

Research Article

Should fathers witness childbirth? A survey of attitudes of expectant mothers attending a tertiary hospital in Kano, northern Nigeria

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Keywords: attitudes, women, childbirth, partners' involvement, Nigeria

<https://doi.org/10.29392/001c.124037>

Journal of Global Health Reports

Vol. 8, 2024

Background

Increased paternal involvement during childbirth can enhance maternal and neonatal outcomes. However, in resource-constrained settings, cultural and health system factors often hinder the involvement of fathers in the birthing process. This study aimed to identify the factors influencing antenatal clients' attitudes toward their partner's presence during childbirth in northern Nigeria.

Methods

We administered a pre-tested, culturally adapted questionnaire to antenatal clients at a tertiary health facility (n=351). Attitudinal scores were measured on a Likert scale, and logistic regression was used to compute adjusted odds ratios (aORs) for predictors.

Results

Only 15.4% of respondents agreed or strongly agreed with the presence of their male partner during childbirth. Women opposed or strongly opposed the suggestion that their partner's presence provided emotional support (35.9% and 59.8%, respectively), reduced labor pain perception (45.1% and 33.1%, respectively), strengthened the couple's relationship (40.2% and 52.7%, respectively), or enhanced father-child bonding (32.3% and 46.6%, respectively). More than half of the respondents (57.0%) strongly disagreed that their partner's presence enhanced paternal responsibility. Rather, the presence of the partner was considered unhelpful (49.3%), culturally unacceptable (37.9%), and against religious rulings (51.6%). Younger maternal age (<30 years, aOR=7.6, 95% CI=2.12-14.40) and higher parity (>5 children, aOR=2.08, 95% CI=1.21-8.38) were associated with a more positive attitude towards the presence of the father during labor.

Conclusions

Most women did not favor having their partners present during childbirth. Policymakers and healthcare providers should integrate cultural sensitivity considerations into guidelines and initiatives that promote male involvement in childbirth in similar settings.

Labor and childbirth are profound experiences for women, necessitating psychological support, traditionally provided by experienced women in many cultures.¹ In most developing countries, cultural norms limit men's involvement in childbirth, with their role typically ending at the labor ward entrance.² Conversely, in industrialized countries, fathers are increasingly present in the labor room, providing support during delivery.³ This involvement has

been associated with enhanced maternal well-being, improved father-child bonding, and positive outcomes for child development.^{4,5}

Despite the recognized benefits of paternal involvement, cultural and health system barriers in developing countries, including northern Nigeria, often prevent fathers from participating in the birthing process.⁶ Attitudes in this region are deeply rooted in cultural and religious norms.⁷ In

northern Nigeria, traditional gender roles assign distinct responsibilities to men and women, with men seen as providers and protectors, while childbirth is considered a woman's domain.⁸ The concept of modesty further discourages male presence during childbirth due to the intimate exposure involved, which is culturally and religiously sensitive.^{9,10} Local customs also reinforce these norms by upholding childbirth as a private event typically attended only by women.¹¹

These factors contribute to strong resistance to paternal involvement in childbirth, driven by fears of violating cultural and religious expectations. Moreover, many health-care facilities do not permit companions during childbirth due to a lack of supportive policies, negative attitudes among healthcare providers, and insufficient privacy measures, such as the absence of curtains and inadequate provisions for companions' comfort. Increasing fathers' participation requires addressing these deeply held beliefs through community engagement, involving religious leaders, and tackling challenges within the health system.^{2,7} While some Nigerian studies indicate that women value their spouse's presence for psychological support during labor,¹²⁻¹⁵ this has not been thoroughly examined in the culturally conservative northern region.

This study aims to assess the attitudes of expectant mothers towards their partners' presence during childbirth in a tertiary hospital in Kano, northern Nigeria, and identify the predictors of these attitudes. Understanding these factors is crucial for designing interventions that could improve paternal involvement, potentially enhancing maternal and neonatal outcomes in this context.

METHODS

SETTING/STUDY POPULATION

This study was conducted at Aminu Kano Teaching Hospital (AKTH), Kano, Nigeria, a 550-bed tertiary hospital with a catchment population exceeding 13 million people.¹⁶ The study population consisted of antenatal clinic attendees from Kano and neighbouring states. The clinic operates four days a week, with an average daily attendance of 180 women. While some men accompany their spouses, the clinic does not provide specific provisions for them.

