



Knowledge, Perception and Acceptance of Cesarean Section among Pregnant Women at Cottage Hospital, Ilorin, Kwara State

Olayinka Idayat Sulyman

Al-Hikmah University, Faculty of Nursing Sciences,
Adewole Estate, Adeta Road, Ilorin, Kwara State, Nigeria

Corresponding Author: Sulyman, O. I.

Corresponding Email: olayinkasulyman4@gmail.com

Article info

Article history:

Submitted: December 3, 2025

Accepted: February 17, 2026

Published: March 30, 2026

Recommended citation:

Sulyman, O. I. (2026). Knowledge, Perception and Acceptance of Cesarean Section among Pregnant Women at Cottage Hospital, Ilorin, Kwara State. *Bayero Journal of Nursing and Health Care*, 8(1): 1860-1870

Abstract

Background: Cesarean section is a common obstetric surgical procedure that has contributed significantly to the reduction of maternal and neonatal mortality. However, its acceptance remains low in many developing countries due to cultural beliefs, fear, and misconceptions. This study aimed to assess the knowledge, perception, and acceptance of cesarean section among pregnant women attending Cottage Hospital, Ilorin, Kwara State, and to determine the socio-cultural and demographic factors influencing its acceptance. **Methods:** A descriptive cross-sectional study was conducted among 109 pregnant women attending antenatal clinics at Cottage Hospital, Adewole, Ilorin, Kwara State. Data were collected using a structured questionnaire and analysed using SPSS version 23. Descriptive statistics, including frequencies and percentages, were used to summarise the data, and results were presented in tables. **Results:** The majority of respondents (89.2%) were aware of cesarean section, mainly through healthcare providers. While 59.5% preferred vaginal delivery, 66.7% were willing to accept cesarean section if medically indicated. Fear of surgery, cost, recovery time, and cultural beliefs were the major factors influencing acceptance of cesarean section. Cultural beliefs appeared to influence perceptions of cesarean section, whereas level of education did not appear to affect acceptance. **Conclusion:** Awareness of cesarean section among pregnant women attending Cottage Hospital was high; however, preference for vaginal delivery remained common. Acceptance of cesarean section increases when the procedure is medically recommended, but fear of surgery and socio-cultural beliefs continue to influence perceptions and decision-making. Strengthening targeted antenatal education and culturally sensitive counselling may improve informed acceptance of cesarean section when clinically indicated.

Keywords: Knowledge; Perception; Acceptance; Cesarean Section; Pregnant Women; Cultural Beliefs

<https://dx.doi.org/10.4314/bjnhc.v8i1.7>

Introduction

Maternal mortality remains a major concern in Nigeria, contributing significantly to the global burden. Nigeria recorded the highest total number of maternal deaths in Africa, with an estimated 82,000 deaths accounting for 28.5% of the global total (WHO, 2023;

Nigeria Health Watch, 2024). Although countries like Chad (1,063 per 100,000) and South Sudan (1,223 per 100,000 live births) recorded higher maternal death rates, Nigeria's large population means the absolute number of maternal deaths is the highest in the world.

Over the past few decades, the world average of cesarean deliveries has risen greatly from about 7% in 1990 to 21% today, far exceeding the World Health Organisation's recommended range of 10–15%. This upward trend is expected to continue, with projections suggesting a global CS rate of 28.5% by 2030 (Betran *et al.*, 2021; Angolile *et al.*, 2023). However, there are striking disparities in access to cesarean sections across regions. In many developed and middle-income countries, CS rates are alarmingly high. For instance, nearly 43% of childbirths in the Caribbean and Latin America are delivered via cesarean section. In countries such as Brazil, Cyprus, Egypt, the Dominican Republic, and Turkey, surgical deliveries have overtaken normal delivery. Conversely, access remains limited in lower-income regions. In sub-Saharan Africa, only around 5% of births are through CS (WHO, 2021).

