



Contraceptive prevalence and factors associated with its use among women of child bearing age in Amai Community of Ukwani Local Government Area, Delta State, Nigeria

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Abstract

Context: The use of contraceptives is essential for family planning in terms of child spacing. Its use is a cost-effective public health measure for reducing maternal deaths due to unintended and high-risk pregnancies. In other words, it improves reproductive health, and gender equity among women in developing countries as well improves maternal health by lowering cases of unwanted pregnancies. This study objective was to determine the prevalence of contraceptive use, types and factors associated with its use among women of child-bearing age.

Materials and Methods: This study adopted a descriptive cross-sectional study design. Questionnaires were used to collect data from 299 respondents using multi-stage sampling techniques. Data were analyzed using Statistical Package for Social Sciences version 26. Inferential statistic (Chi-square) was done at 0.05 significant level. Results were presented in tables.

Results: The prevalence of contraceptive practice was 49.8%. Condoms (10.4%), injectables (16.7%), implants (16.4%), pills (29.8%) and withdrawal method (26.8%) were the identified contraceptive methods used by respondents. Of all these methods, pills were the most used. This study indicates that there is an association between socio-demographic variables and the practice of contraceptives ($p < 0.05$).

Conclusion: Approximately half of the women in the study (49.8%) were contraceptive users. Contraceptive use education targeting adolescents and younger women (15-19 years) should be intensified and health authorities should ensure consistent availability of a broad range of contraceptive methods, particularly pills, condoms, implants, and injectables, which were prominent methods in this study.

Keywords: Contraceptive practice, Prevalence, Factors, Women of child bearing age.

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Background

Contraceptive use is one practice among the most important health decisions that many people make. The use of contraceptives is essential for family planning in terms of child spacing. Its use is a cost-effective public health measure for reducing maternal deaths due to unintended and high-risk

pregnancies that would have warranted abortion. In other words, it improves reproductive health, and gender equity among women in developing countries and as well improves maternal health by lowering cases of unwanted pregnancies and induced abortions, including the reduction in proportions of high-risk births. To affirm this, it is estimated that 140,000–150,000 women are saved annually from pregnancy-related deaths in sub-Saharan Africa¹.

In Nigeria, women often have one or more children than the number they desired, and women in rural areas with higher total fertility rates and are therefore more at the risk of avoidable pregnancies and pregnancy-related deaths¹. This could be traced to poor or non-use of contraception. For instance, in 2014 the National Population Commission (NPC) reported that more than 60% of women with unintended pregnancies were not using any form of contraception². This is a common practice, especially in the rural areas, where reproductive health decisions are largely shaped by the norms and beliefs of the communities in which they live. Nevertheless, about 12.4% of these women rely on ineffective traditional methods for contraception³. Despite the fact that women of reproductive (childbearing) age (15-49) represent about 24% of Nigeria's total population that is made up of approximately equal proportions of male and female, a body of evidence shows that contraceptive practice has been poor⁴. In Nigeria, only 5.7% of rural women are currently using any method of modern contraception despite the adverse maternal mortality ratio of 576 deaths per 100,000 live births⁵. This prevalence varies and ranges between 7% and 29% depending on the area of the country⁶.

Despite the accruable contraceptive use benefits, Nigeria's contraceptive prevalence rate (CPR) for modern methods stood at 12% and later increased to 16.3% in 2024 with government target to hit 27% by the end of the year 2026^{7,9}. However, reproductive health and family planning indices in Nigeria vary widely across the six geo-political zones (GPZs) because evidence from the 2013 to 2024 Nigeria Demographic and Health Survey (NDHS) reveals that women residing in the South-West, South-South and South-East have higher modern CPRs (38%, 28% and 29% respectively) compared to those in the North-Central, North-East and the North-Western parts of Nigeria (16%, 3% and 4% respectively)^{4,9}. It was reported that use of contraception was still very

