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### USAGE OF INDIGENOUS FAMILY PLANNING PRACTICES AMONG RURAL NURSING MOTHERS IN IBARAPA CENTRAL LOCAL GOVERNMENT AREA OF OYO STATE, NIGERIA

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#### **ABSTRACT**

This study assessed the usage of indigenous family planning practices among rural nursing mothers in Ibarapa Central Local Government Area of Oyo State, Nigeria. Specifically, the study described the socio-economic characteristics of respondents, identified indigenous family planning practices used by respondents, and identified challenges associated with the use of indigenous family planning practices by respondents. Primary data were collected using an interview guide administered to 102 nursing mothers who were selected using a multistage sampling procedure. Data collected were analysed using frequency, percentages, Pearson Product Moment Correlation (PPMC) and Chi-square at 0.05 level of significance. Results show that the mean age of the nursing mothers was 30.9 years, and the mean household size was 6 persons. Also, 36.3% had no formal education while 31.4% had secondary education. The indigenous family planning practices used by the majority of the respondents were sperm-killing agents (77.5%), withdrawal (76.5%) and continual breastfeeding (67.6%). Very severe challenges faced by the majority of the respondents were carefree (66.7%), religious barriers (87.3%) and fastchanging social environments (89.2%). Factors significantly associated with the use of indigenous family planning practices were age (r=0.26), household size (r=0.48), marital status ( $\chi^2$ =73.32), primary occupation ( $\chi^2$ =135.05), educational level ( $\chi^2$ =84.46). This study concludes that sperm-killing agents, withdrawal and continual breastfeeding were the commonly used indigenous family planning practices of rural nursing mothers in Ibarapa Central Local Government Area of Oyo State, Nigeria. The study recommends an awareness campaign of the health benefits of using family planning among religious leaders and why women should take it so seriously.

Keywords: Indigenous family planning, Nursing mothers, Primary healthcare, Sperm-killing agent, Religion barrier

### INTRODUCTION

To curb the high rate of population growth that the nation is presently experiencing, there is a need to harness the use of family planning practices as a strategy. However, the acceptance rate of this strategy or practice is still very low (Adedini, Ntoimo and Alex-Ojei. 2023; Fadeyibi, Alade, Adebayo, Erinfolami, Mustapha, and Yaradua, 2020). Several studies have shown that despite the efforts made by the government in this direction, family planning in Nigeria remains largely insignificant (Uhuo, Oguaka and Egba, 2020). Similarly, Do *et al.*, (2020) noted that where knowledge of family planning is high among youth unwanted pregnancies and high birth rates reign in Nigeria.

Family planning, according to the World Health Organization (WHO, 2020) is a way of thinking and living which is voluntarily adopted based on attitude, knowledge, and decisions made by individuals and couples to promote the welfare and health of the family. In essence, family planning serves as a step to better living and development of individuals which contributes effectively to the social and economic development of the country. The

concept of family planning and contraceptives is not a female-sex phenomenon; male sterilization, withdrawal, use of herbs, periodic abstinence, condoms, and other contraceptive methods are being used by men (Imam and Khan, 2019). Where traditional methods are preferred by couples, women in such families need the support of their men to effectively practice safe contraception. In Nigeria, this is added to associated costs and factors that affect family planning adoption and use of contraceptives (Oyedele, 2021).

The use of contraceptives as a motivational strategy to avoid unwanted pregnancy has been found unacceptable in more than four out of ten women within one year of adoption (Akamike, Okedo-Alex and Eze, 2016; Olubodun, Balogun and Ogunsilu, 2020). The correct use of contraceptive methods enables women to actively participate in family planning and at the same time to participate fully in working life. Family planning plays an important role in reducing malnutrition and improving child survival and maternal health (Omoge *et al.*, 2022).

