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Review Article

Barriers and facilitators to the implementation of a midwifery-led care model: a qualitative systematic review

Andreia Soares Goncalves [a,b,c,d,*], Márcia Pestana-Santos [d,e,f], Christine McCourt [g,h], Ana Paula Prata [c,i]

[a] Department of Nursing and Midwifery, Escola Superior de Saúde, Instituto Politécnico de Viana do Castelo, Rua Dom Moisés Alves Pinho, 4900-314 Viana do Castelo, Portugal
[b] Instituto de Ciências Biomédicas Abel Salazar, Universidade do Porto, Rua Jorge de Viterbo Ferreira 228, 4050-313 Porto, Portugal
[c] CINTESIS@RISE – Innovation & Development in Nursing, Center for Health Technology and Services Research, Rua Dr. Plácido da Costa, 4200-450 Porto, Portugal
[d] Health Sciences Research Unit: Nursing (UICISA:E), Avenida Bissaya Barreto, Polo C, 3046-851 Coimbra, Portugal
[e] Nursing School of Coimbra (ESEnfC), Avenida Bissaya Barreto, 3046-851 Coimbra, Portugal
[f] Portugal Centre for Evidence-Based Practice (PCEBP): a JBI Centre of Excellence, Avenida Bissaya Barreto, 3046-851 Coimbra, Portugal
[g] Department of Nursing and Midwifery, School of Health and Medical Sciences, City St. George's, University of London, Myddelton Street Building, Northampton Square, London EC1V 0HB, United Kingdom
[h] Centre for Maternal and Child Health Research, City, University of London, Northampton Square, London EC1V 0HB, United Kingdom
[i] Escola Superior de Enfermagem do Porto, Rua Dr. António Bernardino de Almeida, 4200-072 Porto, Portugal

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ABSTRACT

Problem: Despite the overwhelming benefits of midwifery-led care models, in many countries, for several reasons, there is a resistance to their implementation.
Background: These care models provide both short-term and long-term advantages for mothers and newborn, demonstrate sustainability, and offer economic benefits.
Aim: This qualitative systematic review explores and synthesises evidence on stakeholders' perceptions of the barriers and facilitators to implementing a shift from doctor-led or shared-care models to midwifery-led models of care.
Methods: The review followed Joanna Briggs Institute guidance for qualitative systematic reviews, including a comprehensive database search, study selection, quality appraisal by two independent reviewers, data extraction using a tool for qualitative findings, and thematic synthesis. The Consolidated Framework for Implementation Research guided the organisation and presentation of results, and the credibility and dependability of findings were assessed using ConQual.
Results and Discussion: Seven studies met the inclusion criteria. Fourteen findings, five facilitators and nine barriers, were identified by stakeholders including women, midwives, doctors and educators. These relate to four implementation domains: innovation, outer setting, inner setting, and individuals. Key themes included cost, local attitudes, local attitudes and conditions, laws and policies, tension for change, relationships, infrastructure, compatibility, access to knowledge, client-centeredness and capability. The review underscores the need for evidence-based strategies to overcome barriers and enhance facilitators.
Conclusion: Context-specific strategies informed by implementation science must be developed to support the sustainable integration of midwifery-led care models, with a particular emphasis on policy development and stakeholder engagement.

Statement of Significance

- Despite strong evidence of benefits, the global uptake of midwifery-led care models is slow, especially in contexts transitioning from doctor-led services.
- Previous research has explored midwifery-led care broadly, but

* Corresponding author. Escola Superior de Saúde, Instituto Politécnico de Viana do Castelo, Rua Dom Moisés Alves Pinho, 4900-314 Viana do Castelo, Portugal.
E-mail address: avanessagoncalves@ess.ipvc.pt (A.S. Goncalves).

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few studies specifically address the challenges of implementing these models within existing medical-led systems.

• This review uniquely synthesises stakeholder perspectives on the barriers and facilitators to implementing midwifery-led care in such transitions, using the CFIR framework. It highlights key contextual and organisational factors that influence implementation and provides actionable insights for policymakers and health systems to design evidence-informed, context-sensitive strategies for sustainable integration.

Introduction

Midwifery-led models of care (MLC) have been identified as optimal models (WHO 2018, NICE 2021, Sandall et al., 2016, Sandall et al., 2024) for the care of women with uncomplicated pregnancies, associated with significant benefits for mothers and newborns' when compared to other models of care (Sandall et al., 2016, Sandall et al., 2024, Hatem et al., 2008, Stoll et al., 2023). In a midwife-led care model, midwives are the primary care providers for women and newborns from pre-pregnancy through the postnatal period. As autonomous, educated, licensed, and regulated professionals, midwives lead care planning, assessment, and delivery, referring to other professionals when necessary. This model aligns with the midwifery philosophy, emphasising person-centred care, the woman–midwife partnership, and optimising physiological, psychological, social, and cultural processes while using interventions only when indicated. This approach supports a healthy pregnancy, birth, and transition to parenthood while guaranteeing every woman and newborn receives personalised, holistic care (Sandall et al., 2024, WHO, 2024). Various models exist, tailored to different contexts and needs, the most common being 'continuity of midwifery care' models, where a known and trusted midwife, or a small group of midwives, provides comprehensive care across all stages, ensuring relational, longitudinal, management, and informational continuity (Sandall et al., 2024).

A recent modelling study (Nove et al., 2021) estimated that in medium to high-income countries, a modest scale up of midwife-delivered interventions (10% increase in coverage every 5 years from 2020 to 2035) could avert 26% of maternal deaths, 14% of the stillbirths and 22% of the neonatal deaths, whilst universal coverage (95% increase of all interventions) could avert 51% of maternal deaths, 47% of stillbirths and 44% of neonatal deaths compared to no change in coverage. In addition to these lives saved estimates, midwifery-led models of care have their greatest impact in preventing morbidity, through avoiding unneeded medical interventions such as cesarean sections, amniotomies, episiotomies, instrumental deliveries, a higher likelihood of breastfeeding and spontaneous vaginal deliveries, and greater patient satisfaction (Sandall et al., 2024, Stoll et al., 2023).

Numerous studies have demonstrated the benefits of continuity of care, a critical component of midwifery-led models (Sandall et al., 2024, Rayment-Jones et al., 2021, Homer et al., 2019), however, the success of midwifery-led care extends beyond continuity, as it is rooted in the philosophy of being "with women", person-centred approach to care, optimisation of physiological, biological, psychological, social and cultural processes and intervention use only when indicated (WHO, 2024). Crucially, this woman-centred approach is not only a clinical framework but an ethical imperative: care models should be driven primarily by the health needs, preferences, and values of women and not by the organisational priorities or professional turf interests of clinicians. This woman-centred approach prioritises individualised care, empowers women through shared decision-making, and fosters trust and respect (Bradfield et al., 2017). These values are strongly supported by international guidance, including the WHO's recommendations for intrapartum care (WHO 2018), which emphasise a positive childbirth experience grounded in respect, dignity, and informed choice. Recognise as core component of midwifery philosophy, they are also widely accepted as markers of quality in maternity services (de Labrusse et al., 2016) and are closely linked to improved maternal and neonatal health outcomes (WHO 2012).But despite all the available evidence on the overwhelming short and long term benefits for mother and newborn, the sustainability and economic gains of the model (Kozhimannil et al., 2019), in many countries, for several reasons, there is a resistance to the implementation of such models (United Nations Population Fund 2021).

