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Enabling Safe Quality Midwifery Services and Care in Northern Ireland

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FOREWORD

The women and babies of Northern Ireland have the right to safe, equitable, quality maternal and newborn health care and services. This report has found both serious weaknesses and real strengths in the current provision of midwifery and wider interdisciplinary care for mothers and their babies. Northern Ireland is not alone in experiencing constraints to quality care provision for women and babies - but there is now a real opportunity for Northern Ireland to own these findings and the recommendations and create a system that works for all.

This report is grounded in the experiences of women and families, and the input of midwives and the interdisciplinary team, managers, and senior decision-makers from across Northern Ireland. Experienced clinical, research, and education colleagues from across the UK and Canada supported the identification of key evidence and best practice. This range of perspectives has enabled an open and honest dialogue about current problems, and identification of strategies for improvement that are both practical and evidence informed. I would like to thank each and every person for their vital input. Their active and ongoing engagement has forged a community ready to participate in implementing change.

I hope and expect that the findings of pain and distress described in this report will be met with the respect and response they deserve. Women and their partners described a range of unacceptable experiences in pregnancy, labour and birth, and following birth that have caused physical and emotional harm, sometimes causing long-lasting distress. Many midwives and interdisciplinary colleagues described working in circumstances where they cannot give the quality of care that they know is needed and where they felt care was at times unsafe, resulting in stress and moral distress. The voices of the women and families and of the staff who spoke so openly – often at the cost of re-experiencing their trauma and harm - must result in the outcome they all hope for; a better experience for women, babies, and families in the future.

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I also hope and expect that the findings of excellent care described by some women and families, and the examples of innovative services identified across the region, will be recognised, respected, and used to build a better system for all. Women are clear about what they need and want; respectful, kind, individualised, supportive, evidence-informed, relationship-based care and services across the whole maternity journey. Many staff are clear that they want to provide it – I have been heartened and impressed with the insight, strength, and determination of many midwives, midwifery students, interdisciplinary colleagues, and senior decision-makers despite the difficult context in which they are working. The absolute dedication and commitment of many staff shone through many of my conversations, as did the determination of women themselves to contribute to making things better for women, babies and families in the future.

The next steps are critically important. They will require a coordinated and consistent approach across all of Northern Ireland, development of structures and processes, a significant change in culture, and a radical shift in the relationship with women. It will take time and it will not be easy, but all the signs indicate that there is an openness and willingness to do this.

How we care for women and babies is a measure of our society. In the course of this work I have encountered many people in Northern Ireland who share the understanding that pregnancy, birth, and the early weeks of life are fundamentally important for each woman, baby and family, and for communities and populations. There is a real appetite for change at most levels of the system. Positive change is possible – by working together to implement the recommendations it can be a reality.

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ACKNOWLEDGEMENTS

It has been a privilege to listen to the voices and views of all those who talked with me and who participated in the listening events; approaching four hundred individuals in Northern Ireland - women and their partners, advocacy and community groups, students and professionals at all levels - who all care deeply about maternity care and services. Every single voice has been invaluable in helping to ascertain what is currently working well, understand existing challenges, and identify what needs to change. They provided rich, articulate accounts, sometimes at personal cost as they re-told distressing experiences. Their insights and experiences have all helped to inform this work, and I am profoundly grateful.

This report has benefitted from the wisdom and guidance of the interdisciplinary professionals from clinical, education, research, management, and policy backgrounds who gave so generously of their time to support the work. I wish to acknowledge and thank all the members of the Expert Group from Scotland, England, Wales, Northern Ireland and Canada (named in Appendix 1) who volunteered their knowledge and expertise to enable this report to be truly evidence based, providing advice on methodology, support in identification and analysis of evidence and data, and for being critical readers to my report. I extend my thanks also to the Advisory Group (named in Appendix 2) for providing significant expertise, guidance and support, mainly from an all-important Northern Ireland perspective and also bringing important perspectives from England and Wales. Others supported the work of the Expert Group sub-groups, including Dr Gerry Gormley, Clinical Professor and General Practitioner, Queen's University Belfast; Denise Boulter, Assistant Director of Nursing - Patient Safety and Quality, Public Health Agency, and colleagues from the Public Health Agency. Other colleagues who supported aspects of the work or acted as critical readers included Martin Bradley, Chair of Belfast Health and Social Care Trust; Prof Eugene Declercq, Professor of Community Health Science, School of Public Health, Boston University USA; Francesca Entwistle, formerly of UNICEF UK Baby Friendly Initiative, Fran McConville, previously Technical Adviser Midwifery for World Health Organisation, Ms Roshni R Patel, Consultant High Risk Obstetrician and Clinical Director of Obstetrics & Gynaecology, Chelsea and Westminster NHS Foundation Trust, and MBRRACE-UK lead Obstetric Collaborator.

I express my deep sense of gratitude to the Heads/Interim Heads of Midwifery of the five Northern Ireland HSC Trusts and to colleagues across the Public Health Agency, who, despite day-to-day pressures, were so diligently responsive to all requests for information made of them.

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The authors of the positive service developments (Appendices 11 and 12) gave generously of their time to provide the details about their important work. The learning from these examples, from across Northern Ireland, England, Wales, Scotland and Spain, has strengthened our understanding of the characteristics of quality care and services.

The report would not have been possible without the Secretariat Team (Appendix 3), who have worked tirelessly alongside me, providing constant guidance, logistical and administrative support, often working at pace and to tight deadlines. I offer a special thanks to Dr Jenny McNeill, Reader at Queen's University Belfast and the senior researcher of this report, for her dedication throughout, especially in leading the evidence reviews and data analysis; and to Claire Williams, who guided the team throughout the complex process of conducting this work. Dr Dale Spence, Midwifery Officer to September 2023, Caroline Keown, Chief Midwifery Officer from January 2024, and Maureen Ritchie, Midwifery Support Officer throughout this time, provided constant support. To all colleagues in the Department of Health - your contributions, guidance, and support were instrumental in the successful completion of this report.

With regard to the cross-sectoral multidisciplinary workshop that was influential in informing the recommendations; a special thanks to Co-chairs Emma Fraser, Leslie Altic and Verena Wallace, as well as to the interdisciplinary colleagues who helped facilitate the rich discussions which took place. As service user representatives, Emma Fraser and Leslie Altic have been the conduit between the Secretariat Team and the service users and advocates of maternity services throughout the work of this report; they have been immensely generous with their time, their knowledge, and their networks.

I acknowledge, with great thanks, the key professional, NHS, charitable and government organisations, who meticulously provided necessary information on existing systems, policies and processes.

A final, special thanks to the families whose loss and harm resulted in this report being commissioned. Your experiences have helped to generate knowledge that is important for future parents. We recognise and remember your loss and sadness.

I am incredibly grateful to each and every one of you for giving your time and for providing key lessons for future services and care for women, babies and families. You have been truly instrumental in helping to shape this report.

Nary J. Renfrew



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ABOUT THIS REPORT

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1.0 ABOUT THIS REPORT

This Independent Report was commissioned in May 2023 by the Department of Health (DoH) Northern Ireland (NI). It forms part of a broad programme of work to receive assurance on the safety of maternity and neonatal services for the population of NI.

It resulted from two related developments:

- A request from the Coroner for Northern Ireland that the Department of Health NI take action to investigate her concerns following an inquest into the death of a baby that raised questions about care in Freestanding midwifery led units (MLUs). In the inquest report (available to read [here](#)) the Coroner identified a number of practice and system failings and shortcomings including the management of shoulder dystocia, fetal macrosomia (the baby being large for gestational age), and raised maternal body mass index (BMI). At the time of the inquest, all Freestanding MLUs in NI were closed. The Coroner found that a comprehensive review of the number of staff, experience, training, and policies should be conducted by the DoH, in the event of these Units reopening in the future. In response to this request, the Permanent Secretary asked the Chief Nursing Officer (CNO) for NI, along with the Midwifery Officer, to instigate an inquiry into the issues highlighted by the Coroner.
- Several other reports, both local and national, concerning the safety of services for pregnant women, new mothers, and babies required consideration of the wider health service context that influences midwifery and maternity care and services.

Three Terms of Reference (ToR) were established by the DoH NI to address these concerns:

The first ToR related to key conditions to ensure the safety of Freestanding MLUs:

1. To conduct a comprehensive review of the number of staff, experience, education, training and policies required for Freestanding MLUs (as outlined in para 195 of the Coroner's report)

The second related to the specific circumstances of the baby's death investigated by the Coroner:

2. To consider the need for further guidance to all HSC Trusts in relation to the Coroner's findings regarding the management of BMI and shoulder dystocia

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The third concerned the wider context, recognising that for safe, quality care midwives must work closely with and be supported by other professionals and other parts of the maternity system:

3. To undertake further work to inform a consistent approach to provision of midwifery services, including integration across wider maternity services

A glossary of terms relevant to this report can be found on page 265



SUMMARY OF THE REPORT

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2.0 SUMMARY OF THE REPORT

2.1 Background

This report is an examination of midwifery and the wider maternity care and services across NI. It arose firstly from a Coroner's inquest into a baby's death, with concerns about safety in a Freestanding MLU. [1] Several other reports concerning the safety of services for women and babies both regionally and nationally [2-4] required consideration of the wider health services context of midwifery and maternity care and services.

The aim of the work was to identify the key conditions for safe, quality midwifery and wider maternity services in all settings in NI, to ensure that safe, equitable, respectful, compassionate, and evidence-informed midwifery care is available for all women and newborn infants, wherever and whenever care takes place.

2.2 The Northern Ireland context

Socioeconomic deprivation in NI is a significant factor in the health and wellbeing of the population and NI has the highest proportion of the population living in the most deprived quintile of the United Kingdom (UK). [5] There is a legacy of political instability with adverse impact on funding of public services including the health service. There has been no regional maternity strategy in place since 2018.

All NI rates for stillbirths, perinatal and neonatal deaths exceed the UK average. [6] The complexity of maternity care is affected by increasing rates of poverty [4] and of conditions including obesity and diabetes. Induction of labour and caesarean birth rates in NI have increased rapidly in the past decade and are still rising; more than 38% of women now have their labour induced, and more than 40% have a caesarean birth. [7] While similar to other UK countries and the Republic of Ireland, these rates are out of step with similar countries internationally.

Nearly all of the approximately 20,200 babies born annually are born in hospital across the five HSC Trusts. All Freestanding MLUs are currently closed; a small number of babies are born in the five small Alongside MLUs and at home. There are longstanding workforce shortages, especially of midwives.

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2.3 Methods

The work was conducted in six inter-related stages between May 2023 and June 2024 (Figure 1). A whole-system and evidence-informed approach was taken to examine the underlying causes of problems, to learn from both negative and positive examples of care and services, and to identify evidence-based solutions. The methods were designed to ensure the involvement and participation of women and families, advocacy groups and charities, midwives and midwifery students, and interdisciplinary professional colleagues throughout. The perspectives of managers, leaders, and senior decision-makers working in service provision and in the organisations responsible for service commissioning and governance were also sought. Colleagues with clinical, public health, education, and research experience and expertise from across NI, the rest of the UK, and internationally, supported the work through input to the work of the Expert and Advisory Groups.

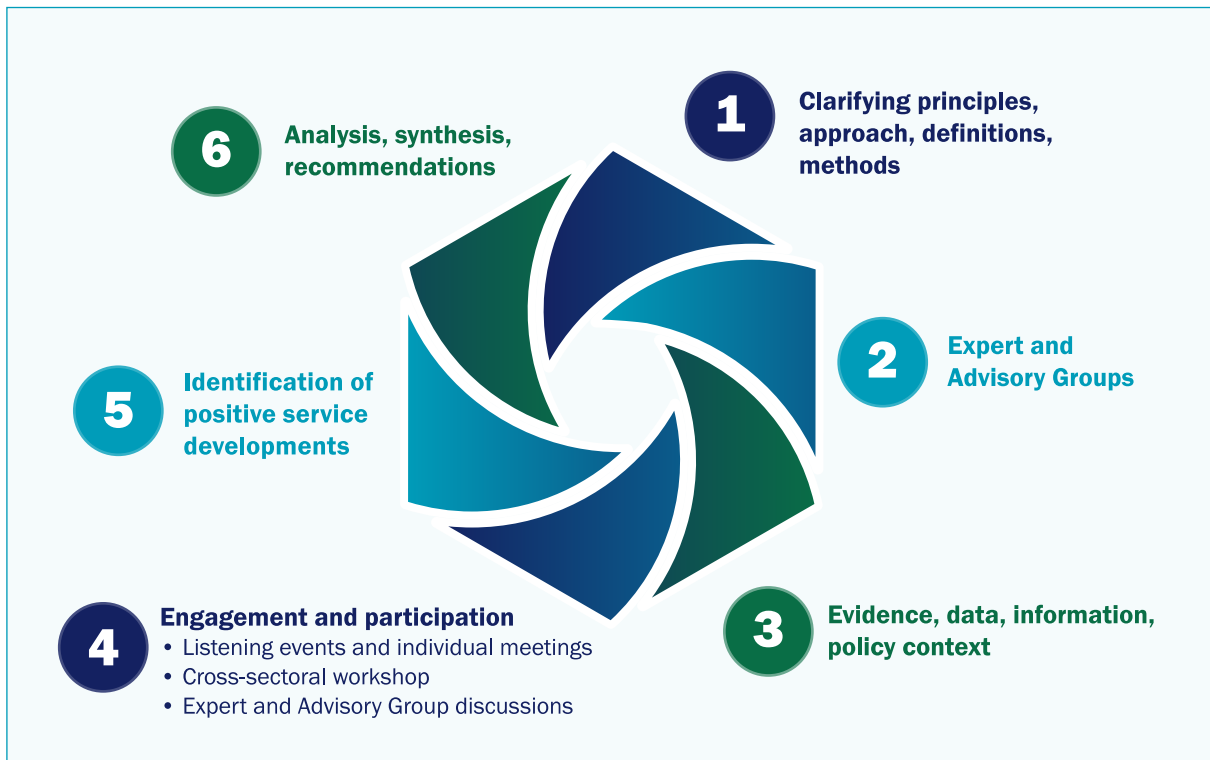


Figure 1: the six inter-related stages of the Independent Report

- We heard directly from 107 individuals including women with recent experience of the maternity services and their partners and representatives of advocacy and community groups; 159 midwifery staff including midwives, midwifery students and educators, maternity support workers (MSWs), midwifery managers and leaders; 30 interdisciplinary colleagues including obstetricians, paramedics, neonatologists/paediatricians, and General Practitioners (GPs); and 80 participants in a cross-sectoral workshop including service users, representatives of advocacy and community groups, students, and interdisciplinary professionals, educators, researchers, managers, and decision-makers. 34 meetings were held with senior decision-makers and representatives of health and social care agencies, commissioners, and Royal Colleges.
- Eight rapid efficient evidence reviews were conducted.
- Fifteen positive examples of midwifery services have been used to identify characteristics of successful services; 11 from across NI, one each from Scotland, England, Wales, and Spain.
- Responses to questionnaires were received from all Heads of Midwifery, all HSC Trust Boards, and service and education commissioners.

The widespread engagement and participation proved to be both feasible and immensely valuable, resulting in detailed information about current care and services and informing practical solutions. The recognition of the need for change, and the willingness to be involved in improving the system, was palpable.

A systematic analysis was conducted to draw together and learn from all of the findings. Two evidence-based frameworks were used to identify the essential components of safe, quality maternal and newborn care [8] and the key conditions the health system needs to ensure are in place to support safe, quality care and services [derived from Mattison et al [9] Appendix 5b]. Examination of these components informed an evidence-informed diagnosis of the underlying causes of the problems. This analysis identified strengths and gaps in current care and service provision, and identification of the evidence base for the recommendations.

2.4 What we found

Women and staff repeatedly reported that women are not consistently receiving the quality of care they need and expect in pregnancy, labour and birth, and postpartum. Some women and partners described disrespectful and damaging interaction with staff. There are deficits in care across the maternity journey, most notably in information and education for women in pregnancy, care in late pregnancy/early labour, postnatal care, and safe options for care in labour and birth outside of labour ward. These factors and the resultant inequities in care provision contributed to serious adverse outcomes and trauma for some, and pain and distress for many more.

Midwives and the wider interdisciplinary team are working in conditions where they cannot consistently give the quality of care that they know is needed and that they want to provide, and their concerns are not always heard. Services are fragmented and there is a disconnect between hospital and community services and a core focus on treating problems, not on prevention and support. The high rates of induction of labour and caesarean birth in the context of significant workforce pressures are leading to an increasingly task-focussed service and a culture that is negatively affecting both women and staff. Midwives are not able to practise the full scope of midwifery care or consistently provide the individualised care and continuity of care and carer which women told us they value and need.

There is insufficient interdisciplinary support for midwives caring for women in labour in midwifery units and at home, especially women who wish options for care ‘outside of guidance’. These factors are resulting in inadequate care for some women and babies, stress and moral distress for many staff, experienced staff choosing to leave, and students and newly qualified staff not getting the experience they need. Many reported that such working conditions are not sustainable.

At the same time it is important to recognise that many women experience good quality care provided by midwives and the wider interdisciplinary team despite the challenging working conditions. There are examples of excellent, positive and innovative service provision across NI, though these were not reliably supported by the system. Characteristics of positive services have been identified (Section 5.3) and can be used to help to turn best practice into common practice. There are talented and committed staff in clinical practice, management, and education. Work is being put in place to improve safety, and there is a strong evidence base to guide the development and transformation of services.

2.5 What are the barriers?

Northern Ireland does not have all the necessary structures and processes in place to effectively drive equitable, region-wide improvement in care and services. Inequalities in care and outcomes and inconsistent processes are apparent across the region. A framework for effective interdisciplinary education and training is lacking. As a result there is inconsistent and fragmented service delivery, staff working in siloes, and unclear accountability. Across the maternity system there is limited scrutiny and evaluation including inadequate access to appropriate metrics and a lack of information about women’s experiences of care and staff wellbeing; this may explain why some at senior levels of management and governance seemed to be unaware of the extent of the problems.

2.6 What is needed?

2.6.1 Responding to the Coroner’s request re Freestanding midwifery led units

It is essential to meet women’s needs for safe, individualised options for care and to ensure that community midwives work in a safe environment by developing safe, quality, equitable, accessible services for labour and birth outside of labour ward. Ensuring safe care and services means that no part of the maternity service should stand alone. There should be a region-wide infrastructure in which community midwifery hubs and alongside midwifery units and home births are fully supported and integrated seamlessly into the wider maternity services. Essential requirements for providing safe, quality care in these settings have been identified (Section 8.2), and a phased approach to implementation is needed with ongoing evaluation.

2.6.2 Key conditions for safe, quality midwifery and wider maternity care and services in all settings

Seven overarching evidence-informed key conditions for safe, quality maternity and neonatal care and services in all settings – hospital and community – and across the whole continuum of care have been identified (Figure 2: details in Section 8.2). These key conditions inter-relate, and for the whole system to function effectively, efficiently, and safely, they all need to be in place.

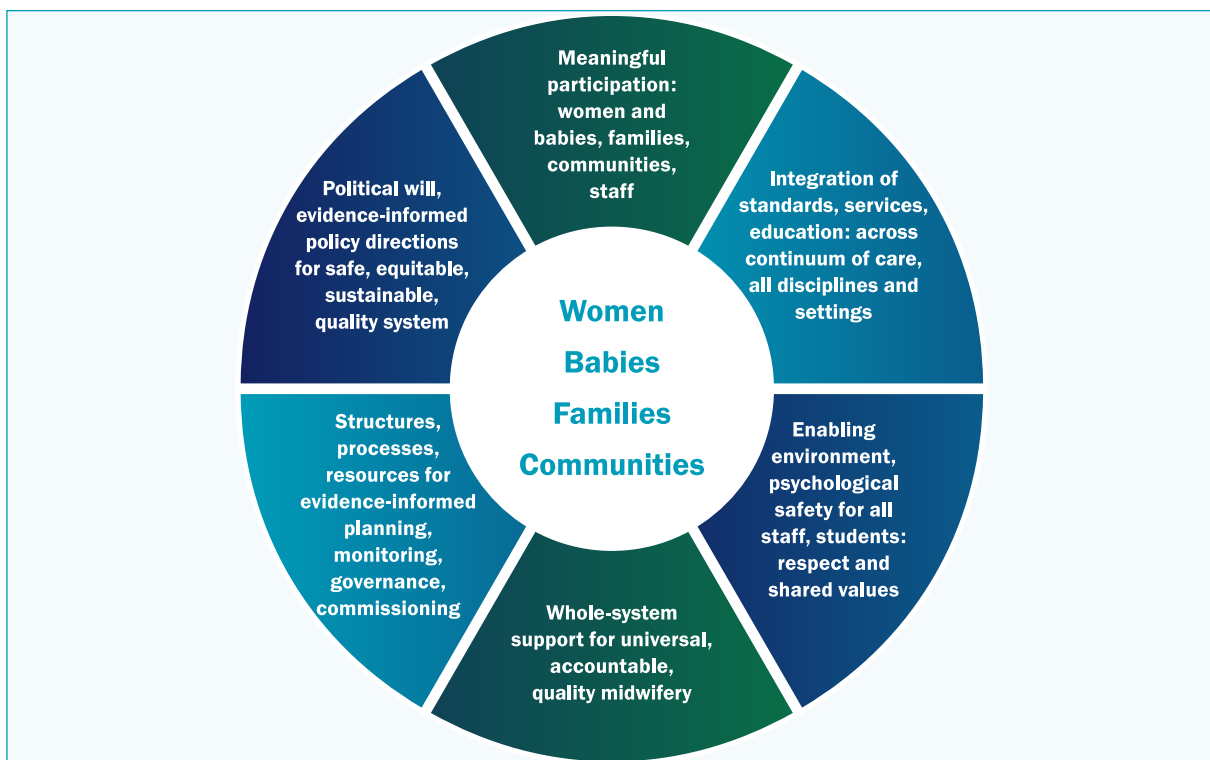


Figure 2: A quality maternal and newborn health system: key conditions for safe, equitable, quality care and services for all women, babies, and families across NI

2.6.3 From evidence to action - the way forward 1: recommendations for change

Thirty-two evidence-informed recommendations for action have been identified (Section 8.3.6), with operational details for each, and consideration of the organisations and groups accountable and responsible for implementation. These recommendations address the system-level issues that must be addressed to enable safe, equitable, quality care and services for women, babies and families. Their implementation will ensure the key conditions are in place for all women and babies, in all settings and across the whole maternity journey, highlighting the qualities that participants identified as essential (Figure 3).

