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#### **ORIGINAL ARTICLE**

## Determinants of Male Involvement in Family Planning Decision making in a Rural Community in Northern Nigeria

Oyefabi A, Dambo H, Nwankwo B, Waje C, Kure S, Akabe J

Department of Community Medicine, Kaduna State University College of Medicine, Kaduna State University.

### **Keywords**

Family Planning;

Male involvement;

Consent;

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#### **ABSTRACT**

**Background:** Male involvement in family planning (FP) is most often associated with better health outcomes for the family. This study assessed male involvement in FP at Fadan Kamantan, a rural community in Zango Kataf Local Government Area of Kaduna State, North Western Nigeria.

**Methods:** This was a community-based descriptive cross-sectional study conducted among 166 married men selected using multi-staged sampling technique. A set of structured, interviewer-administered questionnaires were used to obtain information from the respondents. Data was analyzed with IBM SPSS version 23.0 and STATA/SE 12. The level of statistical significance was set at p<0.05.

**Results:** The mean age of respondents was  $38 \pm 10.7$  years. Current use of FP method by the respondents' spouses was 80 (51%). One hundred and twenty-two (77.7%) of the men gave consent for their wives to attend the FP clinics, 60 (38.2%) ever followed wives to the FP clinics, 122 (77.7%) ever initiated FP discussion with their spouses, 14 (8.9%) initiated FP discussions all the time, husbands predominantly took FP decisions 89 (56.7%). Only 97 (58.4%) had good overall scores for male involvement in FP decision making. The odds for good male involvement in FP was 27 times higher for those who had tertiary education (AOR=27.00, 95%CI=2.95-247.44) compared to those with no formal education.

**Conclusion:** The study showed that male involvement in FP was determined by educational status. The Local Government Authority should engage in health education on FP services targeted at men with lower educational status in this community.

#### Correspondence to:

Dr. A. Oyefabi Department of Community Medicine, Kaduna State University College of Medicine, Kaduna State University Email: oyefabiadegboyega@yahoo.co.uk

#### INTRODUCTION

Family planning (FP) is defined as "the ability of individuals and couples to anticipate and attain their desired number of children and the spacing and timing of their births.<sup>1.</sup> Family planning (FP) is a way of thinking and living adopted voluntarily on the basis of knowledge, attitude and responsible

decisions by individuals and couples in order to promote the health and welfare of the family and thus contribute effectively to the socioeconomic development of the country. Male involvement in family planning is the process of enabling the male spouse to engage positively with their female partners, families, and communities to make

decisions about family planning. This engagement is very essential in promoting gender equity in family planning decision making, with consequent harmony in family relationship and lessen the probability of harmful traditional beliefs and practices regarding FP.<sup>3</sup>

Women especially in low- and middle-income countries have been noted to be more involved in FP services than their male partners.<sup>4</sup> Male involvement in FP had been very minimal and a great concern for most governments and health policy makers especially in most developing countries. This occurs despite the existence of methods that require direct male involvement such as male condoms, periodic abstinence, withdrawal and vasectomy.4 Men have often times been reported as the main obstacle to better reproductive health outcomes for women and blamed for preventing women utilization of FP services or discontinuation of contraceptives.<sup>5</sup> Previous studies have shown that family planning practices in many African countries were not successful due to failure to take into account the male partners whose consents are required in most instances before a woman can access health care services due to the patriarchal nature of African families and societies.<sup>6,7</sup> In a study by Orji and others in urban and rural areas in south-western Nigeria, most of the male respondents believed that men should not accompany their wives to the family planning centres to obtain contraceptive supplies and counsellings.8 This kind of belief has had a very negative impact on the uptake of the FP services among women of reproductive age group in Nigeria. 9

Previous researches into the barriers to FP service utilization have recommended the need to look beyond physical access to examining barriers that arise from psychosocial and cultural factors. 10, 11 Most of these studies have shown that whenever men were involved in the decision-making, the outcomes were almost always better than when only women make FP decisions. 12, 13 Most of the data on male involvement in FP in Nigeria are from the southern part compared to the Northern region of the country.<sup>13,14</sup> The availability of such evidence-based studies is even worse in rural communities in Nigeria compared to the urban centres 15 Previous studies in Nigeria have shown generally high level of male awareness of FP in the country, but poor male involvement in FP services. 16-18

The poor attitude and low FP services utilization predispose women to frequent pregnancies and associated complications including high maternal mortality and poor population control. <sup>19</sup> This study therefore explored male involvement in family planning decision making and determined the factors that influenced male involvement in a rural community in Kaduna State, Nigeria.