Health policy and management decisions do not always reflect research evidence. System pressures, finite resources, amongst others, lead policy makers and health managers to make choices based on priority interventions, funds, and time (White et al., 2021), other than evidence. Meanwhile, interventions and evidence-based practice must be carefully implemented since poorly implemented evidence fails to deliver the expected health benefits.

Previous research has looked into barriers and facilitators to the implementation of midwifery units into maternity services (Batinelli et al., 2022), the experiences of midwives in their practice of a midwifery model of care in an integrated practice setting (obstetric units) (McFarland et al., 2020, Lundgren et al., 2020), barriers and facilitators for implementation of continuity midwifery care (Zarbiv et al., 2025) and on the barriers and facilitators to the implementation of midwife-led care in low and middle-income countries (Sangy et al., 2023). While the latter two studies initially appeared particularly relevant to our research focus, after reviewing it was identified that many included studies analysed the shift from no care (or care provided by traditional birth attendants) to midwifery models of care and that the latter focused primarily on low- and middle-income countries. However, evidence clearly shows that a midwifery-led care models are beneficial not only in low- and medium-income countries but also in high-income countries (Stoll et al., 2023), where care is often doctor-led and characterised as "too much too soon" – reflecting the overmedicalization of pregnancy and childbirth (Miller et al., 2016). This overuse of routine or unnecessary interventions has been linked to adverse health outcomes, increased pressure on healthcare systems, and a significant erosion of women's autonomy during the maternity continuum (WHO, 2024).

Importantly, implementation strategies (whether they prioritise doctors or midwives) can unintentionally reproduce professional-centric structures that overlook what women actually want and need. Future models must avoid simply inverting the medical hierarchy and instead focus on restructuring care around women's assessed needs, who they want to receive care from, when, and to what extent. This requires that midwifery-led care is not only recognised, but meaningfully available as an accessible option. For the present review, it was important to include evidence from high-income countries, as well as from any country that analysed the transition from doctor-led to midwifery-led care. To the authors' knowledge, no previous review has specifically focused on this aspect.

Aim and objectives

To fill this gap and inform further research, the purpose of this systematic review was to explore the barriers and facilitators perceived by stakeholders (participants) in the implementation of midwifery-led-care models (phenomenon of interest) within various health care settings (context), with particular interest in transitions from doctor-led or shared-care models. This study is part of a broader research project investigating the feasibility of implementing midwifery-led care in a high-income country with a universal healthcare system.

A systematic review of this nature is essential to understanding how to transition effectively from doctor-led to midwifery-led models of care. Stakeholder perspectives play a critical role in shaping both the perceived feasibility and acceptability of MLC models, ultimately influencing whether the model is successfully adopted or met with resistance. Without understanding these perspectives, implementation efforts risk overlooking barriers and facilitators that directly affect

sustainability (Rycroft-Malone et al., 2013). By identifying these factors in advance, this review provides actionable insights to help anticipate challenges and leverage facilitators and increase the likelihood of successful MLC integration of MLC within existing healthcare systems.

Review question

What are the barriers and facilitators perceived by stakeholders in the implementation of a midwifery-led care model within a healthcare system?

To guide the research study, we draw on the Consolidated Framework for Implementation Research (CFIR), a widely used framework that helps to systematically assess factors that influence implementation (Damschroder et al., 2022). CFIR provides a structured approach to evaluating multiple dimensions of implementation, including the intervention itself, the inner and outer settings, individual characteristics, and the implementation process. Given that midwifery-led models often face systemic and cultural resistance, applying CFIR allows to better understand the contextual elements that impact their uptake, thus offering a roadmap for overcoming barriers and enhancing facilitators.

A comprehensive synthesis of evidence is therefore essential to support the development of actionable recommendations for policymakers, healthcare practitioners, and other stakeholders. Without effective translation of research findings into routine healthcare practices, gaps in evidence-based care persist, potentially undermining care quality and system sustainability (Morris et al., 2011). Identifying barriers and facilitators to the implementation of midwifery-led care models can inform the design of targeted strategies that not only address known challenges but also leverage existing enablers. Ultimately, incorporating the most relevant evidence is key to ensuring the delivery of high-quality, person-centred maternity care.

Material and methods

This study was conducted following the Joanna Briggs Institute methodology for systematic reviews (Lockwood et al., 2020) and reported following the PRISMA guidance (Page et al., 2021) for systematic reviews.

An *a priori* protocol has been developed, registered with the University of York Centre for Reviews and Dissemination (PROSPERO; registration number CRD42022355495), and is publicly available (Goncalves et al., 2023). The protocol was followed precisely.

Inclusion criteria

This review considered studies exploring the views, perceptions, or experiences of stakeholders involved in the implementation of midwifery-led care models within health care systems, including midwives, doctors, service users, maternity team managers, and policy developers. To align with the review objective, only studies that explicitly addressed the transition from doctor-led or shared-care models to midwifery-led care were included. Models not specific to midwifery, issues unrelated to implementation processes, and continuity models from already-established midwifery-led systems were excluded. This exclusion was intentional, as the review sought to understand factors affecting the *transition* from medical-led to midwifery-led care models. The review includes studies employing qualitative data collection and analysis methods, drawing on approaches such as phenomenology, ethnography, grounded theory, action research, qualitative description, etc. Mixed-methods studies were eligible if qualitative findings could be clearly extracted and analysed. Studies published in English, Portuguese, or Spanish were included. No restrictions were applied regarding geographic location, healthcare system type (public or private), or urban vs rural setting. Likewise, no date limits were applied.

Search strategy

A comprehensive search strategy was developed with input from a health sciences librarian. Initial test searches using targeted terms such as “midwifery-led care,” “implementation,” and “models of care” returned very few relevant results. To improve sensitivity, we adopted a broader strategy focused on capturing qualitative literature about stakeholder experiences in midwifery and maternity care. The full search string for PubMed is provided below:

(("Experience"[Title/Abstract] OR "Facilitator"[Title/Abstract] OR "Barrier"[Title/Abstract])

AND

("Midwifery"[MeSH Terms]))

AND

(("Nurse"[Title/Abstract] OR "Midwife"[Title/Abstract] OR "Obstetrician"[Title/Abstract] OR "Women"[Title/Abstract] OR "Family doctor"[Title/Abstract] OR "General practitioner"[Title/Abstract] OR "Manager"[Title/Abstract]) OR ("Physician Assistants"[MeSH Terms: noexp] OR "Nurses"[MeSH Terms] OR "Obstetrics"[MeSH Terms] OR "Women"[MeSH Terms]))

Keywords and index terms were adapted to the other included databases: CINAHL (EBSCO), PsyInfo (EBSCO) and Web of Science (EBSCO). The final database search for this review was conducted in April 2025. Grey literature databases such as ProQuest Dissertations and Theses were also searched. Additionally, it was performed an iterative search in Google and Google Scholar to find other studies. The reference lists of all studies selected for critical appraisal were screened for additional studies.

