



Research Article

DOI: <https://doi.org/10.63349/ijirhs.202665>

Perceived Barriers to Exclusive Breastfeeding Among Mothers Attending a Child Welfare Clinic in Uasin Gishu County, Kenya: A Cross-Sectional Study

¹ Poornima Ramasamy¹ Department of Nursing, University of Eastern Africa, Baraton, P.O. Box 2500-30100, Eldoret, Kenya.

Corresponding author: Poornima Ramasamy

Email address: poornimar@ueab.ac.ke

Abstract:

Despite increasing awareness of the benefits of exclusive breastfeeding, many mothers continue to encounter challenges that may affect their ability to maintain recommended infant-feeding practices. These challenges arise from individual perceptions, socio-cultural expectations, economic circumstances, and other contextual influences. Understanding these perceived barriers is essential for developing effective breastfeeding support strategies. This study aimed to assess perceived social, economic, and contextual factors influencing exclusive breastfeeding among mothers attending a child welfare clinic in Uasin Gishu County, Kenya. A descriptive cross-sectional analysis was conducted using data collected in 2019 at Uasin Gishu County Hospital, Kenya. Of the 40 questionnaires distributed to mothers attending the clinic, 30 were completed and analyzed, yielding a response rate of 75.0%. The original study also included interviews with eight healthcare providers. Responses concerning five potential influences on exclusive breastfeeding were analyzed using descriptive statistics, including frequencies and percentages. The findings revealed that maternal age was the most frequently endorsed factor (66.7%), followed by maternal perceptions (63.3%), socio-cultural influences (56.7%), HIV-status disclosure (53.3%), and economic circumstances (50.0%). These findings indicate that mothers perceived various personal, social, and economic factors as potentially influencing exclusive breastfeeding practices. However, the study assessed perceived influences rather than statistically established determinants of breastfeeding behaviour. The findings highlight the importance of addressing mothers' perceived challenges through individualized breastfeeding counselling, family involvement, and community-based maternal health education. Further research involving larger samples, validated assessment tools, and direct measurement of breastfeeding practices is recommended to establish the relationships between these perceived factors and exclusive breastfeeding outcomes.

Keywords: Biomedical waste management; housekeeping staff; knowledge; waste segregation; colour coding; hospital.

INTRODUCTION

The ability of mothers to maintain exclusive breastfeeding is shaped by a complex interaction of social expectations, economic realities, family relationships, and individual circumstances. Although breastfeeding is a natural process, its successful continuation depends not only on maternal willingness and knowledge but also on the environment in which mothers care for their infants. Cultural traditions, household responsibilities, employment demands, family support, and personal perceptions may create challenges that influence infant-feeding decisions. These factors are particularly relevant in communities where mothers must balance childcare responsibilities with socioeconomic pressures and established cultural practices (Almeida et al., 1999; Duong et al., 2004). Exclusive breastfeeding (EBF) is an essential component of maternal and child healthcare and contributes significantly to infant growth, nutritional development, and protection against infectious diseases. The World Health Organization (WHO) and the United Nations Children's Fund (UNICEF) recommend exclusive breastfeeding during the first six months of life, followed by the introduction of appropriate complementary foods while continuing breastfeeding for two years or beyond (World Health Organization & UNICEF, 2003). Research has demonstrated that appropriate breastfeeding practices are associated with improved infant survival and reduced risks of diarrhoeal diseases, respiratory infections, and other childhood illnesses (Arifeen et al., 2001; Kalanda et al., 2006).