Knowledge of the cultural and traditional beliefs of people concerning maternal, and child



health and the use of contraceptive practices is significantly higher in rural communities (Ikechukwu et al. 2020). Some of the traditional contraceptive methods include calendar method, withdrawal, and folk methods (Anate, Balogun, Olubodun, and Adejimi, 2021), cervical mucus and lactational amenorrhea methods are examples of traditional contraceptive methods (Rabiu and Rufa'i, 2018). Other traditional methods of contraception that are particularly prevalent in Africa include virginity verification and the use of traditional medicines and herbs (Uhuo et al., 2020). Olowolafe (2021) listed traditional family planning to include the withdrawal method, use of barrier method, use of the local ring, herbal preparation, incantation recitation, jumping after sex, taking salt after coitus and charms. A literature review by Moroole et al., (2020) listed the indigenous contraception commonly used in rural Nigeria including: alcoholic drinks; padlock on labia; douching; standard days method; withdrawal; waistband; armlet/armband; traditional postpartum abstinence; and drinking herbs.

In a decade, traditional family planning has existed, our forefathers have been practising family planning on their own, but this family planning has no scientific rationale, that is, there is no evidence of success or failure (Adedin *et al.* 2023). However, this traditional method of family planning is associated with socioeconomic factors, cultural beliefs and cultural practices (Ojih *et al.*, 2023). There are many other unreported traditional contraceptive methods applicable to rural women in literature. Thus, there is a need to explore diverse indigenous knowledge towards family planning practices in rural communities in Nigeria. Indigenous contraception is known to include all-natural and traditional contraception. It may also include the use of herbs.

Government investment in health services is low and there is a need to promote the use of indigenous and modern lifestyle behaviour to facilitate the adoption of family planning methods. However, problems which emanate from unwanted pregnancy are caused by inadequate access to preferred methods (Sinai et al., 2019). The majority of users of modern family planning practices discontinue use or switch methods within their first year of adoption due to several reasons which include contraceptive failure and desire for pregnancies, side effects with negative health outcomes among others (Anate et al., 2021). The failure of modern contraceptives is related to user personal attributes, characteristics of the method used, the quality of the family planning services and supply factors (Sinai et al., 2019). The reported side effects associated with

modern contraception aroused an interest in indigenous contraception. For example, the World Health Organization (WHO, 2018) factsheet lists traditional methods of contraception for family planning/contraception. However, people are still encouraged to adopt modern contraceptives such as contraceptive pills, injections, intrauterine devices (IUD), condoms and sterilization as a panacea to family planning despite their side effects (Moroole et al., 2020; Ajayi et al., 2018). Both natural and traditional techniques of African indigenous contraception can offer women safe and effective alternative contraceptive options for preventing unwanted pregnancies. It is therefore important to create an enabling environment for the seamless fusion of indigenous and scientific knowledge of family planning methods required to maintain optimal sexual health. It is based on this background that this study assessed the use of indigenous family planning among rural nursing mothers in Ibarapa Central Local Government Area of Oyo State, Nigeria. Therefore, the following objectives were:

- To describe the socio-economic characteristics of the rural nursing mothers in Ibarapa Central Local Government Area of Oyo State;
- To identify indigenous family planning practices used by rural nursing mothers in the study area;
- 3. To ascertain the challenges encountered while using the usage of indigenous family planning practices by rural nursing mothers in the study

Hypothesis of the study: There is no significant relationship between selected socio-economic characteristics of rural nursing mothers and indigenous family planning practices used.

### METHODOLOGY

The study area is Ibarapa Central Local Government Area (LGA) of Oyo State. The LGA consists of two principal towns which are Igboora and Idere with its headquarters at Igboora. It comprises of 10 political wards which encompasses several primary health care centres. The area lies on the longitude 7 ° 26 0'N and latitude 3° 17 ' O'E. Agriculture is the major occupation of the people in the area. Three prominent primary health care (PHC) centres in Igboora, Ibarapa Central Local Government Area of Oyo State, namely: (i) Isale-oba C.A.C Igboora, (ii) Igbole PHC Igboora, and (iii) Oke-Odo PHC Igboora.

The population of the study comprised 514 registered nursing mothers in Isale-oba C.A.C Igboora (114), Igbole PHC Igboora (200) and Oke-



Odo PHC igboora (200). From the population, 20% were randomly selected to give Isale-oba C.A.C Igboora (22), Igbole PHC Igboora (40) and Oke Odo PHC Igboora (40), giving a total sample size of 102 nursing mothers used as respondents.