Data selection

Following the search, 2469 citations (from both peer-review and grey literature sources) were collated and uploaded into Rayyan (Mourad et al., 2016) and duplicates removed. Two independent reviewers screened titles and abstracts against the inclusion criteria and assessed the selected citations in detail. The disagreements were discussed and resolved between the two. Reasons for full-text exclusion were noted and are detailed in the Preferred Reporting Items for Systematic Reviews and Meta-analyses (PRISMA) flow diagram (Page et al., 2021) as well as Supplementary file 1.

Quality assessment

Eligible studies were critically appraised for methodological quality by the two reviewers independently using the standard JBI Critical Appraisal Checklist for Qualitative Research (Lockwood et al., 2020). The Checklist evaluates ten criteria including congruity between research components, representation of participants, researcher positioning, and ethical reporting. Each criterion is rated as “Yes,” “No,” or “Unclear.” No numeric score is prescribed by JBI, but studies were summarised by the number of criteria met out of ten to aid transparency and comparison (see Table 2).

Data extraction and synthesis

Data from included studies were independently extracted by the two reviewers using a purpose-built data extraction tool. Initially, we employed an inductive thematic synthesis approach to analyse the qualitative findings. Verbatim themes and key findings identified in the studies were extracted and systematically aggregated based on similarity and meaning. This method is considered well-suited for exploring experiences, thoughts, or behaviours across a dataset (Kiger and Varpio, 2020, Thomas and Harden, 2008) allowing themes to emerge directly from the data without imposing a pre-existing structure.

Two reviewers independently conducted all stages of data extraction and theme development. Discrepancies in coding or theme

interpretation were discussed and resolved through consensus. Iterative calibration exercises were performed during the early coding phases. These exercises ensured alignment in how initial codes were applied and how descriptive themes were formed, supporting analytical consistency across reviewers. The emerging findings were then iteratively reviewed, refined, and discussed between the reviewers until consensus on the overarching themes was reached. The emerging findings were then iteratively reviewed, refined, and discussed between the reviewers until consensus on the overarching themes was reached.

Following this inductive thematic synthesis, the Consolidated Framework for Implementation Research (Damschroder et al., 2009) served as a deductive lens to organise and present the emergent themes. The framework provides a structured framework for understanding factors influencing implementation, outlining constructs within five domains: intervention characteristics, outer settings (e.g. environmental factors), inner settings (e.g. organisational factors), individual characteristics and implementation process characteristics. By mapping our inductively derived themes onto these CFIR domains and constructs, we were able to systematically categorise and interpret the identified barriers and facilitators within a recognised implementation science framework. This approach enhanced the interpretability and applicability of our findings for future implementation efforts.

Assessing confidence in the findings

The synthesised findings were graded using ConQual (Munn et al., 2014) to assess the confidence in the synthesis output, which contributed to the Summary of Findings. ConQual scores were determined by evaluating dependability (methodological quality appraisal) and credibility (assessment of the quality and detailed illustrations of findings). Both reviewers independently consulted on and confirmed the appraisal, extraction, and synthesis of the findings.

Results

Study inclusion

The search identified 2463 records in the databases, 418 in registers and an additional 6 through citation searching (see Fig. 1). After the screening process, a total of 7 studies were included in this systematic review. There were no exclusions based on methodological quality.

Characteristics of the included studies

The included studies were conducted in Australia (n=2), Canada (n=2), England (n=1), Jordan (n=1), and Pakistan (n = 1). The studies were published between 1997 and 2014. In each included study, the midwifery model of care was defined as one in which midwives were the primary providers responsible for antenatal, intrapartum, and/or postnatal care, aligned with international definitions (see introduction). Most models emphasised midwives' professional autonomy, continuity of care, personalised relationships, consistent with a philosophy of being "with woman." Characteristics of the included studies are summarised in Table 1. The healthcare systems and contexts varied quite significantly amongst the studies. The United Kingdom, Australia and Canada have public universal health coverage although quite different in what regards health financing and the availability/influence of the private sector. A mixed system of public governmental programmes, private sector, and donors/non-governmental organisations describes the situation of Pakistan and Jordan.

A range of relevant methodologies were used such as ethnography (n=1), qualitative exploratory descriptive approach (n=4), qualitative exploratory multiple-case study (n=1) and Critical feminism (n=1). Data collection methods included interviews, focus groups, observation, amongst others. Participants involved midwives, women and other family members (e.g. fathers, grandparents), general practitioners, managers, project leaders, obstetricians, policy makers, and other healthcare professionals. Number of participants ranged from 10 to 396.

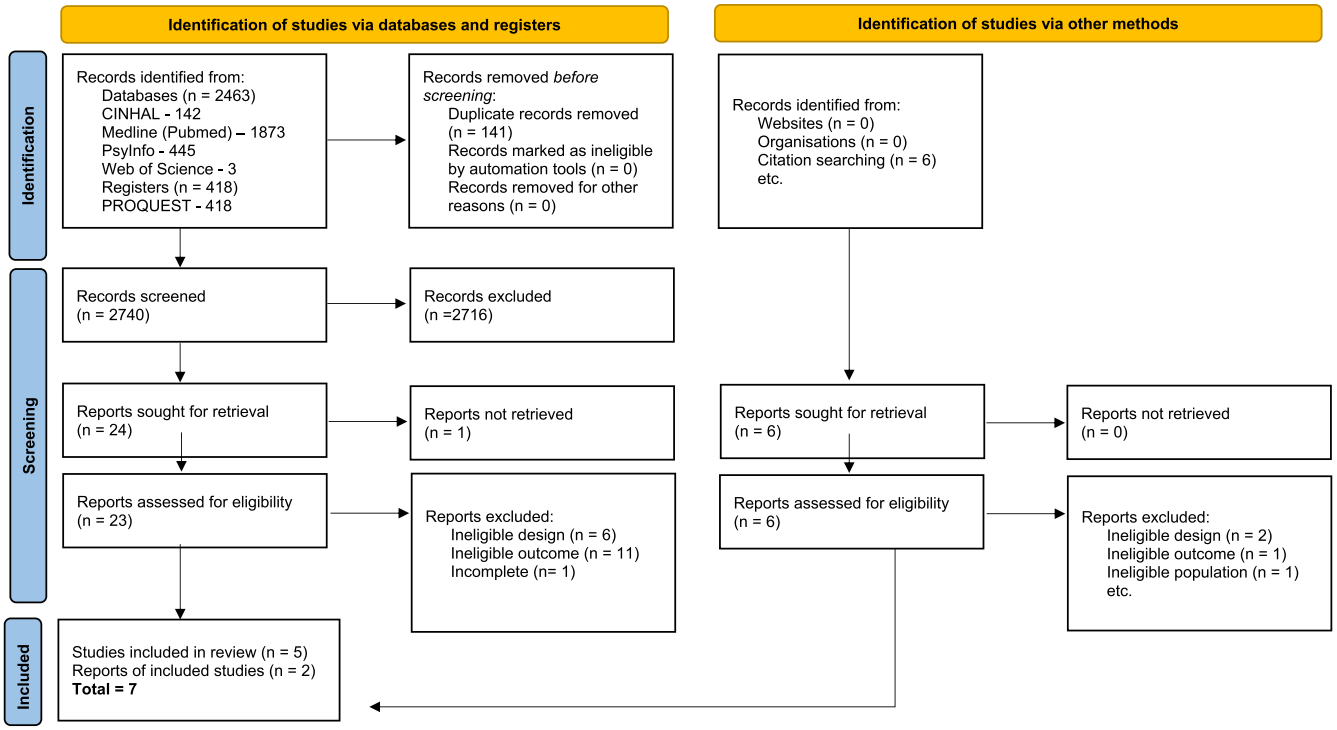

Fig. 1. Screening process using PRISMA flowchart.