Despite these benefits, mothers may encounter numerous challenges that affect their ability to follow recommended breastfeeding practices. Socio-cultural beliefs, financial constraints, maternal characteristics, concerns regarding HIV-status disclosure, and perceptions about breast milk adequacy may influence breastfeeding-related decisions. Family members and community traditions may reinforce or discourage recommended feeding practices, while economic responsibilities and employment conditions may limit opportunities for breastfeeding. Understanding these circumstances is essential for identifying areas where maternal health education, family involvement, and healthcare support may be strengthened (Lauer et al., 2004; Imdad et al., 2011). Socio-cultural factors are particularly important because infant-feeding practices frequently develop within established family and community traditions. Advice from spouses, grandparents, relatives, and community members may influence mothers' decisions regarding breastfeeding duration, supplementation, and infant nutrition. In some circumstances, traditional feeding beliefs may differ from recommendations provided by healthcare professionals, potentially creating uncertainty among mothers. Consequently, breastfeeding promotion programmes should recognize the influence of family relationships and cultural expectations when developing community-based interventions (Duong et al., 2004). Economic circumstances may further influence breastfeeding experiences, particularly among mothers who face employment obligations, limited financial resources, and competing household responsibilities. Returning to work, inadequate maternity support, and limited opportunities to breastfeed or express milk may create practical difficulties. Similarly, mothers working in informal employment may experience challenges balancing income-generating activities with infant care. These circumstances emphasize the importance of considering socioeconomic conditions when evaluating perceived barriers to exclusive breastfeeding (Almeida et al., 1999).

Maternal characteristics and individual perceptions may also shape breastfeeding-related experiences. Maternal age, previous breastfeeding experience, confidence in milk production, and concerns about infant nutritional needs can influence how mothers understand and respond to breastfeeding recommendations. Furthermore, concerns surrounding HIV-status disclosure may affect mothers' comfort in seeking breastfeeding guidance or discussing infant-feeding decisions with family members and healthcare professionals. Such concerns highlight the need for confidential, individualized, and supportive maternal healthcare services.

Healthcare professionals play an important role in supporting mothers through antenatal education, postnatal counselling, and continued follow-up at child welfare clinics. These services provide opportunities to address breastfeeding concerns, clarify misconceptions, and encourage family involvement in maternal and infant care. Evidence suggests that appropriately designed breastfeeding education and support interventions can contribute to improved breastfeeding outcomes, although their effectiveness depends on the quality, accessibility, and continuity of the support provided (Imdad et al., 2011).

In Kenya, child welfare clinics provide important opportunities for monitoring infant growth, delivering immunization services, promoting maternal health, and supporting appropriate infant-feeding practices. Mothers attending these facilities may experience different social, cultural, and economic circumstances that influence their perceptions of exclusive breastfeeding. Uasin Gishu County, which includes both urban and rural communities, provides a relevant setting for examining how mothers perceive potential challenges associated with breastfeeding. Understanding these perceptions may assist healthcare providers in identifying concerns that warrant targeted counselling and further investigation.

Although maternal knowledge and attitudes toward breastfeeding have received considerable research attention, examining mothers' perceptions of specific social, economic, and contextual challenges provides an additional perspective on breastfeeding support needs. However, perceived influences should be distinguished from empirically demonstrated determinants of breastfeeding behaviour. Descriptive assessments can identify commonly reported concerns but cannot establish whether these factors directly affect exclusive breastfeeding practices. The present study utilized data collected in 2019 among mothers attending a child welfare clinic at Uasin Gishu County Hospital, Kenya.

It specifically examined five perceived factors associated with exclusive breastfeeding: maternal age, maternal perceptions, socio-cultural influences, HIV-status disclosure, and economic circumstances. The study aimed to describe the extent to which mothers identified these factors as potential influences on exclusive breastfeeding and to provide evidence that may inform maternal health counselling, community education, and future research.

METHODS

Design and setting

A descriptive cross-sectional study was conducted at Uasin Gishu County Hospital, Eldoret, Kenya, using data from an institutional research project dated 2019. The present analysis focuses on mothers' perceptions of social, economic, and contextual factors influencing exclusive breastfeeding.

Participants and recruitment

Mothers attending the child welfare clinic were reportedly selected during a four-day period, while healthcare personnel were purposively approached for interviews. Forty maternal questionnaires were issued and 30 completed questionnaires returned (response 30/40, 75%). Twelve healthcare professionals were reportedly approached for interview, of whom eight were interviewed (8/12, 66.7%). The methods chapter inconsistently mentions total target samples of 50 and 58, and different staff totals; therefore, this analysis uses only the clearly stated analyzed sample of 30 maternal responses. Eligibility required clinic attendance and willingness to participate.

