

# Media Influence on Sexual Activity and Contraceptive Use Amongst Students of University of Jos, Jos Plateau State Nigeria

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## To cite this article:

Charles Ujunwa Anyaka, Christopher Orokpo Egbodo, Makshwar Luka Kahansim, Amaka Ngozi Ocheke, John Edeoja Edeh. Media Influence on Sexual Activity and Contraceptive Use Amongst Students of University of Jos, Jos Plateau State Nigeria. *Journal of Gynecology and Obstetrics*. Vol. 8, No. 5, 2020, pp. 141-147. doi: 10.11648/j.jgo.20200805.13

**Received:** August 30, 2020; **Accepted:** September 17, 2020; **Published:** October 7, 2020

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**Abstract:** Introduction: The Youth are active consumers of media content where issues pertaining to sexual activity and contraceptives could be seen. Information derivable from the media can reduce the burden of reproductive health. Therefore, examining the influence of media on sexual behaviour and contraceptive use of students may assist policy makers to strategize on providing solutions to these problems. Objective: The general objective of this study was to examine the influence of media on sexual activity and contraceptive use among students at the University of Jos, Plateau State. Methods: A descriptive cross-sectional study where 278 students of general studies were selected using a multistage random sampling technique. Individuals were subsequently chosen at random until a statistically determined sample size was achieved. Statistical Package for Social Sciences (SPSS version 20) software was utilized for data analysis. Results: The mean age of respondents was 22.3 years. Students that were  $\leq 20$  yrs constituted the largest group of respondents (49.6%). Most of the students (77%) agreed that media influences sexual behaviour with the Internet/social media (39.3%) having the most influence. Most of the respondents (87.4%) had heard of contraceptives from the media, most from the Internet/social media (42.4%) while the male condom (46.5%) was the most known type of contraceptive. Most of the respondents (77.7%) felt that contraceptive information in the media encouraged engagement in safe sex. There was a significant statistical association between information from media and influence on sexual activity and also influence on use of contraceptives. There was also significant statistical association between information on contraceptives from media and engagement in safe sexual activity. Significant number of the students (42.6%) agreed while 40.0% disagreed that the media should be a platform for sex education to students. Most of the students (87.4%) agreed that contraceptives information in media can lead to reduced incidence of unwanted pregnancies among students. Most of the students (86.7%) agreed that contraceptives information in media can lead to reduced incidence of STIs and HIV/AIDS among students. Conclusion: Media content is seen among the top sexual educators amongst students. Mass media plays an important role in improving contraceptive use among students. This finding provides a window of opportunity for improving contraceptive utilization in the country through an improved and sustained use of the mass media to disseminate family planning information.

**Keywords:** Media, Influence, Sexual Activity, Contraceptive Use, Jos

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## 1. Introduction

Adolescent sexual behaviour has been recognized as an important health, social and demographic concern in the developing world [1]. Adolescent pregnancy is associated

with adverse maternal, fetal and neonatal outcomes [2, 3]. Teenage girls who get pregnant suffer from social and economic consequences and they are more likely to drop out of school. Furthermore, unwanted pregnancy poses a big problem among young adult in developing countries [4].

Youth are active consumers of media content and often report that the media are among the top sexual educators. [5, 6] It has also been established that many youths report that their parents do not give them sufficient information about sexual subjects during adolescence [5]. This inevitably prompts youths to seek out information from various sources without authenticating the veracity of such sensitive information which could be offensive or graphic to their own disadvantage on handful of occasion. [6, 7]

Adolescents are keen users of the information derivable in the media, and concern has been raised about the influence of media outlets on sexual behaviour and the expectations of these adolescents at a critical developmental stage. [6, 7] There is documented proof in a number of countries of sexual debut amongst adolescents at a very young age [8].

Students who are undergoing tertiary education have greater freedom from home, with new friendships and romantic or sexual relationships [8]. These new opportunities and freedom come with high risk behaviours such as unplanned and unprotected sex sometimes with multiple sexual partners [9]. These new attitudes are usually driven by curiosity, peer pressure and sexual maturation. [7, 8] The result of such sexual experimentation includes unplanned and or unwanted pregnancies that leads to abortions, (mostly unsafe), and sexually transmitted infections including HIV/AIDS [10, 11]. The level of prostitution and all forms of promiscuous behaviour associated with students of tertiary institutions and other anti-social sexual behaviours, coupled with the widespread of sexually transmitted infections and teenage pregnancy amongst undergraduates is of great concern to the society [9]. The absence of contraceptive services in tertiary institutions has further led to increased rates of unwanted pregnancy, unsafe abortions and STIs among undergraduates of these institutions [12, 13].