Table 1
Characteristics of the included studies.

Author, Year	Country	Study Design	Participants	Context
Anwar et al., 2014	Pakistan	Qualitative descriptive exploratory study. Data collection methods: semi-structured interviews and field notes.	Ten women (non-primiparas) who experienced MLC during antenatal, intrapartum, and postnatal care.	Two Secondary care units
Battersby & Thomson, 1997	United Kingdom	Qualitative descriptive exploratory study Data collection methods: Questionnaire and semi-structured interviews.	Nine (9) community midwives and six (6) general practitioners.	Primary Care setting
Brodie, 2002	Australia	Qualitative research: critical feminism Data collection methods: interactive forums; professionals conferences and seminars; graffiti boards; anonymous surveys or "graffiti" sheets placed in professional journals and on a website.	396 midwives	Maternity services in Australia - a cross section of midwives nationally.
Collin et al., 2000	Quebec, Canada	Qualitative exploratory multiple case-study. Data collection: semi-structured interviews, observations, written documents, and focus groups.	14 leaders of the seven projects (co-ordinators of birth centres, directors of local Community Services) 21 members from different professional groups (midwives and lay midwifes), family doctors, obstetricians, neonatologists, nurses working in obstetrics.	Local community service centres.
Olson & Couchie, 2013	First Nation community, Manitoba, Canada	A multi-sited ethnography Data collection methods: participant observation and open-ended interviews	Pregnant Aboriginal women, fathers, grandmothers, First Nations political leaders, policy makers, hospital nurses or working in remote federal health-care centres, First Nations women who practice ceremony, doctors (obstetricians and doctors employed by the federal government), and Aboriginal midwives.	Hospitals, boarding homes, and in government boardrooms
Shaban et al., 2012	Jordan	Qualitative exploratory study using an action research approach. Data collection methods: Focus groups	12 Midwifery educators and 52 midwifery practitioners.	Midwifery educators and midwifery practitioners employed by the Ministry of Health across the north, south and central region of Jordan.
Walker et al., 2004	North Queensland, Australia	Qualitative descriptive exploratory study. Data collection methods: focus groups	22 midwives	Hospital and community setting

"n" values are only presented when explicitly reported in the original studies.

Methodological quality

All the selected studies scored above 6/10 on the appraisal checklist (Lockwood et al., 2020). Anwar et al. (Anwar et al., 2014) study scored the highest with 10/10, all other studies scored moderate to high for dependability (see Table 2). Credibility was high for most studies, demonstrating a high number of "unequivocal" and some "credible" findings with respective illustrations. Only one study scored low for all the findings (Collin et al., 2000) since it did not present illustrations of the participants statements, however, the report findings are pertinent and very detailed. In three studies (Anwar et al., 2014, Brodie, 2002, Walker et al., 2004) "Unequivocal" level of evidence was consistently demonstrated for all findings, accompanied by respective illustrations (see supplementary file 2).

Review findings

All seven included studies described barriers and/or facilitators that influenced the implementation of a midwifery-led care model in their healthcare system (Anwar et al., 2014, Collin et al., 2000, Brodie, 2002, Walker et al., 2004, Battersby and Thomson, 1997, Olson and Couchie, 2013, Shaban et al., 2012). Multiple factors were identified within each

Table 2
Critical appraisal of eligible studies: JBI critical appraisal checklist for qualitative research.

Study	Q1	Q2	Q3	Q4	Q5	Q6	Q7	Q8	Q9	Q10	Total %
Anwar et al., 2014	Y	Y	Y	Y	Y	Y	Y	Y	Y	Y	100
Battersby & Thomson, 1997	Y	Y	Y	Y	Y	N	N	Y	Y	Y	80
Brodie, 2002	Y	Y	Y	Y	Y	Y	Y	Y	N	Y	90
Collin et al., 2000	Y	Y	Y	Y	Y	N	N	N	N	Y	60
Olson & Couchie, 2013	Y	Y	Y	Y	Y	N	N	Y	Y	Y	80
Shaban et al., 2012	Y	Y	Y	Y	Y	N	N	Y	Y	Y	80
Walker et al., 2004	N	N	Y	Y	Y	N	N	Y	Y	Y	60
Total %	86	86	100	100	100	29	29	86	71	100	

Y = Yes, N = No
Q1: Is there congruity between the stated philosophical perspective and the research methodology?
Q2: Is there congruity between the research methodology and the research question or objectives?
Q3: Is there congruity between the research methodology and the methods used to collect data?
Q4: Is there congruity between the research methodology and the representation and analysis of data?
Q5: Is there congruity between the research methodology and the interpretation of results?
Q6: Is there a statement locating the researcher culturally or theoretically?
Q7: Is the influence of the researcher on the research, and vice-versa, addressed?
Q8: Are participants, and their voices, adequately represented?
Q9: Is the research ethical according to current criteria or, for recent studies, is there evidence of ethical approval by an appropriate body?
Q10: Do the conclusions drawn in the research report flow from the analysis, or interpretation, of the data?

study, and we mapped these to 12 constructs across the CFIR four domains: innovation domain (such as innovation factors) outer setting (such as environmental factors), inner setting (such as the organizational factors) and individuals' domain (such as the characteristics of the involved individuals). Notably, no constructs were mapped to the implementation process domain.

Barriers were overall more widely identified and explored in the primary studies than facilitators and some studies reported only barriers (Collin et al., 2000, Brodie, 2002, Olson and Couchie, 2013, Shaban et al., 2012). The synthesised findings are presented in the 'Summary of findings' table (Table 3), which also includes an assessment of confidence in the analysis using the ConQual approach. ConQual scoring decisions are explained in the table's comments. Dependability was downgraded when findings were based on only one or two studies or when the contributing studies demonstrated lower methodological quality according to the JBI checklist. Credibility was assessed based on the degree of support provided by the original data: findings illustrated with direct participant quotations were rated as "unequivocal," while those lacking supporting data were rated lower. For example, finding #2 on local attitudes was downgraded due to one study not including participant quotations, whereas finding #14 on client-centredness was rated high in credibility due to rich, illustrative narrative quotes.