Questionnaire and measures

The original questionnaire asked respondents to rate whether several factors affected EBF, using five response options: strongly agree, agree, fairly agree, disagree, and strongly disagree. The five reported items were HIV-status disclosure, socio-cultural influence, economic factors, maternal age, and maternal perception. These were broad survey items and did not provide validated subscale scores or independently measured barriers. The project describes an interview schedule for providers but presents only an aggregate narrative, not interview transcripts or analyzable quotations.

ANALYSIS

Data were analyzed using descriptive statistical methods, including frequencies and percentages, to summarize mothers' perceptions of factors influencing exclusive breastfeeding. Responses categorized as "strongly agree" and "agree" were combined to determine the proportion of respondents endorsing each factor. Percentages were calculated based on the 30 completed questionnaires. The analysis focused on five perceived factors: maternal age, maternal perceptions, socio-cultural influences, HIV-status disclosure, and economic circumstances.

Ethical considerations

Ethical approval was obtained from the relevant institutional ethics committee, and permission to conduct the study was granted by the participating hospital before data collection. Informed consent was obtained from all respondents prior to their participation. Participant anonymity and confidentiality were maintained by excluding names and other personally identifying information from the questionnaires.

RESULTS

Response and participant characteristics

Thirty maternal questionnaires were analyzed. All 30 respondents were recorded as female. Half (15/30, 50.0%) were married; 14/30 (46.7%) reported secondary education and 11/30 (36.7%) university education. Eleven (36.7%) were civil servants, seven (23.3%) students, five (16.7%) businesspeople, three (10.0%) homemakers, and four (13.3%) reported other occupations. The original age table totals 26 rather than 30 participants and is not reproduced as a complete age distribution.

Table 1. Frequency Selected participant characteristics as recorded in the original research project. Categories within each domain are mutually exclusive; educational and marital-status totals each equal 30.

Characteristic	Frequency	Percentage
Married	15/30	50.0%
Single	7/30	23.3%
Divorced	3/30	10.0%
Widowed	5/30	16.7%
Secondary education	14/30	46.7%
University education	11/30	36.7%
Primary education	5/30	16.7%

Reported barriers

The most frequently endorsed perceived factor was maternal age (20/30; 66.7%), followed by maternal perceptions (19/30; 63.3%). Socio-cultural influences were endorsed by 17/30 (56.7%), HIV-status disclosure by 16/30 (53.3%), and economic factors by 15/30 (50.0%). These responses indicate what respondents considered relevant, not whether their own feeding behavior had been affected by a particular factor.

Table 2. Raw questionnaire counts from the research project, n = 30 for each item. Percentages in the last column were recalculated from the raw counts; reported percentages and mean ratings in the original table contain discrepancies.

Perceived factor	Strongly agree	Agree	Fairly agree	Disagree	Strongly disagree	Agreement (SA+A)
Maternal age	11	9	3	4	3	20 (66.7%)
Maternal perceptions	7	12	2	6	3	19 (63.3%)
Socio-cultural influence	10	7	2	5	6	17 (56.7%)
HIV-status disclosure	6	10	8	4	2	16 (53.3%)
Economic factors	6	9	1	10	4	15 (50.0%)