low in Nigeria and the trend had not been very encouraging and as at 2025, the contraceptive prevalence rate was only 12 percent⁹. A group of researchers reported that people were aware of contraception but only 49.7%(271) had ever used any method but discontinued while 25.4%(69) were those who used and were still using¹⁰. In 2017, an older study in Ibadan reported the prevalence of contraceptive use increased to 67.7%¹¹. Another study in 2017 reported that about one-third had ever used contraceptives while 26.4% were current users¹². Yet another study in 2017 reported that those in current use of any contraceptive device were 140(36.8%) while only 86(22.6%) used it consistently and contraceptive practice was unacceptably low in Rivers State¹. A group of researchers got evidence from the NDHS data and reported overall contraceptive prevalence rate of modern methods to be 10.3% where the highest proportion of use was 26.7% in the South West, while the lowest was 2.7% in the North West¹³. In 2018, only 43.8% of people claimed to be using a modern form of contraception among women in North-West Nigeria¹⁴. In 2021 a team of researchers reported the prevalence of contraceptive use among married women to be 36.03%¹⁵.

Studies have shown that condom (54.0%), injectables (12.2%) and oral pills (11.0%) are the most commonly used contraceptives and about 83.1% were found to be satisfied with their method or choice of contraception¹¹. A study in Rivers State in 2017 reported male condoms (n = 255; 67.1%) and injectables (n = 190; 50.0%) as most used¹. In Bangladesh, a study in 2021 reported that 24.42% of oral contraceptive pills was most used¹⁵. Another study in North-West Nigeria reported male condom (86.8%) and vasectomy (26.6%)¹⁴. A study in Southern Nigeria reported condoms 41(52.6%), pills 28(35.6%) and injectables 18(23.1%) use¹². A study in Oyo State reported traditional type (5.9%), natural type (3.0%), and modern type (91.1%) as most used¹⁰.

It has been empirically established that there is strong relationship between socio-demographic factors and the use of contraceptives¹⁶. Women of high socio-economic status were more likely to use modern contraceptives for delaying, spacing and limiting childbearing completely and enjoy its attendant benefits like the reduction in maternal/infant mortality, decline in unsafe abortion and decrease in

unintended pregnancy rate⁷. Within sub-Saharan Africa, studies have equally implicated socio-demographic factors such as age, parity, education, religion, place of residence, current work, marital status, spousal communication and other variables for observed differences in the use of contraceptives by women^{4,7,16}. Religious beliefs, education and occupation of women, number of living children, rural-urban and region of residence, as well as irregular menses (30.0%) were reported to be associated with contraceptive use^{9,11}. Factors that are also found to have significant association with contraceptive use were maternal age, marital status, type of marriage, level of education and parity decision ($P < 0.05$)¹¹.

It is reported that negative factors prohibiting or reducing contraceptive use were; women's misconceptions of contraceptive side-effects, male partner disapproval, and social/cultural norms surrounding fertility while positive factors included education, employment, and communication with male partner¹⁷. Adeyemi et al., in a study amongst women in Oyo State reported the predictors of contraception use to include the age group of 40–49 years ($P = 0.0001$), married women were approximately four times more likely to use contraception than the single women ($P < 0.0001$), women with tertiary level of education were three times more likely to use contraception than those without formal education ($P = 0.0268$), and the odds ratio of 2 for respondents with a positive attitude to using contraception versus those with negative attitude ($P < 0.0001$)¹⁰. Other factors reported in Ghana and Nigeria (Lagos) were cost of contraceptive ($p = 0.036$), and informed choice ($p < 0.001$)^{12,18,19}.

Different factors to the use of contraception may vary from one country to another, place to place or religion to religion even denomination of the religion to denomination depending on how homogenous a country is or how homogenous the people are or whether different religious groups do exist and are well represented in the study area. Lack of adequate information on available contraceptive methods and restriction of choices are the major constraints for contraceptive users to obtain a method that suits their need^{11,20}. Nevertheless, in the context of Nigeria, studies on contraceptive use within marriage have been neglected because of the flexible population policy on marital fertility²¹.