Age and household size were measured in ratio while marital status, educational level and occupation were categorical variables measured at the nominal level. Use of indigenous family planning was measured as used =1 and not used =0 while challenges were measured as very severe=3, severe =2 and not severe =1. Data collected were analyzed using descriptive and inferential statistics such as Pearson Product Moment Correlation (PPMC) and Chi-square analysis.

## RESULTS AND DISCUSSION Socioeconomic characteristics of rural nursing Mothers

Table 1 shows that the mean age and household size of nursing mothers were 30.9±12.62 years and 6±1.73 persons respectively. This implies that the majority of nursing mothers do not have late marriages and could use family members as family labour when needed. They could be considered as youths who are expected to high adopt the use of family planning. This agrees with Do, Hutchinson, Omoluabi, Akinyemi and Akano (2020) who noted the knowledge of family planning is high among youth but unwanted pregnancies and high birth rates reign. Most (65.7 %) of the respondents were married and had trading (59.8%) as their major occupation while 36.3% had no formal education. This implies that nursing mothers in the study area are predominantly traders. This is contrary to Olubodun et al. (2020) where it was noted that farming was the major occupation of women in the rural areas of Nigeria.

Regarding education of the respondents, most of the respondents had one form of formal education or the other with primary education (21.5%), secondary education (31.4%) and tertiary education (4.9%) giving a total of 57.8% literacy. Even though the percentage of nursery mothers who had tertiary education is low, it could be agreed upon that the nursing mothers had formal education. In this case, a reasonable number of nursing mothers in the study area are expected to be able to read and write. This level of education may support the uptake of indigenous methods of conceptive for family planning to carry out their trading activities. In line with this assertion, the study noted that women are more likely to use family planning methods as

educational and employment opportunities for women improve and they fully contribute to the economic well-being of the family (Kassim, 2020).

### Indigenous family planning practices used by rural nursing mothers

According to results presented in Table 2, the majority (77.5%) of the respondents used spermkilling agents including hot water with or without plain concentrated solutions of salt, alum, vinegar, lemon, potassium or caustic as indigenous family planning practice. Another practice common among the majority (76.5%) was the withdrawal method. The withdrawal method has been considered in literature as age long effective method of preventing pregnancy with only 4 percent possibility if the male partner withdraws before ejaculation, although some traditions in Africa consider it a taboo to splash human sperms outside (Moroole et al., 2020). Continual breastfeeding method is another practice used among the majority (67.6%) of the respondents. Lactation is a natural defence against pregnancy (Sridhar and Salcedo, 2017). The lactational amenorrhea method (LAM) is the specific name given to the use of breastfeeding as a dedicated technique of contraception (Sridhar and Salcedo, 2017). Though lactational amenorrhea can rival the efficacy of the best modern approaches, women must experience pregnancy to use it. If the mother is nursing, she is delaying the return of fertility (Sridhar and Salcedo, 2017). Suckling induces a reduction in gonadotropin-releasing hormone. luteinizing hormone and follicle-stimulating hormone release, resulting in amenorrhea25. Breastfeeding in Nigeria is used for child spacing (Uhuo et al., 2020). LAM is unquestionably cost-effective, as breastfeeding alone provides adequate nutrition and fluid intake through the first 6 months, and breast milk is considered a healthier option than its substitutes for infants in lowresource settings. LAM is 98-99% effective during the first six months after childbirth in women practising exclusive breastfeeding (Moroole et al., 2020).

Religion self-discipline used among an appreciable number of the respondents (47.1%) is similar to abstinence during a religious exercise called Postpartum abstinence. Postpartum abstinence refers to abstaining from sexual relations after childbirth. This is a common technique deep-rooted in the cultures of different communities worldwide with varying duration. A major form of contraception in pre-colonial Nigerian societies was abstinence from sex during breastfeeding (Oyedele *et al.* 2021).



