35.034*	1198

\* Significant at 0.05 level of significance df = 1198, critical t = 1.98

## RESULTS

The finding in table one revealed that the calculated t-value of 44.449 for awareness of family planning practices was greater than the critical t-values of 1.98 required for significant at the 0.05 level of significance. Also, the calculated t-value of 53.796 for awareness of prevention of STI and HIV/AIDS was greater than the critical value of 1.98 required for significance at the 0.05 level of significance. The calculated t-value of 37.817 for awareness of prevention of unwanted pregnancy was greater than the critical t-value of 1.98 needed for significance at the 0.05 level of significance with 1198 degrees of freedom, and the calculated t-value of 35.034 for awareness of traditional practices was greater than the critical value of 1.98 needed for significance at the 0.05 level of significance with 1198 degrees of freedom. This means that secondary school students in Cross River State were significantly aware of family planning practices, prevention of STI and HIV/AIDS, prevention of unwanted pregnancy and traditional harmful practices. Hence the null hypothesis that secondary school students are not significantly aware of:

- Family planning practices
- Prevention of STI/HIV/AIDS
- Prevention of unwanted pregnancy
- Traditional harmful practices was rejected at the 0.5 level of significance.

**Table 2.** Independent t-test analysis showing comparative analysis of awareness of reproductive health among urban and rural secondary school students in Cross River State. n=1199

Reproductive Health Issues	School	N	$\bar{X}$	SD	t
	Location				
Family planning Practices	Urban	600	19.63	3.23	2.81*
	Rural	599	19.07	3.58	
Prevention of STI and HIV/AIDS	Urban	600	20.25	3.22	1.13
	Rural	599	20.03	3.34	
Prevention of unwanted pregnancy	Urban	600	19.11	3.54	1.88
	Rural	599	18.73	3.55	
Harmful traditional practices	Urban	600	18.33	2.87	0.600
	Rural	599	18.22	3.69	

Significant at the 0.05 level of significance; df 1197, critical t 1.98

Information of table 2 revealed that the calculated t-value of 2.81 comparing urban and rural school students on awareness of family planning practices was greater than the critical t-value of 1.98 needed for significance at 0.05 level of significance with 1197 degrees of freedom.

The calculated t-value of 1.13 comparing awareness of

prevention of STI and HIV/AIDS, the calculated t-value of 1.88 comparing urban and rural school students awareness of prevention of unwanted pregnancy, and the calculated t-value of 0.600 comparing urban and rural school students awareness of traditional practices were less than the critical t-value of 1.98 required for significance at 0.05 level of significance with 1197 degrees of freedom. This means that urban students were significantly more aware of family planning practices than their rural student counterparts. There was no significant difference between urban and rural school students in their awareness of prevention of STI and HIV, prevention of unwanted pregnancy and awareness of harmful traditional practices. Hence the null hypothesis was rejected at 0.05 level of significance for awareness of family planning practices, and not rejected for awareness of prevention of STI and HIV/AIDS, prevention of unwanted pregnancy and awareness of harmful traditional practices.

## DISCUSSION

The finding of this study revealed that secondary school students in Cross River State were significantly aware of all reproductive health issues. This findings is at variance with WHO (2003) frightening report on reproductive health status which indicated that Nigeria's maternal mortality has remained of the highest in the world. The reason for this maternal mortality has been attributed to the "3 delays" .Delay in deciding to seek care on part of the mother, family or community. Delay in reaching a health-care facility which may be due to road condition and lack of transportation and the third delay which may be due to poor health care facility, where women received inadequate care or inefficient treatment. The report by WHO (2003) also stated that the level of utilization of modern contraceptive in Nigeria among sexually active adolescent was particularly low, contributing to high level of teenage pregnancy, unsafe abortion and maternal deaths.

The above WHO result is supported by Onifade (2009) who stated that sizeable members of adolescents, heard information about reproductive health from mass media, fiction, internet and magazines. Information gotten from these sources are most times incomplete or not correct.

The result for the second hypothesis showed that students in urban secondary schools were significantly more aware of family planning practices than those in rural secondary schools. School location has no significant influence on students awareness of prevention of STI and HIV/AIDS, prevention of unwanted pregnancy and harmful traditional practices. This result agreed with the findings of Kotwal et al (2006) whose result showed that highly scored aspect of reproductive health issue was identification of family planning methods 64% by urban students, and 36% of rural students identified

family planning methods. The results have shown that the environment an individual lives can affect his or her reproductive health status. The urban students may benefit from abundance of information available, while the rural dwellers may not have such privilege. Also, result from Kotwal et al (2006), revealed both rural and urban school going girls scored low on prevention of STI and HIV/AIDS and on knowledge of prevention of harmful traditional practices as urban girl scored 34% and rural girls 30%. This result also is in support with the result from the findings of this study.

The reason for the similarities between the two groups may be as a result of non-inclusion of reproductive health issues in their curriculum. Since the two groups are using similar curriculum with similar course contents, the two groups are not exposed to issues on reproductive health.

## CONCLUSION

Awareness of family planning practices is limited among adolescents in rural schools, because of this they are prone to unwanted pregnancies with unsafe abortions. Also adolescent in Cross River State, Nigeria are still ignorant of prevention of STI and HIV/AIDS, so they are also at risk of contacting this deadly diseases. The freedom to discuss about reproductive health in schools is still limited. And this notion is derived from the researches' doubt on the high prevalence rate of STI and HIV/AIDS among adolescents in the area of the study.

## RECOMMENDATIONS

1. Parents should be helped to deliberately break the culture of silence and discuss sexual matters freely with their children.
2. The secondary school students residing in rural areas should be more enlightened on reproductive health issues by parents, teachers, guidance counselors and non-governmental organizations.
3. Educational planners at all levels should see the need to include reproductive health education in the formal academic curriculum.

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