Concerted efforts have, however, been made by various State governments in the country and other stakeholders such as non-governmental organizations to increase contraceptive awareness through the mass media and ensuring its access by making available of family planning products and services^{5,22,23}. The essence is to prevent the mother from becoming pregnant immediately after delivery before weaning because it helps to avoid the possibility of developing complications that could affect the mother and even the child. Particularly with regard to unintended pregnancies, family planning and contraceptive use are pivotal, as many women with unintentional pregnancies undergo unsafe abortion procedures. Contraceptive use and family planning are integral components of reproductive health initiatives, and have shown promising effects, including the potential to reduce maternal and child mortality^{18,24}. Therefore, encouraging families to use contraception has been the main strategy to reduce fertility in various developing countries, including Nigeria and Amai community in particular. Therefore, this study was to determine the prevalence of contraceptive use, types and factors associated with its use among women of child-bearing age in the study setting.

Materials and Methods

Study area/setting

Amai is one of the fastest developing rural communities in Ukwuani Local Government Area of Delta State. It lies within latitude $05^{\circ}45'$ N and longitude $06^{\circ}50'$ E in the Niger Delta region of Southern part of Nigeria. The population according to estimate is about 100,000 (65,000 females and 35,000 males)²⁵. The surrounding communities include Obiaruku (North), Ogume (South), Umuebu (East), and Ezionum (West). It has Novena University campus (a private-owned university) located at the central part of the community which helped in giving the community a lime light for development in terms of infrastructure. Amai kingdom, as it is usually being called, is divided into five major clans namely Umuosele, Umuekum, Umubu, Ishikaguma, and Amai-Nge. The major occupation of the people is peasant farming. Their major and easily accessible sources of drinking water are from hand dug wells. Most residential areas have borehole for private use²⁵.

Study design and study population

This study adopted a descriptive cross-sectional study design for the purpose of eliciting information from women of reproductive age in the study area. The population included all women that were residents in Amai at the time of this study aged 15 to 49 years. All consenting women of reproductive age were recruited. The study excluded eligible people who were not physically strong to participate in the study.

Sample size determination

The sample size for the study was determined using the Cochran formula as stated below:

$$n = Z^2 pq / d^2$$

Where; n = minimum sample size for the study

Z = Z-score which is a constant (1.96) at 95% confidence limit

p = prevalence of contraceptive use in a study in Edo State (p=26.4% which is 0.264)¹²

$$q = 1-p = 1-0.264 = 0.736$$

$$d = \text{accepted margin of error (5\% = 0.05)}$$

Therefore;

$$n = 1.96^2 \times 0.264 \times 0.736 / 0.05^2 = 0.7464 / 0.0025 = 298.56 = 299$$

Sampling technique/methods

A multi-stage sampling technique was used as described below:

Selection of clusters

A total of 10 clusters were identified in the community, from which six (6) clusters were selected through a simple random sampling technique by balloting. Each cluster was assigned a unique identification number from 1 to 10. The numbers representing the 10 clusters were written on identical pieces of paper, folded, mixed thoroughly and six numbers were drawn by lottery without replacement. The clusters corresponding to the six numbers drawn were selected for inclusion in the study. Eligible participants were subsequently recruited from the selected clusters

Selection of households

From each cluster, 10 households (60 in total) were selected through systematic sampling technique. Following the selection of the six clusters, a household listing was conducted in each cluster to determine the total number of eligible households.

Because the number of households varied across clusters, the sampling interval was calculated separately for each cluster using the formula $K = N/n$ where N represented the total number of eligible households in the cluster and n = 10 represented the required number of households. A different random starting point between 1 and 4 was selected for each cluster using simple random sampling, after which every Kth household was selected until 10 households were recruited from each cluster. Thus, although the sampling interval and random starting points varied according to the size of each cluster, an equal number of 10 households were selected from each of the six clusters, yielding a total sample of 60 households.

Selection of respondents

From each selected household, up to five (5) eligible women in reproductive age (15-49 years) were recruited. Where fewer than five eligible women were available, all eligible women were recruited and an adjacent eligible household was used to recruit the remaining participants needed to attain five. The replacement household was not counted as an additional sampled household. After completing the required participants, systematic selection continued from the next household according to the pre-determined sampling interval. This procedure was applied independently in each cluster, allowing the sampling interval and random starting point to vary according to cluster size, while maintaining a target of five participants per household selection and 10 household selection per cluster. At the end of the study, a total of 299 respondents were sampled from the study area.

