Perspectives on Barriers to Family Planning Uptake among Postpartum Women, Men and Healthcare Providers in Rural Nigeria: A Mixed-Methods Study.

*Love Ayamolowo[1], Sunday Abatan[2], Abiola Afolabi[3], James Sindiwe[1], Nadine Rall[1]
[1]Department of Nursing Science, Obafemi Awolowo University, Nigeria
[2]Department of Demography and Social Statistics, Federal University Oye-Ekiti, Nigeria
[3] Department of Agricultural Extension and Rural Development, Obafemi Awolowo University, Nigeria
***Corresponding Author's Email: layamolowo@oauife.edu.ng, Phone No: +2348132750008**

Introduction: Unintended pregnancies pose a global challenge, especially in LMICs, with Nigeria heavily affected. An estimated 74 million women in LMICs experience unintended pregnancies annually, leading to 25 million unsafe abortions and 47,000 maternal deaths (WHO, 2019a). Nigeria reports over 1.3 million unintended pregnancies yearly, with a high rate of unsafe abortions (Global Family Planning Report, 2018). These issues contribute to high maternal mortality rates, reaching 934 and 917 deaths per 100,000 live births in 2015 and 2017 (WHO, 2019b). Unintended pregnancies also hinder education, limit employment opportunities, and perpetuate poverty (WHO, 2019a). Despite efforts, progress in improving FP services and increasing FP use remains limited (WHO, 2019a).Unintended and closely spaced pregnancies postpartum pose significant risks, leading to adverse maternal and child health outcomes, including increased infant and maternal mortality (Damtie et al., 2021). Postpartum Family Planning (PPFP) can prevent 30% of maternal mortality and 10% of child mortality if pregnancies are spaced more than 2 years apart (WHO, 2018). Despite efforts to enhance contraceptive access and use, PPFP uptake remains low, especially in rural areas. Men, often perceived as barriers to FP/C use, play a pivotal yet underexplored role. This study explores postpartum FP/C perspectives among women, men, and health workers in Nigeria, aiming to identify barriers, misconceptions, and socio-cultural factors influencing utilization. Insights will inform targeted interventions for postpartum couples, contributing to improved reproductive health outcomes.

Methods: The study utilized a mixed-methods approach to comprehensively explore FP dynamics in postpartum periods among communities in southwest Nigeria. The qualitative component delved into midwives' perspectives on FP services, while the quantitative aspect assessed FP awareness, attitudes, and practices among men and women. The research was conducted across three states (Ekiti, Osun, and Ondo), targeting both public maternity units in rural areas and nearby communities to ensure representation across diverse socio-economic backgrounds. Twenty-one health facilities were purposefully selected, each staffed with at least one midwife. A multistage sampling method was employed to select 388 respondents, with approximately equal representation of men and women. The postpartum women aged 18-49, men aged 18-49 residing in nearby communities with a child, and midwives with a minimum of one-year post-qualification experience in government health institutions. Data collection continued until data saturation was achieved with 21 midwives for the qualitative study, while precision was prioritized in determining the sample size for the quantitative study. The quantitative data were coded and analyzed using IBM SPSS statistics (version 28). Audio recordings were transcribed verbatim, ensuring accuracy. Transcripts included bracketed translations where needed. Data analysis followed Creswell's (2014) six-step qualitative analysis process. Trustworthiness in this study adhered to the model proposed by Lincoln and Guba (Brink et al., 2018).

Results: The socio-demographic characteristics of the respondents are summarized in Table 1

Table 1: Socio-demographic characteristics of respondents (N=388)

Variable	Gender		χ^2	p-value
	Men n=194 (%)	Women n=194 (%)		
Age in years (Mean±SD)	**34.5±7.2**	**30.5±7.4**		