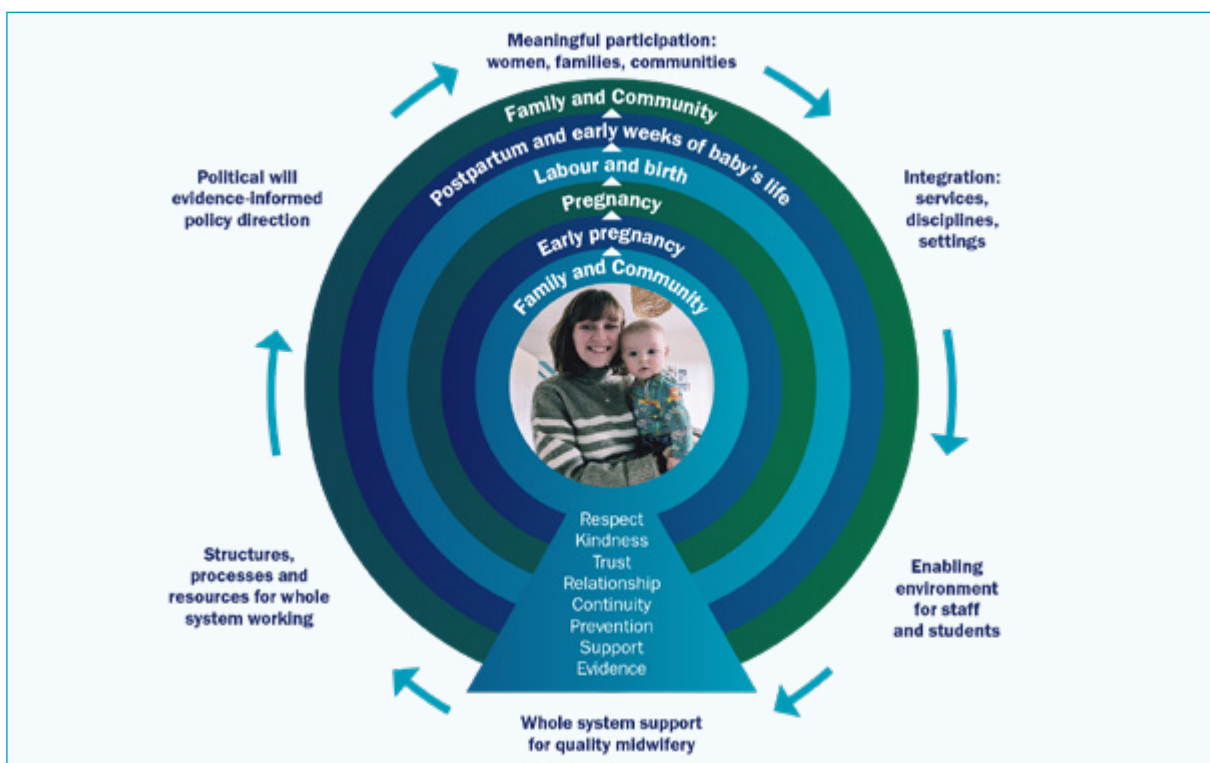


Figure 3: Implementing the key conditions for safe, quality care across in all settings, across the whole system and the whole maternity journey

In summary, the changes needed are:

- **A shared strategic vision for safe, quality midwifery and wider maternal and newborn services in NI with a regional framework for action.** A co-ordinated regional plan is urgently needed, to be fully implemented over five years, informed by evidence of what will work, and with targeted investment that reflects the level of need and the benefit that will result. It should be developed with extensive participation of women and families, advocacy groups, and interdisciplinary staff, and with strong policy and political support, building on the work of this report. *Recommendations 1, 3, 4, 5.*

- **A reconfigured relationship with women, families and communities must be at the heart of the changes;** where women consistently receive care that demonstrates the qualities that participants identified as important; respect, kindness, trust, relationship, continuity, prevention, support, and evidence; and where women, families and communities have meaningful input into the design, delivery and monitoring of services. *Recommendations 1, 2, 3, 4, 5, 6, 7, 15, 17, 18, 30.*
- **A consistent, region-wide, evidence-informed approach to planning, commissioning, standards, provision, monitoring, and review of maternity and neonatal services.** A funded interdisciplinary regional partnership with strong service user and advocacy voice is needed to lead and drive all regional work, and evidence-based regional standards are needed to inform commissioning, governance, and practice across hospital and community. *Recommendations 5, 6, 7, 8.*
- **Improving clinical, psychological, and cultural safety and equity for women, babies and families across the whole continuum of care and in all settings:** recognising the diversity of factors influencing safety, equity, and quality for all women and babies in pregnancy, labour and birth, postnatally, and in the early weeks of life. This should include access to antenatal education and individualised antenatal care, improving care in late pregnancy/early labour especially in regard to induction of labour, and critically, improved postnatal care for all women and babies. *Recommendations 2, 5, 11, 12, 14.*
- **Changing the prevailing work culture to implement an enabling environment for all staff and managers and an open learning culture at every level of the system.** Culture is fundamental to safety, and all staff must be psychologically safe and supported to provide safe, respectful, kind, evidence-informed, interdisciplinary, individualised care for all women and babies, to effectively escalate concerns when needed, and for investigations of adverse incidents to optimise learning rather than blame. *Recommendations 9, 11, 12, 14, 21, 23.*
- **Investment in community as well as hospital services, strengthening midwifery care and services across the whole continuum of maternal and newborn care, and increasing midwives' influence over the safety and quality of care and services.** This should include a phased programme to establish and sustain safe, quality community midwifery hubs and alongside midwifery units to enable women to access options for labour and birth; continuity of midwifery care; support for midwives' work with women living in challenging circumstances and those who wish care 'outside of guidance'; support for midwifery care in labour wards including physiological birth; all in the context of appropriate interdisciplinary working and with recognition of the necessity for midwives' involvement in service planning and decision-making. *Recommendations 1, 2, 5, 11, 13, 15, 16, 17, 19, 20, 22, 24, 25, 32.*

- **Better oversight through improved accountability, monitoring, evaluation, and research:** with monitoring, review, and accountability based on accessible, appropriate information and data from research and evaluation, and improved metrics on clinical, psychological, and cultural safety, including assessment of the views and experiences of women and families, and of staff. *Recommendations 11, 13, 15, 26, 27, 28, 31.*
- **A unified approach to education and training of all staff, including leadership development - especially for midwives - and capacity building for the future.** This should include support for newly qualified midwives (NQMs) to gain the quality of experience they need, and evidence-informed interdisciplinary post-registration/postgraduate education and training at all levels, especially training for emergencies and courageous leadership development. A midwifery career pathway and opportunities for clinical academic careers for all professional groups are needed to strengthen the capability of the whole workforce. *Recommendations 9, 10, 22, 29, 31, 32.*

Priority actions

All of the Recommendations matter. Together they form a quality system to provide safe care for all women, babies and families and whole-system implementation is needed. Individual actions cannot create sustainable, equitable change. But there are three critical priorities that address immediate safety challenges:

1. Postnatal care both in hospital and at home is essential for all women and babies to support women's physical and mental health, to promote optimal infant feeding and attachment between mother and baby, and to provide additional care for women who had difficult experiences in labour and birth. Women having caesarean births have an increased need for care and support postnatally, but the high rates of caesarean birth combined with staffing shortages on postnatal wards are leaving many women vulnerable, sometimes without adequate pain relief or essential care for themselves and their babies. This is affecting the quality of care for all, aggravated by limited postnatal home visiting by midwives. *Recommendations 11, 12, 17, 23, 27, 28, 31.*
2. Improved interdisciplinary working for women requesting care 'outside of guidance', and improved safety for the midwives who care for them. Midwives providing care for women who request care 'outside of guidance' are often working in circumstances where there is inadequate staffing and little interdisciplinary support. Women need better options for such care in both community and hospital settings, and midwives need to be supported throughout by senior midwives and interdisciplinary colleagues. *Recommendations 1, 2, 11, 20.*

3. Psychological safety for all staff. This is critically important both to ensure their own health and wellbeing, and to enable them to speak out and to escalate concerns without fear, confident that their voice will be heard and acted upon. Related to this is the lack of support and voice at Executive and Board levels for several Heads of Midwifery. They play a vital role in management and leadership of the maternity services in both hospital and community and across the whole continuum of care for both women and babies. Without their direct input Boards and Executive do not have adequate information or assurance about the safety and quality of the maternity services. *Recommendations 12, 14, 15, 16, 21, 22, 23, 26, 29.*

2.6.4 From evidence to action - the way forward 2: a framework for transformation

There are strengths to build on. Most staff and service managers are determined and committed to providing the best quality of care. Many women, families, and advocacy groups want to engage in improving the system. There is a readiness for change and improvement in relevant regional organisations.

A regional plan to implement these recommendations should be informed by evidence of what works to improve care and services across hospital and community. This includes ensuring the meaningful participation of women, families, staff, educators, researchers, and decision-makers. Urgent changes are needed, and the system transformation that will support and sustain the necessary changes will require a framework for interdisciplinary education and a phased approach, probably over five years. It should be led by an interdisciplinary region-wide partnership and build on existing strengths. An outline plan and a logic model indicate the essential next steps (Section 8.5.1).

2.7 Why does this matter?

Safe, equitable, quality maternal and newborn care is essential for the survival, health and wellbeing of women and babies. It forms a critical foundation for long-term population health and the wellbeing of all societies. The findings of this report indicate that implementing the recommendations will result in better short, medium and long-term physical and mental health outcomes for women, better health, wellbeing and development for babies, better experiences for all, better attachment and family relationships, better health and wellbeing for staff with improved staff retention, consistent equitable care and service provision, reduced inequalities, and better value for money in the use of health service resources.



NATIONAL AND INTERNATIONAL CONTEXT FOR THIS REPORT

3

3.0 NATIONAL AND INTERNATIONAL CONTEXT FOR THIS REPORT

Many of the challenges of providing safe, quality midwifery and maternity care and services are not unique to NI; the context of maternal and newborn health and care in NI reflects similar trends across the UK and internationally. Maternal and newborn health and wellbeing is influenced by socio-economic and health system factors and by wider societal norms and developments, [10] and it is essential to understand these to analyse the issues and identify effective solutions. To set the context for this work, this section examines some of these wider factors that also affect NI.

3.1 Socio-economic factors, inequality, and population shifts

Developments in maternal and newborn health and care have been set back across the world by factors including the Covid-19 pandemic, increasing poverty and conflict, increasing numbers of refugees and asylum seekers, the global economic downturn, increasing inequalities, a stretched health workforce, structural racism, and changing political priorities that limit women's and children's human rights. [11, 12] As a result, rates of maternal and newborn mortality and morbidity and stillbirth are increasing in many countries for the first time in decades, stalling progress towards the Sustainable Development Goals. [13, 14] Although the UK is among the countries with the lowest rates of maternal and perinatal mortality and stillbirth, improvements have stalled over the past decade and are showing signs of worsening [6, 15] in all UK countries including NI.

Demographic shifts are affecting the funding and provision of maternity services and the demands on the health system in many countries. [10] High-income countries are experiencing an ageing population and falling birth rates. The average age of women having babies is increasing, as are rates of non-communicable diseases including obesity and diabetes, resulting in increased complexity and cost of care in pregnancy and childbirth. [16] These same trends are reflected across the whole UK population.

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Inequality is a key factor in limiting access to quality care and services and in influencing outcomes for women and babies, [10, 17] with challenges of poverty, racism, and inequitable access to quality services directly and indirectly affecting women and babies in many countries. Gender inequality plays its part, and the status of women is directly related to the quality of care and to outcomes for women and babies. [17] There are clear indications of substantive inequality across the UK; there is a three-fold difference in maternal mortality for Black women when compared with White women, and women living in the most deprived areas have a maternal mortality rate that is more than twice the rate of women living in the least deprived areas. [15] Similar ethnic and socio-economic inequalities are seen in rates of stillbirth and perinatal death, [6] in women's physical and psychological morbidity, [18] and in their experiences of care and services. [19] Younger women are much more likely to experience perinatal mental health problems yet report difficulty in accessing services. [19, 20]

3.2 Covid-19 pandemic

The Covid-19 pandemic and the measures taken to control the spread of the virus, including lockdowns, negatively affected maternal and newborn health and wellbeing and the education of health professionals across the world, in high-, middle-, and low-income countries. [21-23] There was substantive impact on maternal and newborn mortality and on physical and mental health for women, babies, and families, and for health service staff and students. The pandemic increased pressure on maternity services and staff and the consequences are still being seen, including in NI and across the UK. [24] There is evidence that it particularly disrupted midwifery-led care in the UK, with centralisation of services and closure of community services. [24-30]

3.3 Health systems

Strengthening health systems is a priority for many countries, and there is international recognition that focussing on maternal and newborn health offers an opportunity to build a foundation for population health in the future. [31] The challenge for many countries is sustainable financing. [32, 33] This is a critical challenge for the NHS. More than a decade of NHS reforms and budget cuts, combined with the impact of the Covid-19 pandemic, has affected the whole NHS and all staff. [34] This has had a bigger impact on maternity care and especially midwifery than other areas of healthcare; in England, midwifery staffing has increased by 7% in the last decade, in comparison with a 34% increase for the NHS as a whole. [35] In a survey of burnout in health professionals in England, midwives topped the list of NHS staff who said they often or always felt burnt out. [36] Despite efforts to increase the NHS workforce, there has been little respite from the workforce shortages especially in maternity care. The situation for midwives in NI is examined in detail in this report.

Integration of health systems across public health, primary care, and acute care settings is recognised as a key step in developing quality care and in resilient health systems, [37] and in improving population health. However over-medicalisation of health care is a challenge and there is concern about the growing imbalance between hospital care and primary care and public health services, with acute services using a disproportionate amount of resources, limiting the impact of services designed to prevent health problems. [11] Optimising the use of interventions in labour and birth is a global concern; caesarean birth is life-saving when it is needed and under-use results in maternal and newborn mortality and morbidity, while over-use can have adverse consequences for women and babies. [38] Rates of caesarean birth are currently increasing rapidly in many countries, raising questions of safety, sustainability, and equity. [39] At the same time, many women still do not have access to this life-saving intervention when it is needed; a situation described by Miller et al as ‘too much too soon, too little too late’. [40] This is a key challenge in the UK. Rates of caesarean birth and of induction of labour are higher than they have ever been, with no clear relationship with improvements in maternal and perinatal mortality or stillbirth. [41] Increasing numbers of women are requesting elective caesarean birth [42] and there is active debate about its appropriate use. At the same time, spending on public health and preventive care is falling. [43]

3.4 Safety and quality of maternal and newborn care

The safety and quality of maternal and newborn care have long been a concern in many countries, affected by factors including the status of women [17] and the under-resourcing of maternity services. [44] This has been a critical concern in the UK for the past decade, with reports of serious maternity services failings described in a series of enquiries and investigations [3, 4, 30, 42, 45-49] that have identified factors including disrespect of women and families, inequalities in treatment and outcomes, workforce shortages, failures in safe care, and problems of interdisciplinary working.

Respectful and equitable care for women is essential for the health and wellbeing of women and babies but remains a serious challenge, with reports from across the world of women experiencing disrespect, abuse and disempowerment in maternity care settings. [50] This reflects the low status of women and children in many societies and the undervaluing of sexual and reproductive health and is a missed opportunity to improve population health. [51] Ensuring respectful care for all remains a significant challenge for maternity services in the UK. The reports of large-scale failures in maternity care resulting in death and damage to women and babies [3, 4, 45] include multiple descriptions of neglectful, unkind, even abusive behaviour towards women in labour. Reports have identified systemic racism and dehumanisation in UK maternity care. [48, 49, 52, 53] A landmark case in Scotland [54] identified deficits in informing and involving women in decisions about their care and has clear implications for women’s involvement in decision-making and consent.

Strengthening midwifery as a key component within the wider health system is increasingly recognised as an important strategy for strengthening quality care for settings and to contribute to public health and primary care as well as to the acute care of women and babies when that is needed. [55-59] The evidence base to demonstrate the scale and breadth of the positive impact of midwives on the survival, health and wellbeing of women and babies, and on health system resources, has been strengthening over the past decade and is resulting in policy shifts in many countries. [8, 60, 61] However the role and status of midwives varies widely across the world, affected by their place in the wider health system and by social and cultural, economic and professional barriers. [62]

In the UK, high profile inquiries into maternity service failures and reports on safety in maternity care [3, 4, 30, 42, 45] have been followed by a contentious media environment for maternity care as a whole, and for midwifery in particular. Midwives have been singled out for blame and the concept of physiological birth, a core midwifery responsibility and skill, has raised heated debate. [63-67] The negative impact, especially on the status and the morale of midwives, has been profound.

In a positive development for midwifery in the UK, the Nursing and Midwifery Council (NMC) published new evidence-based standards for pre-registration midwifery programmes and standards of proficiency for midwives in 2019. These are now implemented across all midwifery education programmes in the UK; [68] more work is needed to fully implement these standards in practice. These outcome-focused standards identify the knowledge and skills that midwives need to provide skilled, knowledgeable, respectful, kind and compassionate care for all women, newborn infants and their families across the continuum of care and in all care settings. They enable midwives to be fully accountable as the lead professional for the care they provide, based on the best available evidence, working in partnership with women, and enabling their views, preferences, and decisions. There is an increased emphasis on evidence-based care, providing continuity of care and carer, perinatal mental health, and recognition of the contribution midwives make to population health, mitigating health and social inequalities, multidisciplinary and multiagency working, and to promoting excellence. Midwives educated to these standards are now starting to enter the system and as they gain experience and seniority, they are likely to have a substantive impact on practice and policy.

3.5 The importance of language

The language of maternity care

Language is a critically important and sometimes unrecognised influence on culture, values, assumptions, and practice. This is undoubtedly the case in maternity and wider health care. [69, 70] Language such as ‘allowing’ women to make decisions, describing pregnant women as ‘patients’, and the over-use of medical terms when talking with women and partners, indicates an imbalance of power. Terms such as ‘failure to progress’ and ‘poor maternal effort’ implicitly blame the woman for the circumstances of her labour. The term ‘unassisted birth’ implies that the work of midwives is unimportant. All women have a right to be addressed in respectful terms, using non-judgemental language, and for information to be shared with them in ways they can understand [71] and that are culturally appropriate.

Some terms have become contentious. The term ‘normal birth’ is used by organisations including the International Confederation of Midwives and the World Health Organization, but it has taken on negative connotations in the UK and particularly in England. This has resulted in a national project, the Re:Birth project, [72] to ask women and staff about appropriate terminology for birth. The terms ‘birth without intervention’, ‘spontaneous vaginal birth’ and ‘physiological birth’ were all preferred to ‘normal birth’. [72]

The language used in the first part of this report reflects the language used by participants in our engagement work and by those working in the system. The exceptions to this are the use of the term ‘caesarean birth’ in place of ‘Caesarean section’, to indicate that this is not only a surgical operation but the birth of a baby, and ‘spontaneous vaginal birth’, and where appropriate ‘physiological birth’, in place of ‘normal birth’ when that was used. In the final section of the report consideration is given to changing some common terminology.

Gender identity

There is an important international and national debate on gender identity and language. This affects those using and providing the maternity services, and it is essential for those delivering care to respect the identity and preferences of each and every individual. [73] All those using maternity care and services should receive individualised, respectful care including use of the gender nouns and pronouns they prefer. [74]

The words ‘women’ and ‘woman’ are used throughout this report, recognising that this reflects the biology and identity of the great majority of those who are childbearing. For the purpose of this report, these terms include adolescent girls, and people whose gender identity does not correspond with their birth sex or who may have a non-binary or fluid identity.



AIM, DEFINITIONS, METHODS

4

4.0 AIM, DEFINITIONS, METHODS

4.1 Aim, vision, terms of reference, and key principles

The **aim** of this independent report is to identify the key conditions for safe, quality midwifery services and care in all settings in NI, to ensure that *evidence-informed, equitable, safe, respectful, and compassionate midwifery care is available for all women and newborn infants wherever and whenever care takes place.*

The **Terms of Reference** are:

1. To conduct a comprehensive review of the number of staff, experience, education and training and policies required for Freestanding Midwifery Led Units (as outlined in para 195 of the Coroner's report). [1]
2. To consider the need for further guidance to all HSC Trusts in relation to the Coroner's findings [1] regarding the management of maternal body mass index (BMI) in pregnancy and of shoulder dystocia.
3. To undertake further work to inform a consistent approach to provision of midwifery services including integration across wider maternity services.