Table 1: Distribution of respondents according to socioeconomic characteristics

Variables	Frequency	Percentage	Mean	Std. Dev.
Age (years)				
<25	5	4.9		
26 - 35	59	57.8	30.9	12.62
36 - 45	31	30.4		
46 and above	7	6.9		
Marital status				
Single	9	8.8		
Married	67	65.7		
Widowed	21	21.6		
Separated	5	4.9		
Occupation				
Farming	33	33.2		
Civil servant	3	2.9		
Trading	61	59.8		
Artisan	5	4.8		
Household size (persons)				
1-5	51	49.9		
5 - 10	46	45	6.00	1.73
< 10	5	4.9		
Educational level attained				
No formal education	37	36.3		
Adult education	6	5.9		
Primary education	22	21.5		
Secondary education	32	31.4		
Tertiary education	5	4.9		

Source: Field survey, 2017

Table 2: Distribution of rural nursing mothers based on indigenous family planning practices used

Indigenous Family	Used		
	Frequency	Percentage	
Use of sperm-killing agents e.g hot water with or without	79	77.5	
plain concentrated solutions of salt, alum, Vinegar, lemon,			
potassium or caustic soda			
Withdrawal	78	76.5	
Continual breastfeeding	69	67.6	
Religion self-discipline	48	47.1	

Source: Field survey, 2017

## Challenges encountered while using indigenous family planning practice among rural nursing mothers

Table 3 reveals that the majority of the respondents indicated very severe challenges including a fast-changing environment as a result of civilization (89.2%), religious barriers (87.3%), and the non-challant attitude of the nursing mothers (66.7%). This implies that civilization, religion and

care for local family planning practices are the most influencing factors responsible for the extinction of indigenous family planning practices. The position of Babalola, Loehr, Oyenubi, Akiode, and Mobley (2019) on contraceptive usage foregrounds the dilemma involved in reproductive healthcare in Nigeria. The most populous Black nation in the world battling serious economic challenges also has its level of contraceptive usage among the lowest worldwide.



Table 3: Distribution of rural nursing mothers based on challenges associated with the usage of indigenous family planning practices

Challenges	Very Severe	Severe	Not Severe
Non-challant attitude of nursing mothers	68 (66.7)	5 (4.9)	29 (28.4)
Religion barrier	89 (87.3)	11 (10.8)	2 (1.9)
Inaccessibility to the practices	18 (17.6)	5 (4.9)	79 (77.5)
Wrong usage of the practices	6 (5.9)	7 (6.9)	89 (87.2)
Fast-changing social environment	91 (89.2)	8 (7.9)	3 (2.9)

Source: Field survey, 2017

## Relationship between selected personal characteristics of rural nursing mothers and indigenous family planning practices used

Results in Table 4 indicate that a significant relationship existed between age (r 0.26), household size (r-0.48), marital status (r =73.32), Occupation (r = 135.05), and indigenous family planning practices used. This finding is in line with a report by Anate *et al.* (2021) who found that the use of family planning in rural Nigeria was significantly related to the age of women.

The educational level attained ( $x^2$ =84.46) by the women showed a significant relationship with the use of family planning. This finding indicated that attainment of formal education promotes the use of contraceptives among nursing mothers in the study area. This finding is consistent with previous studies

that indicated education as a required factor in the use of conceptive among women (Olayiwola, Kazeem, and Fuein, 2021; Woldeamanuel, Gessese, Demie, Handebo and Biratu, 2023).

Findings further imply that household size for example is influenced by the indigenous family planning practices used. A little or no use of family planning by rural nursing mothers might amount to an increase in the number of pregnant cases which in turn leads to high household size. Also, nursing mothers' educational level might influence the usage of the practices or not. That is, there is the possibility of an educated fellow being more exposed to different methods as a result of acquired knowledge. These findings support Ojih *et al.* (2023) submission that the socio-economic characteristics of the population were significant predictors of contraceptive use in Nigeria.

Table 4: Test of the relationship between socioeconomic characteristics of respondents and indigenous family planning practices used

planning practices used			
Variables	r-value	p-value	
Age	0.26	0.001*	
Household size	0.48	0.030*	
	Chi-square $(\chi^2)$		
Marital status	73.32	0.000*	
Occupation	135.05	0.000*	
Educational level attained	84.46	0.000*	