#### **METHODOLOGY**

The Fadan Kamantan community is a rural setting in Zangon Kataf Local Government Area of Kaduna State, North Western Nigeria. <sup>20</sup> The community is the traditional centre of Anghan chiefdom and political headquarters of Kamantan ward. It has a land mass of 0.411km<sup>2</sup> and in 2020 was estimated to have a population of 1,614 persons at 3.0% annual growth rate. The community has a Primary Health Care centre and

two private clinics. These health facilities offered maternal health services including FP at the time of this survey.

The study population were married men of reproductive age group (15-59 years) who have resided in the community for more than 5 years. The estimated sample size was 166 married men calculated using the Fisher's formular for sample size calculation with p, proportion of men who had good knowledge of FP from a previous study equal to 0.89 at 95% confidence interval. The inclusion criteria were married men of reproductive age group (15-59 years) who have resided in the community for more than 5 years and were willing to participate in the study. The study excluded married men who met the inclusion criteria, but could not participate due to non-availability, ill health and those who declined participation.

Multi stage sampling technique was employed to select respondents. Stage 1: A major road that passes through the community divided it into the Eastern and western sections. There were eleven Ungwas (districts) in the community. Six Ungwas were on the West (Ugwan Rimi, Daudu, Mission, Musa and Ugwan Dan Baki) and five on the Eastern part (Ungwan Sarki, Gidan Gada, Wakili, Hausawa, Fulani and Barau). A simple random sampling technique (balloting) was used to select 2 Ungwas on the East (Barau and Sarki) and two Ungwas (Rimi and Daudu) on the western part of the community. In stage 2, the houses in each Ungwa were line listed/numbered. There were 60 houses in Ungwan Sarki, 45 houses in Ungwan Barau, 34 houses in Ungwan Rimi, and 52 houses in Ungwan Daudu. Using proportionate allocation with ratio (60:45:34:52), 160 houses were selected;

50 house in Ungwan Sarki, 38 in Ungwa Barau, 29 in Ungwan Rimi and 43 in Ungwan Daudu were selected for the study by simple random sampling. From the selected houses, there were a total of 166 households which were used for the study.

A set of structured, interviewer-administered questionnaires, were used to obtain information from the respondents. Seven questions assessed level of male involvement in FP. These questions were on: Male consent to FP services; ever followed wife to FP clinics; ever initiated FP discussions with the wife; frequency of initiation of FP discussions, perception of initiation of FP decision, who predominantly takes FP decision; and reception of feedback from the wife after attending the FP clinic. Positive response to any four of the seven questions (>50%) was adjudged good male involvement in FP. A score of <3 out of 7 (<50%) was considered poor male involvement in FP. Data entry and descriptive statistic were done using IBM SPSS Statistics Windows, Version 25.0. Bivariate analysis was done with the STATA/SE 12 (StataCorp.2011; Stata Statistical Software: Release 12, College Station, TX; Stata Corp LP). The chi-square tests were used to determine the factors associated with increased spousal uptake of FP and also male involvement in FP. A logistic regression analysis was done for the determinants of male involvement in FP decision making. The level of statistical significance was set at p < 0.05.

The primary outcome variable was male involvement in FP decision-making. The predictor variables were age, educational level, religion, ethnicity, occupation and family setting. Ethical clearance for the study was obtained from the

Barau Dikko Teaching Hospital's Ethical Clearance Committee with HREC Reference number BDTH/ MAC/GEN/134/VOL/1. The permission of the traditional ruler, the Mai Ungwas and informed written consent from the participants were obtained before data collection.