The work was guided by **key principles**:

- There will be a core focus on the needs and views of all women, babies, and families across the whole maternity journey – with an equity lens to ensure inclusion of all.
- Safety in maternity care must include physical, psychological, social, and cultural safety, for women, babies, partners and families, and for all staff and students; and consider short-, medium, and long-term impact.
- It will incorporate an evidence-based approach, drawing on high quality evidence to inform analyses and recommendations.
- It will use a strengths-based approach, considering analysis of what works and drawing on positive examples of quality care and services.
- Meaningful collaboration and participation with women, families, staff, students, and senior decision-makers will be implemented throughout.
- The recommendations will promote interdisciplinary working in a psychologically safe, enabling environment for staff and students.
- It will take a whole-system approach, considering practice, policy, workforce, education, research, leadership, culture, finance, governance, and regulation.

4.2 Expert and Advisory Groups and Secretariat: remit and responsibilities

Two groups were established at the start to inform and support the work:

An **Expert Group** including experienced service user advocates, and senior and experienced colleagues from research, education, clinical practice and clinical service management including midwifery, obstetrics, and neonatology, and from regulation and policy, from the four UK countries and internationally (Appendix 1). Responsibilities of this group included:

- Advising methods of the report and of engagement and consultation.
- Contributing to identification, review, and analysis of evidence, data, and positive examples for case studies.
- National and international networking.
- Supporting syntheses of findings and identification of recommendations.

An **Advisory Group** of service user advocates and professional colleagues from midwifery, obstetrics, neonatology, anaesthetics, the ambulance service, clinical service management, education, research, and policy; from across NI (Appendix 2). Responsibilities of this group included:

- Providing expertise, guidance and support, advice, and critical review and discussion on the conduct, dissemination, and follow-up to this work.
- Receiving regular updates of ongoing progress and ensuring appropriate onward communication to colleagues.

A **Secretariat** was established to support and guide the conduct of the work and to enable liaison with the DoH. Weekly meetings were held throughout the nine months of the work. Membership is shown in Appendix 3.

A senior researcher from Queen's University Belfast, Dr Jenny McNeill, supported the report throughout.

In the early stages of the work the scope and methods of the report were informed by, discussed, and agreed with the Expert and Advisory Groups.

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4.3 Methodology: focus, approach, perspective, analytical framework

4.3.1 Clarifying the concepts

The **focus** of this report is the woman and the baby across the whole maternity journey, in the context of her partner, family and community.

Whole system approach

Planning safe, quality care requires a whole system approach. [75] All health systems need multiple components to work effectively and efficiently together, but the maternity system has to reach across the continuum of care for women and babies from pregnancy to the early weeks of life, coordinate a large diverse multidisciplinary team in a wide range of hospital and community settings, and interface with multiple health, social care, and community services. It is of intense public interest and often provokes high profile public debate, media involvement, and political scrutiny.

Strengths-based approach

Recent reports in England have examined safety in maternity care from the perspective of serious failures in care, [3, 4, 48, 49] and there are crucially important lessons to learn. It is essential in addition to examine and to learn from factors that contribute to successful care and services as well as those that contribute to problems and failure. [76] A strengths- or asset-based approach examines the characteristics of individuals or of services that work. [77] As well as examining the problems and challenges raised, this analysis draws on an analysis of positive care and services from NI and internationally (Section 5.3).

Wider maternity services

The **perspective** of this report is the whole maternity system across NI, considering issues of equity and consistency. While MLUs and midwifery services and care are specifically identified in two of the Terms of Reference (ToRs) for the report, the third ToR recognises the need for this wider perspective to understand how midwifery fits in the context of the wider maternity services, and to identify underlying causes and appropriate actions to enable large-scale, sustainable change. 'Wider maternity services' include all the services and systems that are needed for safe, quality care for women and babies, including:

- Hospital and community services in all settings: tertiary and district hospitals including antenatal services, labour wards, postnatal wards, and neonatal units, GP practices, health centres, MLUs, and home.
- Acute and community and primary care, public health, and emergency transport.

- All the professional disciplines and support workers needed to meet the needs of all women, babies, and families including midwifery, obstetrics, paediatrics/neonatology, anaesthetics, MSWs, general practice, ambulance services, mental health including psychiatrists and psychologists, public health, nutrition, multiple medical services for women and babies who are ill, community services, and social services.
- Access to community resources and support including social care, Sure Start, perinatal mental health and breastfeeding support.
- Routine data collection, analysis and health intelligence systems across all settings and disciplines for both the woman and the baby.
- Pre-registration/undergraduate and postgraduate education and continuing professional development.
- The management and governance systems to support this activity, including systems to enable timely communication between professionals and across different settings and organisations, implementation of consistent policies, guidelines and protocols, clinical management, leadership and governance at all levels including HSC Trust Boards.
- Adequate funding and appropriate commissioning of services and of education.
- Effective professional and service regulation.
- Research, audit and evaluation to provide evidence and data to inform best practice and policy, including funding for new research and for evidence synthesis.
- Policy and political support for maternity, women, and children in early years and for the maternity services.

Given the limitations of time, only the core services and disciplines have been examined in depth.

Safety and quality in maternity care and services

An essential question to consider is – what are safety and quality in maternity care and services? This matters; quality maternity care and services promote survival, optimal health and wellbeing, effective parenting and strong mother-baby and family relationships, in the short-, medium- and long-term, and into future generations. The issue with much patient safety literature is that it can focus on specific practices and interventions such as technical activities, training and audit, which miss the big picture. [78] Equitable, sustained improvement needs appropriate accessible data and effective, evidence-based actions to inform a whole-system response. To achieve this, analysis and understanding of the full range of safe, quality care needed by all women, babies, and families is needed. Quality health care can be defined in many ways [79] but to date there is broad acceptance that quality health services should be:

- Effective – providing evidence-based healthcare services to those who need them.
- Safe – avoiding harm to people for whom the care is intended.

- People-centred – providing care that responds to individual preferences, needs and values.
- Timely – reducing waiting times and sometimes harmful delays.
- Equitable – providing care that does not vary in quality on account of gender, ethnicity, geographic location, and socio-economic status.
- Integrated – providing care that makes available the full range of health services throughout the life course.
- Efficient – maximizing the benefit of available resources and avoiding waste.

A recent paper goes further and has identified key features of safety in maternity units; [80] these include (1) commitment to safety and improvement at all levels, with everyone involved; (2) technical competence, supported by formal training and informal learning; (3) teamwork, cooperation and positive working relationships; (4) constant reinforcing of safe, ethical and respectful behaviours; (5) multiple problem-sensing systems, used as basis of action; (6) systems and processes designed for safety, and regularly reviewed and optimised; (7) effective coordination and ability to mobilise quickly. Other characteristics are important for a whole-system examination of safe, quality maternity care and services. [8] [Sandall 2024 [81] unpublished Appendix 5a]. Analysis of maternity care and services must consider:

- the concept of care across the whole maternity journey and in all settings; safety and quality matter from early pregnancy through labour and birth to postpartum and the early weeks of life.
- ‘*safety*’ as integral to ‘*quality*’; physical, psychological, social and cultural safety for all women, babies and families matter, measured by equity and by short-, medium-, and longer-term outcomes and experiences.
- the evidence base for *what* care is needed, *how* it should be organised and provided, and *who* provides it.
- to deliver sustainable, safe, quality care for women, babies and families, staff must also be physically and psychologically safe.

To ensure consideration of all important characteristics of maternity care and services, analysis of care and services in this report is founded on The Lancet Framework for Quality Maternal and Newborn Care (QMNC) (Figure 4), which was developed by synthesising the evidence from more than 450 high quality systematic reviews and meta-syntheses, with the extensive experience of an international multidisciplinary group of 35 colleagues and extensive critical input. It is widely used internationally for policy, standards, and education. [8] It has been used to assess services and inform policy across the UK [82] and it forms the evidence base for the NMC standards of proficiency for midwives. [68] The framework demonstrates the quality of care and services that all women and babies need across the continuum of care from pre-pregnancy, pregnancy, labour and birth, postpartum, and the early weeks of life.

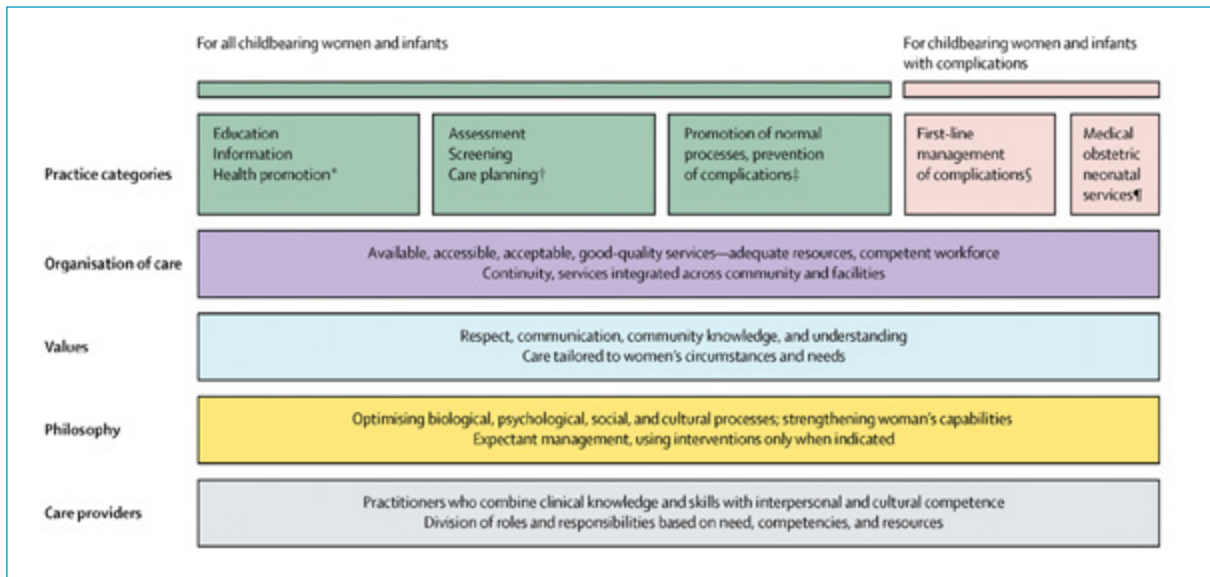


Figure 4: The Quality Maternal and Newborn Care framework. Source: Renfrew MJ, McFadden AM, Bastos MH et al, 2014. *The Lancet*, 384: 1129-45 [8]. Used with permission.

Analysis also draws on the findings of an efficient evidence review, conducted for this report, on the characteristics of a safe, quality midwifery and maternity system (Appendix 5b [9]).

What is midwifery?

Although the International Confederation of Midwives sets international standards for midwives, [83] midwifery is implemented in varied ways across the world. In the UK, midwifery is a regulated profession that meets and exceeds these international standards. Midwives in NI must meet the UK NMC’s Standards of Proficiency for Midwives (2019), [68] which describe and define the scope of practice of midwives in the UK. These standards inform analysis of the role and scope of practice of midwives in NI in this report. Drawing on the QMNC evidence base, midwifery in these standards is defined as:

‘Skilled, knowledgeable and compassionate care for childbearing women, newborn infants and families across the continuum throughout pre-pregnancy, pregnancy, birth, postpartum and the early weeks of life. Core characteristics include optimising normal biological, psychological, social and cultural processes of reproduction and early life, timely prevention and management of complications, consultation with and referral to other services, respecting women’s individual circumstances and views, and working in partnership with women to strengthen women’s own capabilities to care for themselves and their families’.

4.4 Methods

The work was conducted in six inter-related stages (Figure 5).

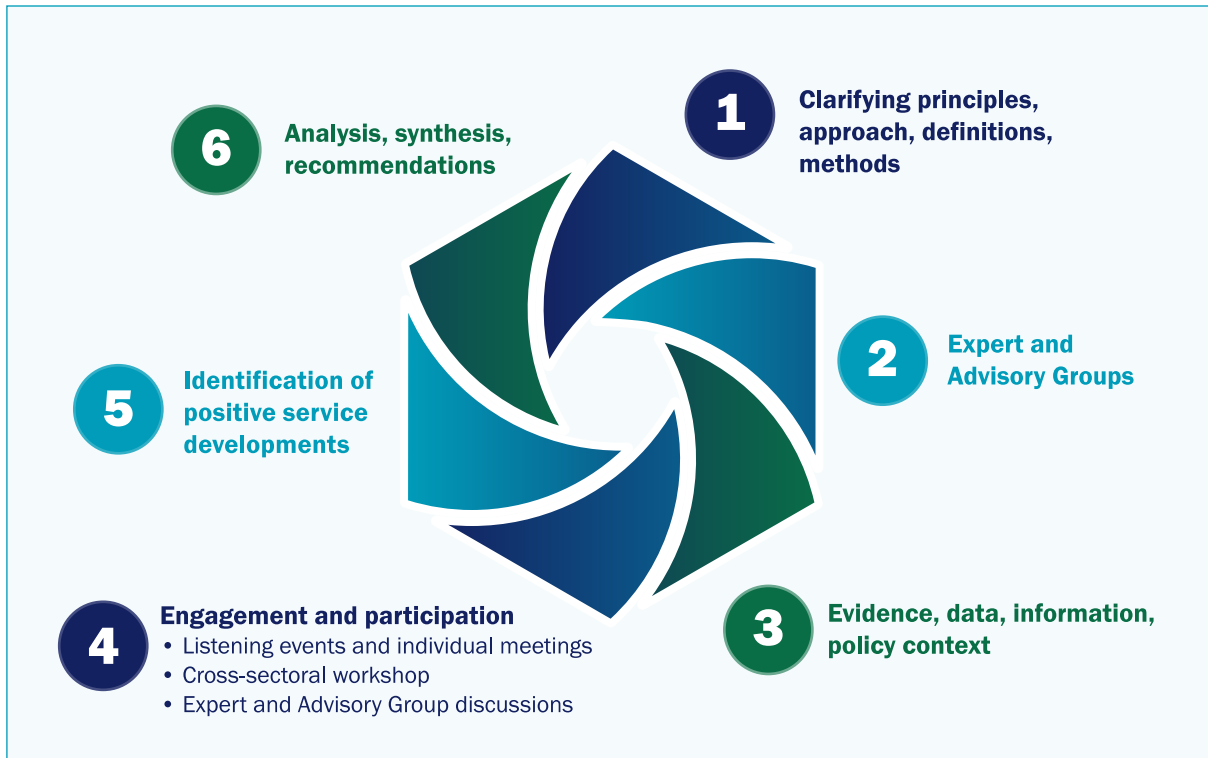


Figure 5: Six inter-related stages of the Independent Report

The first two stages were preparatory and were explained above:

1. Development of principles, approach, and methods.
2. Establishment and involvement of the Expert and Advisory Groups.

The remaining stages are described below:

3. Identification and analysis of evidence, data, policy, and reports.
4. Engagement and participation.
5. Identification and analysis of positive service developments in NI, the rest of the UK, and Spain.
6. Analysis and synthesis of findings, identifying recommendations.

4.4.1 Evidence, data, information and policy context

Evidence reviews and evidence-informed consensus

Critical questions were identified by the Expert Group to address the three ToRs of this work and to guide the methods of the rapid efficient reviews (Appendix 4).

Rapid, efficient literature reviews were conducted by Expert Group members working together with Prof Renfrew and Dr Jenny McNeill in small sub-groups. Given the short timescale and the need to ensure identification of high quality evidence, methods for the reviews followed those developed by Gavine et al 2018 [84] for conducting high quality efficient evidence reviews for policy. Sources of information included published research studies, systematic reviews, guidelines, and reports on the maternity services. In the event that sufficient high quality research evidence was not available, expert evidence-informed consensus was developed by discussion among Expert Group members, augmented by additional expertise where needed. Summaries of methods and findings from each review are available in Appendix 5. Review topics were:

- Key conditions for safe, quality midwifery services and care in midwifery-led unit, home, and hospital settings (ToRs 1 and 3).
- Health systems required for safe, quality midwifery services and care (ToRs 1 and 3).
- Best practice (ToR 2) regarding management of:
 - raised maternal BMI in pregnancy.
 - fetal macrosomia.
 - shoulder dystocia.
- Education and training for emergencies in all settings (ToRs 1 and 3).
- Approaches to improving safety and quality in maternity care (ToRs 1 and 3).
- Economic analyses of midwifery services and care (ToRs 1 and 3).

Identification and analysis of data and relevant reports

To establish the context for midwifery and maternity services in NI, data on maternal and neonatal outcomes, workforce, service provision, education, governance, and related policy and practice were retrieved from routine sources, from a questionnaire to Heads of Midwifery in all HSC Trusts, and pre- and post- registration commissioned education providers. Information was also requested from the HSC Clinical Education Centre for Nurses, Midwives and Allied Health Professionals (CEC), Queen's University Belfast, the Northern Ireland Statistics and Research Agency (NISRA), and the Public Health Agency (PHA). Relevant reports and policy in development were identified by colleagues in the DoH and appropriate agencies. Analyses of data were supported by colleagues in the PHA and the DoH, and international benchmarking by Prof Eugene Declercq, Boston University.

Understanding governance and commissioning of services and education

Reports from regional organisations and discussions with staff identified the structure and relationships between regional and HSC Trust-level organisations with responsibility for aspects of maternal and newborn health, care and services. These included the Regulation and Quality Improvement Authority (RQIA), the DoH, Northern Ireland Practice and Education Council for Nursing and Midwifery (NIPEC), the HSC CEC, the Northern Ireland Ambulance Service (NIAS), Queen's University Belfast (QUB), and Boards of the five HSC Trusts. Professional organisations contacted included the NI offices of the Royal College of Midwives (RCM), Royal College of General Practitioners (RCGP), Royal College of Obstetricians and Gynaecologists (RCOG) and Royal College of Paediatrics and Child Health (RCPCH).

Questions about Board-level functioning and priorities in regard to maternity and neonatal services (Appendix 6) were sent to CEOs and Board Chairs of the five HSC Trusts; all responded.

A meeting was held with members of the Strategic Planning and Performance Group (SPPG) in the DoH, and written information was provided about budget allocation and the commissioning and assessment of maternity services (Appendix 7).

Questions about the commissioning and provision of education at under- and post-graduate levels, and about training and continuing professional development (CPD) were sent to education commissioners within the DoH.

4.4.2 Engagement and participation

The engagement and participation work aimed to a) understand the views, experiences, and perspectives of women and partners, midwives, multidisciplinary colleagues, midwifery students, midwifery educators, managers, and senior decision-makers; b) identify problems, challenges, barriers, and enablers of safe, quality maternity services and care in both hospital and out of hospital settings and c) hear their views on what is needed to improve care and services. There was also an intention to establish open, trusting conversations and debate around safe, quality midwifery and maternity care and services involving a wide range of multidisciplinary colleagues, students, service users and advocates, and senior decision-makers, to help inform recommendations and next steps.

Groups and individuals who contributed to engagement work are acknowledged in Appendix 8. This work included:

Listening events and meetings with women, partners, and advocates

Sixteen listening events, both face-to-face and virtual, were held with 107 individuals including women, partners, and advocates from across NI. Events included one-to-one and group meetings with maternity service users and advocates, and Maternity Services Liaison Committee/Maternity Voice Partnership (MSLC/MVP) Chairs and service user members. This work was not resources as a full-scale research project, but was a rapid systematic evaluation of views and experiences. Ethics approval was not required. Procedures were followed to ensure confidentiality and anonymity and to conduct the work in ways that minimised the potential for re-traumatising women and to provide support for participants if needed.

All the work of engagement with women and families was advised and supported by experienced service user advocates (Leslie Altic, Emma Fraser, Mary Newburn), experienced researchers and clinicians working in the field of maternity care (Prof Fiona Alderdice, Dr Fiona Lynn, Prof Alison McFadden, Dr Jenny McNeil, Dr Dale Spence, Maureen Ritchie) and by community groups. We aimed for diversity of geography, ethnicity, socio-economic circumstances, experiences, and outcomes. We were aware of the potential of re-traumatising women who may have had difficult experiences, a serious challenge for reports of this nature when asking women and families to re-tell their stories. We worked to minimise this by conducting our engagement with existing community groups such as Sure Start, breastfeeding support, and mental health support groups. This approach was planned to ensure that women would have support from group organisers and from each other both during and after their meetings with us. We avoided the use of social media to prevent triggering women and families who might read about traumatic events unexpectedly. We conducted face-to-face meetings when possible, with a small number of virtual meetings in addition. We worked to create a safe space for each event, where we listened carefully to hear what was being said and we asked women to take as much time as they needed. Participants were assured of confidentiality and told that while their input would inform the report, no attributions would be made. Meetings opened with a brief introduction to the background and aims of the report, and some questions were outlined to start the discussion (Appendix 9). Participants were then encouraged to talk about whatever mattered to them. Meetings were led mostly by Prof Renfrew with a small number led by other experienced professional members of the secretariat (Maureen Ritchie, Dr Jenny McNeill). One additional secretariat member took detailed notes during engagement meetings, with the full knowledge and agreement of those attending and with no attribution to individuals. At the end of all meetings participants were given the email address of a secretariat member in case of any follow up required. Group organisers were available to support group members.

A small number of women requested one-to-one meetings with Prof Renfrew. In these cases, Prof Renfrew took notes, again with their permission and again unattributed.

Listening events and meetings with staff, students, educators, and organisations

A total of 25 engagement events and one to one meetings with staff and students, both face-to-face and virtual, were conducted using similar principles to those identified for women's engagement. A small number of staff requested one-to-one meetings with Prof Renfrew; these were conducted in the same way as the individual meetings with women. In total, 189 staff and students participated, including midwives, midwifery students and educators, MSWs, multidisciplinary colleagues including obstetricians, neonatologists/paediatricians, ambulance staff, GPs, and managers.