Barriers to the implementation of a midwifery-led care

Outer setting domain

Local attitudes, particularly the *lack of professional recognition* of midwifery, posed implementation challenges as indicated in three studies (Collin et al., 2000, Brodie, 2002, Shaban et al., 2012). These studies not only highlighted a lack of knowledge among other healthcare providers about midwifery practice (Collin et al., 2000) but also revealed disparities in the philosophy of care, contrasting women-centred versus doctor-controlled care and shared versus doctor-led responsibility (Collin et al., 2000, Brodie, 2002). This discrepancy led to hesitancy in developing midwifery-led models and evidence-based practices (Brodie, 2002) hindered integration of midwives within healthcare teams, and fostered tensions among healthcare providers (Collin et al., 2000). One study emphasised the invisibility of midwifery as a profession as a significant barrier to enhancing the utilisation of midwives as primary healthcare providers (Shaban et al., 2012).

Local conditions

Lack of societal recognition and image were also seen as hindering implementation. The studies unveiled an absence of awareness and education about midwives' autonomous role from both the general public (Anwar et al., 2014, Brodie, 2002, Shaban et al., 2012) and other health care professionals such as doctors (Brodie, 2002). In Anwar (Anwar et al., 2014) and colleagues women expressed a notable absence of knowledge regarding midwifery care and midwifery-led services within their community, where word-of-mouth served as the primary mode of marketing. The limited acknowledgment and social standing of midwifery in society were pinpointed as obstacles impeding midwifery's capacity to make a substantial impact on enhancing health outcomes (Shaban et al., 2012). Consequently, this lack of societal recognition and image negatively impacted women's choices.

Several studies (Anwar et al., 2014, Brodie, 2002, Battersby and Thomson, 1997) highlighted that women's options were constrained by the lack of awareness and undervaluation of midwifery-led services within society. These studies not only acknowledged the absence of marketing (Anwar et al., 2014) but also the inadequacy of government provision of midwifery services (Brodie, 2002) despite available evidence. Additionally, in cases where midwifery-led care was available, women were not informed that this was an option by other healthcare professionals (Battersby and Thomson, 1997).

Policies and laws

Medical domination of the health services was emphasized as an obstacle to the implementation of midwifery-led services. In Brodie (Brodie, 2002) and Shaban (Shaban et al., 2012) midwives described how their scope of practice was limited due to medical dominance of all aspects of maternity care and "a frightening balance and use of power" [36] (p.9).

Certain aspects of *midwifery education* were also found to impede implementation. Midwives noted insufficient preparation amongst recently graduated midwives, characterised by a shortage of practical skills and absence of adequate support from midwifery educators (Brodie, 2002). The same study also recognised a lack of educational resources for midwives re-entering the workforce after extended breaks, as well as for rural midwives who struggle to maintain their emergency skills. Furthermore, the requirement of a midwifery bachelor's degree as the minimum level of education was emphasised by midwifery educators (Shaban et al., 2012) who argued that this would warrant both quality in midwifery care and opportunities for midwives to pursue higher education. Lastly, midwives expressed confidence that their education adequately equipped them to deliver antenatal care within the community though they felt that it had favoured the management of 'normal' cases or maintained a balanced approach between normal and abnormal scenarios (Battersby and Thomson, 1997). Conversely, general practitioners (GPs) believed that their education leaned heavily towards abnormal cases. Furthermore, both midwives and family doctors demonstrated a significant deficiency in their comprehension of each other's educational backgrounds and ongoing professional development requirements (Battersby and Thomson, 1997).

Inner setting domain

Tension for change

The major concern voiced by all the family doctors in Battersby and Thompson's (Battersby and Thomson, 1997) study related to the financial implications of implementing midwifery-led care services. Doctors reported feeling 'nervous' and 'threatened' by the potential loss of income. They were happy for midwives to 'take on the care' unless that meant financial consequences for them.

Relational connections

Two studies revealed how *gaps between professional cultures* hindered implementation. Variation in the perception of risk was seen between midwives and doctors who tend to view childbirth as 'more medically oriented' (Battersby and Thomson, 1997), "potentially risky" (Collin et al., 2000) and favour intervention, whereas midwives emphasise a natural approach and rely on the mother's trust in her capabilities. This dichotomy often led to tension, lack of trust in each other's methods (Brodie, 2002) and differing judgments on clinical intervention and even the safety of birth locations, as many doctors advocated hospitals are the only secure setting for births (Collin et al., 2000). Participants described the gaps in their care cultures as "women centred vs medical controlled care" (Brodie, 2002)(p.7).

Antenatal care responsibility was also found to be an issue, with midwives reporting a feeling of 'abuse' from family doctors who took credit but did not conduct the antenatal examinations, and doctors believing they were owed overall responsibility for care as a result of certain 'system-imposed' limitations on the midwife's role such as their inability to request scans or make direct referrals (Battersby and Thomson, 1997). In another study responsibility was explored differently, between professional and client. Doctors view themselves as having imbalanced knowledge towards clients, defining authority, and perceiving significant responsibility over care. In contrast, the interviews with midwives demonstrate a distinct vision of the midwife-patient relationship where expertise, authority, and responsibility are shared with the woman, empowering the client to take a more active role in their care (Collin et al., 2000).

Table 3
Summary of review findings.