< 25 (Early reproductive age)	13 (6.7)	42 (21.7)		
25 – 34 (Mid reproductive age)	75 (38.7)	95 (48.9)	**32.374**	**p<0.001***
35 & above (Late reproductive age)	106 (54.6)	57 (29.4)		
Religion				
Christianity	142 (73.2)	141 (72.7)	4.251	†0.119
Islam	48 (24.7)	53 (27.3)		
Traditional	4 (2.1)	0 (0.0)		
Occupation				
Civil servant	10 (5.2)	16 (8.2)		
Private employment	13 (6.7)	21 (10.8)	**10.663**	**0.014***
Self-employed	163 (84.0)	137 (70.6)		
Unemployed	8 (4.1)	20 (10.3)		
Partners occupation				
Civil servant	14 (7.2)	27 (13.9)		
Private employment	18 (9.3)	23 (11.9)	**8.806**	**0.032***
Self-employed	144 (74.2)	136 (70.1)		
Unemployed	18 (9.3)	8 (4.1)		
Educational level				
No formal education	10 (5.2)	10 (5.2)		
Primary	28ab (14.4)	22 (11.3)	1.062	0.786
Secondary	101 (52.1)	109 (56.2)		
Tertiary	55 (28.4)	53 (27.3)		
Partner's educational status				
No formal education	7 (3.6)	7 (3.6)		
Primary	38 (19.6)	9 (4.6)	**27.719**	**P<0.001***
Secondary	103 (53.1)	97 (50.0)		
Tertiary	46 (23.7)	81 (41.8)		
Family type				
One partner	167 (86.1)	173 (89.2)	0.856	0.355
More than one partner	27 (13.9)	21 (10.8)		

Statistically significant at 95% Confidence Interval; †Fisher exact p-value

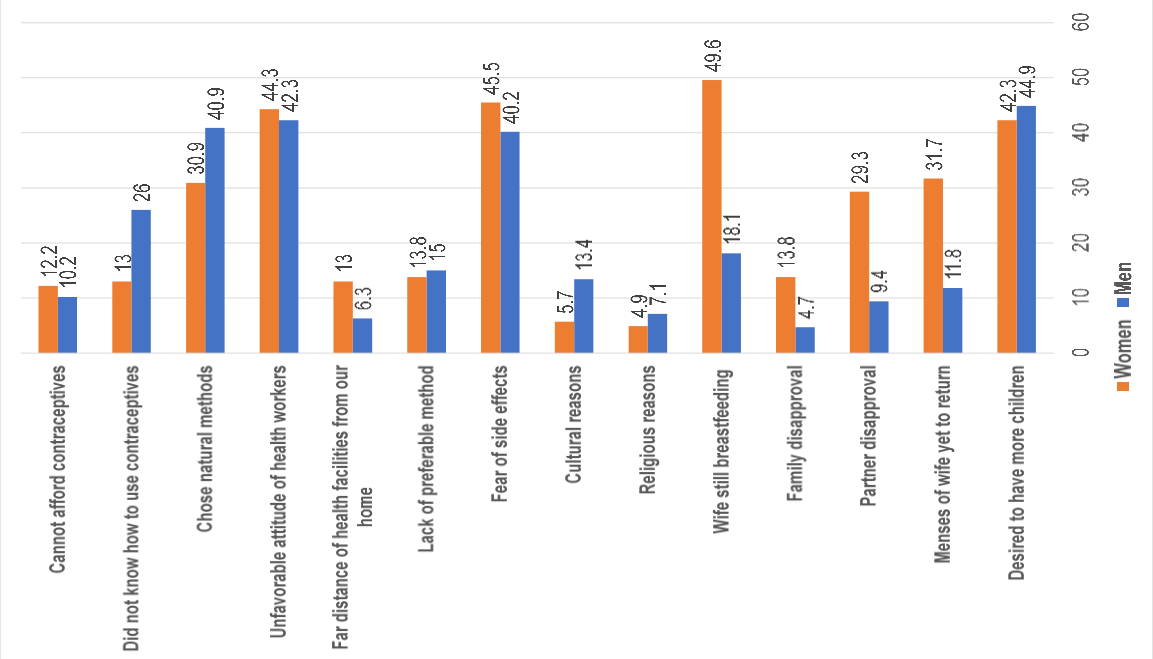

Figure 1: Reasons for not using family

Figure 1: Reasons for not using family planning

Only 35.5% of respondents currently used family planning, with similar rates among men and women. Reasons for using family planning were primarily for child spacing (85.9%) and resumption of sexual intercourse (56.3%). Reasons for not using family planning methods as illustrated in figure 1 were diverse among men and women respectively, including desires for more children (44.9%, 42.8%), fear of side effects (40.2%, 45.5%), and preference for natural methods (40.9%, 30.9%),

The majority exhibited positive attitudes towards family planning (62.6%). Men with positive attitudes (OR=1.436, $p>0.05$), tertiary education (OR=2.331, $p<0.05$), and multiple partners (OR=1.793, $p<0.05$) had higher odds. Women with more than four previous pregnancies (OR=4.881, $p<0.05$), infants aged 6 months and above (OR=3.135, $p<0.05$), and Caesarean deliveries (OR=2.519, $p<0.05$) had higher odds, while home births (OR=0.356, $p<0.05$) had lower odds.