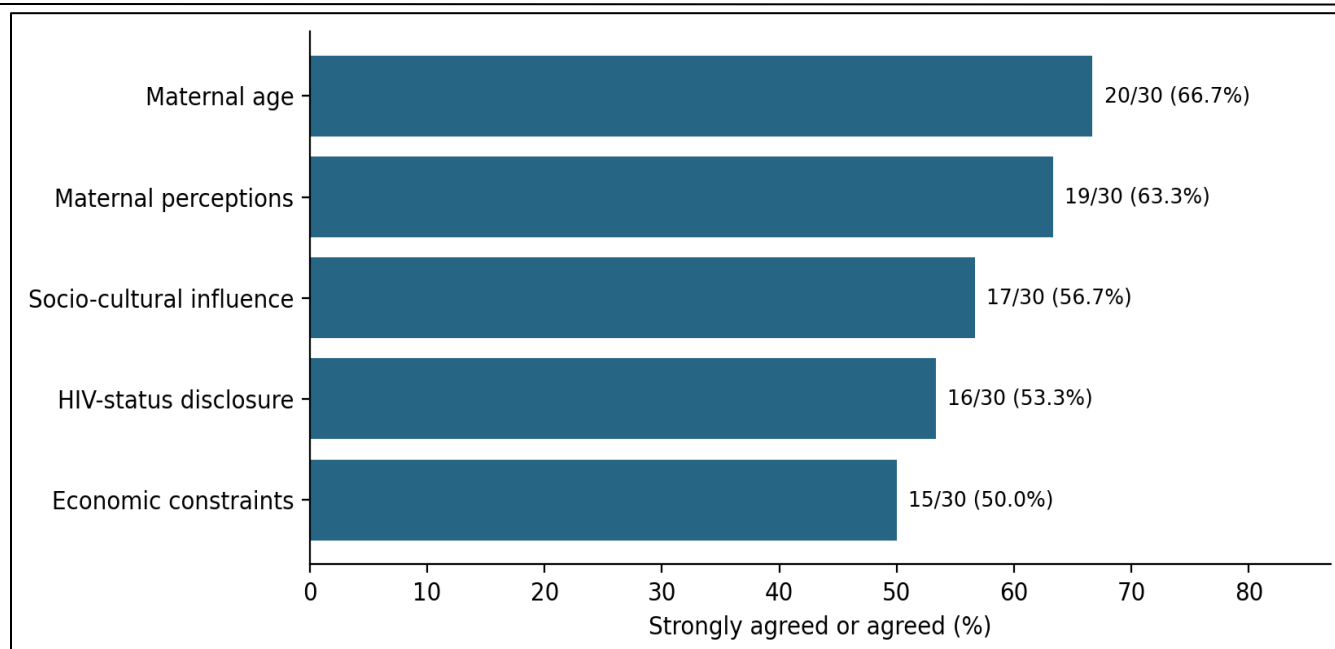


Figure 1. Percentage strongly agreeing or agreeing that each item could affect exclusive breastfeeding (n = 30). The plot describes perceptions, not measured effects or causal associations.

Healthcare-provider interview summary

Eight interviews were reportedly completed. The project summarizes staff views that social class, education, age, parental support, employment, parity, place of delivery, antenatal care, and cultural or religious practices may be relevant. However, the source provides no item-specific counts, verbatim quotations, coding procedure, or participant-level interview data. These observations should be interpreted solely as the authors' descriptive summary, not a formal qualitative thematic analysis.

Table 3. Recomputed descriptive distribution of all barrier items. SA = strongly agree; A = agree; FA = fairly agree; D = disagree; SD = strongly disagree. Minor row-sum deviations in printed percentages reflect rounding only.

Survey item	SA n (%)	A n (%)	FA n (%)	D n (%)	SD n (%)
Maternal age	11 (36.7)	9 (30.0)	3 (10.0)	4 (13.3)	3 (10.0)
Maternal perceptions	7 (23.3)	12 (40.0)	2 (6.7)	6 (20.0)	3 (10.0)
Socio-cultural influence	10 (33.3)	7 (23.3)	2 (6.7)	5 (16.7)	6 (20.0)
HIV-status disclosure	6 (20.0)	10 (33.3)	8 (26.7)	4 (13.3)	2 (6.7)
Economic factors	6 (20.0)	9 (30.0)	1 (3.3)	10 (33.3)	4 (13.3)