STUDY DESIGN AND SAMPLING

This cross-sectional study involved a sample size of 370 pregnant women, calculated using Fisher's formula, assuming a 32% prevalence of positive attitudes towards partner presence during labor from previous studies. The power analysis assumed a type 2 error rate (β) of 20% or power of 80%, a type 1 error rate of 5%, and accounted for a 10% non-response rate.

Systematic sampling was used to recruit participants as they arrived for antenatal care. After registration, sequential serial numbers were assigned to each participant. The sampling interval was determined based on the average attendance and the sample size. The first respondent was

chosen by selecting a random number between 1 and the sampling interval, followed by inviting every *n*th woman to participate. Informed consent was obtained from all participants, and ethical clearance was granted by the AKTH Health Research Ethics Committee.

STUDY INSTRUMENT AND DATA COLLECTION

Data were collected using a pretested, structured, interviewer-administered questionnaire adapted from previous studies.^{17,18} The questionnaire was culturally adapted through translation into Hausa, with back-translation to ensure accuracy. Content validity was confirmed by specialist obstetricians, and reliability was verified with a Cronbach's alpha of 0.83. The questionnaire assessed socio-demographic characteristics and attitudes toward fathers' presence during childbirth, using a five-point Likert scale.¹⁹ Attitude items included both positive and negative statements to reduce social desirability bias, with scores ranging from strongly agree (+2) to strongly disagree (-2). Total scores were aggregated to classify attitudes as positive or negative, with the median score as the threshold.²⁰ The cultural adaptation process involved ensuring that the language and content were culturally sensitive and relevant to the local context.

Pre-testing was conducted on a 10% sample of pregnant women at a different hospital to refine the instrument. Experienced female interviewers, fluent in Hausa and familiar with the cultural context, administered the questionnaires.

DATA ANALYSIS

Data from the questionnaires were entered and analyzed in SPSS v.22 (SPSS Inc., Chicago, IL).²¹ Continuous variables were summarized using mean \pm standard deviation or median and range, depending on the distribution. Categorical data were presented as frequencies and percentages. At bivariate level, Pearson's chi-square or Fisher's exact test was used to test for significant associations, with a $p < 0.05$ considered significant. Using dichotomized attitude (positive or negative) towards partners' presence in the labor room as outcome variable, a logistic regression model was loaded and fitted with variables that had $p < 0.10$ at bivariate level and conceptually important variables, irrespective of significance.²² Adjusted Odds Ratios (AOR) and Confidence Intervals (95% CI) measured the predictive strength of independent variables. All tests of hypothesis were two-tailed, with a type 1 error rate set at 5%.

RESULTS

SOCIODEMOGRAPHIC CHARACTERISTICS

Out of 370 women approached, 351 (94.9%) completed the interviews. The average age of respondents was 29 years (SD \pm 7.12), with the majority being of Hausa/Fulani ethnicity (93.7%), Muslim (97.2%), and married (96.6%). Most respondents (86.0%) and their partners (89.5%) had at least a secondary education. Nearly half (47.9%) were in the sec-

ond trimester of pregnancy, while the rest (52.1%) were in the third trimester.

ATTITUDE OF WOMEN TOWARDS MEN'S PRESENCE AT CHILDBIRTH

Only 15.4% of expectant mothers supported the idea of male partners witnessing childbirth, with nearly half (45.9%) strongly opposing it. The majority of respondents felt that the presence of male partners would not provide emotional support (59.8% strongly disagreed), reduce pain perception (33.1% strongly disagreed), or strengthen the couple's relationship (52.7% strongly disagreed). Many believed that men's presence could be psychologically distressful (58.1%) and exacerbate the woman's anxiety (43.0%). Cultural and religious beliefs were also significant barriers, with 37.9% and 51.6% of respondents, respectively, viewing men's presence in the labor room as culturally inappropriate or religiously forbidden (Table 2).

PREDICTORS OF ATTITUDE TOWARDS MEN'S PRESENCE IN THE LABOR ROOM

At bivariate level, positive attitude towards the presence of the male partner during childbirth was significantly associated with respondent's age only ($p < 0.05$). However, at the multivariate level, age and parity were significant predictors of a positive attitude towards men's presence during childbirth. Younger women, particularly those under 20 years of age, were more likely to support male partners in the labor room, being over seven times more likely to have a positive attitude compared to women aged 40 and above (adjusted odds ratio, aOR=7.6, 95%CI=2.12-14.40). Similarly, women in their twenties were more than three times as likely to favor their partner's presence compared to older women (aOR=3.44, 95%CI=1.18-15.29). In addition, women with five or more children were twice as likely to accept their partner's presence during childbirth relative to first-time mothers (aOR=2.08, 95%CI=1.21-8.38) (Table 3).