Study Instrument

A 25-item semi-structured researcher-administered questionnaire comprising of four (4) sections was used for data collection. Ten percent (30 copies) of the sample size was used for the pre-testing in Ogume community that was not part of the primary study. This was to test for reliability and validity of the instrument to ensure that it is fit for data collection. The instrument administered were then subjected to reliability test using Cronbach Alpha reliability analysis to determine the reliability estimate of the instrument to check if the values estimates were good enough and can be considered high enough to be used for the study. The values

obtained were 0.7-0.9 which were considered significant. Thereafter the instrument was used for data collection proper.

Data analysis

The collected data were checked for consistency and completeness, thereafter sorted, coded and analyzed using Statistical Package for Social Sciences (SPSS) (version 20) software. Chi-square test was used to determine association between categorical variables at 0.05 significant level (i.e., 95% CI). Results are presented on tables.

Ethical consideration

Ethical approval was obtained from the Novena University Research Ethics Committee with the number NUO/RHE/19/7491. The study adhered strictly to the principles of the Declaration of Helsinki. All participants provided verbal informed consent, and their confidentiality and anonymity were maintained throughout the study.

Results

Socio-demographic characteristics of respondents

A total of 299 respondents were used for the study giving a hundred percent (100%) response rate. Out of this number, 80 (26.8%) were within the age group 15-19 years, 40 (13.4%) were 20-24 years, 67 (22.4%) were 25-29 years, 40 (13.4%) were 30-34 years, 21 (7.0%) were 35-39 years, 10 (3.3%) were 40-44 years while 41 (13.7%) were within the age group 45-49 years. Most of the respondents 89 (29.8%) were self-employed, 80 (26.8%) were students, 50 (16.7%) were unemployed and 50 (16.7%) were civil servants while 30 (10.0%) gave other occupations other than the ones listed in the study. Majority of the respondents 128 (42.8%) were married, followed by 120 (40.1%) who were single, and 41 (13.7%) were divorced while 10 (3.3%) were widowed. A greater proportion of the respondents 137 (45.8%) were those who had tertiary education, 91 (30.4%) of respondents had secondary education, and 61 (20.4%) had no formal education while only 10 (3.3%) of the respondents had primary education. Majority of the respondents 119 (39.8%) were low-income earners (<N18,000), followed by 109 (36.5%) who were middle income earners (N18,000-50,000) while only 71 (23.7%) were high income earners (>N50,000). More than half of the respondents 240 (80.3%) subscribed to Christianity,

40 (13.4%) were affiliated to Islam while 19 (6.4%) were traditionalists. About 60 (20.1%) had one to three household members, 130 (43.5%) had 4-6 members while 109 (36.5%) had seven members and above in the household (Table 1).

Table 1: Socio-demographic characteristics of respondents

Variables	Frequency (n=299)	Percent
Age (in years)		
15-19	80	26.8%
20-24	40	13.4%
25-29	67	22.4%
30-34	40	13.4%
35-39	21	7.0%
40-44	10	3.3%
45-49	41	13.7%
Occupation of respondents		
Students	80	26.8%
Unemployed	50	16.7%
Civil servants	50	16.7%
Self-employed	89	29.8%
Others	30	10.0%
Marital status of respondents		
Married	128	42.8%
Single	120	40.1%
Divorced	41	13.7%
Widowed	10	3.3%
Highest educational level of respondents		
No formal education	61	20.4%
Primary education	10	3.3%
Secondary education	91	30.4%
Tertiary education	137	45.8%
Respondents' monthly income		
Low income (< N18,000)	119	39.8%
Middle income (N18,000-50,000)	109	36.5%
High income (> N50,000)	71	23.7%
Religious affiliation		
Christianity	240	80.3%
Islam	40	13.4%
Traditionalists	19	6.4%
Total household members		
1-3	60	20.1%
4-6	130	43.5%
7 members and above	109	36.5%