#### **RESULTS**

The mean age of the 166 respondents was  $38\pm10.7$  years. Majority were Christians 127 (76.5%), Southern Kaduna Aghan tribe 78 (47%) and had completed at least a secondary education 124 (74.7%). The respondents were mostly farmers 64

(38.6%) and traders 52 (31.3%). A greater proportion were married 164 (98.8%), and were in monogamous families 135 (81.3%). Most of the respondents 121 (72.9%) had less than five children. (Table 1)

Majority 157 (94.6%) were aware of FP, and the most known methods were injectables 137 (87.3%), condoms 135 (86.0%) and pills 135 (86.0%). The major sources of FP information were health personnel, 120 (76.4%), friends/relation 89 (56.7%), mass media 77 (49%) and social media 20 (12.7%). (Table 2)

Table 1: Socio-demographic profile of respondents

Variables	Frequency (n=166)	Percent	
Age (years)			
<40	85	51.2	
≥40	81	48.8	
Religion			
Christianity	127	76.5	
Islam	39	23.5	
Ethnicity			
Anghan ++	78	47.0	
Hausa	39	23.5	
Others	49	29.5	
Level of Education			
No formal Education	16	9.6	
Primary Education	26	15.7	
Secondary Education	74	44.6	
Tertiary Education	50	30.1	
Occupation			
Farmers	64	38.6	
Traders	52	31.3	
Civil Servants	33	19.9	
Unemployed	17	10.2	
Marital Status			
Married	164	98.8	
Widower	2	1.2	
Nature of Family			
Monogamous	135	81.3	
Polygamous	31	18.7	
Number of Children			
<5	121	72.9	
≥5	45	27.1	

 $Mean \ age \pm SD = 38 \pm 10.7$ 

<sup>++</sup> Anghan is the major language of Fadan Kamatan people

<sup>\*</sup>Others- Ikulu, Atyap, Baju, Jaba, Igbo, Yoruba

Table 2: Respondents 'awareness of family planning services in Fadan Kamanta

Variables	Frequency	Percent
Awareness of FP (n=166)	-	
Yes	157	94.6
No	9	5.4
Awareness of FP methods (n=157)		
*SARC		
Injectables	137	87.3
Condom (Male/female)	135	86.0
Pill	135	86.0
Abstinence	120	76.4
Withdrawal	116	74.0
Rhythm.	56	35.7
*LARC		
Implants	99	63.1
Sterilization (Male/ female)	34	21.7
Major sources of FP information (n=157)		
Health personnel	120	76.4
Friends and relation	89	56.7
Mass media	77	49.0
Social Media	20	12.7

<sup>\*</sup>SARC- Short acting reversible contraceptive \*LARC- Long-acting Reversible Contraceptives

Table 3: Respondents' involvement in family planning decision making in Fadan Kamanta

Variables	Frequency (n=157)	Percent
Give spouse consent for FP services		
Yes	122	77.7
No	35	22.3
Ever followed wife to FP clinics		
Yes	60	38.2
No	97	61.8
Ever initiated FP discussion with wife		
Yes	122	77.7
No	35	22.3
Frequency of initiation of FP decision		
All the time	14	8.9
Most of the time	29	18.5
Sometimes	79	503
None of the time	35	22.3
Get Feedback from wife after FP clinics		
Yes		
No	108	68.8
	49	31.2
Who predominantly takes family planning decisions?		
Husband only	89	56.7
Husband &wife	63	40.1
Wife only	5	3.2
Do you feel that men should be involved in FP decision making?		
Yes	120	
No	37	76.4
		23.6
Total score for male involvement FP		
Good	95	60.5
Poor	62	39.5

Table 4: Respondents' spousal reproductive health profile

Variables	Frequency	Percent	
Current use of FP (n=157)	)		
Yes	80	51.0	
No	77	49.0	
FP method in use (n=80)			
Implants	28	35.0	
Injections	26	32.5	
Pills	14	17.5	
Female sterilization	5	6.3	
Others*	7	8.8	
Duration of FP			
method use (n=80)			
<1yr	44	55.0	
≥1yr	36	45.0	
Place of FP services access	s		
(n=80)			
Government facilities	75	93.8	
Non-governmental	5	6.2	
Reasons for utilization of	FP services		
( <b>n=80</b> ) Fe	or spacing of		
births	60	75.0	
To prevent unwanted births	12	15.0	
To improve health status.	6	7.5	
No reason	2	2.5	

<sup>\*</sup>Others (abstinence, withdrawal, rhythm, condom)