DISCUSSION

Our study revealed a strong cultural resistance among predominantly Hausa expectant mothers in northern Nigeria to having their male partners present during childbirth. The majority of women did not expect their partners to be in the labor room, citing concerns that men's presence could cause psychological distress, anxiety, and distraction, rather than offering emotional support. They also expressed that male presence during childbirth contradicted cultural and religious norms.

In contrast, studies from southern Nigeria indicate a more favorable attitude towards paternal involvement. For instance, research from Ibadan and Oshogbo showed that a significant proportion of women in the south prefer male partners as companions during labor, citing emotional and practical support as key reasons.^{14,15} Similarly, studies from southeastern Nigeria have highlighted more progressive attitudes towards male participation, with women showing a higher acceptance of their partners in labor and

Table 1. Sociodemographic and obstetric characteristics of respondents, Kano, Nigeria.

Characteristics	Frequency No. (%) N=351
Age group	
<20	14 (4.0)
20-29	167 (47.6)
30-39	105 (29.9)
≥40	65 (18.5)
Ethnicity	
Hausa	259 (73.8)
Fulani	70 (19.9)
Others	22 (6.3)
Religion	
Islam	341 (97.2)
Christianity	10 (2.8)
Education	
No formal	29 (8.3)
Primary	20 (5.7)
Secondary	108 (30.8)
Post-Secondary	194 (55.2)
Marital status	
Married	339 (96.6)
Divorced	11 (3.1)
Widowed	1 (0.3)
Type of marriage	
Monogamous	272 (77.5)
Polygamous	79 (22.5)
Occupation	
Homemaker	109 (31.1)
Trading	90 (25.6)
Civil servant	131 (37.3)
Others	21 (6.0)
Parity	
0	46 (13.1)
1-4	237 (67.5)
≥5	68 (19.4)
Gestational age (weeks)	
≤12	2 (0.6)
13-28	168 (47.9)
29-40	183 (52.1)
Husband's education	
No formal	20 (5.7)
Primary	17 (4.8)
Secondary	58 (16.6)
Post-Secondary	256 (72.9)

Table 2. Attitudes towards partners' presence during labor, Kano, Nigeria.

Statement regarding partner's presence in labor room	Strongly Agree No. (%)	Agree No. (%)	Undecided No. (%)	Disagree No. (%)	Strongly disagree No. (%)
1. Is acceptable since observing childbirth is one of the most important moments in life	11 (3.1)	43 (12.3)	23 (6.6)	114 (32.7)	160 (45.9)
2. Will provide emotional support to the mother	2 (0.6)	7 (2.0)	6 (1.7)	126 (35.9)	210 (59.8)
3. Will provide the mother the opportunity to express her problems to a familiar person	8 (2.3)	12 (3.4)	20 (5.7)	136 (39.0)	175 (50.1)
4. Will increase the husband's sympathy and gratitude towards his wife	7 (2.0)	7 (2.0)	9 (2.6)	117 (33.3)	211 (60.1)
5. Will allow the husband to share the pain of delivery with his wife	5 (1.4)	25 (7.2)	19 (5.4)	116 (33.2)	186 (53.3)
6. Will prepare the husband to accept his paternal responsibility	9 (2.6)	11 (3.1)	16 (4.6)	115 (32.8)	200 (57.0)
7. Will strengthen the couple's relationship	7 (2.0)	5 (1.4)	13 (3.7)	141 (40.2)	185 (52.7)
8. Will decrease the mother's anxiety	27 (7.7)	52 (14.9)	41 (11.7)	133 (38.1)	98 (28.1)
9. Will help the mother bear labor pain	20 (5.7)	29 (8.3)	27 (7.7)	158 (45.1)	116 (33.1)
10. Will have a positive effect on father-child relationship	21 (6.0)	15 (4.3)	38 (10.9)	113 (32.3)	163 (46.6)
11. Is not helpful to the mother	54 (15.4)	119 (33.9)	34 (9.7)	95 (27.1)	49 (14.0)
12. May lead to psychological distress in the husband	78 (22.2)	126 (35.9)	32 (9.1)	78 (22.2)	37 (10.5)
13. May transfer the husband's anxiety to the mother	48 (13.7)	103 (29.3)	56 (16.0)	87 (24.8)	57 (16.2)
14. Is not a good idea as the delivery room is not suitable for men	44 (12.6)	112 (32.0)	36 (10.2)	107 (30.6)	52 (14.9)
15. Will be unpleasant for the mother	51 (14.5)	119 (33.9)	42 (12.0)	99 (28.2)	40 (11.4)
16. Is the husband's duty	32 (9.1)	80 (22.8)	49 (14.0)	147 (41.9)	43 (12.3)
17. Will decrease the husband's anxiety	32 (9.1)	90 (25.6)	60 (17.1)	131 (37.3)	38 (10.8)
18. Will not be tolerable for the husband	44 (12.5)	114 (32.5)	65 (18.5)	105 (29.9)	23 (6.6)
19. Is against our culture	36 (10.3)	97 (27.6)	33 (9.4)	149 (42.5)	36 (10.3)
20. Will be frightening in the case of a complicated delivery	33 (9.4)	91 (25.9)	29 (8.3)	132 (37.6)	66 (18.8)
21. Not allowed by our religion	62 (17.7)	119 (33.9)	30 (8.6)	105 (29.9)	35 (10.0)
22. Can only happen in a private ward	43 (12.3)	57 (16.3)	11 (3.1)	98 (28.0)	142 (40.6)