Thirty-four meetings were held with senior decision-makers and representatives of organisations including health and social care agencies, commissioners, and the Royal Colleges of Midwives, Obstetrics and Gynaecology, Paediatrics and Child Health, and General Practice.

Cross-sectoral workshop

A structured cross-sectoral workshop was held to a) discuss and sense-check the findings from the engagement events, and b) inform development of the recommendations. Eighty-two colleagues from user and advocacy, multi-professional, university, health and social care organisations, and policy sectors across NI contributed. Following a summary presentation and discussion of the findings and key challenges from the listening events, facilitated group discussions considered challenges, solutions, and potential recommendations for the report.

Expert Group engagement

The 16 members of the Expert Group (Appendix 1) included service user advocates and colleagues with expertise in practice, policy, research, education, management, and regulation from NI, across the UK, and internationally. Four whole-group meetings were held, in addition to multiple sub-group meetings and individual discussions. Whole-group meetings included ongoing input, challenge, structured discussion, consideration of evidence, and critical review of recommendations. Sub-groups debated the issues in depth, conducted the rapid efficient evidence reviews, and developed consensus where needed.

Advisory Group engagement

Thirty-one members of the Advisory Group (Appendix 2) included service user advocates and multidisciplinary colleagues in key strategic and leadership roles from across NI. They included representatives from the Royal Colleges of Midwives, Obstetrics and Gynaecology, Paediatrics and Child Health, and Anaesthetists. Four meetings were held during the course of this work, and included ongoing input, structured debate and discussion, sense-checking of engagement findings, review of recommendations, and consideration of next steps. Individuals from the Advisory Group advised specific components throughout.

4.4.3 Identification and analysis of positive service developments

The aim of this stage was to identify and learn from examples of positive service provision from diverse settings and perspectives. Positive service developments from across NI, the rest of the UK, and internationally were identified by Expert and Advisory Group members, by Heads of Midwifery in all HSC Trusts, by advocacy groups in NI, and by inviting HSC Trusts to submit examples. A template was prepared for authors of the positive examples to identify the context, topic, and its characteristics, as well as lessons learned and recommendations for the future. A working group including Secretariat members and Prof Renfrew assessed the submissions on the basis of relevance and span of topics, geographical spread, availability of comprehensive information, and data on outcomes and processes. Fifteen examples were selected, four from Scotland, England, Wales, and Spain, and 11 from NI. Challenges, achievements, and lessons learned from each example were summarised and key characteristics were identified, along with their recommendations for practice and policy. Summaries of each example were checked for accuracy with the authors. Confirmation of permission to publish the work as part of this report was obtained.

4.4.4 Analysis, synthesis, and recommendations

The aim of the analysis and synthesis of findings was to inform recommendations for policy, practice, education, research, and implementation and monitoring. This work included:

- Summaries of the evidence reviews and evidence-informed consensus were agreed by the Expert Group sub-groups.
- Analysis of the detailed notes from all engagement was conducted by one member of the Secretariat with quality assurance by a senior researcher from the Advisory Group (Prof Fiona Alderdice) with expertise in qualitative analysis. These analyses were used by Prof Renfrew to structure summaries of the findings.
- Key themes and lessons learned from the positive service examples were identified by the working group.

- Analysis of the data on outcomes and experiences, and information on the structure, commissioning and governance of the maternity services was conducted by Prof Renfrew, Dr McNeill, and Prof Gwendolen Bradshaw from the Expert Group, and further informed the analysis of the key problems.

Developing recommendations

These analyses were used to identify issues that needed to be addressed, as well as strengths in the system, and the evidence base for feasible, sustainable solutions. Drawing also on the findings from the cross-sectoral workshop, Prof Renfrew drafted the key conditions for safe, quality care and services, and the recommendations. These were sense-checked with interdisciplinary colleagues and service user advocates and finalised in discussion with the Expert and Advisory Groups.

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5.0 FINDINGS

5.1 Findings 1: information and data on maternity care and services in Northern Ireland

5.1.1 Population and services

The health and social care system in NI serves a population of 1.9 million, [85] a recent increase of 0.3%. People live in urban, semi-rural and rural communities. Belfast is the capital city, with almost 18% of the population. [86]

The proportion of women of childbearing age (15-45 years) reduced by almost 1% from 2019 to 2020, from 370,925 to 367,925. [87] The age distribution is changing; the number of women aged between 15 and 24 is projected to increase by 2035, compared with a reduction in the number of women aged between 30 and 39.

Ethnicity of the population of NI was predominantly reported as White (96.5%) in the 2021 census, with the largest ethnic minority groups represented by Mixed, Indian, and Chinese communities. [88] The proportion of NI residents born outside of UK and the Republic of Ireland increased from 4.5% in 2011 to 6.5% in 2021. [89] Migration, both immigration and emigration, will continue to impact the demography of women of childbearing age, changing the profile of maternity service users in NI. [87] Known inequalities in relation to migrant and immigrant pregnant women are reported on their experiences of care, access to services and risk of poorer morbidity and mortality outcomes. [90, 91]

Socioeconomic deprivation in NI is a significant factor in the health and wellbeing of the population. Household incomes and productivity levels are lower than the UK average (-17.9% and -14.1% respectively) and NI's gross disposable household income in 2021 was £17,340; lower than Wales (£18,038), Scotland (£19,630) and England (£22,213). Comparison (adjusted for the different deprivation indices used across the UK) [92] demonstrates that NI has the highest proportion of the population living in the most deprived quintile of the UK (37%), followed by Wales (22%).

The map below (Figure 6) highlights the extent and location of deprivation using the NI Multiple Deprivation Measure [93] showing Decile 1 (dark blue, most deprived) through to Decile 10 (white, least deprived).

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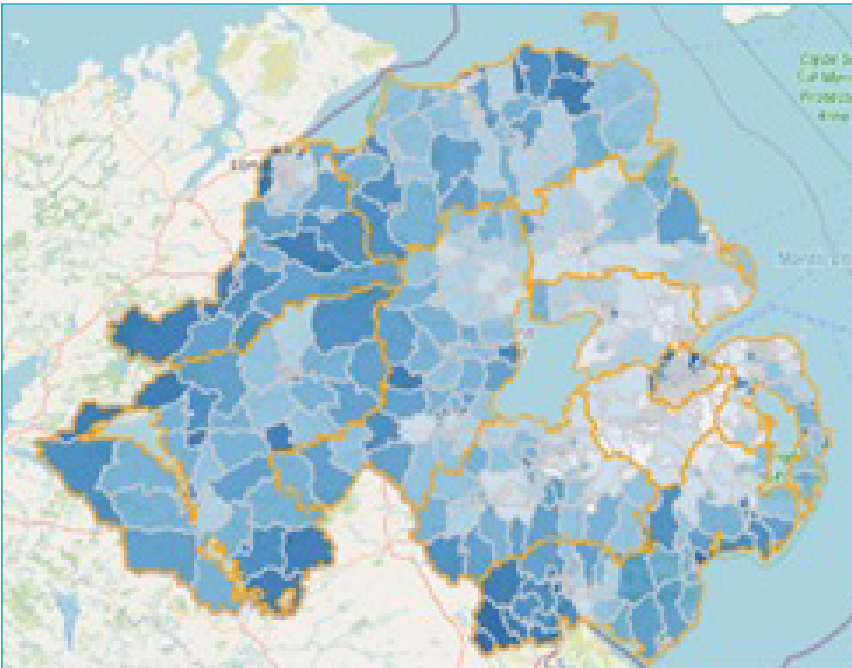


Figure 6: Map displaying multiple deprivation measure areas in NI, 2017.
 *Decile 1 (dark blue, most deprived) – Decile 10 (white, least deprived).
 Source: Maternity & Neonatal Health Needs Assessment (2023) p11 [87]

Women of childbearing age are over-represented in the most deprived communities; Figure 7 presents the deprivation decile distribution for women aged 15-44 years in 2019.

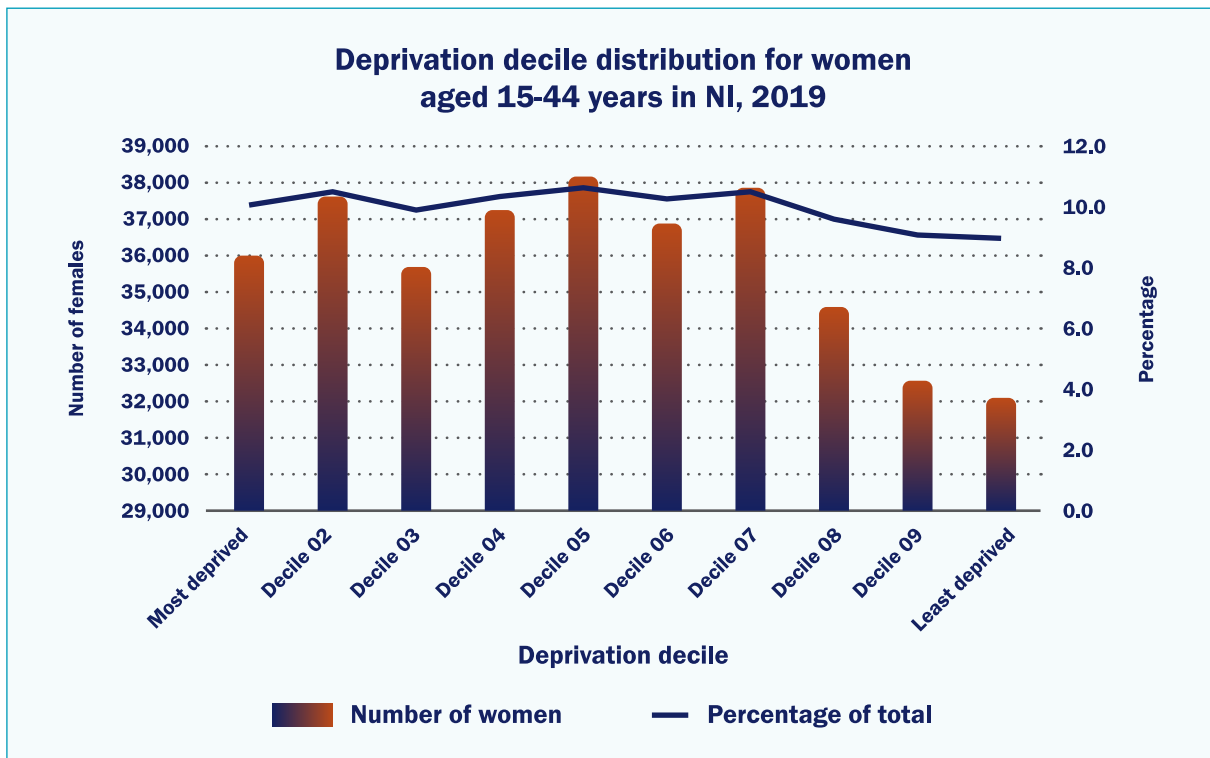


Figure 7: Mid-year population estimates of women aged 15-44 years by deprivation decile in NI, 2019.
 Source: Maternity & Neonatal Health Needs Assessment (2023) p11 [87]

Inequalities across and within HSC Trusts varies significantly; the largest gaps in deprivation-related inequality were seen in relation to smoking during pregnancy, teenage births, alcohol, drugs and self-harm. [94]

Birth rates

The total number of infants born has declined by approximately 15% over the previous decade, from 24,418 in 2013 to 20,683 in 2022 (Figure 8). Each HSC Trust has experienced a decline overall (Figure 9) in births. This decline is not equitable across the HSC Trusts; Western HSC Trust has seen the greatest proportionate decrease and Northern HSC Trust the great proportionate increase.

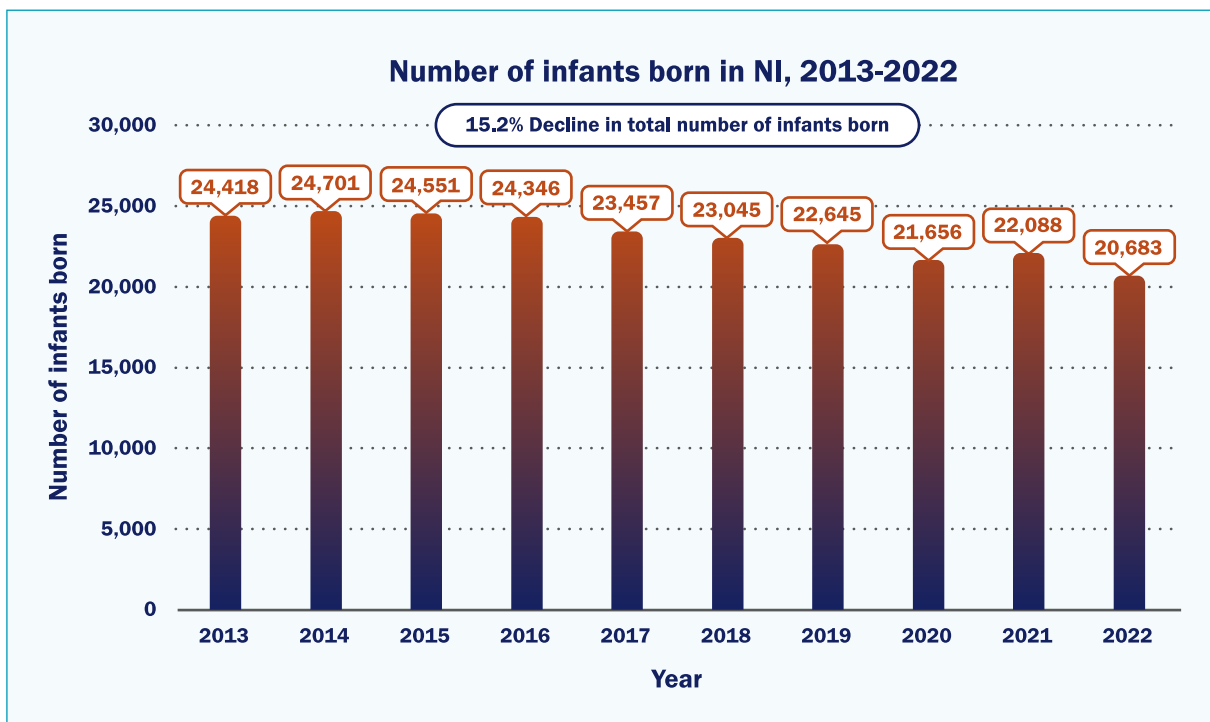


Figure 8: Total births in NI, 2013-2022. Source: NIMATS 2023

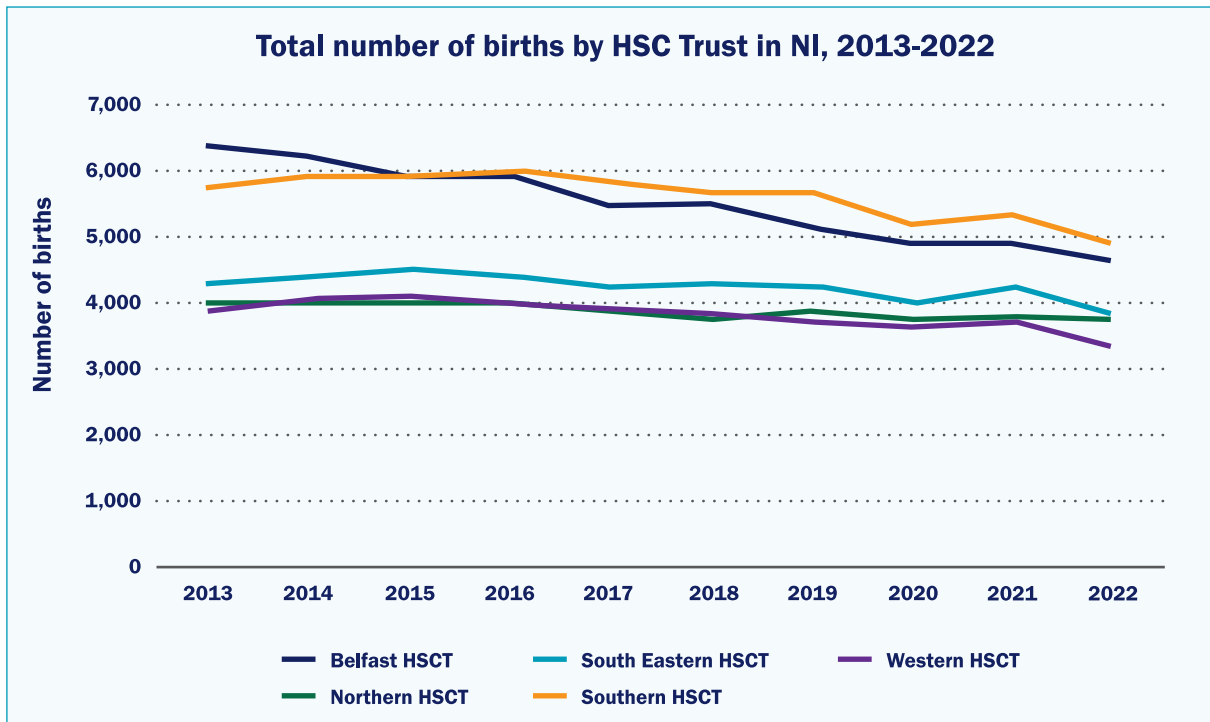


Figure 9: Births in NI HSC Trusts, 2013-2022. Source: PHA/NIMATS

Change in legislation re termination of pregnancy

The NI (Executive Formation etc) Act 2019 decriminalised abortion. As a result, abortion services are now available in all five HSC Trusts, which enables the majority of demand to be met locally.

The Abortion (Northern Ireland) (No 2) Regulations 2020 (the 2020 Regulations) were subsequently introduced by the UK Government on 14 May 2020 providing a legal framework for abortion in NI. Following the collapse of the NI Executive in February 2022, the UK Government introduced further regulations on 20 May 2022 - The Abortion (Northern Ireland) Regulations 2022 - removing the legislative requirement for NI Executive agreement under the Ministerial Code for abortion services to be commissioned, and conferring new powers on the Secretary of State (SoS) for NI to act in this matter.

Subsequently, on 2 December 2022, the SoS instructed the DoH to commission and fund abortion services in line with the agreed commissioning framework and service specification for 2022 - 2025. A formal programme for implementation and service mobilisation has been developed and progress continues to be overseen by the DoH.

This change should be considered when interpreting trend data on perinatal outcomes, especially stillbirth, as abortion in NI is now an option for pregnant women where tests show a fetal anomaly.

Health and Social Care in Northern Ireland

Structure and organisation of health services

Following the Belfast (Good Friday) Agreement in 1998, the Northern Ireland Act was passed, and devolution legislature was established resulting in The NI Assembly, a power sharing executive. Health and social services are one of the areas where the NI Assembly has full legislative powers, following the devolution settlement in 1999. Prior to this, since the Ministries Act (NI) 1944 [95] followed by the National Health Service Act (1948), health and social care were managed by the Ministry of Health and Local Government for NI of the UK Government. [96] From May 2022 to February 2024, the NI Assembly did not function. It was reinstated on 3 February 2024.

The structure of Health and Social Care in NI is summarised in Figure 10.

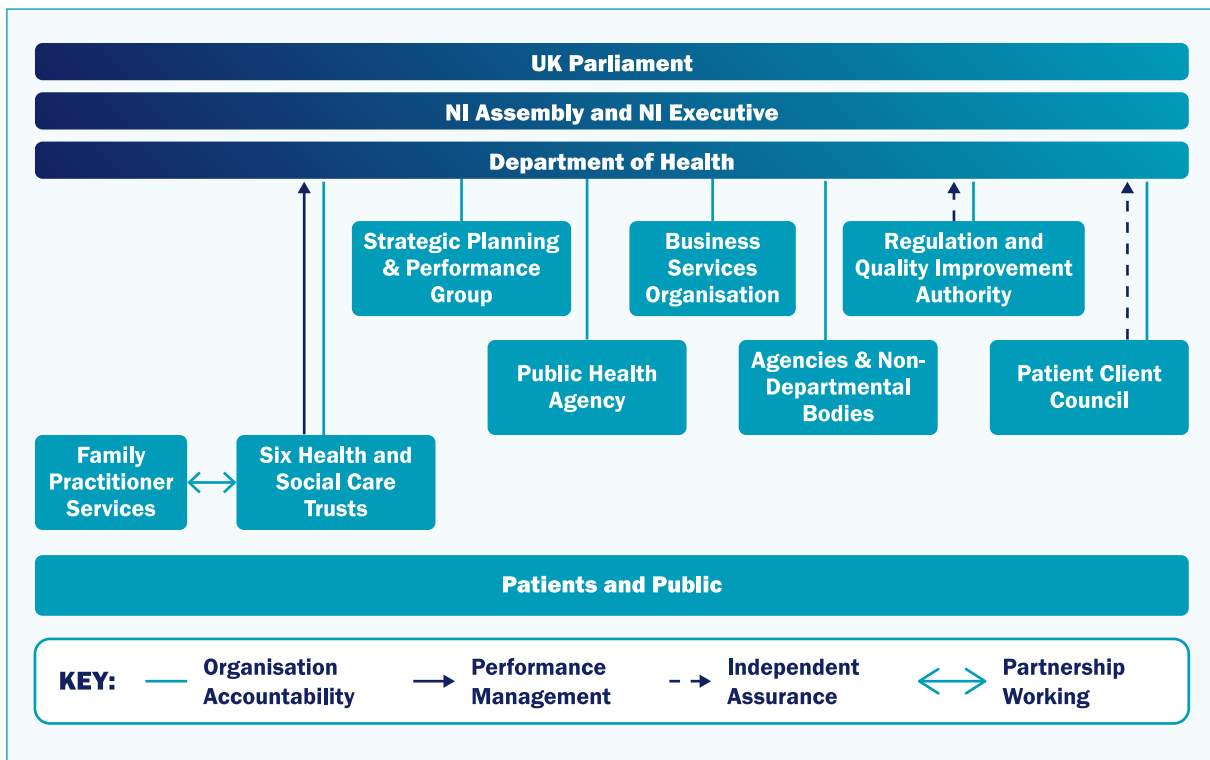


Figure 10: Structure of Health and Social Care in NI

Integrated health and social care has existed in NI since 1973 and is provided through a publicly funded healthcare system, via a block grant each year from the UK government. Funding is not specifically allocated and devolved administrations decide locally how to use funds across all government departments. [97] Maternity services are commissioned by the Strategic Performance and Planning Group (SPPG) at the DoH NI. There are five local HSC Trusts in NI, all of which provide hospital and community based maternity services. The SPPG is responsible for ‘*planning, improving and overseeing the delivery of effective, high quality, safe health and social care services within available resources*’.