<sup>\*</sup>Significant

#### CONCLUSION AND RECOMMENDATIONS

The study assessed the use of indigenous family planning among rural nursing mothers in Ibarapa Central Local Government Area of Oyo State, Nigeria. Based on the findings, this study concludes that rural nursing mothers mainly used sperm-killing agents such as hot plain water with or without concentrated solutions of salt as a good source of indigenous family planning practices followed using withdrawal methods and continual breastfeeding. Age, household size, marital status, occupation, and educational status of the rural nursing mothers support the choice of indigenous family planning methods used. Religious barriers and a fast-changing

environment because of civilization present very severe challenges to the use of indigenous family planning methods among rural nursing mothers. The study thus recommends an awareness campaign of the health benefits of using family planning among religious leaders and why women should take it so seriously. Maternal health care intervention programmes by government and non-governmental organizations aimed to increase the use of contraceptives among rural nursing mothers in the study area should focus on adult nursing mothers, married, and educated nursing mothers while the under-aged nursing mothers (teenagers) should be discouraged through awareness campaign but uptake the use of family planning.



#### REFERENCES

- Adedini, S.A., Ntoimo, L.F.C. and Alex-Ojei, C.A. (2023). Sub-national Analysis of Contraceptive Discontinuation among Women in Nigeria: Evidence from the Demographic and Health Survey. DHS Working Papers No. 194. Rockville, Maryland, USA: ICF. <a href="https://dhsprogram.com/pubs/pdf/WP194/WP194.pdf">https://dhsprogram.com/pubs/pdf/WP194/WP194/WP194.pdf</a>
- Ajayi, A.I., Adeniyi, O.V. and Akpan W. (2018). Use of traditional and modern contraceptives among childbearing women: findings from a mixed methods study in two southwestern Nigerian states. *BMC Public Health*, 18(1); 1-9. <a href="https://doi.org/10.1186/s12889-018-5522-6">https://doi.org/10.1186/s12889-018-5522-6</a>
- Akamike, I. C., Okedo-Alex, I. N., Eze, I. I., Ezeanosike, O. B. and Uneke, C. J. (2020). Why does uptake of family planning services remain sub-optimal among Nigerian women? A systematic review of challenges and implications for policy. *Contraception and Reproductive Medicine*, 5(1). https://doi.org/10.1186/s40834-020-00133-6
- Anate, B. C., Balogun, M. R., Olubodun, T., and Adejimi, A. A. (2021). Knowledge and utilization of family planning among rural postpartum women in Southwest Nigeria. *Journal of family medicine and primary care*, 10(2), 730–737. <a href="https://doi.org/10.4103/jfmpc.jfmpc.1312\_2">https://doi.org/10.4103/jfmpc.jfmpc.1312\_2</a>
- Do, M., Hutchinson, P., Omoluabi, E., Akinyemi, A.I. and Akano, B. (2020). Partner Discussion as a Mediator of the Effects of Mass Media Exposure to FP on Contraceptive Use among Young Nigerians: Evidence from 3 Urban Cities. *Journal of Health Communication*, 25(2); 115–125. <a href="https://doi.org/10.1080/10810730.2020.1716">https://doi.org/10.1080/10810730.2020.1716</a>
- Fadeyibi, O., Alade, M., Adebayo, S., Erinfolami, T., Mustapha, F. and Yaradua, S. (2022). Household Structure and Contraceptive Use in Nigeria. *Frontiers in global women's health*, 3, 821178. https://doi.org/10.3389/fgwh.2022.821178
- Imam, M.I. and Khan, B. (2019). Challenges and prospects of contraceptives use among women attending family planning services in Yobe State, Nigeria. *World Scientific News*, 122, 122–132. http://yadda.icm.edu.pl/yadda/element/bwm