CFIR Domain	Findings (#)	Studies contributing to the review finding	Type of research	Dependability	Credibility	ConQual Score	Comments
CFIR Domain I: Innovation domain (i.e., innovation characteristics)	**# 1:** Cost - midwifery services were seen as **affordable** and therefore facilitating implementation	Anwar et al., 2014	Qualitative	Moderate 1	High	Moderate	Dependability downgraded one level due to results from 1 single study only. Credibility was high, with all findings unequivocal.
FIR Domain II: Outer setting domain (i.e., environmental factors)	**# 2:** Local attitudes, such as **lack of professional recognition about the practice of midwifery,** were seen as hindering implementation	Brodie, 2002; Collin et al., 2000; Shaban et al, 2012	Qualitative	Moderate 1	Moderate	Moderate	Dependability downgraded one level due to results from studies scoring only 3 "yes". Credibility was moderate, with unequivocal and one non-supported finding.
	# 3: Local conditions, such as **constraints on women's choice**, were seen as hindering implementation	Anwar et al., 2014; Battersby & Thomson, 1997; Brodie, 2002	Qualitative	Moderate 1	Moderate	Moderate	Dependability downgraded one level due to results from 2 studies scoring unchanged and 1 study with 3 "yes". Credibility was moderate, with unequivocal and one non-supported finding.
	# 4: Local conditions, such as lack of s**ocietal recognition and image**, were seen as hindering implementation	Anwar et al., 2014; Brodie, 2002; Shaban et al, 2012	Qualitative	Moderate 1	High	Moderate	Dependability downgraded one level due to results provided from 1 study unchanged and 1 study scoring 3 "yes". Credibility was high, with all findings unequivocal.
	# 5: Policies and laws, such as **medical domination of health services**, were seen as hindering implementation	Brodie, 2002; Shaban et al, 2012	Qualitative	Moderate 1	High	Moderate	Dependability downgraded one level due to results from 1 study unchanged and 1 study scoring 3 "yes". Credibility was high, with all findings unequivocal.
	# 6: Policies and laws, such as **midwifery education**, were seen as hindering implementation	Battersby &Thomson, 1997; Brodie, 2002; Shaban et al, 2012	Qualitative	Moderate 1	High	Moderate	Dependability downgraded one level due to results from 1 study unchanged and 2 studies scoring 3 "yes". Credibility was high, with all findings unequivocal.
CFIR Domain III: Inner setting domain (i.e., organisational factors)	**# 7:** Tension for change, such as **changes in the provision of antenatal care (e.g., financial threat)**, were seen as hindering implementation	Battersby & Thomson, 1997;	Qualitative	Moderate 1	High	Moderate	Dependability downgraded one level due to results from 1 study only which scores only 3 "yes". Credibility was high, with all findings unequivocal.
	# 8: Relational connections, such as undefined **responsibility for antenatal care** or **gaps between professional cultures**, were seen as hindering implementation	Battersby & Thomson, 1997; Brodie, 2002; Collin et al., 2000;	Qualitative	Moderate 1	Low	Low	Dependability downgraded one level due to results from 3 studies scoring 3 "yes". Credibility was low with two unequivocal and one non-supported finding.
	# 9: Work infrastructure, such as **stress, workload and supply of midwives**, were seen as hindering implementation	Battersby & Thomson, 1997; Brodie, 2002; Shaban et al, 2012; Walker et al., 2004	Qualitative	Moderate 1	High	Moderate	Dependability downgraded one level due to results from 3 studies scoring 3 "yes" and 1 study unchanged. Credibility was high, with all findings unequivocal.
	# 10: Compatibility, such as the legal and **organisational structure**, were seen as hindering implementation	Collin et al., 2000; Olson & Couchie, 2013; Walker et al, 2004	Qualitative	Moderate 1	Low	Low	Dependability downgraded one level due to results provided from 3 studies scoring 3 "yes". Credibility was low with two unequivocal and one non-supported finding.
	# 11: Compatibility, such as the legal and **organisational structure**, were seen as facilitating implementation	Battersby & Thomson, 1997	Qualitative	Moderate 1	High	Moderate	Dependability downgraded one level due to results from 1 study only which scores 3 "yes". Credibility was high, with all findings unequivocal.
	# 12: Relational connections, such as effective **team structures** in **the provision of antenatal care**, were seen as facilitating implementation	Battersby & Thomson, 1997; Walker et al., 2004	Qualitative	Moderate 1	High	Moderate	Dependability downgraded one level due to results provided from 2 studies scoring 3 "yes". Credibility was high, with all findings unequivocal.
	# 13: Access to knowledge and information, such as **up-to-date continuous professional**	Battersby & Thomson, 1997;	Qualitative	Moderate 1	High	Moderate	Dependability downgraded one level due the results came from only 1 study which scores only

(*continued on next page*)

Table 3 (*continued*)

CFIR Domain	Findings (#)	Studies contributing to the review finding	Type of research	Dependability	Credibility	ConQual Score	Comments
	development, were seen as facilitating implementation # **14:** Culture of client-centeredness, such as **midwifery presence, women's satisfaction, personalised relationships, and empowerment of women to make decisions**, were seen as facilitating implementation	Anwar et al., 2014	Qualitative	Moderate 1	High	Moderate	3 "yes". Credibility was high, with all findings unequivocal. Dependability downgraded one level due to results from 1 study only. Credibility was high, with all findings unequivocal.
CFIR Domain IV: individuals' domain (i.e., individuals' factors)	# **15:** Capability of midwives, such as **admiring maturity and accountability acceptance**, were seen as facilitating implementation	Anwar et al., 2014; Walker et al, 2004	Qualitative	Moderate 1	High	Moderate	Dependability downgraded one level due to results from 1 study unchanged and 1 study scoring 3 "yes". Credibility was high, with all findings unequivocal.

[1]Downgraded 1 level

Returning to 'system-imposed limitations', the *compatibility of midwifery-led care with the existing legal and organisational structures* posed a concern. Studies revealed a range of obstacles from the organisational perspective. Adding to the already mentioned limitations in ordering ultrasound scans and make direct referrals other obstacles were identified such as order hospital beds and prescribe basic medications (Battersby and Thomson, 1997), order laboratory work, access patient records, prescribe in the public system (Olson and Couchie, 2013) or have access to timely transportation to attend homebirths (Walker et al., 2004). Collin et al. (Collin et al., 2000) reported a lack of clear articulation from the outset of implementation of the new midwifery-led care service and conventional medical practices, along with undefined legal responsibilities, led to challenges in bridging the gap between political intent and actual cooperation during the implementation period. These uncertainties and lack of precision hindered the establishment of robust relationships between healthcare professionals (Collin et al., 2000). One study (Battersby and Thomson, 1997) identified the organisational structure as a facilitator to the midwifery-led care model emphasising that the model achieved was working "quite well" and that they felt the women got "a nice balance"[(p.94)].

Work infrastructure, such as stress, workload and supply of midwives, were seen as hindering implementation. Midwives expressed reservations and concerns or were reluctant to the implementation of midwifery-led care due to 'overwhelming worry' over adding to their already busy workload (Walker et al., 2004, Battersby and Thomson, 1997). The same was expressed by midwives in Shaban et al. (Shaban et al., 2012) and Brodie (Brodie, 2002) which added concerns over staff shortages and skill mix issues which generated high levels of stress and concerns over safety and quality.

Facilitators to the implementation of a midwifery-led care

Innovation domain

Cost was identified as a facilitator in the study of Anwar et al. (Anwar et al., 2014). Women reported that midwifery-led services were more affordable, noting similarities in service provision compared to doctors while appreciating quality and the constant presence of the midwife in contrast to the doctor.

Inner setting domain

Good relational connections, such as *effective team structures* were seen as facilitating implementation. This was reported in the study of Battersby & Thomson (Battersby and Thomson, 1997) and Walker et al. (Walker et al., 2004) where certain midwives recognised the effective collaboration within the team, noting its positive reflection on the safety and quality of care provided. Similarly, family doctors within the same team recognised the value of midwifery, affirming that "there' s very, very little that we can do that the midwife can't do" (Battersby and Thomson, 1997).

Midwives' up-to-date *knowledge and information*, enforced by legal requirements, was seen as positively affecting implementation.

A *culture of client-centeredness* amongst midwives was found in the study of Anwar et al. (Anwar et al., 2014). Women welcomed the personalised relationship established with the midwives, their constant presence such as during labour as well as their gentle manner. They reported feeling listened-to, nurtured, and empowered to make choices. All these aspects were considered facilitators of implementation. Women shared these positive experiences through informal channels, such as word-of-mouth, creating a ripple effect that encouraged other women to opt for midwifery-led services.

Individuals domain

Finally, regarding individual characteristics, women reported valuing the *maturity and capability* of the midwives (Anwar et al., 2014) who were knowledgeable and involved women in their care through education and information sharing. Walker et al. (Walker et al., 2004) also reported *accountability acceptance* as an individual characteristic that facilitated implementation. Midwives were willing to accept responsibility for their own practice, autonomously caring for low-risk women and collaboratively for higher risk women.