Table 2 summarizes key themes related to barriers to uptake of family planning. Three main themes emerged from midwives' transcripts: User-Related Challenges, Providers-Related Challenges, and Health System Challenges.

Table 2: Themes and sub-themes from the interviews

Themes	Subthemes	Quotes
User-Related Challenges	Knowledge Level	*"Some women have this myth and misconception; some believe that the person will start having a swollen or big tummy." "Spacing of their children. Some still want to space, you know, create a gap between their children."*
	Fear of Family Planning Side Effects	*"Another reason is the fear of side effects because those ones that are taking condoms still complained that it doesn't make sex enjoyable." "Another recounted a case where a woman's death was attributed to FP use."*
	Spousal Disposition and Family Influence	*"Family and community perceptions linked FP use to promiscuity, while some believed only the family should decide on childbearing." "Husbands' attitudes also influenced women's FP utilization, with concerns about promiscuity."*
	Preference for Alternative Methods	*"Women favored natural or traditional methods over modern contraceptives due to beliefs about their effectiveness or failure rates." "Some distrusted modern FP due to experiencing unplanned pregnancies."*
	Belief System and Religion	*"Community attitudes, norms, and religious beliefs often discouraged FP use, particularly among men." "Some cultures considered FP taboo, associating it with adverse outcomes like death."*
Providers-Related Challenges	Undesirable Attitudes of Midwives	*"Some midwives' negative attitudes, particularly towards adolescents seeking FP, deterred them from accessing services." "Adolescents preferred seeking contraceptives from pharmacies to avoid stigmatization."*
	Few and Inexperienced Midwives	*"Limited FP providers and insufficient training hindered service delivery." "Midwives lacked expertise in modern FP methods, impacting access and quality of care."*
Health System Challenges	Inadequate Family Planning Commodities	*"Health facilities lacked essential equipment and supplies for FP services, leading to personal expenses and service disruptions."*
	Time Wasting at Healthcare Facilities	*"Long wait times at clinics, compounded by staff shortages, deterred men and women from seeking FP services, viewing it as a waste of time."*
	Family Planning Education and Monitoring Barriers	*"Challenges in educating communities about FP benefits and monitoring usage due to low attendance at health facilities impeded effective service delivery."*
	Accessibility of Health Facilities	*"Far distances to health facilities limited access to FP services, leading some to opt for alternative sources like pharmacies due to convenience."*

Discussion: Socio-demographic factors such as age, education, and occupation significantly influence the utilization of family planning services (Dingeta et al., 2021). Older, more educated women engaged in occupations are more likely to use contraception. However, demographic factors like sex, religion, and family type did not exhibit statistically significant associations with family planning uptake, consistent with findings from rural settings in Nigeria and Ghana (Anate et al., 2021; Schrumpf et al., 2020). Parity emerged as a significant factor influencing family planning decisions, emphasizing the importance of considering

the number of children already had in addressing family planning needs (Bhatt et al., 2021). Nevertheless, the impact of education on family planning uptake can vary across different settings, as observed in countries like Kenya and Uganda (Omona et al., 2021). Moreover, the occupation of spouses was identified as a factor influencing family planning uptake, possibly due to financial stability, support for family planning, and access to information and resources. The emphasis on socio-cultural factors and myths influencing family planning decisions is consistent with existing literature (Ahmed et al., 2020). Similar concerns over misconceptions about family planning methods and cultural beliefs favoring large families have been documented in previous studies (Sedgh et al., 2016). However, this study adds depth to the understanding of these issues by exploring their impact specifically within the postpartum period, shedding light on how socio-cultural factors intersect with the timing of family planning decisions. Healthcare providers may impose eligibility barriers or exhibit bias towards certain contraceptive methods, limiting access to family planning services and deterring individuals from utilizing them. This aligns with prior studies emphasizing providers' impact on contraceptive uptake (Ali et al., 2018). However, this study further underscores the significance of midwives in particular, who are often the primary point of contact for reproductive health services in many Nigerian communities. Healthcare systems must establish guidelines for equitable access to family planning services and provide comprehensive training and education for healthcare providers. Promoting non-judgmental attitudes and effective communication skills among providers is essential to create a supportive environment for individuals seeking family planning services. The accessibility of healthcare facilities in rural Nigerian communities also poses a significant challenge to the utilization of family planning services. The study found healthcare access issues in rural areas, due to limited facilities, distance, transport challenges, and resource scarcity. This resonates with research on healthcare barriers (Izugbara et al., 2019). However, our study uniquely explores rural Nigeria's hurdles, like transport and resource scarcity, enhancing understanding of healthcare access and family planning. Comprehensive strategies are needed to address challenges, including increasing investment in healthcare infrastructure, ensuring a steady supply of contraceptives, and implementing targeted interventions like community outreach and reproductive health education.