Health and social care services are provided by five HSC Trusts, all of which provide hospital and community based maternity services. A sixth HSC Trust, the NIAS provides ambulance services for the region. Local Commissioning Groups (LCGs) are responsible for the commissioning of health and social care by addressing the care needs of their local population. [98] LCGs also have responsibility for assessing health and social care needs, planning health and social care to meet current and emerging needs and securing the delivery of health and social care to meet assessed needs.

The SPPG is also required to work with the PHA, particularly where activity relates to the key priorities and targets of the PHA. The PHA is charged specifically with promoting improvements in the general health and wellbeing of the people of NI, working closely with other public services such as health, education and local government in a local community planning process. This division of responsibilities requires the SPPG, PHA, HSC Trusts and the DoH NI to work closely to ensure services which are to be commissioned can be delivered within the resources available.

At the time of writing this report, it is anticipated that the Integrated Care System (ICS) NI will be launched in the latter half of 2024. The ICS is a single planning system for health and social care in NI and will bring together a range of partners to plan health, social care, and other services, with the aim of improving health and wellbeing and reducing health inequalities in NI. It is an outcomes-based model, underpinned by a population health approach. By working closely with voluntary and community partners, local councils and carers and service users, it will seek to address the whole journey from prevention, through to treatment, and end-of-life care, improving outcomes for people in NI now and into the future.

Whilst the DoH NI has overall responsibility for health and social care services, [99] in terms of providing services the DoH NI discharges this duty to the PHA and a number of other health and social care bodies, including the six HSC Trusts, the Business Service Organisation (BSO) and other agencies/non-departmental public bodies. This is in conjunction with independent assurance from the RQIA and the Patient and Client Council (PCC), both of which are sponsored by the DoH NI. All these HSC bodies are accountable to the DoH NI, which in turn is accountable, through the Minister, to the Assembly for the manner in which this duty is performed.

Safety and quality of maternity care: regional structures

The DoH NI holds overall policy responsibilities for maternity quality, safety and care. Primary, community and secondary sectors across the region have roles and responsibilities to ensure that maternity quality, safety and care is person- and family-centred, meets individual needs, and is delivered in the right place, at the right time, and by the most appropriately skilled person. The Strategy for Maternity Care in NI 2012-2018, which outlined aims to provide high-quality, safe, sustainable and appropriate maternity services, is now outdated. [100]

In 2001, the NI Executive's Programme for Government included a commitment to raise the quality of public services. In 2002, Ministerial agreement to proposals in 'Best Practice, Best Care', [101] meant that for the first-time health and social care organisations had to fulfil a statutory duty of quality. [102] In April 2005, the RQIA was established and is responsible for inspecting the availability and quality of health and social care services in NI, with the responsibility of ensuring that every aspect of care reaches the standards laid down by the DoH and expected by the public. [102] The RQIA publishes findings that may include reports on specific areas or themes, but does not report on the quality of individual services. An RQIA review of maternity services in 2023 [2] identified systemic issues that needed to be addressed; these remain to be fully implemented.

Quality improvement

All HSC Trusts are signed up to deliver the regional Quality Strategy 2020, [103] a ten-year strategy designed to protect and improve quality in health and social care in NI. There has been some investment in training, including an online awareness course for all staff, with some staff accessing the Scottish Quality and Safety Fellowship Programme and the Scottish Improvement Leader course. [104] In terms of maternity care there is a mixed approach across the HSC Trusts. There is no overarching Quality Improvement (QI) strategy for maternity. QI work tends to focus on specific topics, predominantly hospital-based interventions and with limited evaluation. All midwifery students must complete QI modules and all MSc Midwifery students prepare a QI protocol, with some students undertaking projects during their programme as part of their dissertation. The inconsistent QI training for midwives has resulted in some students having to step back from undertaking a QI project.

The PCC was created on 1st April 2009 as part of the reform of Health and Social Care in NI. [105] Its responsibility is to advocate for people across NI in Health and Social Care and act as an independent voice for patients, clients, carers and communities. There has been limited interaction between the PCC and the maternity services to date.

Health and Social Care Trusts

HSC Trusts are the main providers of health and social care services to the public. Each HSC Trust manages its own staff and services and controls its own budget. Figure 11 shows the location of the five local HSC Trusts and the individual hospitals, and the annual births in each HSC Trust in 2023.

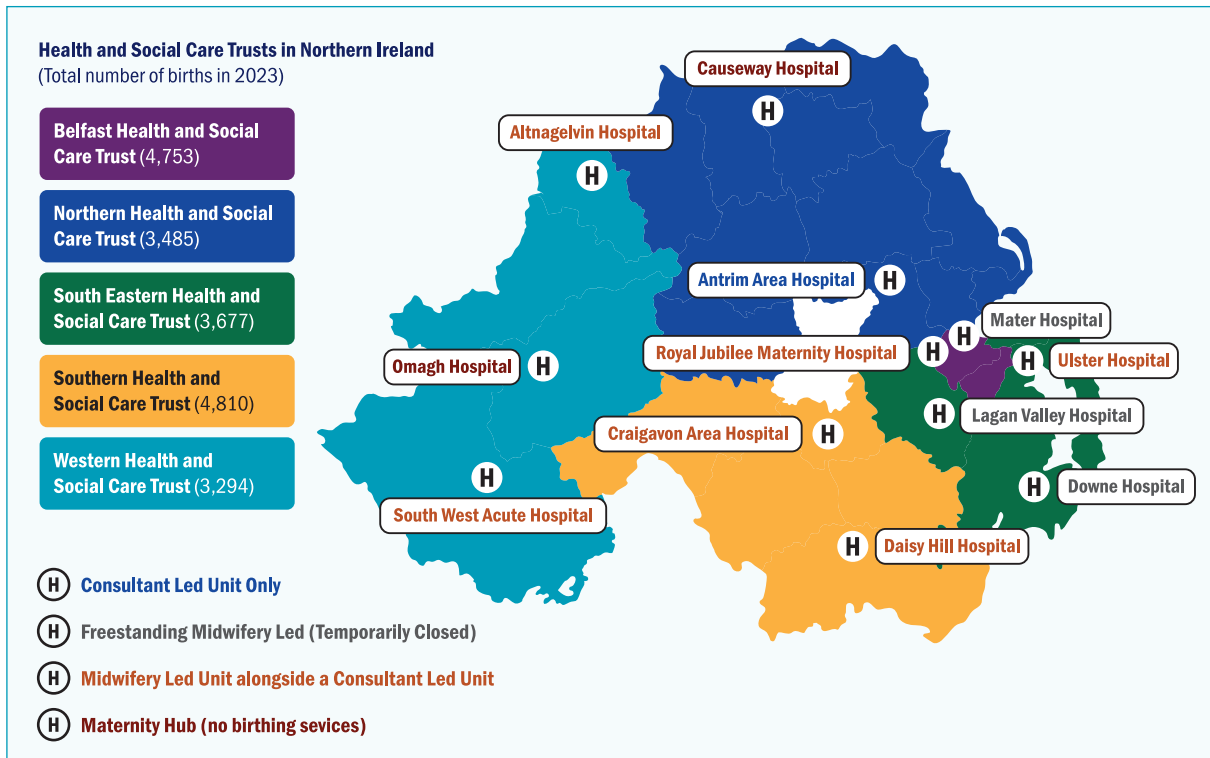


Figure 11: Map of HSC Trusts NI, location of hospital and birth statistics, 2023 (provisional data)

Professional regulation

Professional regulation for midwifery and medical professions in NI sits with the UK-wide professional regulators, the NMC and the General Medical Council. Each of the Royal Colleges representing midwives and relevant medical professions including obstetricians, gynaecologists, anaesthetists, general practitioners, and paediatrics, have NI representation.

Organisation of maternity and neonatal services

Maternity and neonatal service provision within the five HSC Trusts is detailed in Appendix 10, and the map above (Figure 11) illustrates the location of births by HSC Trust in NI for 2023. A range of models of maternity services are available including Continuity of Midwifery Carer (CoMC), midwifery-led care, shared midwife and obstetrician care, and obstetric consultant-led hospital-based care. Data on numbers of births in different settings are shown in Section 5.1.1.

Neonatal services are provided across all five HSC Trusts in NI in alignment with obstetric-led maternity services. The Regional Neonatal Intensive Care unit is located in the Belfast HSC Trust and provides care across all levels of dependency and gestations with a specific remit for babies requiring complex medical/surgical care and extremely preterm babies. There are a further six units across the remaining four HSC Trusts with five units that provide local neonatal care at Levels 1 to 3 (known as Local Neonatal Units (LNU) and Special Care Baby Units (SCBU) in other UK countries) and the remaining unit provide Level 3 care which is defined as special care. Transitional care for babies who need a small amount of additional care and support such as phototherapy and antibiotics is available on postnatal wards and provided by midwives, enhanced or advanced neonatal nurses, transitional care nurses or paediatricians/neonatologists, depending on individual HSC Trust arrangements.

Guidance, policies, protocols and investigations

The National Institute for Health and Care Excellence (NICE) is tasked with providing guidance on current best practice in health treatment and care, including public health, to the NHS in England and Wales. NICE guidance promotes clinical excellence and the effective use of resources for people using the NHS and is designed for use in England and Wales, and as such it does not automatically apply in NI. The DoH NI established formal links with NICE on 1st July 2006 whereby guidance published by the Institute from that date would be locally reviewed for applicability to NI and, where appropriate, endorsed for implementation in Health and Social Care. It is the responsibility of HSC organisations, under the statutory duty of quality as specified in Article 34 of the HPSS (Quality, Improvement and Regulation) (NI) Order 2003, to put in place the necessary systems for implementing NICE guidance, which should include adequate and comprehensive dissemination, as part of their clinical and social care governance arrangements. The DoH NI reviewed its process for the endorsement, implementation, monitoring and assurance of NICE guidance in NI (2022), and a revised process came into effect on 1st April 2022 which replaced the previous arrangements. [106] The governance framework for processing NICE guidance in NI is available on the DoH website. [107] The SPPG is responsible for monitoring the implementation of NICE guidance with Health and Social Care NI.

HSC Trust policies and protocols in relation to maternity care should be consistent with DoH NI endorsed NICE Clinical Guideline on intrapartum care for healthy women and babies. In the inquest that resulted in this report it was found that HSC Trust policies were not consistent with extant NICE guidance, which was at that time CG190 (now NG235 (2023)). [108, 109] As a result of this inquest the Guidelines and Audit Network (GAIN) Guideline for admission to midwife led units in NI was withdrawn, along with the associated information for women. The GAIN guideline and related information for women had been developed through a process of co-production with women, staff, and external experts, drawing on evidence reviews, and its withdrawal was keenly felt by women and by many midwives.

1

Investigations relating to Maternity and Newborn Safety are completed at HSC Trust level in NI, through a Serious Adverse Incident (SAI) procedure. HSC Trusts can enter into a bespoke agreement with the Maternity and Newborn Safety Investigation (MNSI) programme in England - formerly the Healthcare Services Safety Investigation Board (HSSIB) - to carry out an investigation. [110, 111]

2

In 2019, the Chief Medical Officer (CMO) requested PHA and SPPG work jointly to support the implementation of the national Perinatal Mortality Review Tool (PMRT) in all HSC Trusts. This tool provides a systematic web-based approach to support objective, robust and standardised reviews to provide answers for bereaved parents and their families about why their baby died. It is intended to ensure local and national learning to improve care and prevent future baby deaths. There is a regional PMRT midwives' group established which is chaired by PHA and meets every 6-8 weeks. All HSC Trusts have a PMRT Midwife in post. Following their appointment, the PHA supported those individuals by planning and facilitating training, provided by colleagues from the National Perinatal Epidemiology Unit and Birmingham Women's and Children's Hospital Trust.

3

Before any confidential information can be collected and used to undertake a PMRT review, the PMRT Midwife must advise the parents of the process and consent obtained for their information to be stored on the PMRT database. PMRT midwives then co-ordinate HSC Trust-based PMRT review groups to enable a full review of all care delivered to be undertaken. Once the review is complete, the PMRT midwife will identify any actions or learning and ensure this is shared locally and regionally. Regional learning is shared through the Maternity Strategy Implementation Group (MSIG) every six months.

4

Service commissioning

The SPPG plans and oversees the commissioning of health and social care services for the population of NI. SPPG is part of the DoH and is accountable to the Minister for Health. The model is under review as part of the development and implementation of a new ICS for NI. [112, 113]

5

The budget for Maternity and Child Health in 2023/4, which includes maternity services, is around £221m, increased from £138m in 2015. Of this, £149m is allocated for 'obstetrics' and 'community midwifery'. Funding is allocated to each HSC Trust on the current historic model based on population. Increased funding is a result both of inflation and new service developments agreed by the SPPG and HSC Trusts.

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Changes to the block contract occur through processes that include submission of specific business cases to support service developments from individual HSC Trusts; these should include an assessment of need, and they should take account of specific population health and social care needs of the locality including the extent of cross-boundary provision. Changes also result from endorsed CNO and CMO recommendations; changes to NICE guidance; and recommendations following a review by SPPG, the PHA or RQIA or other body. Once a new service has been implemented it moves into the block contract for the following year. There is a process in place to monitor activity, assess significant variations, and assess value for money, benchmarked against both UK and NI peers. This does not include monitoring the impact of existing services or service changes on outcomes.

Data and monitoring

The responsibility for information collation lies across the DoH, SPPG, PHA, and the HSC Trusts. Data are submitted from a range of sources including different HSC Trust systems. They are collated, quality checked, and summaries disseminated via dashboards, excel tables, or traditional reports. As an example, the Information and Analysis Directorate (IAD) within the DoH provides public facing statistical information relating to aspects of population health, primary and secondary care, social care services and the health and care workforce in NI. This includes overall staff numbers and staff vacancies, and public health indicators such as health inequalities, sexual health, and tobacco use. Data on stillbirth, perinatal and neonatal mortality, and maternal mortality are reported and collated through the MBRRACE-UK programme. [15] Due to data laws on secondary use of data in NI, the PHA facilitates HSC Trusts in submitting anonymized data to the national programme.

The Maternity and Neonatal Dashboard contains a range of demographic and clinical information on women and babies including CO2 monitoring at booking, mode of onset of labour and mode of birth, shoulder dystocia, postpartum haemorrhage, and 3rd and 4th degree perineal tears. The Key Performance Indicators (KPIs) reported are: women booked before 12 weeks, women's report of smoking at booking, elective caesarean birth before 39 weeks, and baby's birth weight below the 10th centile not detected before birth. These are reported by HSC Trust, but not by levels of deprivation or by ethnicity. The dashboard is updated by the SPPG and sourced from Northern Ireland Maternity System (NIMATs). It is normally produced quarterly and distributed to designated contacts in the HSC Trusts and PHA and is reviewed by the Maternity Collaborative. This information is not available to the public.

NICORE (Neonatal Intensive Care Outcomes Research and Evaluation) produces data reports on neonatal activity and outcomes, distributed to HSC Trusts and the Neonatal Network. It is funded by DoH and is jointly overseen by PHA and QUB; the PHA has a service level agreement with QUB to support analysis and reporting of data related to neonatal services. The work of NICORE is directed by the Neonatal Network.

Midwifery services

Each of the five HSC Trusts has midwifery services, providing antenatal, intrapartum, and postnatal care in hospital and community settings, and consultant-led obstetric care. All women and babies receive care from midwives, regardless of the model of care.

Birth settings are predominantly hospital based, either in a labour ward or for a smaller number of women, in an Alongside MLUs within a maternity hospital. A small number of women choose to birth at home.

Freestanding MLUs were first established in NI in 2009, following extensive public and professional discussion. Details are shown in Table 1.

Table 1: Freestanding Midwifery Led Units in NI

HSC Trust	Site	Year opened	Year closed
Belfast HSC Trust	Mater Hospital	2013	2020
Northern HSC Trust			
South Eastern HSC Trust	Downe Hospital	2009	2020
	Lagan Valley Hospital	2011	2022
Southern HSC Trust			
Western HSC Trust			

Three Freestanding MLUs (Downe, Lagan Valley and Mater) were opened between 2009 and 2013. A limited service subsequently was provided in Downe Freestanding MLU due to staffing pressures and the numbers of births declined from 2015 onwards. Downe Freestanding MLU suspended births in 2020 with the centralisation of services due to COVID-19 and staffing constraints. During the Covid-19 pandemic the Mater Freestanding MLU was repurposed and did not reopen for intrapartum care due to staffing constraints. Intrapartum care at Lagan Valley Freestanding MLU was temporarily paused in Autumn 2022 following a number of safety concerns including the tragic death of the baby that resulted in this report. At the request of the CMO and CNO all Freestanding MLUs were required to remain closed until the outcome of this report.

Alongside MLUs exist in four of the five HSC Trusts (Table 2). Five of these are open with core staff retained, but all experience workforce pressures that affect access. One is closed, and staff have been re-deployed to other parts of the service.

Table 2: HSC Trust responses to request for information on access to Alongside Midwifery Led Units, April 2024

HSC Trust	Site	Current Position
Belfast HSC Trust	Royal Jubilee Maternity Hospital	Open Core staff retained and women have access to it 24/7 Access will be affected if there are staffing pressures/sickness when staff will be diverted from the unit to meet pressures elsewhere in system
Northern HSC Trust	None	N/A
South Eastern HSC Trust	Ulster Hospital	Open Core staff retained and women have access to it 24/7
Southern HSC Trust	Craigavon Area Hospital	Open Core staff not retained. Staff are diverted from this unit to meet pressures elsewhere, but women have access to it 24/7
	Daisy Hill Hospital	Open Core staff retained. Staff are diverted from this unit to meet pressures elsewhere, but women have access to it 24/7
Western HSC Trust	South West Acute Hospital	Open Core staff retained and women have access to it 24/7
	Altnagelvin Hospital	Closed Staff from this unit are working within labour ward and the other maternity departments, where women are offered the midwife-led model of care.

A consultant midwife has been appointed within each HSC Trust (two in Belfast HSC Trust), with a range of responsibilities including delivery of high quality, safe and effective care. Their role blends a significant proportion of direct, higher level clinical care with education, research, service development and evaluation activities, working within multidisciplinary teams across organisational, and professional boundaries.

Three midwife consultants work within the PHA, using strategic influence and expert knowledge to lead and develop sustainable safe and effective high-quality midwifery and neonatal services and care, maximising the use of resources, providing professional leadership across the Health and Social Care System. One leads on CoMC, the others have a focus on maternal and child health. Their strategic focus is intended to improve public health for service users and their families, *‘to support them to achieve the best health they can across the childbirth trajectory and to give every child the best start in life’*.

Maternity service user involvement

There is an intention to facilitate partnership working between maternity service users and providers in NI through Maternity Services Liaison Committees (MSLCs) within HSC Trusts. The aim is for service users and service providers to meet together to identify how well the service is working to meet the needs of women and families. Considerable variation exists in the role, working and governance of these committees across the five HSC Trusts, which will be examined in Section 6.2.1.

Regional collaboration

The **Maternity and Neonatal Services Safety Oversight Group** is a DoH-led group that was established in January 2023 to oversee the maternity and neonatal services at regional level, with an aim *‘to receive assurance that maternity and neonatal services are safe and appropriate for the NI population’*.

The **Neonatal Network for Northern Ireland** is a funded network established in 2013. It was set up in response to DoH recommendations for the development of a formalised network structure for neonatal services in NI. It leads on the provision of safe, high quality services for specialist neonatal care and the development of outcome-led services. It is overseen by the Neonatal Network Board, which has membership from all HSC Trusts, SPPG, PHA and TinyLife, a local NI charity focused on supporting parents of premature and vulnerable babies. It has neonatal, obstetric, and nursing leads. The Neonatal Network is committed to maintaining safe, high quality, family focused and sustainable neonatal services in NI and is a focus for HSC Trusts, family representatives and service planners to work together towards this aim. It has limited influence over practice in individual HSC Trusts.

The Network’s key priorities are achieving regional consistency in care and driving quality improvement across the region. It supports the development of clinical leadership and provides a forum to share knowledge, good practice, expertise and learning. Its priorities are:

- A family centred approach.
- Co-production of information and resources to support parents, families and staff.
- To develop and implement guidance across the region.

- To standardise practice across the region to ensure consistency for families.
- To support a necessary multi-disciplinary team working approach to care.
- Staff and units working as a network to support capacity and manage demand across NI to strive to keep mothers and babies together and deliver appropriate care close to home where possible.
- Improving information flows and standardising data collection to support analysis and research for informed decision making purposes.