Low level of utilization of contraceptives has been associated with high rates of unwanted pregnancies and unsafe abortions among Sub-Saharan Africa youth<sup>14</sup>. A study conducted among nursing female students at University of Calabar in Nigeria revealed that 55% of students were sexually active while 37% had knowledge of family planning especially condom use [15]. In a similar study, more than half (51%) of the students who had unwanted pregnancy ended with abortion [15]. Low utilization of contraception has also been attributed to limited capacity of the health care system and structure within which family planning services are offered [16]. Furthermore, individual factors such as risk perception, fear of side effects, opposition from male partners, health service limitations and insufficient knowledge needed to make informed choices have been reported as barriers for utilization of contraception. [17, 18]

In most sub-Saharan African countries, more than 70% of young women begin sexual activity during adolescent period – this to a large extent is as a result of exposure to media effect [10, 15].

It is against this background that this study therefore sought to examine the influence of media on sexual activity and contraceptive use among students in university of Jos,

Plateau state Nigeria. The increase of sexual violence, teenage pregnancies, illicit abortions, and sexually transmitted infections, especially human immunodeficiency virus (HIV), among undergraduates in sub-saharan African countries [19], makes this research more timely.

## 2. Methodology

### 2.1. Study Area and Study Design

This descriptive cross-sectional study was carried out at the University of Jos among first year students who compulsorily take General studies courses. The city is located on the Jos Plateau with coordinates of 9.8965° N, 8.8583° E at an elevation of about 1,238 metres or 4,062 feet high above sea level [20]. Jos is a city in north-central Nigeria and the administrative capital of Plateau State.

This was a descriptive, cross-sectional study.

### 2.2. Sample Size

The sample size was determined using the formula (see below) for sample size determination in cross-sectional studies. Using a 95% confidence level and accuracy of 5% and a prevalence of sexual activity among undergraduates of 76.4% based on a previous study in Nigeria [21]; the sample size was calculated using the formula below:

$$\text{Sample Size} = z^2 pq / d^2$$

Where  $Z=1.96$ ;  $p=0.764$ ;  $q=(1-p)=0.236$  and  $d=0.05$

By computing, sample size=277

However considering an attrition rate of 10%=27.7, so sample size was  $277+28=305$  participants

Sample collection: Pretested semi-structured questionnaires were administered to randomly selected students of general studies who are made up of all the faculties of the University of Jos. The 100 level (1<sup>st</sup> year) students taking general studies as compulsory courses are grouped into 5 classes for expediency into

1. Faculties of Natural sciences, Engineering, Medical sciences and Pharmacy
2. Faculties of Social and Management sciences
3. Faculties of arts and environmental sciences
4. Faculty of Education
5. Faculties of Law, Agricultural sciences and Veterinary medicine.

Each class had  $305/5=61$  pretested semi-structured questionnaires distributed. The students who declined consent were not included in the study. Simple random sampling technique was then used in selecting this number of students per class. Of 61 questionnaires shared on each lecture day, weekly for five weeks between 24<sup>th</sup> April 2018 and 29<sup>th</sup> May 2018, however a total of 278 (91.1%) students returned their questionnaires with all questions completely answered.

This self-administered questionnaire was divided into four sections. The first section comprised of sociodemographic characteristics of respondents; the second section dealt with

influence of media and sexual behaviour; the third section examined the influence of media on the use of contraceptives; and the last section dealt with the influence of contraceptives in media on sexual behaviour of students. All questionnaires were checked for completeness and entered into statistical package for social sciences (SPSS version 20) software.

Data Analyses: Chi-square analysis was done and statistical significance tested. Data was summarized and presented in tables. Using a five-point Likert scale (strongly agree, agree, undecided, disagree, strongly disagree), outcome variables for the attitudes of respondents were scored.

Ethical issues: Ethical approval to conduct this study was

obtained from the Research Ethics Committee of Jos University Teaching Hospital, Jos, Plateau state. In addition, verbal informed consent was obtained from each respondent.