Prevalence of contraceptive practice

With regards to having once used a modern contraceptive device, 179 (59.9%) admitted that they had at least used a modern contraceptive device once while only 120 (40.1%) had never used it. Concerning those who were currently using any contraceptive device as at the time of the study, 149 (49.8%) were using at least one while 150 (50.2%) were not using any. A total of 139 (46.5%) of the respondents who were using at least one contraceptive device were willing to continue in its use while 160 (53.5%) were not willing to continue in the use of contraceptive device. About 79 (26.4%) of the respondents had once used a traditional contraceptive method while a total of 220 (73.6%) had never used any traditional contraceptive method. To determine the reasons people use contraceptives, majority 159 (53.2%) of the respondents use it to prevent conception, followed by 90 (30.1%) who use it to prevent sexuality transmitted infections (STIs) while 50 (16.7%) of the respondents use it for other reasons. Summary of this result is presented in table 2.

Table 2: Prevalence of contraceptive practice

Variables	Frequency(n=299)	Percent
Those who had once used any contraceptive device		
Used at least once	179	59.9%
Never used	120	40.1%
Those who were still using at least one		
Currently using at least one	149	49.8%
Not using any	150	50.2%
Those willing to continue in its use		
Continuity	139	46.5%
Never will continue	160	53.5%
Those who had once used any traditional contraceptive device		
Had once used	79	26.4%
Never used	220	73.6%
Reasons for using contraceptives		
To prevent pregnancy	159	53.2%
To prevent infection	90	30.1%
Others	50	16.7%

Types of contraceptives used

A total of 31 (10.4%) used condoms, 50 (16.7%) used injections, 49 (16.4%) used implants, 89 (29.8%) used pills while 80 (26.8%) used withdrawal method. The most likely contraceptive method to be used by respondents was withdrawal method, 89 (29.8%) followed by pills, 70 (23.4%), implants 61 (20.4%) and 49 (16.4%) said injections while the least were 30 (10.0%) who said condoms. Regarding the current contraceptives in use, 69 (23.1%) use condoms, 30 (10.0%) use injectables, 59 (19.7%) use implants, 71 (23.7%) use pills while 70 (23.4%) use withdrawal method as a present way of preventing pregnancy. All the respondents 299 (100%) attested that they had at least once used withdrawal method to prevent pregnancy. A total of 70(23.4%) respondents were still using withdrawal method of contraceptive while more than half 229(76.6%) had stopped using withdrawal method. This is presented in Table 3.

Table 3: Types of contraceptives used by respondents

Variables	Frequency(n=299)	Percent
Type of contraceptive ever used		
Condom	31	10.4%
Injection	50	16.7%
Implant	49	16.4%
Pills	89	29.8%
Withdrawal method	80	26.8%
Contraceptive methods most likely to be used		
Condom	30	10.0%
Injection	49	16.4%
Implant	61	20.4%
Pills	70	23.4%
Withdrawal method	89	29.8%
Contraceptive method currently in use by respondents		
Condom	69	23.1%
Injection	30	10.0%
Implant	59	19.7%
Pills	71	23.7%
Withdrawal method	70	23.4%
Type of natural contraceptive method ever used		
Withdrawal	299	100%
Those currently using withdrawal method		
Still using withdrawal method	70	23.4%
Stopped using withdrawal method	229	76.6%

Reasons for choice of contraceptive use and non-use

More than half of the respondents 221 (73.9%) used contraceptives based on the recommendation from the healthcare worker, followed by 60 (20.1%) who used it because of the failure of the previous method used while 18 (6.0%) used it based on the comfortability of the choice of method. Regarding reasons for non-use, most of the respondents 119 (39.8%) refuse using because of the discomfort associated with it, followed by 111 (37.1%) who did not use because of failure to prevent pregnancy while 69 (23.1%) said the desire to have more children has stopped them from using any contraceptive device.