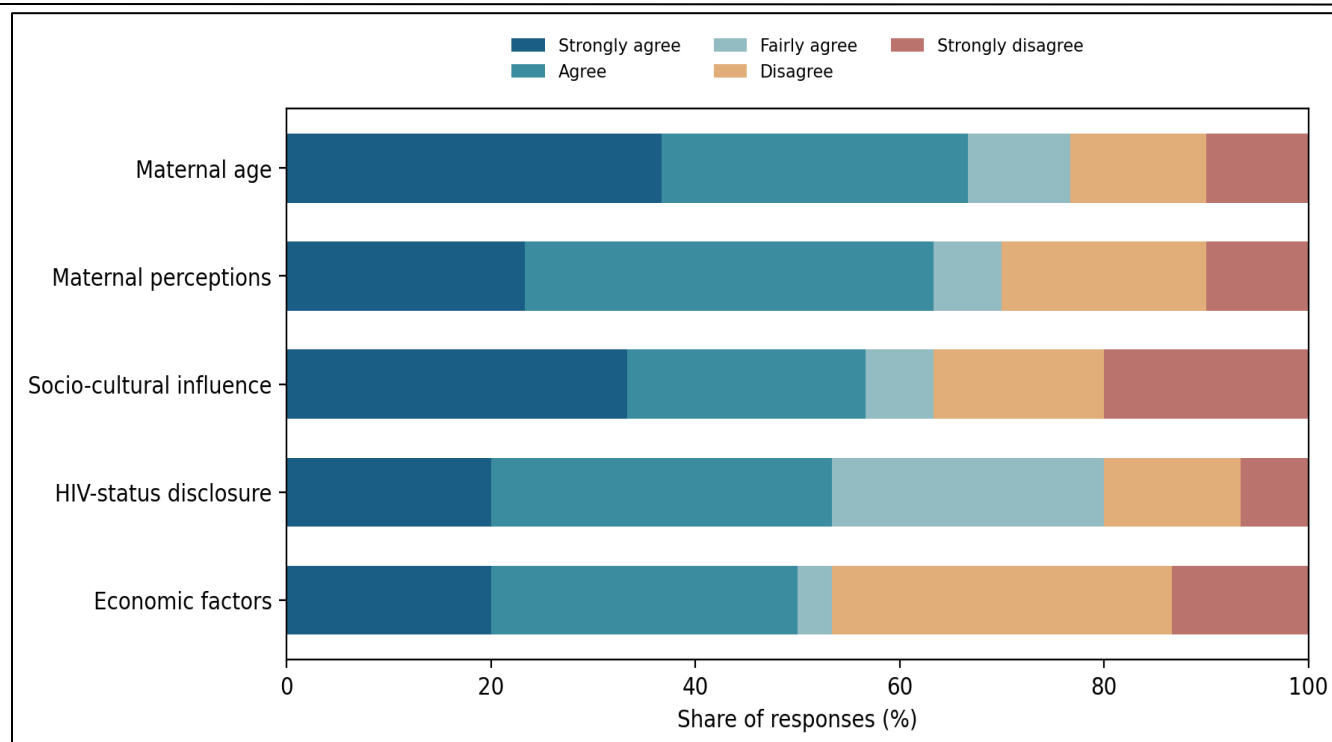


Figure 2. Composition of responses to each perceived-barrier item, showing agreement, intermediate responses and disagreement. Values are computed from original questionnaire counts.

DISCUSSION

The present barrier-focused description suggests that participants perceived exclusive breastfeeding to be embedded in family, cultural and material circumstances. The higher endorsement of maternal age and perceptions may indicate a need for counselling adapted to mothers' varying experiences, but the broad wording of these items prevents more specific interpretations. In particular, no age-by-feeding-status cross-tabulations were provided to establish whether age was actually associated with EBF. More than half of respondents endorsed socio-cultural factors. Previous research has described the influence of family and social circumstances on breastfeeding initiation and continuation (Duong et al., 2004; Almeida et al., 1999). Community and peer-support approaches may be promising, and a meta-analysis assessed peer support for breastfeeding outcomes in low- and middle-income countries (Sudfeld et al., 2012). The present data, however, do not test such interventions. Half of respondents endorsed economic factors. Work responsibilities, time constraints and household resources were discussed in the project's background, but no direct measure of maternity leave, income, food insecurity, or individual feeding practice was cross-tabulated against this item. The finding should therefore be framed as perceived economic relevance rather than an identified risk ratio or causal driver. HIV-status disclosure concerns were endorsed by 16 respondents, but the project did not document respondents' HIV status. The endorsement must not be interpreted as evidence that these mothers were living with HIV. Stigma-sensitive counselling and confidentiality are important general considerations, but clinical infant-feeding guidance should follow current national and WHO recommendations rather than older HIV-feeding passages in the source report. These findings are compatible with the wider rationale for counselling and support. Intervention evidence suggests that strategies to promote breastfeeding can improve breastfeeding outcomes (Imdad et al., 2011). Practical responses could include consistent facility messaging, engagement of partners and other caregivers with mothers' consent, and sensitivity to work and household constraints. This study itself cannot establish the effectiveness of any proposed intervention.