Conclusion: The study provides valuable insights into the complex socio-cultural and systemic factors influencing postpartum family planning uptake in Nigeria. Targeted interventions addressing knowledge gaps, cultural beliefs, and healthcare access are essential for improving family planning utilization and reproductive health outcomes. Healthcare provider training, outreach, and infrastructure investment are crucial to overcome family planning barriers in rural areas. Nigeria can progress towards reproductive health goals, reducing unintended pregnancies and maternal mortality significantly.

References

Ahmed, S., Creanga, A. A., Gillespie, D. G., & Tsui, A. O. (2020). Economic status, education, and empowerment: implications for maternal health service utilization in developing countries. PLoS One, 15(1), e0227570.

Ali, M., Cleland, J., & Shah, I. H. (2018). Causes and consequences of contraceptive discontinuation: evidence from 60 demographic and health surveys. Geneva: World Health Organization.

Anate, M., Belayneh, Z., Mekonnen, E., & Shiferaw, Z. (2021). Modern contraceptive utilization and its associated factors among married women in rural communities of Hula district, southern Ethiopia: A community-based cross-sectional study. PLoS One, 16(10), e0257719.

Bhatt, G. K., Patel, P. K., Kudia, R., Shah, A., & Shaikh, M. A. (2021). Contraceptive practices and its determinants among women in a rural area of Surendranagar district, Gujarat, India. International Journal of Community Medicine and Public Health, 8(1), 82-86.

Damtie, D., Yeshitila, Y. G., Tarekegn, A. A., Tsehay, K. N., & Alemayehu, D. M. (2021). Incidence and predictors of postpartum family planning utilization among postpartum women in Nekemte town, Western Ethiopia. BMC Pregnancy and Childbirth, 21(1), 1-9.

Dingeta, T., Oljira, L., & Assefa, N. (2021). Assessing the extent and factors associated with utilization of long-acting contraceptive methods among women of reproductive age group in Hossana town, southern Ethiopia: A cross-sectional study. PLoS One, 16(8), e0256489.

Global Family Planning Report. (2018). Nigeria country profile. Retrieved from https://www.who.int/docs/default-source/documents/family-planning/nigeria_country_profile.pdf?sfvrsn=4

Izugbara, C. O., Wekesah, F. M., Tilahun, T., Amo-Adjei, J., & Tsala Dimbuene, Z. (2019). Standing on their shoulders: a qualitative assessment of health system constraints and opportunities to improve access to maternal health services in rural Malawi. BMC Health Services Research, 19(1), 1-12.

Jalang'o, R., Thuita, F., Barasa, S. O., & Njoroge, P. (2017). Determinants of contraceptive use among postpartum women in a county hospital in rural KENYA. BMC Public Health, 18(1), 1-7.

Omona, W. O., Kitara, D. L., & Anyait, A. (2021). Determinants of long-acting reversible contraceptive use among women of reproductive age in Uganda. BMC Women's Health, 21(1), 1-9.

Schrumpf, L. A., Ochieng, C., Singh, K., Odoyo, J., Koskei, E., & Lally, M. A. (2020). Family planning use and fertility desires among HIV-infected and -uninfected clients attending family planning clinics in Western Kenya. PLoS One, 15(7), e0236597.

Sedgh, G., Singh, S., & Hussain, R. (2016). Intended and unintended pregnancies worldwide in 2012 and recent trends. Studies in Family Planning, 47(3), 301-314.

WHO. (2018). Postpartum family planning: for healthy births and healthy mothers. Retrieved from https://apps.who.int/iris/bitstream/handle/10665/260156/WHO-RHR-18.01-eng.pdf

WHO. (2019a). Family planning/contraception: fact sheet. Retrieved from https://www.who.int/news-room/fact-sheets/detail/family-planning-contraception

WHO. (2019b). Maternal mortality ratio (per 100 000 live births). Retrieved from https://www.who.int/data/gho/indicator-metadata-registry/imr-details/4414

World Health Organization. (2019b). Trends in maternal mortality: 2000 to 2017: estimates by WHO, UNICEF, UNFPA, World Bank Group and the United Nations Population Division. Retrieved from https://www.who.int/publications/i/item/9789241516488