delivery settings.^{12,13,23} For instance, a study reported nearly two-thirds (63.9%) of male partners were present during their spouse's last childbirth.²⁴ This variation underscores the impact of regional cultural and religious norms on attitudes towards paternal involvement in childbirth.

This resistance is deeply rooted in the cultural and religious context of northern Nigeria, where traditional gender roles are strictly adhered to. In this region, childbirth is often viewed as a female-only domain,^{7,25} with men playing a more detached role in the birthing process. This cultural perspective is reinforced by religious beliefs that emphasize modesty and privacy for women during childbirth, making the presence of men, even husbands, seem inappropriate.⁷ Unlike in more urbanized or southern regions of Nigeria, where exposure to different cultural practices and the influence of global trends may have led to more progressive

attitudes towards male involvement,^{23,26} northern Nigeria remains more conservative in this regard.

The implications of these findings are significant for efforts to promote male involvement in maternal health in northern Nigeria. Health education programs must be sensitive to these cultural and religious norms. Strategies to increase male participation should focus on educating both men and women about the potential benefits of male support during childbirth,²⁷ while also respecting cultural sensitivities. Engaging religious and community leaders as advocates for change could also be instrumental in shifting these deeply ingrained beliefs.

Our study underscores the importance of healthcare providers offering flexible options that respect the cultural preferences of women in this region. For instance, private delivery rooms where men can be present without compromising the privacy of other women in labor could be a viable solution.²⁸ Additionally, encouraging male involve-

Table 3. Logistic regression model for predictors of positive attitudes to partner's presence in the labor room, Kano, Nigeria.

Characteristics	N	Positive attitude, * n (%)	Crude Odds Ratio (95% CI)	Adjusted Odds Ratio (95% CI)†	P-value
Age group		<i>p</i> =0.027			
<20	14	6 (42.9)	6.94 (1.58-30.41)	7.6 (2.12-14.40)	0.012‡
20-29	191	28 (14.7)	1.59 (1.05-5.31)	3.44 (1.18-15.29)	0.033‡
30-39	105	16 (15.2)	1.66 (0.52-5.31)	1.65 (0.44-6.20)	0.34
≥40	41	4 (9.8)	Reference		
Parity		<i>p</i> =0.20			
0	46	7 (15.2)	Reference		
1	72	13 (18.1)	1.23 (0.45-3.35)	1.78 (0.57-5.55)	0.53
2-4	165	19 (11.5)	0.73 (0.28-1.85)	1.18 (0.36-3.91)	0.64
≥5	68	15 (22.0)	1.58 (1.10-4.23)	2.08 (1.21-8.38)	0.025‡
Education		<i>p</i> =0.12			
No formal	29	5 (17.2)	Reference		
Primary/Secondary	128	26 (20.3)	1.22 (0.43-3.52)	1.34 (0.42-4.31)	0.71
Post-Secondary	194	23 (11.9)	0.65 (0.22-1.86)	1.01 (0.31-3.31)	0.43
Partner's age		<i>p</i> =0.08			
<30	31	8 (25.8)	Reference		
30-39	128	14 (10.9)	0.35 (0.13-0.94)	0.77 (0.21-2.84)	0.38
40-49	118	23 (19.5)	0.70 (0.28-1.75)	1.72 (0.41-7.16)	0.27
≥50	74	9 (12.2)	0.40 (0.14-1.15)	1.04 (0.20-5.40)	0.14
Partner's education		<i>p</i> =0.10			
No formal	31	8 (25.8)	Reference		
Primary/secondary	64	12 (18.8)	0.66 (0.24-1.84)	0.46 (0.15-1.42)	0.53
Post-secondary	256	34 (13.3)	0.44 (0.18-1.06)	0.40 (0.15-1.10)	0.32