One hundred and twenty-two (77.7%) of the men gave consent for their wives to attend the FP clinics, 60 (38.2%) ever followed their wives to the FP clinics, 122 (77.7%) ever initiated FP discussion with their spouse, 14 (8.9%), initiated FP discussions all the time, 29 (18.5%) did most of the time, while 79 (50.3%) of the men initiate FP discussions sometimes. Husbands predominantly took FP decisions 89 (56.7%), while husband and wives took FP decisions only in 63 (40.1%) of cases. Most 120 (76.4%) of the participants believed that men should be involved in FP decisions. Only 97 (58.4%) had overall good scores for male involvement in FP decision making. (Table 3)

Eighty (51%) of the respondents' spouses currently use FP method at the time of the survey. The common FP method used were implants 28 (35%), injections 26 (32.5%) and contraceptive pills 14 (17.5%). Most of the respondents' spouses 44 (55.0%) had utilized the FP method for less than one year. Higher proportion of these women 75 (93.8%) accessed FP services in government facilities. The reasons for utilization FP services in Fadan Kamatan community was for child spacing 60 (75%), to prevent unwanted births 12 (15%) and to improve health status 6 (7.5%) (Table 4). Good male involvement increased significantly with increasing level of education from 2 (14.3%) among those with no formal education to 44 (88%) among those with tertiary education. ( $\chi^2 = 31.4$ , p= 0.001) The bivariate analysis further showed that Christians 81 (66.4%) significantly had good male

Table 5: Association between respondents' characteristics and their involvement in family planning decision making

Variable	Involvement		Chi square	p- value
	Good (n=95)	Poor (n=62)	•	1
	n (%)	n (%)		
Age (years)				
<40	50 (63.3)	29 (36.7)	0.52	0.47
≥40	45 (57.7)	33 (42.3)		
Religion				
Christianity	81 (66.4)	41 (33.6)	7.93	0.005***
Islam	14 (40.0)	21 (60.0)		
Level of Education	, ,	, ,		
No formal education	2 (14.3)	12 (85.7)	31.40	0.001***
Primary	11 (45.8)	13 (54.2)		
Secondary	38 (55.1)	31 (44.9)		
Tertiary	44 (88.0)	6 (12.0)		
Occupation				
Farmer	28 (45.9)	33 (54.1)	17.88	0.002***
Trader	26 (55.3)	21 (44.7)		
Civil Servant	28 (87.5)	4 (12.5)		
Unemployed	13 (76.5)	4 (23.5)		
Ethnicity				
Hausa-Fulani	18 (54.5)	15 (45.5)	1.62	0.45
Anghan	70 (60.9)	45 (39.1)		
Others	7 (77.8)	2 (22.2)		
<b>Marital Status</b>				
Married	93 (57.9)	62 (42.1)	1.32	0.52
Widower	2 (100.0)	0 (0.0)		(Fisher exact)
Nature of Family				
Monogamous	79 (61.7)	49 (38.3)	0.42	0.52
Polygamous	16 (55.2)	13 (44.8)		

<sup>\*\*\*</sup> Statistically significant

Table 6: Determinants of male involvement in family planning decision making

Variable	AOR	95% CI	p-value	
Religion				
*Islam	1.0		1	
Christianity	0.70	0.27-1.81	0.46	
Level of education				
*None	1.0			
Primary	4.09	0.67-24.10	0.13	
Secondary	5.62	1.03-30.62	0.04	
Tertiary	27.00	2.95-247.44	0.004	
Occupation				
*Farmer	1.0			
Trader	0.74	0.33-1.64	0.46	
Civil Servant	0.85	0.17-4.13	0.84	
Unemployed	0.96	0.21-4.36	0.96	