The **Maternity Collaborative** is a sub-group of the MSIG and has cross-trust and multi-professional input from obstetricians, midwives, anaesthetists, neonatologists, and GPs. It is led by the Public Health Agency and chaired by a consultant obstetrician. There is also membership from DoH, PHA, SPPG, QUB, and the CEC. The aim of the Collaborative is to improve the safety and outcomes of maternal and neonatal care by reducing regional variation in practice and to provide a high quality healthcare experience for all women, babies and families across the maternity services. Like the Neonatal Network, it has limited influence over the practice of individual clinical colleagues in HSC Trusts. The Maternity Collaborative has led on a number of initiatives including:

- Development of a regional guidance.
- Introduction of a physiological approach for interpretation of cardiotocographs (CTG) for intrapartum fetal monitoring.
- Development of a Regional Intrapartum Fetal Monitoring Guideline and intrapartum physiological based evaluation tool and checklist, alongside the provision of regional masterclass training for maternity staff.
- Implementation of Saving Babies Lives 2 within HSC Trusts in NI.
- Implementing service improvements based on the learning from confidential enquiries and maternity safety reports.

Unlike the Neonatal Network for NI, the Maternity Collaborative does not operate as a fully funded network. Transition to network status requires endorsement from the DoH. The **Strategic Midwifery Forum (SMF)** historically was the DoH-linked committee for senior midwifery leaders in NI, chaired by the Midwifery Officer for the DoH. The SMF promoted a coordinated and focused approach to midwifery activity across all areas of maternity services with a view to influencing the strategic direction of midwifery within NI. It was however limited by the governance structure. It was proposed that the SMF was re-established as the Strategic Midwifery Sub Committee of the Central Nursing and Midwifery Advisory Committee (CNMAC), to improve effectiveness and accountability of the forum. Following several meetings of, and discussion at, CNMAC, the Strategic Midwifery Sub Committee was formally approved and first met in September 2022. In alignment with other subcommittees of CNMAC, the committee is co-chaired by representation from practice and academia.

As a Sub Committee of CNMAC, the formal contribution of midwifery to the Strategic Nursing and Midwifery agenda is embedded into the formal governance arrangements, providing advice to the Minister of Health, support to the CNO, Executive Directors of Nursing & Midwifery and members of CNMAC, in their role as leaders within NI’s Health and Social care system.

5.1.2 Maternity service workforce, education and training

Midwifery workforce

There are approximately 1000 full time equivalent midwives and 200 full time equivalent MSWs in NI. The vacancy rate for midwives was 4.9% (n=66) and 1.9% (n=5) for MSWs as of February 2024 (Figure 12). Despite the increased number of pre-registration Master of Science (MSc) and Bachelor of Science (BSc) Midwifery programme places since 2020 (115 places per year commissioned 20-21, 21-22 and 22-23), this has not yet had a significant impact on workforce deficits as the first graduates only entered the workforce in September 2023. The age profile of midwives in NI in 2016 highlighted that almost half the workforce were over 50 years of age. [114] As a result the increased programme numbers have had a stabilizing effect but have had a limited impact in addressing overall vacancies, unlike England and Scotland where the FTE of midwives has been increasing. Wales has a similar workforce profile to NI.

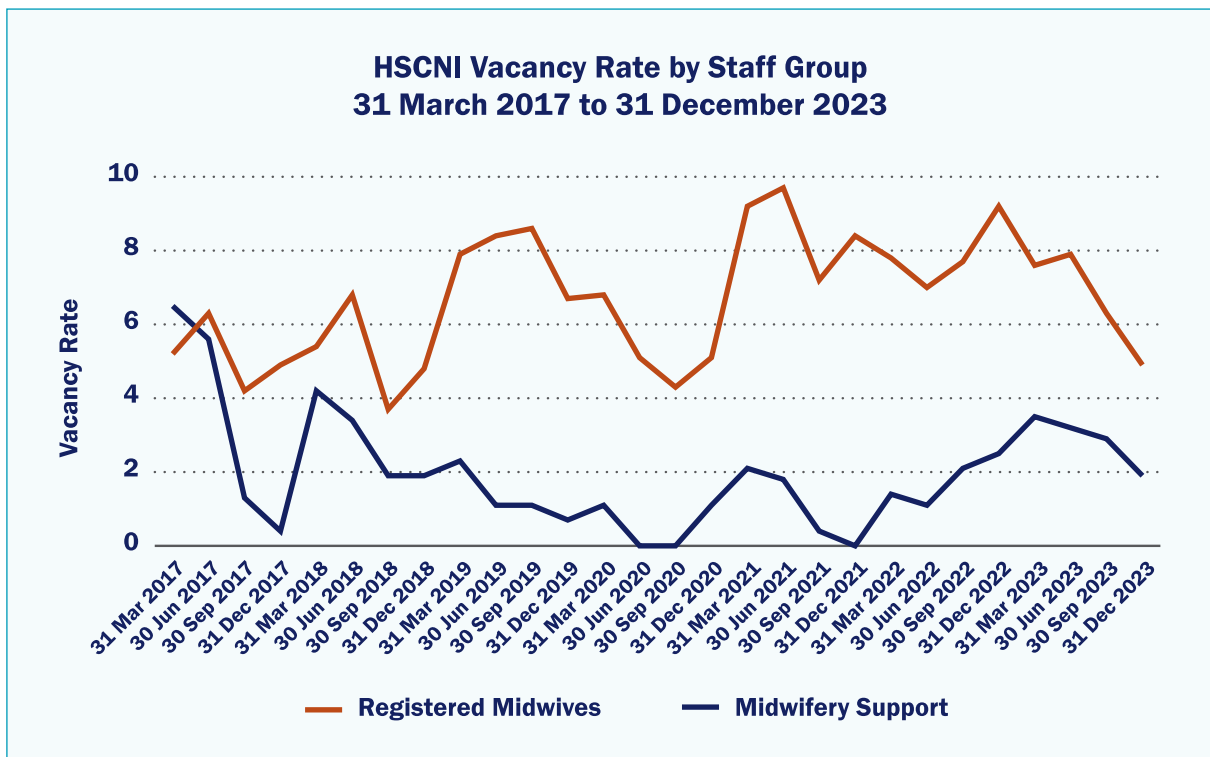


Figure 12: HSC Vacancy rates for midwives and midwifery support staff in 2017-2023. Source: Department of Health, 2024

1

Ending in December 2022, an exercise was undertaken using Birthrate Plus® as a workforce planning tool. The ensuing report indicated that funded clinical midwifery staffing Bands 5 to 7 varied across each HSC Trust, ranging from 144.07-226.01 Whole Time Equivalent (WTE), with a total clinical shortfall identified as -47.54 WTE. Western HSC Trust had the largest deficit. The report also identified that overall, an additional 80.93 WTE, Bands 3 (MSWs) to 8, were required for safe staffing.

2

Some variation in the role and integration of MSWs in the overall workforce was noted. A recent programme of work has been undertaken to ensure a regional approach to MSWs, and further work is seeking to ensure the provision of an accredited preparation programme for MSWs which potentially will facilitate entry to a pre-registration midwifery programme.

3

The Birthrate Plus® report identified a range of specialist midwifery posts in each HSC Trust. These ranged from 10.42-23.25 WTE, with approximately 33.7-39.1% of their role allocated to clinical time. This differs from an average of 46% allocated to clinical time in England. A number of factors are not given consideration in the Birthrate Plus® calculations, including the recent implementation of Continuity of Midwifery Care, absence or sickness rates, and indirect care for women with complexities or safeguarding concerns. The deficit for safeguarding named midwives was identified at 7.1WTE. This concern was recognised in the recent RQIA report on maternity safety. [2]

4

The sickness absence rates for both midwives and MSWs have increased between 2018/19 and 2022/23, from 7.52% to 9.08% (midwives) and from 11.12% to 16.33% (MSWs). The leading cause of sickness absence was mental health (35.6% of the reasons given), including workplace stress.

5

There is a small attrition on entry to the profession and often midwives work part-time following completion of their pre-registration programme. Attrition is not hugely significant from the pre-registration programme, although periods of temporary withdrawal have increased slightly over recent years (ranging from <1% to 22.9%) with students citing pressures, work life balance, carer or family responsibilities or medical reasons to take a temporary pause from their programme. Most students rejoin after a maximum period of two years. An All-Ireland approach to recruitment was implemented in 2023, resulting in an increase in funded student places. [115] Overall, there has been a decrease in UCAS applications to UK midwifery undergraduate programmes (13%) and specifically in NI a decrease of 7% has been experienced in 2024. [116]

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8

Obstetric and neonatal workforce

As of September 2023, there were approximately between 15 and 20 obstetric and gynaecology consultants in post in each of the five HSC Trusts (total number in post = 89). Of these 58 are female. There are nine vacant posts. Factors including current workload, retention, retirements, waiting times and the need to improve the quality and safety of maternity services were highlighted in a recent report [117] as key to the potential of ensuring a specialist obstetric workforce fit for purpose.

The neonatal medical workforce includes both specialty-trained neonatologists and general paediatricians. Neonatal care in the District General Hospital (DGHs) is predominantly provided by general paediatricians at both consultant and registrar levels, who cover both neonates and general paediatrics. Sixty-six consultants are in post, with five vacancies reported.

Education and training

Current provision of pre-registration midwifery education

QUB is the only provider of pre-registration midwifery education in NI, supported by DoH funding of approximately £4.4 million. Pre-registration programmes are offered at BSc and MSc level, with an annual intake of 115 (85 BSc and 30 MSc) students since 2020; an increase from the previous annual intake of 90, intended to address the shortfall of qualified midwives.

The midwifery education and research workforce is predominantly situated in the School of Nursing & Midwifery within QUB. Although the overall number of midwifery students has increased, the crude staff student ratio has not significantly changed. A low of 1:27.6 (NMC registered midwifery staff: midwifery students) in 2020 has now improved to the current rate of 1:24.7; this still compares unfavourably to many other midwifery education providers of pre-registration programmes and with the RCM-recommended ratio of 1:19.

Current provision of post-registration education

For midwives: Post-registration education at QUB includes CPD opportunities, MSc and doctoral level study; whilst the DoH supports individual students, some are supported by HSC Trusts and others self-fund. The HSC CEC is a regional service provider for post registration midwifery education and a unit of the BSO. CEC is commissioned by the DoH to design and deliver in-service post-registration education that supports nurses, midwives and allied health professionals across NI. HSC Trusts identify midwives' learning needs, and midwives then apply to attend CEC programmes.

The HSC Trusts have in-house education teams who conduct mandatory updating. These include Practice Education Coordinators who sit within the Nursing Directorate, supported by Practice Education Facilitators (PEFs).

For medical colleagues: The NI Medical and Dental Training Agency (NIMDTA) is an Arm's Length Body (ALB) of the DoH which commissions, promotes and oversees postgraduate medical and dental education and training throughout NI in addition to supporting revalidation of GMC registered medical professionals. The funding stream to support the work of NIMDTA is separate to commissioning for postgraduate/registration education for nursing, midwifery and allied health professionals.

Paramedics do not have a specific budget and CPD is largely ad hoc.

Training for emergencies: Practical Obstetric Multi-Professional Training (PROMPT) training for maternity emergencies is also managed and funded at HSC Trust level. This varies between HSC Trusts, but seems mostly to be offered to midwives, obstetricians and anaesthetists every year, with some additional workshops for out-of-hospital preparation for midwives. At least one HSC Trust includes ambulance staff in out-of-hospital PROMPT training, but this does not seem to be common practice.

A recent report on post-registration education in NI recommended a more strategic interdisciplinary approach to meet the challenges facing health and social care services in NI. [118]

Facilities for simulation: The KN Cheung, SK Chin InterSim Centre at QUB (QUB KN Cheung SK Chin InterSim Centre), provides students with the opportunity to experience low-to-high fidelity simulation, through immersive role playing for individual professions and interdisciplinary working; and access to 360° life-like videos and audios of simulated scenarios. Scenarios are co-designed with practice partners, service users and interdisciplinary educators as members of a Simulation Working Group, challenging students to underpin practice with the appropriate evidence-based knowledge, critical thinking, decision-making and team communication behaviours.

5.1.3 Key clinical characteristics and outcomes for women and babies

Characteristics of childbearing women

Maternal age

Maternal age at birth in NI has significantly changed across age categories from 2013 to 2022 in all HSC Trusts (Figure 13). Fewer women aged 29 and under are having babies. Pregnancies in those aged 19 and under have declined by 50% (from 4% to 2%) since 2013. There has been an increase of approximately 3% in women age categories from 30-39+ years. [7]

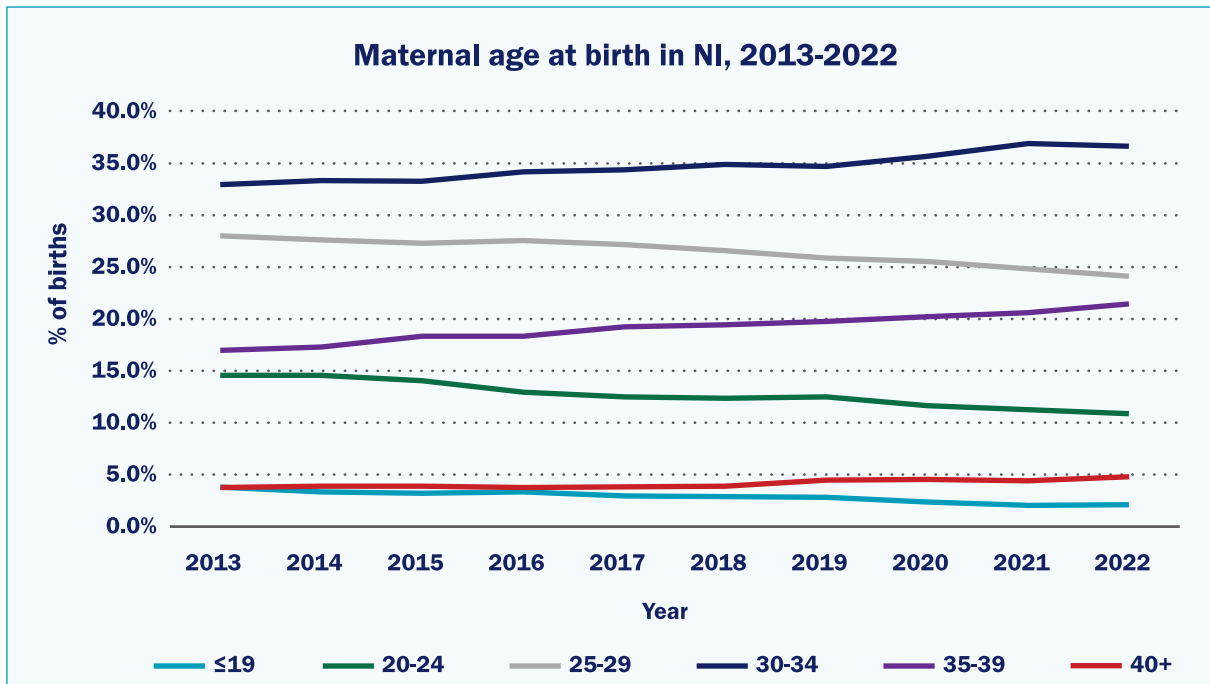


Figure 13: Maternal Age at Birth in NI, 2013-2022. Source: NIMATS 2023 [7]

Deprivation

A larger proportion of total births are to women living in the most deprived quintiles (1 and 2). The largest proportion of births is to women living in the most deprived quintiles, ranging from 21.3% of all births in Q1 (most deprived) to 17% in Q5 (least deprived). Of note is the larger number of births to women aged 24 and under living in the most deprived areas compared with those living in the least deprived areas (Figure 14).

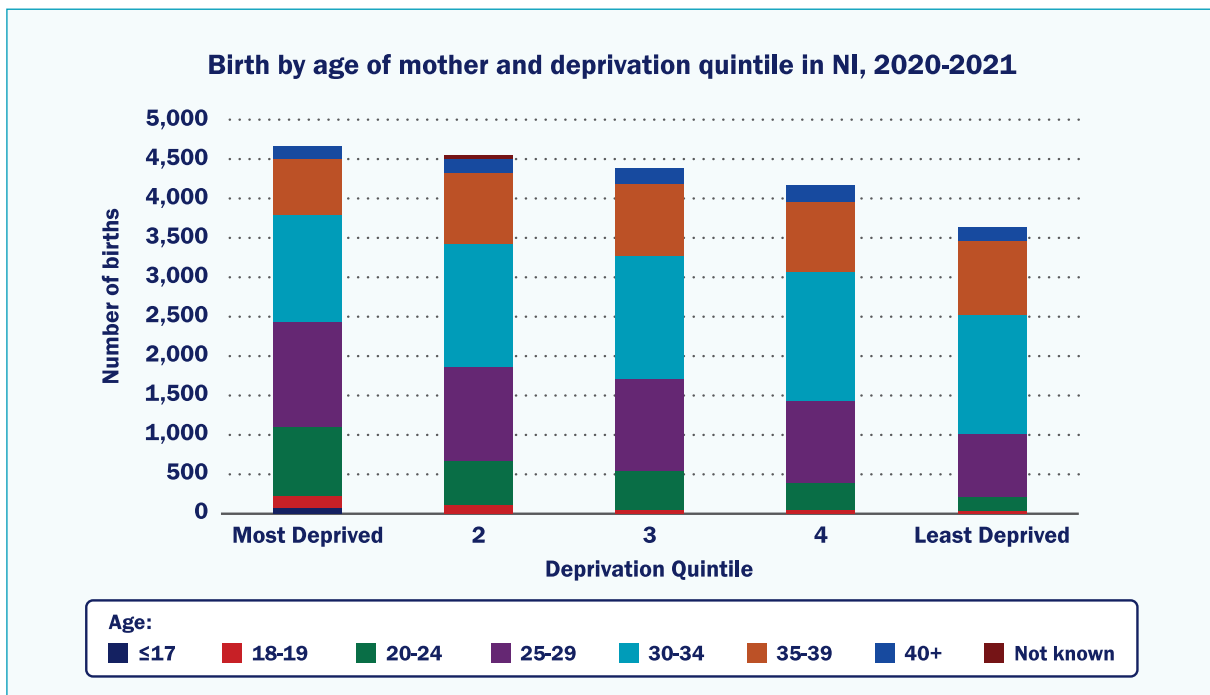


Figure 14: Births to Northern Ireland residents, by age of mother and deprivation quintile of mother's residence, 2020-2021. Source: Public Health Agency 2023 p99 [87]

Parity

First time mothers represent approximately 38.6% of women giving birth in NI in 2022 (NIMATS 2023), with most women having been pregnant once or twice previously (34.2% and 17.5% respectively). A small proportion of women were pregnant four or more times (3.5%) in 2022. These proportions were largely unchanged between 2013 and 2022.

Ethnicity

Most women giving birth in NI are recorded as White; approximately 95% in 2021/22. [88] Data on ethnicity by age or sex are not published from the most recent Census data (2021). In 2021, there was an increase in babies born to mothers born outside of the UK or Ireland and approximately 10% of births in 2013 were to mothers who were born outside of the UK or Ireland in comparison to less than 4% in 2002. [119]

This differs significantly from England and Wales, where 30.3% of all live births were to non-UK-born mothers in 2022, and two thirds of live births in London were to parents (one or both) who were born outside the UK. [120]

Smoking

Approximately two thirds of women in NI over 16 years of age have never smoked with around 11% currently smoking. [87] Smoking has declined in women of childbearing age; all HSC Trusts reported a reduction in maternal smoking status at antenatal booking between 2013 and 2022. Smoking status at booking was reported as 'yes' by 10% (n=2111) of women in 2022, representing a decline from 16% (n=3813) in 2013. Smoking at booking is less likely in first time mothers, women from ethnic minorities, and women living in the least deprived quintile: 4.4% in the least deprived compared with 23.2% in the most deprived. [87]

Maternal BMI at booking

The proportion of pregnant women presenting with a BMI of $\geq 30\text{kg/m}^2$ at booking increased from 19.2% (n=4613) in 2013 to 28% (n=5676) in 2022. [7] The proportion of pregnant women who presented at booking with a normal BMI (18.50-24.99 kg/m^2) declined from 48% (n=11,526) in 2013 to 39.6% (n=8066) in 2022 across all HSC Trusts in NI, representing a steady annual decrease.

Outcomes and processes for women and babies

Maternal mortality

Maternal mortality is monitored and reported through the Mothers and Babies: Reducing Risk through Audits and Confidential Enquiries across the UK (MBRRACE-UK) programme of work, [15] with combined data presented across England, Wales, Scotland, and NI. The most recent report (2023) indicates there was an increase in the overall UK maternal death rate by 15% (RR 1.15, 95% CI 0.96-1.38) between 2009-11 and 2019-2021; this remained significant when deaths due to Covid-19 were excluded (Figure 15). [24] Thrombosis and thromboembolism were the leading causes of death. Deprivation and ethnicity are key influencing factors in relation to maternal deaths in the UK; in 2019-2021, women from the most deprived areas were more than twice as likely to die than women from the least deprived areas, and Black women three times more likely than White women to die.