In Nigeria, the overall cesarean section prevalence is 2.7%. Urban areas report a higher rate (5.2%) compared to rural areas (1.2%). Regionally, the North-West region has the smallest prevalence, with a total of 0.7%, 1.5% in urban areas, and 0.4% in rural areas. On the other hand, cesarean section rates are higher in the southern regions, with the South-West recording the highest overall rate at 7.0% and 3.3% in rural areas, while the South-South region records the greatest occurrence in urban areas at 8.5% (Adewuyi *et al.*, 2024). Despite the need, many women in sub-Saharan Africa remain reluctant to undergo cesarean delivery. This reluctance is often influenced by cultural beliefs that associate vaginal birth with strength and virtue, while viewing the cesarean section

as a sign of weakness or failure. Such perceptions create a strong social stigma around CS, even when it is medically necessary (Roudsari *et al.*, 2015). Several factors affect the acceptance of cesarean delivery. Limited knowledge and poor perception of CS, especially among women in rural areas, contribute significantly to its low uptake. Women who attend antenatal care regularly are more likely to accept CS compared to those who do not (Adewuyi *et al.*, 2019; Amiegheme *et al.*, 2017). Maduka and Enaruna (2021) found that 46% of women refused a repeat CS due to fears of pain, death, and being seen as a failure. Concerns such as religious beliefs, stigma, cost, healthcare workers' attitudes, and hospital protocols also discourage CS use, contributing to higher maternal death and complication rates.

Although knowledge, perception, and acceptance of cesarean section have been widely studied in Nigeria, most available evidence is derived from tertiary hospitals and large urban populations, where access to specialist care and health information is relatively higher. These findings may not adequately reflect the experiences of women attending lower-level public health facilities, where antenatal counselling practices, resource availability, and socio-cultural influences differ. Cottage Hospital, Adewole, functions as a primary healthcare facility serving a predominantly community-based population in Ilorin West Local Government Area. Understanding how women in this setting perceive and accept cesarean section is important for identifying context-specific barriers that may not be captured in large quantitative studies conducted in tertiary centres. This

study therefore provides locally relevant evidence to inform antenatal education and counselling strategies aimed at improving informed decision-making and maternal outcomes in similar primary healthcare settings.

Materials and Methods

This study used a descriptive cross-sectional survey design to investigate the knowledge, perception, and acceptance of cesarean sections among pregnant women at Cottage Hospital, Adewole, Ilorin, Kwara State. A sample of 109 respondents was selected using the Taro Yamane formula (1967) for sample size calculation, within an error range of 0.05 at a confidence level of 95%. A simple random sampling technique was used to ensure everyone had an equal chance of being selected.

Data were collected using a structured questionnaire consisting of four sections: socio-demographic profile, knowledge of cesarean sections, perception of cesarean sections, and acceptance of cesarean

sections. The questionnaires were administered in person during prenatal visits, with respondents assured of confidentiality. Data collection was completed within one week.

Data analysis was done using SPSS (Statistical Package for the Social Sciences) version 23. Basic statistical measures, including frequencies, percentages, and means, were employed to describe demographic data and results were presented in tables.

Ethical clearance for this study was obtained from the Ethical Committee of Cottage Hospital, Adewole, Ilorin, Kwara State. As this committee functions as the hospital's ethics oversight body, no formal reference number was issued. Participation was voluntary, informed consent was obtained from all respondents, and confidentiality was maintained throughout the study. Permission to conduct the study was also obtained from the Medical Officer in Charge.

Results**Table 1: Demographic Characteristics of the Respondents (n= 109)**

Variables	Frequency	Percentage (%)
Have you heard about cesarean sections?		
Yes	99	89.2
No	10	9.0
How did you learn about cesarean sections?		
Healthcare provider	73	65.2
Family/Friends	18	16.2
Media (TV, internet, etc.)	12	10.8
All the above	6	5.4
What do you think are common reasons for having a cesarean section?		
Fetal distress	28	25.2
Maternal health issues	47	42.3
Multiple pregnancies	8	7.2
None of the above	3	2.7
All the above	23	20.7
What are the potential risks associated with cesarean sections?		
Infection	18	16.2
Longer recovery time	51	45.9
Complications in future pregnancies	16	14.4
Infection, Longer recovery time, and Complications in future	16	14.4
None of the above	7	6.3
All the above	1	9
What benefits do you believe cesarean sections provide?		
Safer delivery for the baby	59	53.2
Reduced labour pain	26	23.4
More control over delivery time	12	10.8
None of the above	2	1.8
All the above	10	9