Table 4: Reasons for choice of contraceptive use and non-use

Variables	Frequency(n=299)	Percent
Reason for use of contraceptive device		
Failure of previous method used	60	20.1%
Recommendation from health worker	221	73.9%
Comfortability of the method	18	6.0%
Reasons for non-use		
Failure to prevent pregnancy	111	37.1%
Discomfort associated with it	119	39.8%
The desire for more children	69	23.1%
Religion		
Church discouragement of its use	110	36.8%
Church does not discourage usage	189	63.2%
Culture		
Culture discourages its use	209	69.9%
Culture never discouraged its use	90	30.1%
Contraceptive that may never be used by respondents		
Condom	20	6.7%
Injection	31	10.4%
Implant	188	62.9%
Pills	19	6.4%
Withdrawal method	41	13.7%

Table 5: Association between socio-demographic variables and contraceptive use

Variables	Contraceptive use Non-use	Use	χ ²	df	p-value
Age group (in years)			90.683	6	<0.001
15-19	60(75.0)	20(25.0)			
20-24	10(25.0)	30(75.0)			
25-29	20(29.9)	47(70.1)			
30-34	30(75.0)	10(25.0)			
35-39	0(0.0)	21(100.0)			
40-44	0(0.0)	10(100.0)			
45-49	30(73.2)	11(26.8)			
Occupation			61.690	4	<0.001
Students	50(62.5)	30(37.5)			
Unemployed	0(0.0)	50(100.0)			
Civil servants	30(60.0)	20(40.0)			
Self-employed	50(56.2)	39(43.8)			
Others	20(66.7)	10(33.3)			
Marital status			19.480	3	<0.001
Married	50(39.1)	78(60.9)			
Single	70(58.3)	50(41.7)			
Divorced	20(48.8)	21(51.2)			
Widowed	10(100.0)	0(0.0)			
Highest educational level			60.114	3	<0.001
No formal education	30(49.2)	31(50.8)			
Primary education	10(100.0)	0(0.0)			
Secondary education	70(76.9)	21(23.1)			
Tertiary education	40(29.2)	97(70.8)			
Monthly income			6.150	2	0.046
Low income (<N18,000)	70(58.8)	49(41.2)			
Middle income (N18,000-50,000)	50(45.9)	59(54.1)			
High income (> N50,000)	30(42.3)	41(57.7)			
Religious affiliation			11.716	2	0.003
Christianity	130(54.2)	110(45.8)			
Islam	10(25.0)	30(75.0)			
Traditionalists	10(52.6)	9(47.4)			
Total household members			36.249	2	<0.001
1-3	10(16.7)	50(83.3)			
4-6	70(53.8)	60(46.2)			
7 members and above	70(64.2)	39(35.8)			

Figures in parenthesis are percentages

Almost half of the respondents 110 (36.8%) said that church discourages its use while 189 (63.2%) said their church never discouraged its use. A total of 209 (69.9%) respondents attested that their culture discourages the use of contraceptive device while 90 (30.1%) of respondents objected to it. This is summarized in Table 4.

The result of the analysis showed that there was a statistically significant association between contraceptive use and age ($p=0.001$), occupation ($p=0.001$), marital status ($p=0.001$), highest educational level ($p=0.001$), monthly income ($p=0.046$), religious affiliation ($p=0.003$) and total household members ($p=0.001$).

Discussion

Prevalence of contraceptive practice

The present study found that 49.8% of women of reproductive age were using contraception, while 50.2% were not. This indicates that approximately one in every two women in the study population used contraception. This finding suggests a relatively substantial level of contraceptive uptake within the study community, although it also indicates that half of the women remained non-users and may therefore be at risk of unintended pregnancy depending on their fertility intentions and sexual exposure. The contraceptive use prevalence observed in this study was substantially higher than the national estimate (16.3%) reported in the 2024 Nigeria Demographic and Health Survey (NDHS). The 2024 NDHS reported that among currently married women aged 15-49 years, 20% were using any contraceptive method, comprising 15% using modern methods and 5% using traditional methods²⁶. The present finding is also considerably higher than estimates from analyses of earlier national Nigerian data using the 2018 NDHS where it was reported that 12.2% of women used modern methods while 16.6% used traditional methods²⁷.