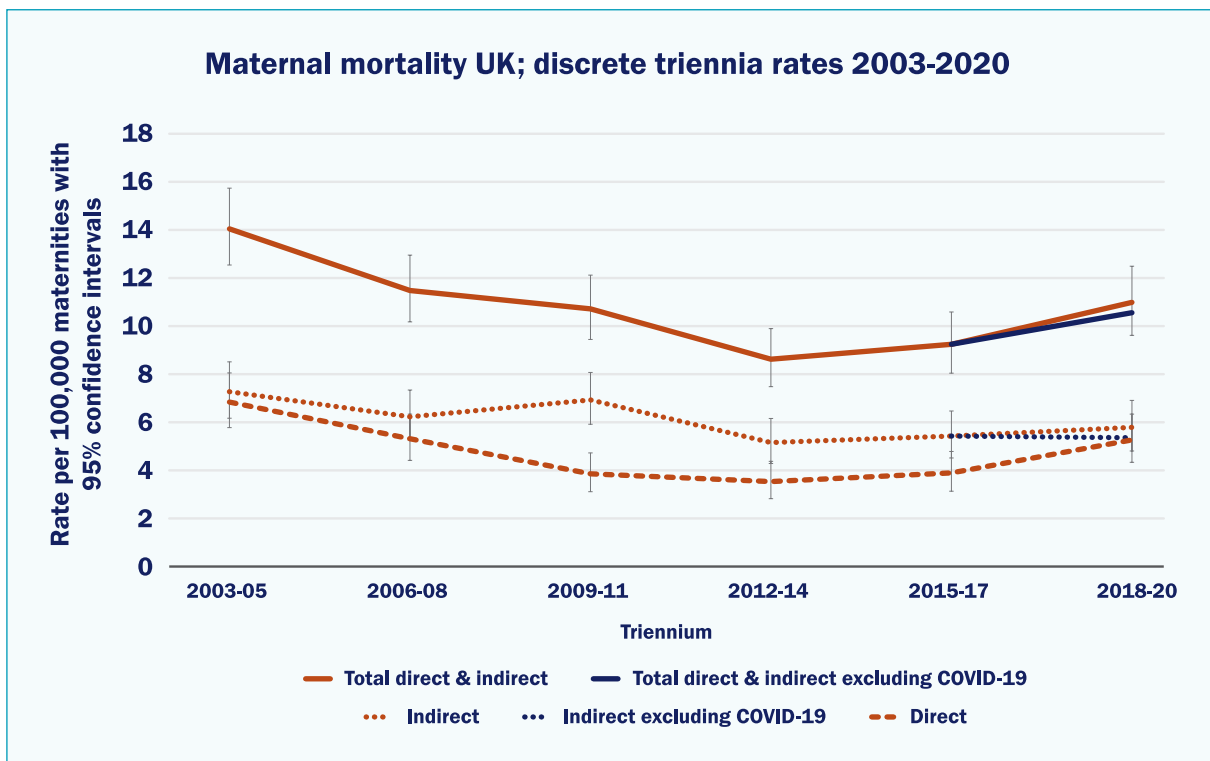


Figure 15: Maternal mortality in UK, 2003-2020. Source: MBRRACE-UK 2023

Perinatal mortality

Perinatal mortality data for NI are shown in the comparative figures below, from the most recent State of the Nation Report on UK Perinatal Deaths for Births in 2021. [24] All NI rates presented for 2021 exceed the UK average and are the highest amongst all UK countries. While stillbirth rates were declining across the UK, recent data show an increase in all countries except Scotland, with an increase in all stillbirths in NI to 4.09 per 1000 total births.

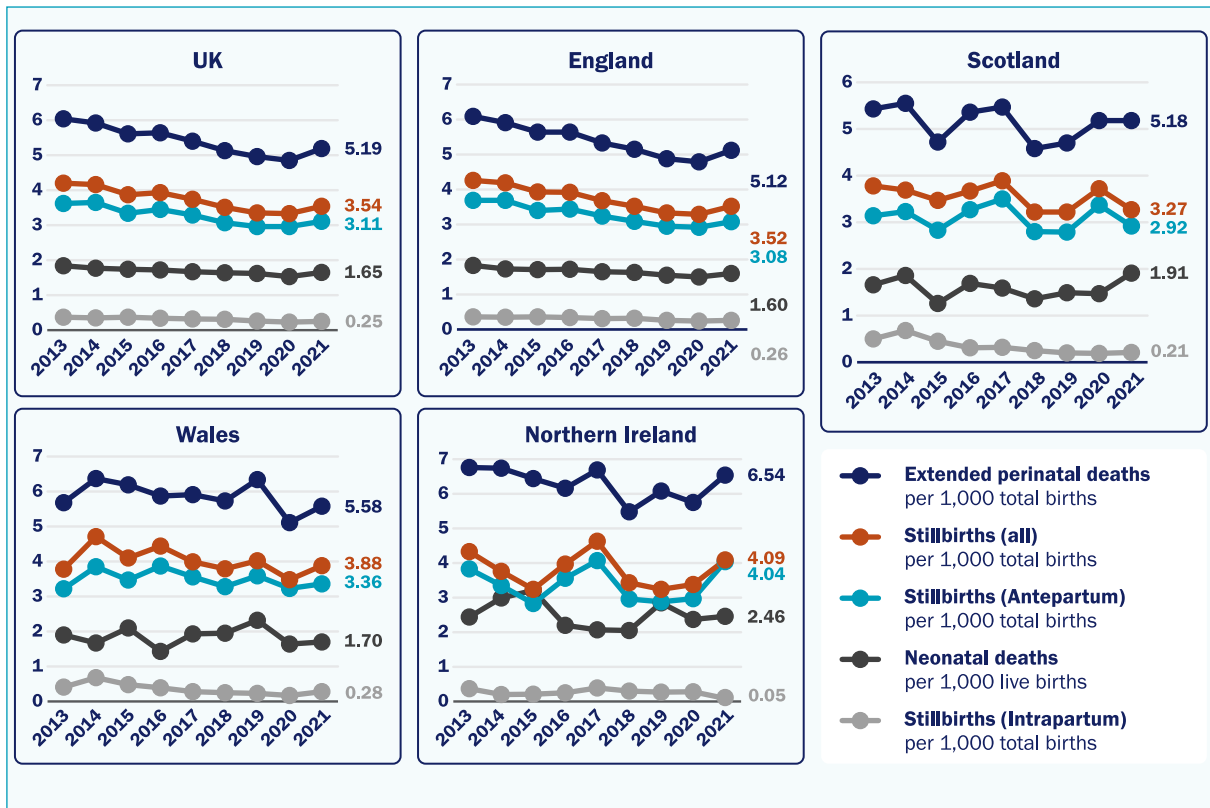


Figure 16: Stillbirth, neonatal and extended perinatal mortality rates for the UK by country of residence, 2013-2021. Source: MBRRACE, 2023 [State of the Nation Report | MBRRACE-UK \(le.ac.uk\)](#)

Until 2020 termination of pregnancy law differed in NI; it is important to note that during this period stillbirth and, in particular, neonatal mortality rates in Northern Ireland were still influenced by differences in the law relating to termination of pregnancy, with more babies affected by major congenital anomalies being carried into the later stages of pregnancy and resulting in early neonatal deaths. The crude stillbirth rate excluding congenital anomalies for the most recent MBRRACE data (2021) for NI as a region is 3.49 per 1000 births. Due to small numbers (based on less than 4000 or more births overall) data are not published for Western HSC Trust and Southern HSC Trust. The other three HSC Trusts ranged from over 15% lower (South Eastern HSC Trust, 2.37/1000) to over 5% higher (Belfast HSC Trust, 5.92/1000) than the NI average. [121]

The neonatal mortality rate (excluding major congenital anomaly) from the most recent MBRRACE data (2021) for NI as a region was 1.18/1000 total live births in 2021. MBRRACE data are not published for Western HSC Trust and Southern HSC Trust due to small numbers; Belfast HSC Trust, South Eastern HSC Trust and Northern HSC Trust all exceed the NI average by 5% or more. [121]

Shoulder dystocia

The occurrence of shoulder dystocia has remained fairly constant from 2013 to 2022, representing a small number of overall births. The percentage of births in NI which shoulder dystocia occurred ranged from 0.98% (n=229) to 1.18% (n=256) between 2013 and 2022. The occurrence of shoulder dystocia across HSC Trusts followed a similarly consistent pattern and little variation was evident in the data. From 2013 and 2022 there were 27 cases of shoulder dystocia that resulted in stillbirth or neonatal death (0-4 cases annually). Of these, 24 cases occurred in hospital (one following transfer from a Freestanding MLU), two at home and one in a Freestanding MLU. The incidence of shoulder dystocia reported in the literature varies; 0.58 - 0.7% as reported by evidence between 1994-2005; 0.53% -1.1% in retrospective UK studies, and 2-16% cited by Crofts et al (2016). [122-125]

Place of birth

Nearly all babies in NI are born in hospital labour wards (approximately 89%, 2013-2022). The proportion of all births that took place in Alongside and Freestanding MLUs increased from 8.5% (n=2076) in 2013 to 14.3% (n=3233) in 2019, declining again to 9.5% in 2022. The remainder are born at home (0.4%) or are born before arrival (0.5%). The number of women giving birth in Freestanding MLUs was consistently between 1-2% (n=150-464) of overall births until 2020; the percentage in 2020-2022 was less than 1%. Data are similar to those collated by the UK Midwifery Study System (UKMidSS). [126] In comparison with the rest of the UK, the proportion of births in Alongside MLUs in NI was slightly lower than in the rest of the UK for 2016 and 2017, although this reversed in 2018. For 2019 and 2022 (combining Alongside and Freestanding MLU births) the proportion of births in midwifery units in NI was slightly higher than in the rest of the UK. UKMidSS data suggest Freestanding MLU births in NI in 2019 (approximately 2%) were higher than in the rest of the UK; and by 2022 were lower than the rest of the UK (approximately 1% for NI Freestanding MLU births).

Births in Freestanding MLUs were paused from November 2022 (Section 5.1.1). Forty-four women gave birth at home in 2013, which increased to 91 in 2022. In addition to these data, a very small number of women have decided to freebirth at home without professional assistance. The actual number is not known, but anecdotal accounts suggest the number is increasing.

Onset of labour

Data demonstrate an increasing trend towards induction of labour, from 31.9% of total births in 2013 (n=7895) to 38.2% in 2022 (Figure 17). The (provisional) rate in 2023 was 38.3% (n=7672).

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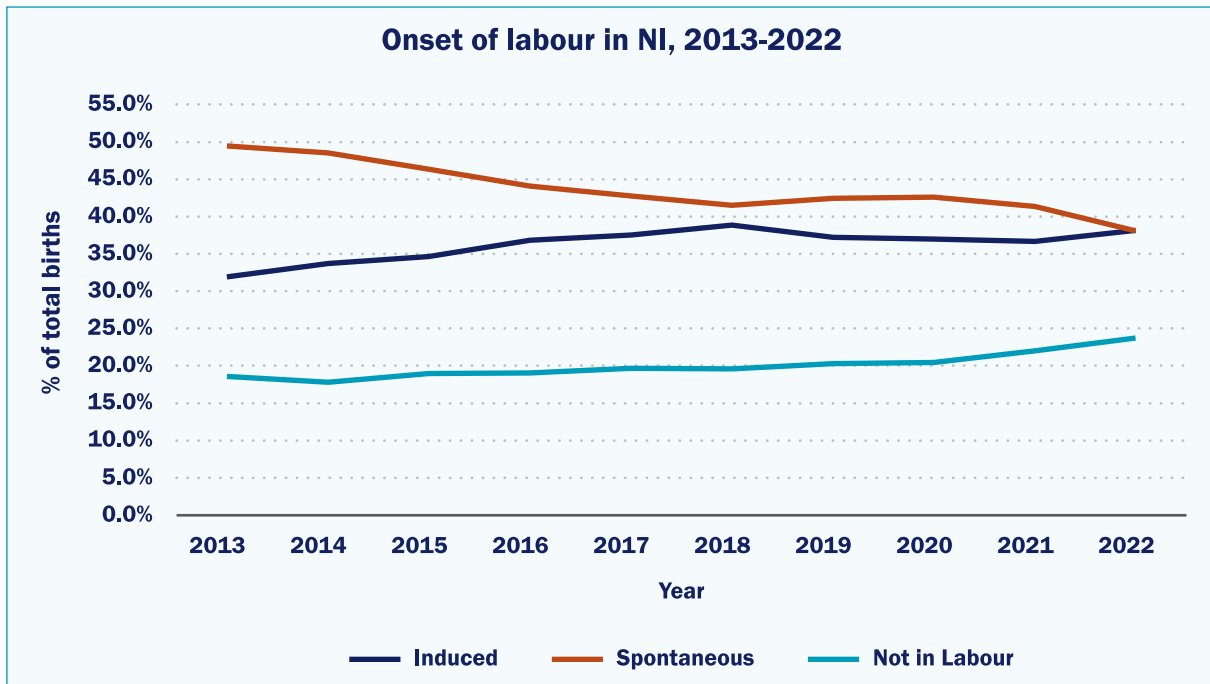


Figure 17: Onset of labour in NI, 2013-2022. Source: [7]

Rates of induction of labour in NI are higher than England and the USA (Figure 18).

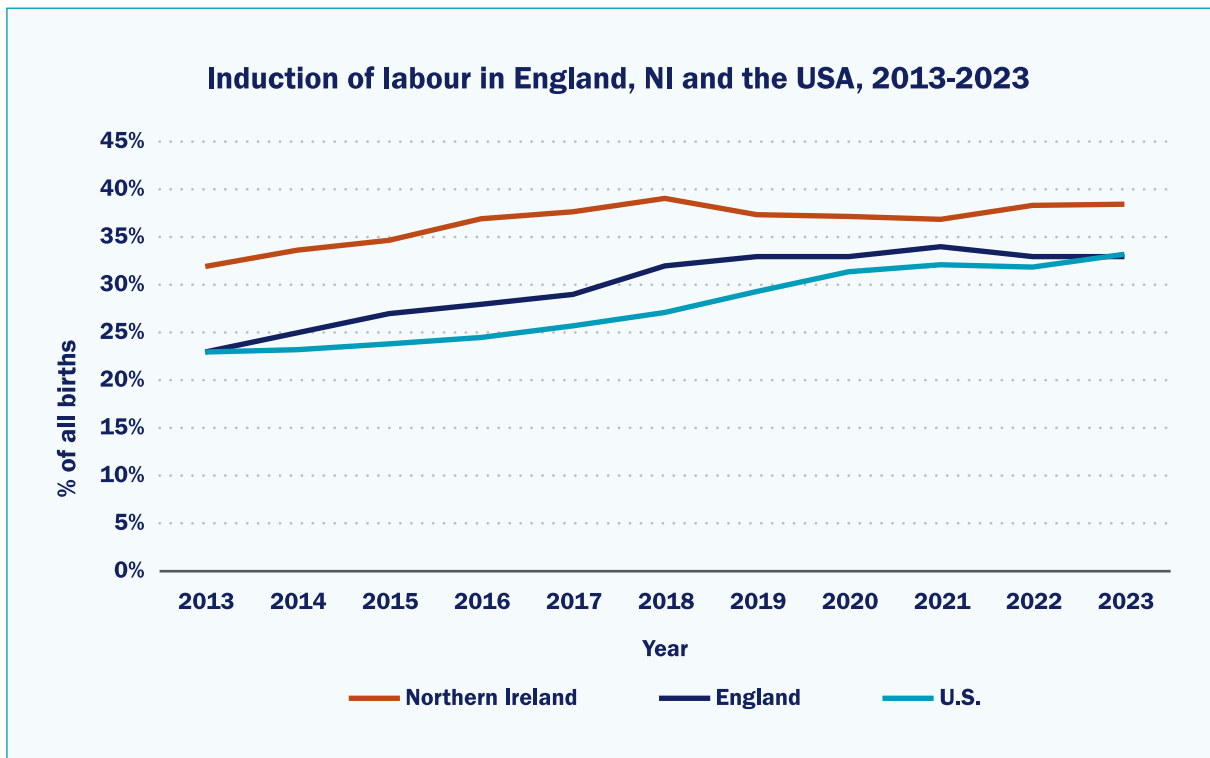


Figure 18: Induction of labour in England, NI and the USA, 2013-2023. *English data for 2012-3/2013 to 2022-3/2023. Source: NHS Hospital Episode Statistics, 2022-2023 U.S. Data – CDC Wonder online database. U.S. 2022 & 2023 data are provisional. NI data 2023 are provisional.

Mode of birth

Mode of birth for women in NI has changed significantly in the previous decade. Vaginal birth is now less common, with caesarean birth (both elective and emergency) representing 40.1% of all births in 2023 (provisional data) compared with 29.3% in 2013 (Figure 19).

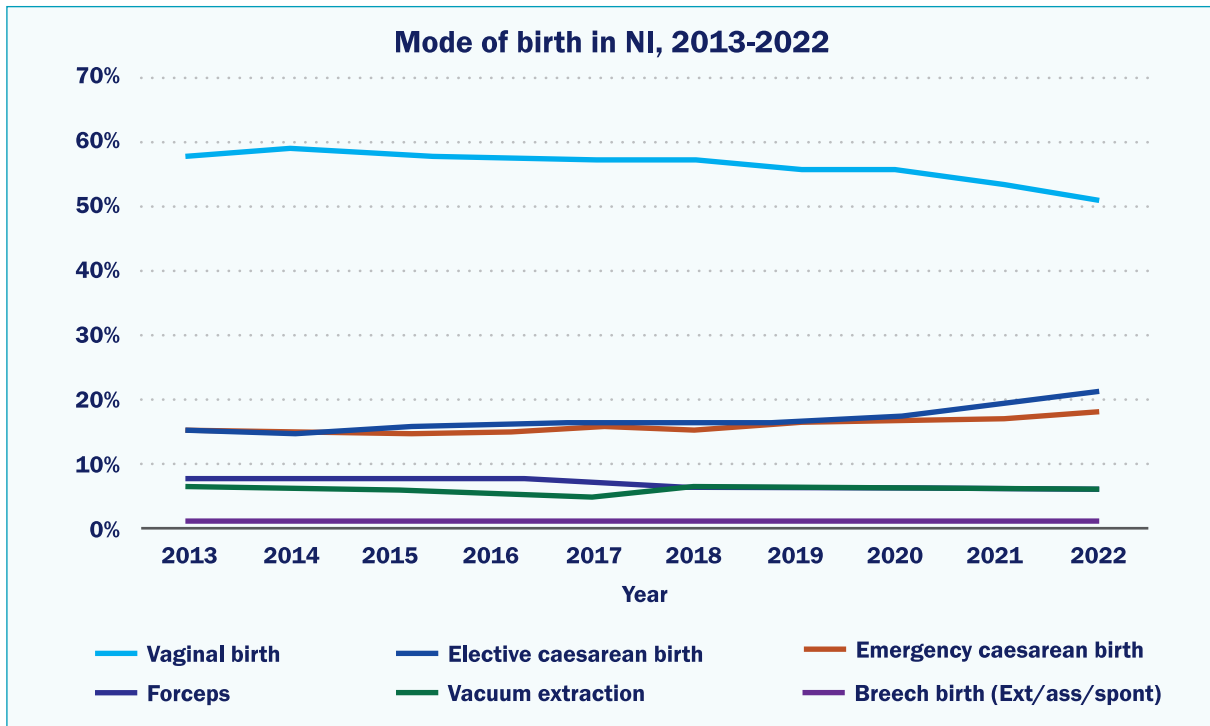


Figure 19: Mode of birth in NI, 2013-2022. Source: NIMATS 2023 [7]

In regard to mode of birth, the UK and the Republic of Ireland demonstrate a trend that diverges from other high-income countries (Figure 20). Comparative 2019 data reported by Euro-Peristat [127] suggest a median caesarean birth rate of 26% (IQ range 20.3-32.7% and range 16.4-53.1%) with the NI rate 32.7%, the Republic of Ireland 34.8%, Scotland 35.5% and Wales 28.3%.

All UK countries are above the OECD average for caesarean birth rates, and also above the US, where the caesarean birth rate has remained stable around 32% over this time period.

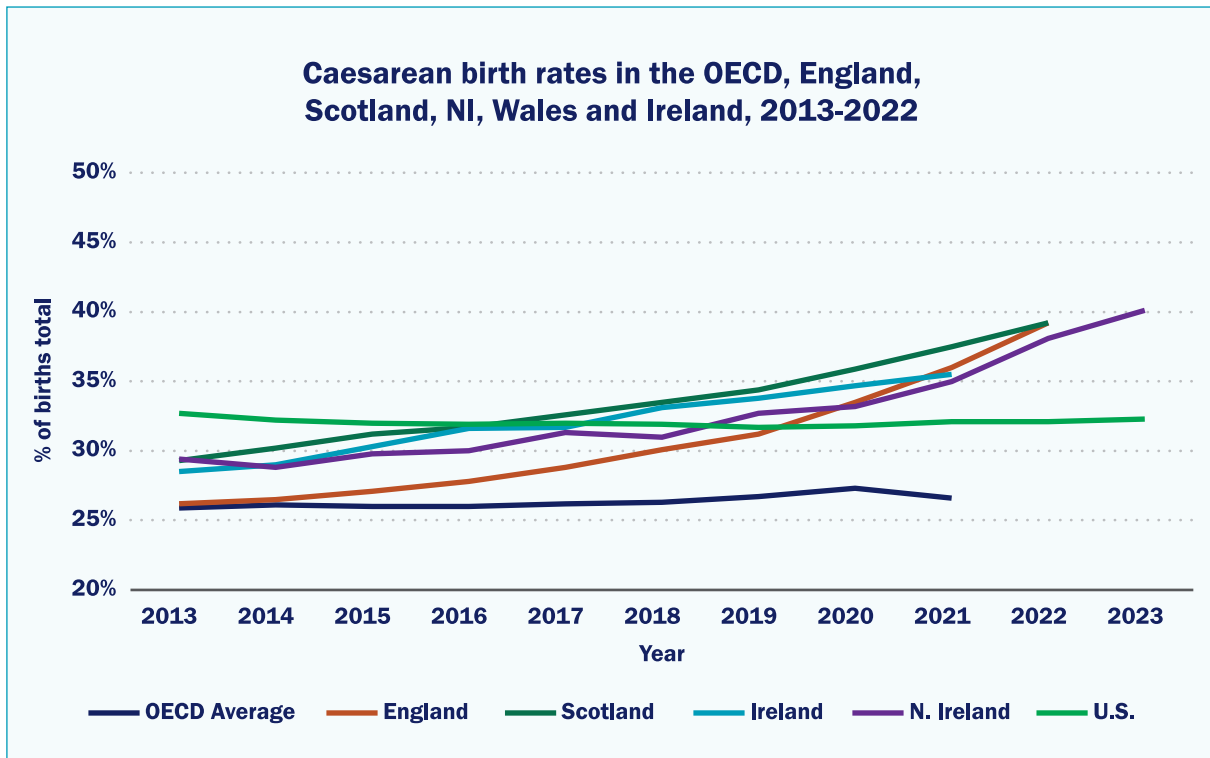


Figure 20: Caesarean birth rates in OECD countries, England, Scotland, NI, Wales and Ireland, 2013-2022. *Average for OECD wealthy countries with at least 100,000 births (Australia, Belgium, Canada, Czech Rep., France, Germany, Israel, Italy, Netherlands, Spain, Sweden). Source [128]. U.S. 2023 data provisional. NI data provisional for 2023. Source: [7]

Amyx et al (2023) [128] reviewed caesarean birth rates from 2015-2019 across 28 European countries and reported during that although UK and Republic of Ireland rates had increased within the timeframe, nine countries had decreased their rates and seven had remained stable. The percentage of women having a spontaneous vaginal birth (excluding breech, forceps or vacuum) decreased from 57.4% (n=14013) to 50.4% (n=10422) in the same time period.