Table 1 shows that most respondents (63.1%) were aged 25–34 years, followed by those aged 18–24 years (23.4%) and 35–44 years (11.7%). Regarding educational level, most respondents (67.6%) had tertiary education, while 27.9% had secondary education and 2.7% had primary education. In terms of

occupation, 48.6% of the respondents were self-employed, 21.6% were employed, 14.4% were students, and 13.5% were unemployed. Furthermore, most respondents were married (91.9%), while 2.7% were single and 3.6% were widowed.

Table 2: *Knowledge about Cesarean Section*

Variables	Frequency	Percentage (%)
Age in years		
18-24	26	23.4
25-34	70	63.1
35-44	13	11.7
Religion		
Christianity	26	23.4
Islam	83	83
Education Level		
Primary	3	2.7
Secondary	31	27.9
Tertiary	75	67.6
Occupation		
Employed	24	21.6
Unemployed	15	13.5
Student	16	14.4
Self Employed	54	48.6
Marital Status		
Single	3	2.7
Married	102	91.9
Widowed	4	3.6

Table 2 shows that 89.2% of respondents were aware of cesarean section. The main sources of information were healthcare providers (65.2%), family and friends (16.2%), and the media (10.8%). Maternal health issues (42.3%) and fetal distress (25.2%) were the most commonly cited reasons for cesarean section, while 20.7% reported multiple reasons. The most frequently perceived risk was longer

recovery time (45.9%), followed by infection (16.2%) and complications in future pregnancies (14.4%). Regarding benefits, 53.2% believed cesarean section ensures safer delivery for the baby, 23.4% reported it reduces labour pain, 10.8% indicated it allows better control over delivery timing, and 9% reported all listed benefits

Table 3: Perception of Cesarean Sections

Variables	Frequency	Percentage (%)
If given a choice, would you prefer a cesarean section over vaginal delivery?		
Yes	35	31.5
No	66	59.5
No Preference	6	5.4
	4	3.6
Do you believe cesarean sections are safer than vaginal deliveries?		
I strongly agree	18	16.2
Agree	29	26.1
Disagree	46	41.4
I strongly disagree	14	12.6
How much do you think family and friends influence your opinion about cesarean sections?		
A lot	32	28.8
Some	26	23.4
Very little	24	21.6
Not at all	25	22.5
Do you think cultural beliefs play a role in how cesarean sections are perceived?		
Yes	57	51.4
No	31	27.9
Unsure	19	17.1

Table 3 shows that most respondents (59.5%) preferred vaginal delivery over cesarean section (31.5%), while 5.4% had no preference. Regarding safety, 41.4% disagreed that cesarean section is safer than vaginal delivery, 26.1% agreed, and

16.2% strongly agreed. Family and friends influenced opinions for 28.8% of respondents, while 22.5% reported no influence. Additionally, 51.4% believed cultural beliefs play a significant role in how cesarean section is perceived.

Table 4: *Acceptance of Cesarean Section*

Variables	Frequency	Percentage (%)
If a cesarean section is medically recommended, would you accept it?		
Yes	74	66.7
No	25	22.5
Unsure	8	7.2
Have you or anyone you know had a cesarean section?		
Yes	80	72.1
No	27	24.3
How did that experience influence your view on cesarean sections?		
Positive	53	47.7
Neutral	21	18.9
Negative	13	11.7
Not applicable	20	18
What factors would influence your decision not to accept a cesarean section?		
Fear of surgery	44	39.6
Cost	19	17.1
Concerns about recovery time	24	21.6
Cultural beliefs	6	5.4
All the above	15	13.5
What factors would influence your decision to have a cesarean section?		
Health of the baby	20	18
Health of the mother	4	3.6
Recommendations from healthcare providers	54	48.6
Personal preference	1	0.9
All the above	30	27
If you were to get pregnant again, would you consider having a cesarean section?		
Yes	31	27.9
No	61	55
Unsure	15	13.5