### 3. Results

There were 278 students, 189 males and 89 females. Table 1 below shows that students that are  $\leq 20$  yrs constituted the largest group of students (49.6%) while those that are  $\geq 35$  yrs constituted the least (3.6%). The mean age was 22 years. There were more male students (67.9%). Most of the respondents (66.2%) were Christians and single (92.8%).

**Table 1.** Sociodemographic characteristics of the respondents (N=278).

Characteristics	Frequency	Percentage
Age range of students (Years)		
$\leq 20$ yrs	138	49.6
21-25yrs	70	25.1
26-30yrs	44	15.9
31-35yrs	16	5.8
$\geq 35$ yrs	10	3.6
Sex of students		
Male	189	67.9
Female	89	32.1
Religion of students		
Christian	184	66.2
Moslem		
Traditional	94	33.8
Others		
Marital Status		
Single	258	92.8
Married	20	7.2
Degree program (faculty)	No	%
Natural sciences, Engineering, Health sciences and Pharmacy	58	20.9
Social and Management sciences	56	20.1
Arts and Environmental sciences	52	18.7
Education	58	20.9
Law, Agricultural sciences and Veterinary medicine.	54	19.4

Table 2 below shows that 29.6% of the students were sexually active and of these, 29.6% were aged  $\leq 20$  yrs. The mean age was 22 years. Most of the students (77%) agreed that media influences sexual behaviour with the Internet/social media (39.3%) having the most influence. Most of the respondents (87.4%) had heard of contraceptives

in media, most from the Internet/social media (42.4%). The male condom (46.5%) is the contraceptive most respondent have heard from the media. Most of the respondents (77.7%) feel that contraceptive information in media encourage engagement in safe sex.

**Table 2.** Sexual behaviour and contraceptives usage among students (N = 278).

Characteristics	Frequency (n)	%
Are you sexually active		
No	202	70.4
Yes	76	29.6
Age at first sex (years)		
$\leq 20$ yrs	20	26.3
22-25yrs	28	36.8
26-30yrs	14	18.4
31-35yrs	9	11.8
$\geq 35$ yrs	5	6.7
Does Media influence sexual activity		
No	64	23.0
Yes	214	77.0
Which media influence your sexual behaviour		
Radio	36	16.8
Television	82	38.3

Characteristics	Frequency (n)	%
Newspaper	12	5.6
Social media/internet	84	39.3
Have you heard of contraceptives from media		
No	35	12.6
Yes	243	87.4
If yes, which contraceptive did you hear from media		
Male condom	113	46.5
Female condom	8	3.4
Oral pills	56	23.1
Injectables	20	8.2
Implants	12	4.9
IUCD	24	9.8
Vasectomy (Male method)	10	4.1
Source of information about contraceptives		
Friends	32	13.2
Radio	10	4.1
Television	88	36.2
Newspaper	10	4.1
Social media/internet	103	42.4
Does contraceptive information in media encourage engagement in safe? Sex		
No	62	22.3
Yes	216	77.7

Table below showed that 42.6% of the students agree while 40.0% disagree that the media should be a platform for sex education to students. Most of students (72.7%) agree that Media has Influence on the use of contraceptives among students. Most of the students (74.4%) agree that contraceptives information in media can be effective in

increasing healthy sexual behaviours among students. Most of the students (87.4%) agree that contraceptives information in media can lead to reduced incidences of unwanted pregnancies among students. Most of the students (86.7%) agree that contraceptives information in media can lead to reduced incidences of STIs and HIV/AIDS among students

**Table 3.** Attitudes of students to media, sexual activity and contraceptives (n=278).

Variables	Strongly agree n (%)	Agree n (%)	Undecided n (%)	Disagree n (%)	Strongly disagree n (%)
The media should be a platform for sex education to students	84 (30.2)	35 (12.6)	45 (16.2)	34 (12.2)	80 (27.8)
Media has Influence on the use of contraceptives among students	120 (43.2)	82 (29.5)	18 (6.5)	24 (8.6)	34 (12.2)
Contraceptives information in media can be effective in increasing healthy sexual behaviours among students	140 (50.3)	67 (24.1)	29 (10.4)	21 (7.6)	21 (7.6)
Contraceptives information in media can lead to reduced incidences of unwanted pregnancies among students	151 (54.3)	92 (33.1)	10 (3.6)	13 (4.7)	12 (4.3)
Contraceptives information in media can lead to reduced incidences of STIs and HIV/AIDS among students	163 (58.6)	78 (28.1)	15 (5.4)	8 (2.9)	14 (5.0)

Table 4 below shows that there is significant statistical association between information from media and influence on sexual activity and also influence on use of

contraceptives. It also shows that there is significant statistical association between information on contraceptives from media and engagement in safe sexual activity.