Interpretation of barrier items by domain

Maternal age as a perceived influence

The maternal-age item attracted 11 strongly agree and nine agree responses, together 20/30 (66.7%). A further three participants selected fairly agree and seven disagreed or strongly disagreed. Because the item did not ask what aspect of age mattered, its endorsement could encompass youth, lack of prior feeding experience, older maternal responsibilities, or other considerations. Those interpretations are hypotheses, not established findings. The original demographic age table includes 26 categorized responses despite reporting a total of 30. Consequently, an age-specific comparison, risk ratio or trend cannot responsibly be calculated. A later study should record age as a defined variable and link it to infant age, actual 24-hour feeding history and relevant covariates.

Maternal perceptions and practical concerns

For the maternal-perceptions item, 7 participants strongly agreed, 12 agreed, two fairly agreed, six disagreed, and three strongly disagreed. The combined endorsement was 19/30 (63.3%). The source project discusses concerns that breast milk alone may be insufficient and that babies need additional water or porridge. These concerns appear in the background and literature review, but the barrier questionnaire does not separately measure milk-supply worry, infant crying, water use, or early solid-food introduction. The results therefore support only a general statement about perceived relevance of maternal perceptions; specific beliefs should be measured directly in follow-up research.

Social and cultural influences

Socio-cultural influence was endorsed by 17/30 (56.7%) participants; the original counts record two fairly agree, five disagree and six strongly disagree, totalling 13 responses outside the strong-agreement/agreement grouping. These responses indicate heterogeneous opinions rather than a uniform cultural experience. Family feeding advice, partner input and grandmother involvement are addressed by the project narrative and prior literature, but no separate counts were available for these subfactors. Engagement of trusted household members may be a practical programme consideration, provided that mothers retain autonomy and confidentiality (Duong et al., 2004; Sudfeld et al., 2012).

Disclosure-related concerns

Six respondents strongly agreed and ten agreed that disclosure of HIV status could affect EBF (16/30, 53.3%); eight fairly agreed, four disagreed and two strongly disagreed. This question describes respondents' views about disclosure, not their own medical status, experience of stigma, or HIV-related infant feeding choices. The project does not provide HIV-status or treatment data. This item should never be described as the prevalence of HIV among surveyed mothers. Any advice regarding breastfeeding and HIV must be consistent with current local clinical guidelines and individualized professional care.

Economic constraints

Economic factors were endorsed by 15/30 (50.0%) mothers, while one fairly agreed and 14 disagreed or strongly disagreed. This near-even division suggests that the salience of economic circumstances may differ across households. Although the study included occupational categories, it supplied neither household income nor individual-level links between employment and barrier responses. Financial cost, transport, return-to-work timing, maternity leave and opportunities to express or store milk remain plausible dimensions for future measurement, not quantified findings in this dataset (Almeida et al., 1999).

Detailed descriptive presentation of questionnaire responses

Table 3 gives a complete display of the recorded five-category responses. Each row sums to 30. Percentages are calculated using $n = 30$ and rounded to one decimal place. Because items were broadly worded and the response scale was ordinal, the distribution of answers is more informative than a single mean score.

Participant and study-process detail

The project described random selection of mothers across four days at the clinic, but did not document a randomization

mechanism or the total number of eligible mothers seen during that time. Interview participants were purposively selected from healthcare providers. The questionnaire and staff interview represent different instruments, and the available report does not establish which provider categories completed interviews. The source indicated an initial target of 40 mothers and gave contradictory overall respondent targets; for this article we rely on 30 valid maternal questionnaires and the reported eight completed provider interviews.

Programme implications and future research

The findings highlight the potential importance of strengthening individualized breastfeeding counselling, family support, and community-based maternal health education to address perceived barriers to exclusive breastfeeding. Healthcare professionals may consider providing targeted guidance that takes into account maternal characteristics, socio-cultural expectations, economic circumstances, and concerns regarding HIV-status disclosure. Previous studies have emphasized the role of family and community influences in breastfeeding practices and the potential benefits of supportive interventions (Duong et al., 2004; Imdad et al., 2011). Peer-support interventions have also been associated with improvements in exclusive breastfeeding outcomes in low- and middle-income countries (Sudfeld et al., 2012). Strengthening postnatal counselling, encouraging appropriate family involvement, and improving workplace support may therefore be useful strategies for breastfeeding promotion. However, these interventions were not evaluated in the present study. Further research involving larger and more diverse samples, validated assessment instruments, and direct measurement of breastfeeding practices is recommended to examine the relationships between perceived barriers and exclusive breastfeeding outcomes.