Table 4 shows that 66.7% of respondents would accept a cesarean section if medically recommended, while 22.5% would not, and 7.2% are unsure. 72.1% reported knowing someone who has had a cesarean section, and 47.7% felt positively influenced by their experience. The most common reason for not accepting a cesarean section is fear of surgery (40%), followed by concerns about cost (17.1%) and recovery time (21.6%). 48.6% stated healthcare providers significantly influence their decision, while 27.0% acknowledged multiple influencing factors. Regarding future pregnancies, 55.0% of respondents would not consider a cesarean section, 27.9% would, and 13.5% are unsure.

Discussion

This study assessed the knowledge, perception, and acceptance of cesarean section among pregnant women at Cottage Hospital, Ilorin, Kwara State. The findings provide insight into how awareness, socio-cultural beliefs, and perceived risks influence decision-making regarding cesarean delivery in a low-resource, primary care setting. The high level of awareness of cesarean section observed in this study suggests that antenatal care attendance plays a significant role in disseminating information about delivery options. This finding aligns with previous studies conducted in Nigeria and other sub-Saharan African countries, which reported high awareness of cesarean section among pregnant women receiving antenatal care services (Adewuyi *et al.*, 2019; Maduka & Enaruna, 2021; Amiegheme *et al.*, 2017). The prominence of healthcare providers as the main source of information further underscores the importance of antenatal clinics as a

platform for educating women about obstetric interventions. However, high awareness did not translate into a preference for cesarean delivery, as most respondents still preferred vaginal birth.

The preference for vaginal delivery observed in this study reflects deeply rooted cultural and social beliefs that associate vaginal birth with womanhood, strength, and normalcy. Similar findings have been reported in studies from Nigeria and other African settings, where cesarean section is often perceived as a sign of weakness or failure (Roudsari *et al.*, 2015; Adewuyi *et al.*, 2024). These perceptions may be reinforced by societal expectations, family pressure, and narratives within the community, which discourage women from accepting surgical delivery even when medically indicated.

Despite this preference, acceptance of cesarean section increased when it was recommended for medical reasons. This suggests that while cultural beliefs influence perceptions, trust in healthcare providers and concern for maternal and fetal well-being can override initial resistance. This finding is consistent with earlier studies that reported higher acceptance of cesarean section when women received adequate counselling and understood the medical necessity of the procedure (Adewuyi *et al.*, 2019). It highlights the critical role of effective communication between healthcare providers and pregnant women in shaping informed decision-making.

Fear of surgery, cost implications, prolonged recovery time, and cultural beliefs emerged as key barriers to acceptance of cesarean section in this

study. These concerns are widely documented in the literature and reflect both individual anxieties and systemic challenges within the healthcare system (Maduka & Enaruna, 2021). In primary healthcare settings, where referral to higher-level facilities is often required for surgical delivery, financial and logistical constraints may further intensify these fears.

The finding that cultural beliefs significantly influenced perceptions of cesarean section, while educational level did not significantly affect acceptance, suggests that formal education alone may not be sufficient to change deeply entrenched cultural norms. This contrasts with some studies that reported a positive association between higher education and acceptance of cesarean delivery but aligns with others that emphasise the dominant role of cultural context over individual educational attainment (Roudsari *et al.*, 2015). This highlights the need for culturally sensitive health education that engages not only women but also their families and communities.

Overall, the findings underscore the complexity of cesarean section acceptance in low-resource primary healthcare settings. Awareness is high, yet cultural beliefs, perceived risks, and healthcare system constraints strongly influence acceptance. Interventions such as culturally sensitive health education, improved antenatal counselling, and active engagement of families may enhance informed acceptance of cesarean section and reduce preventable maternal and neonatal complications.

Conclusion

Awareness of cesarean section among pregnant women attending Cottage Hospital, Ilorin, was high. However, acceptance remains limited due to fear, socio-cultural factors, and misconceptions. Strengthening antenatal education, providing counselling, and engaging families could improve acceptance and maternal and neonatal outcomes.