*To the presence of male partner in the labor room during childbirth.

†Logistic model includes the following variables: age group, parity, education, partner's age and partner's education; CI – confidence interval.

‡Significant at *P*<0.05

ment during antenatal care may better prepare them for participation during labor. This gradual engagement could be a more culturally acceptable approach to enhancing men's involvement in childbirth.

The association of younger maternal age with a more favorable attitude towards male presence during childbirth suggests that there is potential for gradual change in these attitudes over time. Younger women, who are more exposed to global trends and digital information, may be more open to new ideas and less bound by traditional norms. This generational shift could be harnessed by targeting younger couples with educational campaigns that highlight the positive impact of male involvement in childbirth.

This study employed a cross-sectional survey design to quantitatively assess the attitudes of expectant mothers towards paternal presence during childbirth. The survey approach was chosen for its ability to capture a broad range of attitudes across a significant sample size, providing generalizable data that can inform policy and programmatic decisions. While qualitative interviews or an explanatory mixed methods design could have offered deeper insights into the complexities of these attitudes, the study was con-

strained by limited resources, which precluded a more comprehensive approach at this stage.

The findings may not be generalizable to all women in northern Nigeria due to the sample's predominance of Hausa/Fulani and Muslim participants, and the focus on a single, better-educated group from one tertiary center. Women from different ethnic, religious, and educational backgrounds, especially those in rural areas, may hold different views. Future research should include a broader range of ethnic, religious, and socio-economic groups across multiple centers to better understand the barriers to male involvement in childbirth.

The research team recognizes the value of exploring these attitudes further through qualitative methods. To this end, a separate detailed qualitative study is planned, aimed at providing richer context and deeper understanding of the cultural and personal factors influencing these attitudes.

CONCLUSIONS

Our study revealed significant cultural resistance in Kano, northern Nigeria, toward male partners' presence during

labor due to deep-seated cultural and religious beliefs. To address this, targeted education should dispel misconceptions, while maternity wards should provide clear guidelines for optional involvement of fathers in the birthing process. Healthcare facilities should first establish policies supporting labor companionship, including training healthcare workers and managers on its benefits and how to integrate companions into the care team.²⁹ Effective implementation also involves raising awareness about the benefits, addressing health workers' concerns, offering orientation sessions, and optimizing facility infrastructure to ensure privacy and comfort. Future research should explore men's willingness and experiences, and health care worker attitudes toward male participation in childbirth.

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ACKNOWLEDGEMENTS

We wish to thank the study participants for making this study possible.

ETHICS STATEMENT

Ethics approval was obtained from the Aminu Kano Teaching Hospital Research Ethics Committee (FWA00026225).

DATA AVAILABILITY

Data can be made available on a case-by-case basis and in strict accordance with Nigeria data privacy rules.

FUNDING

This work is supported by the Fogarty International Center (FIC) and the National Institute on Alcohol Abuse and Al-

coholism of the U.S. National Institutes of Health, award number 1D43TW011544. The findings and conclusions are those of the authors and do not necessarily represent the official position of the FIC, NIAAA, NIH, the Department of Health and Human Services, or the government of the United States of America.

AUTHORSHIP CONTRIBUTIONS

HG, SJ, TA and ZI conceived the study; HG, FY, ZI, TA, HS and MA designed the study protocol; ZI, HG, TA, and SJ supervised data collection; ZI, RA, and TA analysed the data. All authors participated in drafting the manuscript and critical review of the article; ZI, FY, RA, HS and MA finalized the manuscript; ZI is the guarantor of the paper; all authors approve the final version of the manuscript.

DISCLOSURE OF INTEREST

The authors completed the ICMJE Disclosure of Interest Form (available upon request from the corresponding author) and disclose no relevant interests.

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Submitted: July 13, 2024 BST, Accepted: September 12, 2024
BST



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