A visual representation of barriers and facilitators to the implementation of midwifery-led care using CFIR is presented in Fig. 2.

Discussion

The barriers and facilitators identified in the studies shared coherence despite the range of study contexts. Although the studies included in this review were published between 1997 and 2014, this time frame reflects the narrow focus on transitions from doctor-led or shared-care models to midwifery-led models of care. More recent studies explore midwifery-led care in contexts where it is already established or examine its introduction in low-resource settings or in comparison to traditional birth attendants. Such contexts differ substantially from our research focus and were therefore excluded to maintain conceptual clarity.

Despite their publication dates, the selected studies offer valuable and relevant insights that remain consistent with contemporary priorities in maternity care, including those outlined by WHO (WHO 2024) such as care that is respectful, woman-centred, and evidence-based.

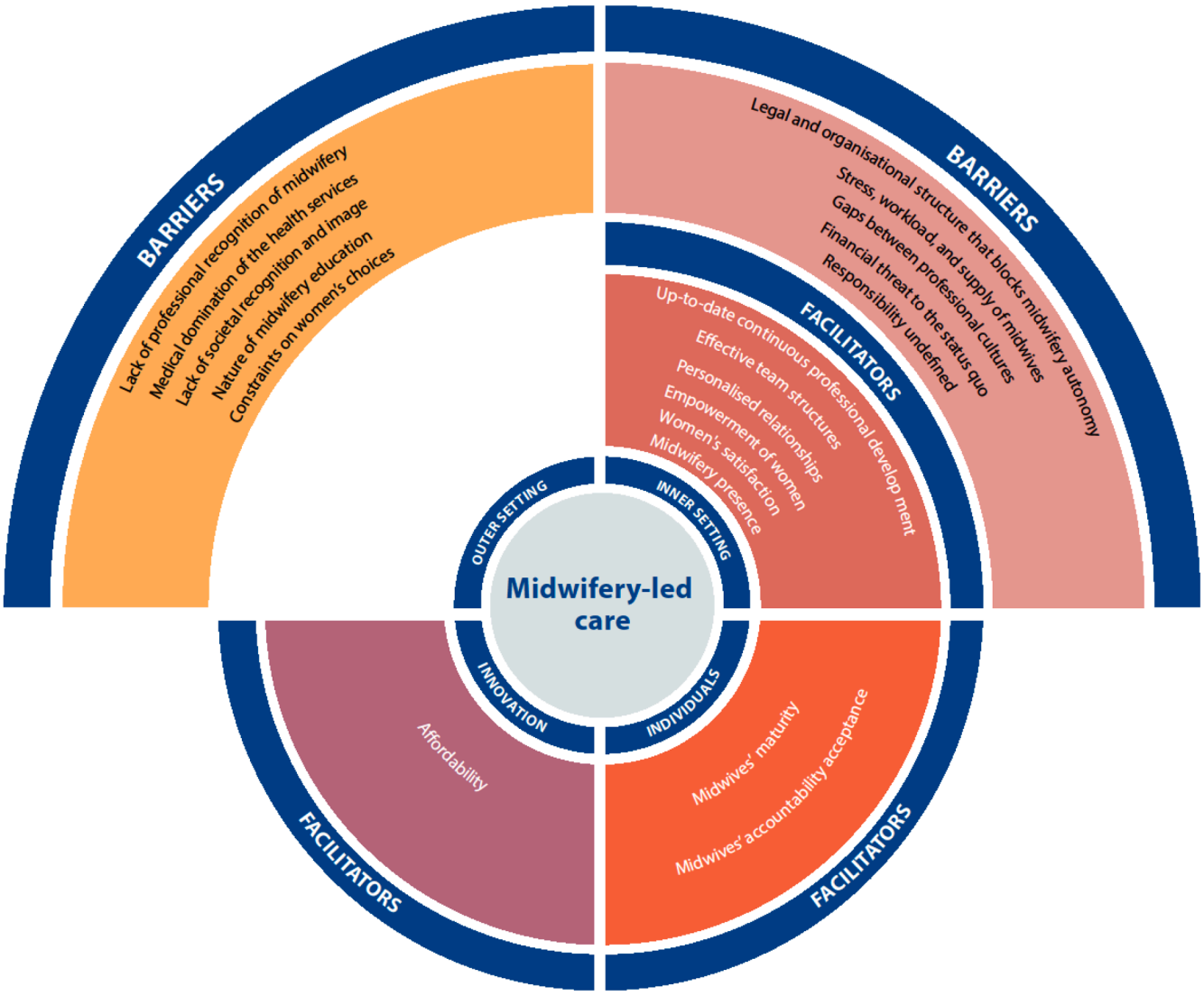

Fig. 2. Visual representation of barriers and facilitators to the implementation of midwifery-led care within CFIR domains.

Upon examination of their visual representation, it becomes evident that they have limited association with the Innovation Characteristics or Characteristics of the Individuals domains. Instead, they are predominantly related to the Outer Setting (e.g., external policy and incentives, patient needs and resources) and Inner Setting (e.g., organisational culture, networks and communications, and leadership engagement) domains on the implementation of health innovations and evidence-based practice, as highlighted by Chaudoir et al. (Chaudoir et al., 2013) and Li et al. (Li et al., 2018). This underscores the importance of considering organisational and environmental factors when planning and implementing interventions such as midwifery-led care models, as these elements can significantly impact implementation success.

No constructs were mapped to the implementation process domain, as none of the studies reported on specific implementation strategies such as planning, engaging, executing, or evaluating, activities considered central to the implementation process (Damschroder et al., 2009). The absence of such reporting highlights a gap in the literature and suggests that greater emphasis on documenting and evaluating implementation strategies is needed, consistent with recommendations from Proctor et al. (Proctor et al., 2011).

The *invisibility of midwifery* as a profession seems to be a key phenomenon behind the sub-themes identified in the outer setting domain. Several authors argue that gendered power dynamics render midwives "invisible" within the healthcare system, resulting in lack of recognition for their specialised skills and expertise (Day-Stirk and Fauveau, 2012) (Plumwood, 1993), despite robust evidence supporting their contribution to women's health. This invisibility strengthens doctors' authority (traditionally upheld by male dominated systems) (Mattison et al., 2020) within maternity services. Likewise, in societies where the midwife does not have a visible role, the general public may not fully understand their scope of practice and may underestimate their importance in providing quality maternal and newborn care (Mattison et al., 2020). The resulting constraints to women's choices, along with resistance to implementing evidence-based practices, reflect the broader dynamics of this powerplay.

This limited visibility also extends into policy, governance, and educational arenas. Midwives often encounter challenges advocating for policy reforms and achieving full integration into healthcare systems, especially in settings where they have relatively lower or non-existent representation in decision-making structures relative to other health professionals (United Nations Population Fund 2021). These issues are especially relevant in relation to CFIR's Outer Setting: External Policy and Incentives construct, which highlights how lack of supportive policy environments can impede the uptake of innovations like midwifery-led care.