Recommendations

The recommendations below are derived from the study's results:

1. Antenatal health education at the primary healthcare level should move beyond general awareness of cesarean section to address specific fears and misconceptions identified in this study, particularly those related to surgery, recovery, and cultural beliefs.
2. Nurses and midwives should strengthen individualised counselling during antenatal visits, especially for women who express a strong preference for vaginal delivery, emphasising the safety and medical indications for cesarean section when clinically necessary.
3. Given the observed influence of socio-cultural beliefs on perceptions of cesarean section, culturally sensitive counselling approaches should be integrated into routine antenatal care to support informed decision-making.
4. Future interventions at primary healthcare facilities should prioritise effective provider–patient communication, as willingness to accept cesarean section increased when medical explanations were provided.

Conflict of Interest

The author declares that there is no conflict of interest regarding the publication of this manuscript.

References

- Abazie, O. H., & Abdul-Kareem, A. Y. (2019). Pregnant women's knowledge and perceptions of cesarean section in Lagos State, Nigeria. *African Journal of Midwifery*, 13(3), 1–11.
- Adewuyi, E. O., Akosile, W., Olutuase, V., Philip, A. A., Olaleru, R., Adewuyi, M. I., Auta, A., & Khanal, V. (2024). Cesarean section and associated factors in Nigeria: Assessing inequalities between rural and urban areas—Insights from the Nigeria Demographic and Health Survey 2018. *BMC Pregnancy and Childbirth*, 24(1), 538. <https://doi.org/10.1186/s12884-024-06722-7>
- Adewuyi, E. O., Auta, A., Khanal, V., Tapshak, S. J., & Zhao, Y. (2019). Cesarean delivery in Nigeria: Prevalence and associated factors—A population-based cross-sectional study. *BMJ Open*, 9(6), e027273. <https://doi.org/10.1136/bmjopen-2018-027273>
- Angolile, C. M., Max, B. L., Mushemba, J., & Mashauri, H. L. (2023). Global increased cesarean section rates and public health implications: A call to action. *Health Science Reports*, 6(5), e1274. <https://doi.org/10.1002/hsr2.1274>
- Amiegheme, F. E., Adeyemo, F. O., & Onasoga, O. A. (2017). Perception of pregnant women towards caesarean section in Nigeria: A case study of a missionary hospital in Edo State, Nigeria. *International Journal of Community Medicine and Public Health*, 3(8), 2040–2044. <https://doi.org/10.18203/2394-6040.ijcmph20162542>
- Betran, A. P., Ye, J., Moller, A. B., Souza, J. P., & Zhang, J. (2021). Trends and projections of cesarean section rates: Global and regional estimates. *BMJ Global Health*, 6(6), e005671. <https://doi.org/10.1136/bmjgh-2021-005671>
- Maduka, R. N., & Enaruna, N. O. (2021). Acceptance of repeat cesarean section and its determinants among a Nigerian pregnant woman population. *Sahel Medical Journal*, 24(3), 104–110. https://doi.org/10.4103/smj.smj_4_20
- Nigeria Health Watch. (2024, November 30). An unseen grief: Maternal mortality's impact on infants and children. *Nigeria Health Watch*. <https://articles.nigeriahealthwatch.com/an-unseen-grief-maternal-mortalitys-impact-on-infants-and-children/>
- Roudsari, L., Zakerihamidi, M., & Khoei, E. (2015). Socio-cultural beliefs, values and traditions regarding women's preferred mode of birth in the north of Iran. *International Journal of Community Based Nursing and Midwifery*, 3, 165–176.
- World Health Organisation. (2023). *Trends in maternal mortality 2000 to 2020: Estimates by WHO*.

UNICEF, UNFPA, World Bank Group and UNDESA/Population Division. World Health Organisation.
<https://www.who.int/publications/item/9789240068759>
World Health Organisation. (2021, June 16). *Caesarean section rates*

continue to rise, amid growing inequalities in access. World Health Organisation.
<https://www.who.int/news/item/16-06-2021-caesarean-section-rates-continue-to-rise-amid-growing-inequalities-in-access>