- eta1.element.psjd-1874e113-a8b0-455eb83c-9a373b705f23/c/WSN\_122\_2019\_122-132.pdf
- Ikechukwu, H. I., Ofonime, N., Kofoworola, O. and Asukwo, D. E. (2020). Influence of cultural and traditional beliefs on maternal and child health practices in rural and urban communities in Cross River State, Nigeria. *Annals of Medical Research and Practice*, 1, 4. https://doi.org/10.25259/anmrp 4 2019
- Kassim, M.R.M. (2020). A qualitative study of the maternal health information-seeking behaviour of women of reproductive age in Mpwapwa district, Tanzania. *Health Information and Libraries Journal*, 38(3); 182–193. https://doi.org/10.1111/hir.12329
- Marquez, M.D., Kabamalan, M.M.M. and Laguna, E.P. (2018). Traditional and Modern Contraceptive Method Use in the Philippines: Trends and Determinants 2003-2013. *Studies in Family Planning*, 49(2), 95–113. https://doi.org/10.1111/sifp.12051
- Moroole, M., Materechera, S. A., Otang-Mbeng, W. and Aremu, A. O. (2020). African indigenous contraception: A review. *African Journal of Reproductive Health*, 24(4); 173–184. <a href="https://doi.org/10.29063/ajrh2020/v24i4.18">https://doi.org/10.29063/ajrh2020/v24i4.18</a>
- Ojih, S.E., Adeyeye, B., Onoja, I.B., Adesina, E., Omole, F., and Kayode-Adedeji, T. (2023). Cultural Practices and Adoption of National Family Planning Communication Campaigns on Select Ethnic Groups in Nigeria. *Healthcare*, 11, 495. https://doi.org/10.3390/healthcare11040495
- Olayiwola S.O., Kazeem B.L.O. and Fuein V.K. (2021). Female Education and Contraceptives Use in Nigeria. European Scientific Journal, ESJ, 17 (32), 366. <a href="https://doi.org/10.19044/esj.2021.v17n32p3">https://doi.org/10.19044/esj.2021.v17n32p3</a>
- Olowolafe, A.S. (2021). Knowledge and practice of family planning among nursing mothers attending child welfare clinic in Lagos university teaching hospital, Lagos state. *Journal of Nursing and Care*, 10:3, 1-12.
- Omoge, A.O. Oyedele, M.O. Erinsakin, O.B. and Oluwafemi, O. D. (2021). Family Planning Services Utilization Among Women Visiting Better Life Primary Healthcare Centre For Family Planning Services In Ondo City, Ondo State, Nigeria. <a href="https://doi.org/10.22541/au.166603254.4857">https://doi.org/10.22541/au.166603254.4857</a> 5524/v1



- Oyedele, O.J. (2021). Gender, Media, and Contraceptive Use in Nigeria: Men Need Help, Not Women. *Journal of International Women's Studies*, 22(5); 266-283. <a href="https://vc.bridgew.edu/jiws/vol22/iss5/17">https://vc.bridgew.edu/jiws/vol22/iss5/17</a>
- Rabiu, A., and Rufa'i, A. A. (2018). The role of traditional contraceptive methods in family planning among women attending primary health care centers in Kano. *Annals of*
- Sridhar, A. and Salcedo, J. (2017). Optimizing maternal and neonatal outcomes with postpartum contraception: impact on breastfeeding and birth spacing. *Maternal Health, Neonatology and Perinatology*, 3(1); 1-10. <a href="https://doi.org/10.1186/s40748-016-0040-y">https://doi.org/10.1186/s40748-016-0040-y</a>
- Uhuo, E.N., Oguaka, V.N. and Egba, I.S. (2020). Predictive factors to access and use of family planning services by rural and semi-urban dwellers in Afikpo North Local Government area, Ebonyi State, Nigeria. *African Journal of Reproductive Health*, 24(4);132-137. https://doi.org/10.29063/ajrh2020/v24i4.14
- World Health Organization (2020). Family planning/contraception methods.

- *African medicine*, 17(4), 189–195. https://doi.org/10.4103/aam.aam 60 17
- Sinai, I., Omoluabi, E., Jimoh, A. and Jurczynska, K. (2019). Unmet need for family planning and barriers to contraceptive use in Kaduna, Nigeria: culture, myths and perceptions. *Culture, Health and Sexuality*, 1–16.

https://doi.org/10.1080/13691058.2019.1672 894

https://www.who.int/news-room/fact-sheets/detail/family-planning-contraception

- Woldeamanuel, B. T., Gessese, G. T., Demie, T. G., Handebo, S. and Biratu, T. D. (2023). Women's education, contraception use, and high-risk fertility behavior: A cross-sectional analysis of the demographic and health survey in Ethiopia. Frontiers in global women's health, 4, 1071461. https://doi.org/10.3389/fgwh.2023.1071461
- World Health Organization. Family planning/Contraception. (2018).

  <a href="https://www.who.int/news-room/factsheets/detail/family-planning-contraception">https://www.who.int/news-room/factsheets/detail/family-planning-contraception</a>