**Table 4.** Relationship between Attitudes of students to sexual activity, contraceptives with information from media.

Variable	Influence on sexual activity		Chi square	df	P
	No	Yes			
Information from media					
No	24	40	17.94	1	<0.001
Yes	52	162			

Variable	Influence on use of contraceptives		Chi square	df	P
	No	Yes			
Information from media					
No	15	20	53.15	1	<0.001
Yes	11	232			

Variable	Encourages to engage in safe sexual activity		Chi square	df	P
	No	Yes			
Information on Contraceptives from media					
No	15	11	20.00	1	<0.001
Yes	47	205			

## 4. Discussion

From our study 77% of the respondents were of the opinion that media has influence on sexual behaviour. Social media with 39.3% represents the source with the most influence on sexual behaviour. This is similar to previous reports [21, 22]. This finding may be related with affinity by young persons to social media using the internet which serves as source for easy information on most current issues for which sexual activity is not exempted. They are at risk of uncensored messages which as a result of peer pressure may lure them into sexual activity. [21] Social media is a growing platform that potentially gives out health promotion and disease prevention messages [23, 24]. Others however have opined that Internet and social media might also have negative health consequences due to erroneous belief of privacy leading to more illicit behavior and discussion around drinking, sex, violence coupled with less parental monitoring [25, 26].

From our study, 87.4% of the respondents have heard of contraceptives from media. This finding is similar to other reports.[27] It is also seen that the male condom is the contraceptive having the highest awareness with 46.5%. This finding is also similar to other reports. [28] This may be due to the fact that male condoms are more easily accessible, cheap and readily available and has been noted to also have protection against some sexually transmissible infections. [16, 17] Very few students (8.4%) were aware of the female condom from the media. This calls for more education and promotion of female condom and other family planning methods by various stakeholders to make it readily available to our women of reproductive age.

Mass media has been shown to play an important role in improving contraceptive use among Nigerian women. [29, 30] Adolescent female students should be provided opportunities to access reproductive health information to navigate this period of development successfully.

From our study, 77.7% of the respondents were of the view that contraceptive information in media would encourage safe sex. This is similar with other reports with such percentages. [31] This is a commendable finding and it shows that all the campaigns against unprotected sex with its consequent effects is having its desired impact especially on the young who indeed could be in harm's way. So more of such information is encouraged especially in the media as it would get to our youths with positive impact. A recent study revealed that 86% of the recent decline in teen pregnancies could be attributed to increased contraceptive use, and only 14% was attributable to increased abstinence. [32] This is also in keeping with reports by other authors which showed that countries that widely encourage birth control products in media have a much lower rate of teen pregnancy. [33]

From our study, 42.6% of the students agreed while 40.0% disagreed that the media should be a platform for sex education to students. The views on this appears

equally split, this may be from reports showing the mass media having advantages by providing necessary information for young people on sexual health and healthy sexual relationships. [7] However this is at variance with others studies which have shown that mass media negatively influences teens in their sexual behaviors.[7, 34] Most of the students (87.4%) agree that contraceptives in media can lead to reduced incidences of unwanted pregnancies among students. Most of the students (86.7%) agree that contraceptives in media can lead to reduced incidences of STIs and HIV/AIDS among students. This is consistent with findings from other authors, where advocacy was made for promotion of contraceptives in media with its immense beneficial effect in reduction of unintended pregnancies and STIs. [30, 35]

The limitation of this study: there were some very personal and sensitive questions which some of the respondents did not feel very comfortable answering, so they had to be reassured of confidentiality again.

## 5. Conclusion

Most of the respondents in this study agree that media influences sexual behavior and most have heard of contraceptives from the media and opined that media has influence on contraceptive use. Most of the students agreed that contraceptives information in media can be effective in increasing healthy sexual behaviours among students.

On the basis of these findings, it is recommended that that young people be wholistically educated on the media especially on the proper use of the internet. Undergraduates in schools in this country are required to compulsorily take a course in general studies as a way of acquiring rudimentary knowledge in this arena, tertiary institutions should use this opportunity to educate students on how to use the media to access proper and useful information on sexual issues and use of contraceptives to reduce the incidences of unwanted pregnancies and STIs.

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