 $<sup>*</sup>Reference\ category$ 

involvement in FP compared to Moslems 14 (40%),  $(\chi^2 = 7.93, p = 0.005)$ . The civil servants 28 (87.5%) and the unemployed 13 (76.5%) also had good male involvement in FP compared to farmers 25 (45.9%) and traders 26 (55.3%), and this was statistically significant,  $\chi^2 = 17.88$ , p=0.002. (Table 5) However multivariate logistic regression revealed that the odds of the respondents having good involvement in FP decision making was 27 times higher for those who had tertiary education (AOR=27.00, 95%CI=2.95-247.44, p=0.004), 5.6 times higher for those who attained secondary The awareness was especially higher for FP injections, condoms and oral pills. The increasing awareness of injectable and other short acting reversible contraceptives might be due to increased acceptance and utilization of these contraceptive However, it is worth noting that a devices. previous study conducted in Indonesia showed that the rate of terminations of the use of short-acting reversible contraceptives (SARC) such as the injectables were also very high compared to long acting reversible contraceptive (LARC) devices such as the implant or intra uterine contraceptive devices (IUCD). <sup>23</sup> The SARC has been shown in previous studies conducted in Indonesia<sup>23</sup> and Uganda<sup>24</sup> to be less efficient than the LARC because a client can skip a treatment for socioeconomic or other logistic reasons, which can result in unintended pregnancy and sequel complications of high-risk pregnancy including maternal death. One third of the women in this study use the injectable contraceptive which was lower than a previous report which revealed a high rate of utilization of the injectable contraceptives (60.5%) among women of reproductive age group

education (AOR=5.62, 95%CI=1.03-30.62, p=0.04) and 4 times higher for those with primary education (AOR= 4.09, 95% CI=0.67-21.10, p=0.13) compared to men with no formal education. (Table 6)

#### **DISCUSSION**

In this study, majority of the respondents (94.6%) were aware of FP services. This corroborates the findings of the 2018 Nigeria Demographic Health Survey which showed that nine in every ten men in Nigeria were aware of the FP services. <sup>22</sup>

in four rural Local Government Areas in Ibadan, southern Nigeria  $^{25}$ 

Majority of the men in this study were aware of the withdrawal methods of contraception. Coitus interruptus (withdrawal method) is a readily available and cheap FP strategy. It does not require medical or surgical procedures but the failure rate is high.<sup>26</sup> This can lead to high unmet need for family planning, increased risk of sexually transmitted infections, high risk and unplanned pregnancy, increased maternal mortality and socioeconomic difficulties of caring for more children than the family can cope with. <sup>27</sup> Though one out every five respondents were aware of sterilization method of FP, only 5 (6.3%) women had ever used this permanent method of contraception in the community for child limiting. Previous studies from Abuja<sup>28</sup> and Jos<sup>29</sup> in North central Nigeria, showed that sterilization was among the least utilized contraceptive method in Nigeria due to the cultural restrictions of such practices.

Most of the men in this study gave their spouses consent to access of FP services, which is a welcome development in this rural community. This is contrary to previous report in most settings in northern Nigeria where there was high level of male partner disapproval of the FP practices due to sociocultural factors. <sup>30-31</sup>. Spousal consent for FP will result in higher uptake of these services: <sup>31</sup>This means that if the health system is strengthened to respond maximally to the FP need of this community, the women will have less of high-risk pregnancies, couples will take decisions to bear the number of children they can cater for, with consequent less pressure on the health system and other social infrastructures. This will consequently impact highly on the quality of life of these women, their families, the community and the state. <sup>31</sup>

This study also found that men with higher education tend to be more supportive to their wife's utilization of FP services. The finding is in keeping with findings of most previous studies reviewed. 32-33 Studies have shown that men with tertiary education had better access to health information and therefore utilizes the health services more than men with lower educational status.<sup>33,34</sup> Higher education provides better access to health information through varied electronic, print, and social media. 35Continuous Access to quality health information is a driver to making informed decision about utilization of health services.<sup>36</sup> Inter-spousal communications in this study were also good. This was reflected in proportion of men who had ever initiated FP discussions with their wives. Communication between spouses about utilization of FP services is an important intermediate step on the path to eventual adoption and sustained use of FP services.37-38

**Limitation:** This study was based on verbal reports from the male participants who gave FP

information about themselves and their spouses. This might be liable to information bias due to participant self-reporting and recall ability.

Conclusion: Overall, male involvement in FP in this study was good. The determinant of male involvement in FP in this study was educational status. Men with higher education tend to be more supportive to their wives' utilization of FP services. This emphasizes the need for sustained FP sensitization and health education program targeted at men with lower formal educational status.

Recommendations: The authors recommend improved community mobilization and health education on the benefit of FP services targeted at men with no formal education and those with lower educational status in this community. The Fadan Kamatan Local Government Authority in collaboration with other health development stakeholders in the locality need to engage and empower the community health workers in this community to do this.

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