The finding in this study is slightly higher than the findings by Unumeri et al. who reported that reproductive health and family planning indices in Nigeria vary widely across the six geo-political zones (GPZs) because evidence from the 2013 NDHS reveals that women residing in the South-West, South-South and South-East have higher modern CPRs (38%, 28% and 29% respectively) compared to those in the North-Central North-East and the North-West (16%, 3% and 4% respectively)⁴.

This is synonymous with the finding by Adeyemi et al. who reported that only 49.7% of study participants had ever used any contraceptive method, while 25.4% were still using a contraceptive method¹⁰.

The present study found that oral contraceptive pills were the most commonly reported method currently in use (29.8%), closely followed by withdrawal (26.8%), injectable (16.7%) and condom use (10.4%). The distribution suggests that contraceptive use in the study community is characterized by a relatively broad method mix rather than dependence on a single method. The relatively high use of withdrawal is noteworthy because it indicates continued reliance on a traditional method alongside modern contraceptive options. The finding is comparable with a 2024 Nigerian study among postpartum women attending selected healthcare facilities, which reported a current contraceptive prevalence of 59.2%, withdrawal was the most frequent used method (24.8%), followed by condoms (19.2%), injectables (9.9%) and oral pills (4.3%)²⁸. The similarity is particularly striking for withdrawal, condom, and injectables. In both studies, withdrawal constituted approximately one-quarter of current contraceptive use, while condoms and injectables occupied substantial proportions. To further support this, Osaro et al.¹, Adesola et al.¹¹, Ogboghodo et al.¹², Adefalu et al.¹⁴ and Roy et al.¹⁵ reported similar contraceptive use mix.

There is a statistically significant association between socio-demographic variables and prevalence of contraceptive use ($p < 0.05$). This is corroborated by Adebowale who established that there is strong relationship between socio-demographic factors and the use of contraceptives¹⁶. Fotso et al. also found that women of high socio-economic status are more likely to use modern contraceptives for delaying, spacing and limiting childbearing completely and they enjoy its benefits like the reduction in maternal/infant mortality, decline in unsafe abortion and decrease in unintended pregnancy rate⁷. Similarly, Unumeri et al. as well reported relationship between use of modern contraceptives (the dependent variable) and the socio-economic status (age, rural-urban residence, education, religion, current work status, marital status, and number of living children) of these women in the north-east (NE) and north-west (NW) geo-political zones (GPZs)⁴. This finding is as well

supported by Adesola et al. who reported that factors significantly associated with contraceptive use were maternal age, marital status, type of marriage, level of education and parity decision ($P < 0.05$)¹¹. This study reported that personal reasons has influence on the use of contraceptives ($p < 0.05$). This is in tandem with Osuafor and Mturi who reported similar association⁹.

Conclusion

This study showed that the prevalence of contraceptive practice was substantial and various types of contraceptives were used with oral pills and withdrawal being reported as the frequently used methods. Association was found between socio-demographic characteristics and contraceptive use. Based on these findings, it can be recommended that there is need to intensify community-based family planning education and counselling particularly for women who are currently not using contraception. This is important because approximately half of the women in the study (50.2%) were non-users. Education should address misconceptions, perceived disadvantages and concerns about contraceptive methods and should provide clear information on effectiveness, side effects, duration of protection and fertility return. Intervention should target adolescents and younger women (15-19 years) with tailored contraceptive services because the study showed substantially lower contraceptive use in this age group compared with several older age categories. Lastly, health authorities should ensure consistent availability of a broad range of contraceptive methods, particularly pills, condoms, implants, and injectables, which were prominent methods in this study.

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Authors contributions

We declare that this work was done by the authors named in this article and all liabilities pertaining to claims relating to the content of this article will be borne by the authors. All the authors were fully

involved in the study.

JJE and OE-J conceived and designed the study, collected and analyzed the data.

NOO took part in the interpretation of data analysis.

OE-J took part in the structure and proof reading of the manuscript.

JJE, FEA and CFN took part in data entry and analysis.

All authors read and approved the final manuscript.

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