In the inner setting domain, team structures were noted to be a either

a facilitator or a barrier depending on their functionality. Effective and collaborative team dynamics supported implementation, whereas poorly defined roles, perceived threats to professional identity, and a lack of shared values hindered progress. For instance, challenges arose when team members felt threatened by the emerging role of midwives, when team roles were unclear or poorly defined, or when there was a lack of shared vision and values. These challenges reflect CFIR constructs such as Networks and Communications, Culture, and Implementation Climate, and align with the broader literature on organisational culture, which shows that dysfunctional teams can significantly undermine care quality (Dixon-Woods, 2010, Buljac-Samardzic et al., 2020, Liberati et al., 2021) and contribute to severe system-wide failures (Mannion and Davies, 2018). The importance of supportive leadership and midwifery autonomy, key enablers of physiological approaches to labour and birth, is also well documented (McNiven et al., 2011) (Healy et al., 2016) Darling et al. (Darling et al., 2021). These elements are widely recognised in the literature, including by global health authorities such as the WHO (WHO, 2024), the International Confederation of Midwives, and in implementation standards for Midwifery Units (Rocca-Ihenacho et al., 2018). They align closely with CFIR's Leadership Engagement construct, underscoring their central role in the successful implementation of midwifery-led care models.

Despite substantial economic evidence supporting the benefits of midwifery-led models of care, including improved outcomes and economic gains when compared to doctor-led or shared care models of care (Sandall et al., 2016, Fawsitt et al., 2017, Koto et al., 2019, Attanasio et al., 2020), facilitators such as financial advantages and client-centredness were reported in only one of the studies reviewed. Despite their recognised importance in health policy decision-making (Rabarison et al., 2015) this limited attention may be explained by a lack of understanding among stakeholders and the public, who may equate "cheaper" care with lower quality (Hussey et al., 2013). In some healthcare cultures, frequent medical interventions are still perceived as better, contributing to resistance toward less interventionist, midwifery-led approaches.

It is clear that implementing midwifery-led care models requires a multi-faceted approach that addresses not only clinical structures but also the broader, cultural and policy-level factors that shape professional recognition and public perception. Future efforts should adopt a structured approach guided by implementation frameworks such as CFIR, which can help identify and address context-specific determinants of success across multiple domains. In particular, it can support the design and tailoring of targeted strategies to address the unique challenges and facilitators identified in this review, as well as other context-specific factors. By drawing on these tools, implementers can enhance the adoption, integration, and sustainability of midwifery-led care, ultimately improving maternal and newborn health outcomes.

Strengths and limitations

Despite a comprehensive and systematic search strategy only seven studies met the inclusion criteria. This limited number may, in part, be due to the highly focused nature of our research question, specifically on the implementation of midwifery-led services in contexts transitioning from doctor-led models, as it was considered significantly different from expanding existing midwifery-led care, shifting to continuity models, or introducing midwifery-led services where no care had previously been available, but also due to the limited volume of published research in this area. This targeted approach ensured conceptual clarity but may have reduced the number of eligible studies.

The included studies spanned diverse health systems and geographical settings. Although this limited generalisability, common themes emerged across contexts**.** A point to consider is the temporal scope of the evidence base, as the included studies were published up to 2014. This limitation stems from a notable lack of more recent published literature on this precise topic, which our review highlights as an important research gap. Given the evolving nature of health systems and policy environments, relying on data that is over a decade old may mean that some conclusions reflect conditions that have since changed. We acknowledge this aspect and its potential influence on the generalisability and contemporary applicability of our findings, underscoring the need for further research in a wider range of settings.

Most studies were of adequate to high methodological quality based on the JBI Critical Appraisal Checklist. ConQual assessments showed high credibility for most findings, although some findings were downgraded because they were based in one study only, or due to the absence of participant quotations (eg. findings 8 and 10 were downgraded due to the absence of participant quotations in one study (Collin et al.), despite efforts to retrieve these from the authors).

The use of an implementation framework to synthesise the themes was a strength, enabling a more nuanced understanding of the organisational, cultural, and system-level factors influencing implementation.

Recommendations for practice: In addition to substantiated evidence supporting the advantages of midwifery-led models of care, the stakeholder perceptions synthesised in this review further support their implementation. These findings are especially relevant in settings with an accessible midwifery workforce, trained to international standards, and where environmental and organisational factors can be conducive to supporting the midwifery profession.

Recommendations for policy: Future policies should integrate evidence-based, context-sensitive strategies to target the identified barriers and facilitators. Implementation frameworks like CFIR can help guide these efforts. Addressing systemic challenges, such as the underrepresentation of midwifery within healthcare systems and the lack of recognition for its critical role is essential. Engaging stakeholders including midwives, doctors, policymakers, and community representatives will be crucial for the success and sustainability of policy change.

Recommendations for research: Given the scarcity of studies found, more research is needed to explore this transition in depth. Future studies should employ robust designs, report on strategies used, and examine both outcomes and mechanisms of change. Although various countries have undergone this transition, their implementation experiences remain underreported.

Conclusion

Best available evidence should be a cornerstone of policymaking (Brownson and Chriqui, 2009). Yet, competing interests, financial considerations, cultural norms, trade-offs, biases, and interest groups agendas collectively influence the translation of research evidence into policy decisions (Malekinejad et al., 2018) and the success of implementation (Damschroder et al., 2022).

Despite the crucial role midwives play in maternal and newborn care, they face systemic challenges within that undermine their contribution to healthcare systems or society globally.

This qualitative systematic review identified a range of barriers and facilitators encountered by health systems transitioning from doctor-led to midwifery-led care models. Barriers most related to local attitudes, professional hierarchies, lack of recognition for midwifery, structural limitations, and insufficient education or policy support. Facilitators included strong midwifery capability, client-centred care culture, interprofessional collaboration, and evidence of cost-effectiveness.

These findings highlight the complexity of implementing midwifery-led models and point to the importance of addressing systemic, organisational, and cultural factors. Understanding these factors can help policymakers design strategies that mitigate challenges and enhance facilitators, thus fostering implementation success. While the studies included in this review date from 1997 to 2014, with no later studies identified that fitted the inclusion criteria, the findings remain relevant in contexts where midwifery integration faces resistance. More research is needed to examine contemporary implementation efforts and strengthen the evidence base for sustainable midwifery integration.

Ultimately, the goal should be to ensure that health systems are responsive to what women actually need, providing them with genuine, supported choices to access midwifery-led care models, in recognition of women's choice and as a commitment to respectful, evidence-based, and person-centred care.

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CRediT authorship contribution statement

Andreia Soares Goncalves: Writing – original draft, Visualization, Software, Project administration, Methodology, Funding acquisition, Formal analysis, Data curation, Conceptualization. **Márcia Pestana-Santos:** Writing – review & editing, Visualization, Validation, Methodology, Formal analysis, Data curation. **Christine McCourt:** Writing – review & editing, Validation, Supervision, Methodology, Conceptualization. **Ana Paula Prata:** Writing – review & editing, Validation, Supervision, Methodology, Funding acquisition.

Declaration of competing interest

The authors declare that they have no known competing financial interests or personal relationships that could have appeared to influence the work reported in this paper.

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Supplementary materials

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