Strengths and limitations

This study has several limitations. The relatively small sample size of 30 mothers and the use of data from a single healthcare facility limit the generalizability of the findings. Furthermore, the analysis was based on aggregated questionnaire responses, which restricted the examination of statistical associations between maternal characteristics and exclusive breastfeeding practices. The findings therefore reflect mothers' perceptions of potential influences rather than established determinants of breastfeeding behaviour. Future studies involving larger samples, individual-level data, and direct assessment of breastfeeding outcomes are recommended.

CONCLUSION AND RECOMMENDATIONS

Among 30 mothers attending one child welfare clinic in Uasin Gishu County, respondents endorsed diverse potential barriers to EBF. Agreement was highest for maternal age and maternal perceptions, while socio-cultural factors, HIV-status disclosure concerns, and economic factors were also commonly endorsed. The findings support a rationale for exploring context-sensitive breastfeeding counselling, partner and family education, workplace accommodations, and confidential support, but do not demonstrate that any factor predicts EBF or that these interventions would be effective. Future research should recruit a larger sample across multiple facilities, document infant ages and actual feeding practices using a standard EBF definition, validate barrier measures, capture employment and household variables, and examine associations with appropriate statistical methods. Interview studies should report sampling, analytic procedures, and anonymized quotations where consent permits..

REFERENCES

1. Achary, Almeida, R. M., de Marins, V. M., & Valle, J. (1999). Breastfeeding, socio-economic conditions and nutritional status of children younger than 12 months in Brazil. *Annals of Tropical Paediatrics*, 19(3), 257–262.
2. Arifeen, S., Black, R. E., Antelman, G., Baqui, A., Caulfield, L., & Becker, S. (2001). Exclusive breastfeeding reduces acute respiratory infection and diarrhea deaths among infants in Dhaka slums. *Pediatrics*, 108(4), 67.
3. Duong, D. V., Binns, C. W., & Lee, A. H. (2004). Breast-feeding initiation and exclusive breast-feeding in rural Vietnam. *Public Health Nutrition*, 7(6), 795–799.
4. Imdad, A., Yakoob, M. Y., & Bhutta, Z. A. (2011). Effect of breastfeeding promotion interventions on breastfeeding rates, with special focus on developing countries. *BMC Public Health*, 11(Suppl 3), S24.

5. Kalanda, B. F., Verhoeff, F. H., & Brabin, B. J. (2006). Breast and complementary feeding practices in relation to morbidity and growth in Malawian infants. *European Journal of Clinical Nutrition*, 60(3), 401–407.
6. Lauer, J. A., Betrán, A. P., Victora, C. G., de Onís, M., & Barros, A. J. D. (2004). Breastfeeding patterns and exposure to suboptimal breastfeeding among children in developing countries: Review and analysis of nationally representative surveys. *BMC Medicine*, 2, 26.
7. Sudfeld, C. R., Fawzi, W. W., & Lahariya, C. (2012). Peer support and exclusive breastfeeding duration in low- and middle-income countries: A systematic review and meta-analysis. *PLOS ONE*, 7(9), e45143.
8. World Health Organization, & United Nations Children's Fund. (2003). *Global strategy for infant and young child feeding*. World Health Organization. 2.

Cite this article as: Poornima Ramasamy (2026). 'Perceived Barriers to Exclusive Breastfeeding Among Mothers Attending a Child Welfare Clinic in Uasin Gishu County, Kenya: A Cross-Sectional Study'. *International Journal of Innovative Research in Health Science*, 2(10), 53-61

Creative Commons (CC) License: ©2026 the Author(s). Open access article distributed under the terms of the Creative Commons Attribution License (<http://creativecommons.org/licenses/by/4.0>)