Caesarean birth rates vary across HSC Trusts, with Belfast HSC Trust having lower rates than all the others (Figure 21).

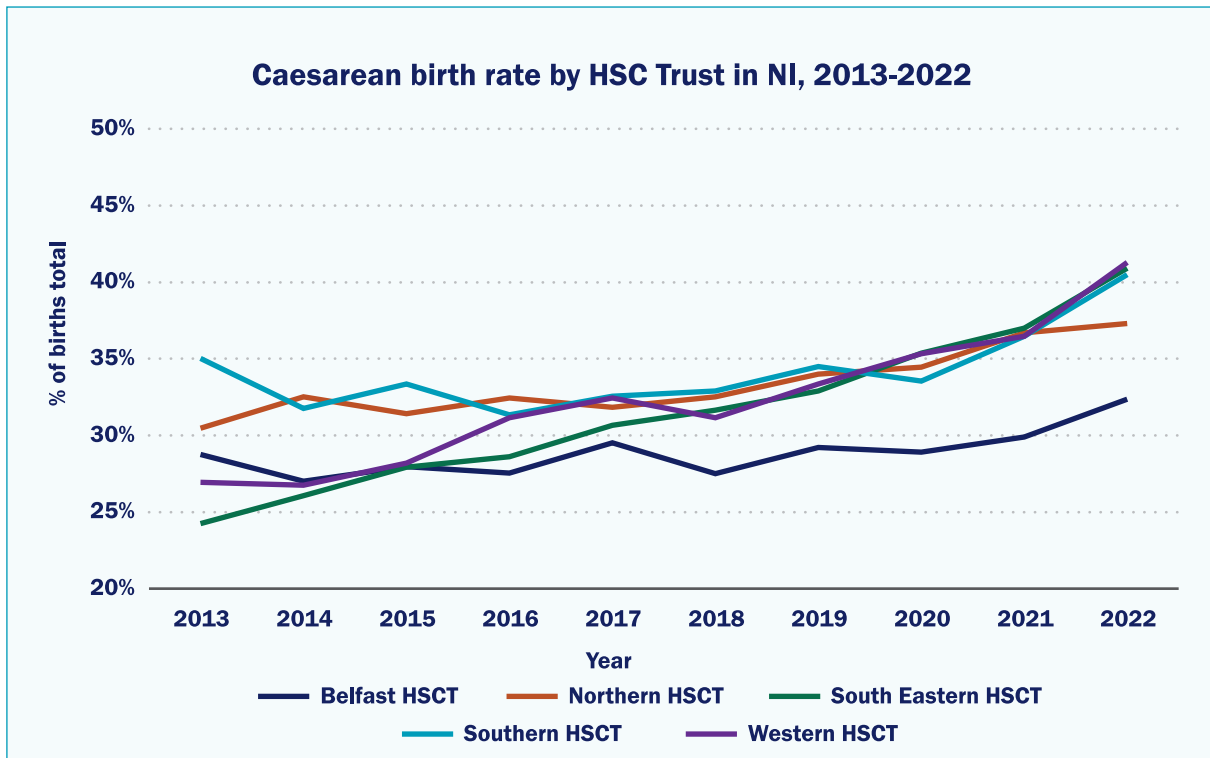


Figure 21: Caesarean birth rate by HSC Trust in NI, 2013-2022. Source: [7]

Mode of birth and mode of onset of labour

Of the women who had their labour induced, emergency caesarean births increased from 17.5% (n=1361) to 23.7% (n=1872) from 2013 to 2022.

For women who experienced a spontaneous onset of labour, 72.9% (n=5743) had a spontaneous vaginal birth in 2022, representing a decline from 76% (n=7278) in 2019. Emergency caesarean birth rates for women with a spontaneous onset of labour increased from 10.9% in 2013 to 12.8% in 2022.

Mode of birth and parity

For women who were pregnant for the first time in 2022, caesarean births represented 41.6% (n=3326), an increase from 29% (n=2777) in 2013. For women who were not pregnant for the first time, caesarean births represented 35.9% (n=4563) of births in 2022 (Figure 22).

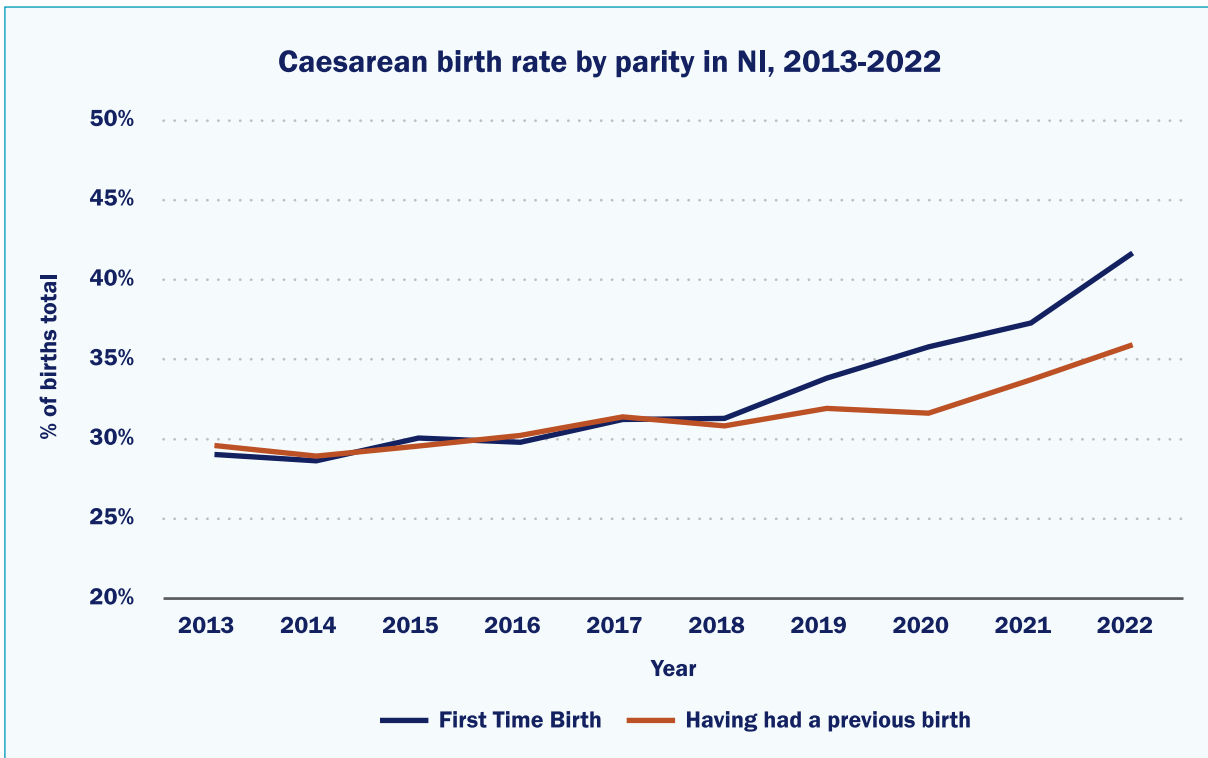


Figure 22: Caesarean birth rate by parity in NI, 2013-2022. Source: [7]

For women who had a previous caesarean birth, 83.7% (n=3179) had a repeat caesarean birth, 65% electively (n=2066) in 2022, compared with 60.9% (n=1497) in 2014, of which 45.3% (n=670) were elective. The proportion of women having a vaginal birth after caesarean birth (VBAC) has declined steadily since 2015 (Figure 23). Compared with other industrialised countries, NI is now 6th lowest of 20 in its rates of VBAC; it would have been 4th highest in 2014. NI experienced a 25% decline in VBAC rate from 2015-2022 (see Figures 23 and 24).

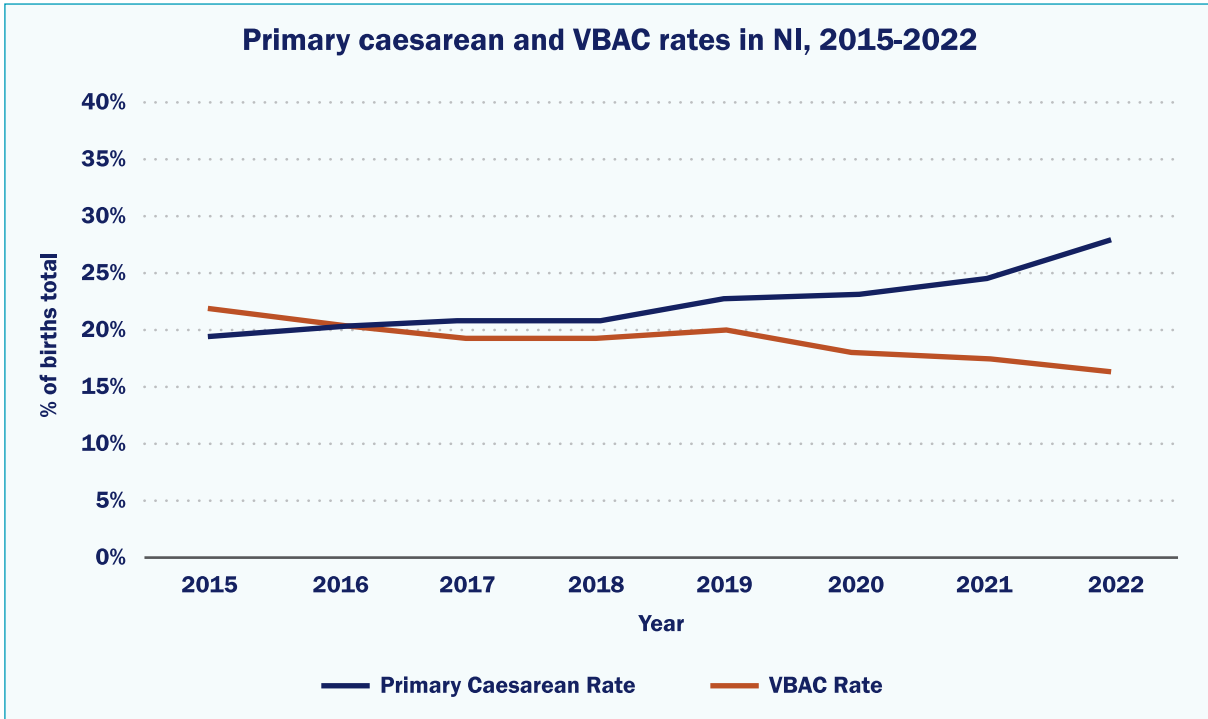


Figure 23: Primary caesarean and vaginal birth after caesarean birth (VBAC) rates in NI, 2015-2022. Source: [7]

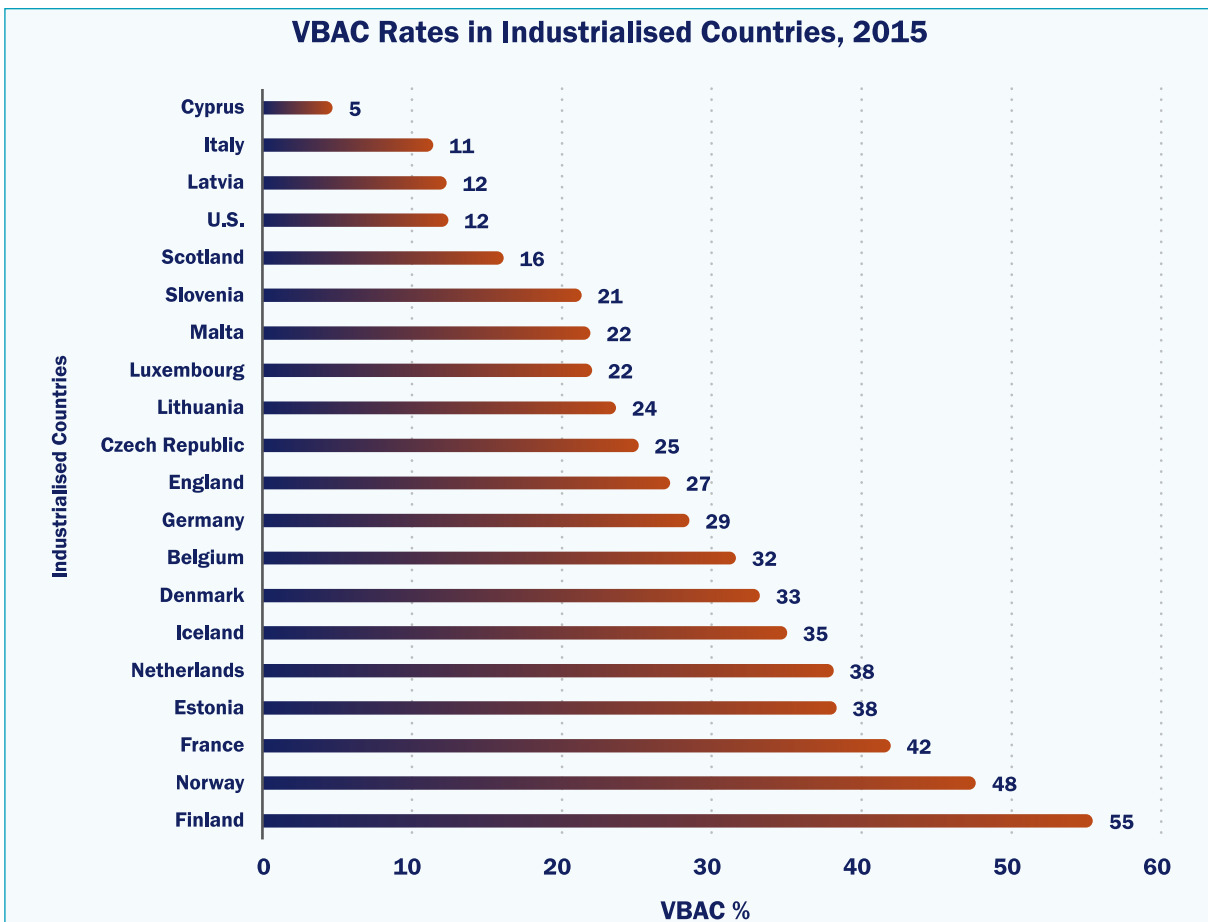


Figure 24: Vaginal birth after caesarean birth (VBAC) rates in industrialized countries, 2015. [127]

Gestation at birth

The majority of infants were born at 39+ weeks gestation in 2022. Preterm births (<37 completed weeks gestation), as a proportion of total births, showed a small decline from 7.72% in 2012/13 to 7.37% in 2021/22. [119] Preterm birth is linked with levels of deprivation; more infants were born preterm to mothers living in deprived areas. A small number of babies are born extremely preterm (<28 weeks); approximately 0.5% (n=113) in 2022.

Neonatal care

A recent (unpublished) NI Report [87] identified birth rate, congenital anomaly rates, prematurity, low birthweight, multiple births, maternal factors (including age, obesity, smoking, alcohol, and substance use, in care or the justice system) and ethnicity as the key factors impacting on demand for neonatal services in NI. Figure 25 shows the decreasing number of admissions to neonatal units, in line with the decreasing birth rate. Approximately 7% (n=1471) of infants are born preterm (<37 weeks gestation). There has been an increase in the proportion of term infants admitted to neonatal care from 2018. Around 20% of babies born following induction of labour are admitted to neonatal units. Admission following elective caesarean birth has increased from 16% to 20% since 2013, while admission following emergency caesarean births has decreased from 38% to 35% over the same period.

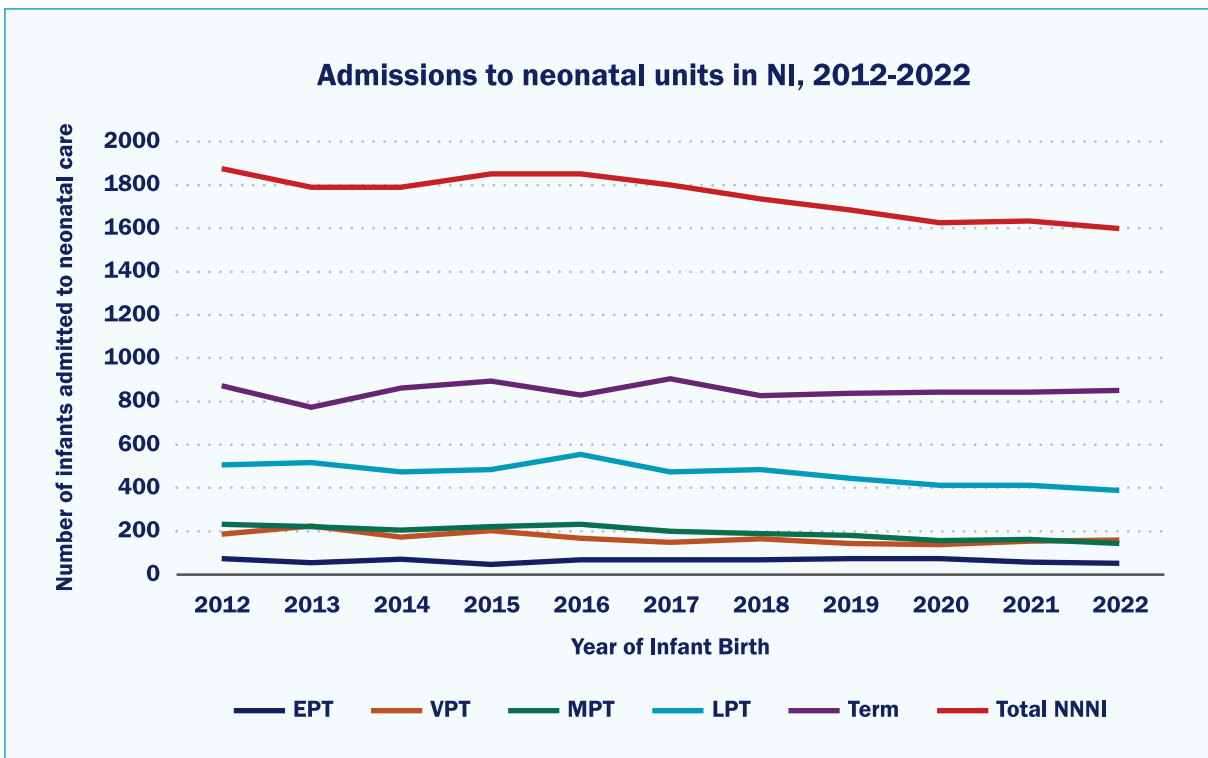


Figure 25: Admissions to neonatal units in NI, 2012-2022. *Definitions used: EPT, Extremely preterm (less than 28 weeks' gestation); VPT Very preterm (28 to 31 weeks' gestation); MPT, moderately preterm (32 to 33 weeks' gestation); LPT, Late preterm (34 to 36 weeks' gestation); Term (greater than or equal to 37 weeks' gestation). Source: NICORE 2023

Postnatal outcomes for women

Postpartum haemorrhage (PPH)

The incidence of postpartum haemorrhage (PPH - blood loss greater than 1500mls) increased from 0.8% (n=187) in 2013 to 2.9% (n=593) in 2022. Practice has changed in relation to the measurement, recognition and reporting of PPH across HSC Trusts during the previous 10 years which may account in part for the increased percentage.

When PPH is considered in relation to mode of onset of labour and mode of birth (Figures 25 and 26) the most marked increase is in women who have had an emergency caesarean birth (1.5%, n=55 in 2013 to 6%, n=219 in 2022) and elective caesarean birth (1%, n=37 in 2013 to 3%, n=136 in 2022). For women who had their labour induced the incidence of blood loss greater than 1500mls has increased from 0.8% (n=63) in 2013 to 3% (n=248) in 2022.

The rate of PPH greater than 1500mls for women who had spontaneous onset of labour and blood loss >1500 mls also increased from 0.5% (n=63) to 1.9% (n=148) in the same time period.

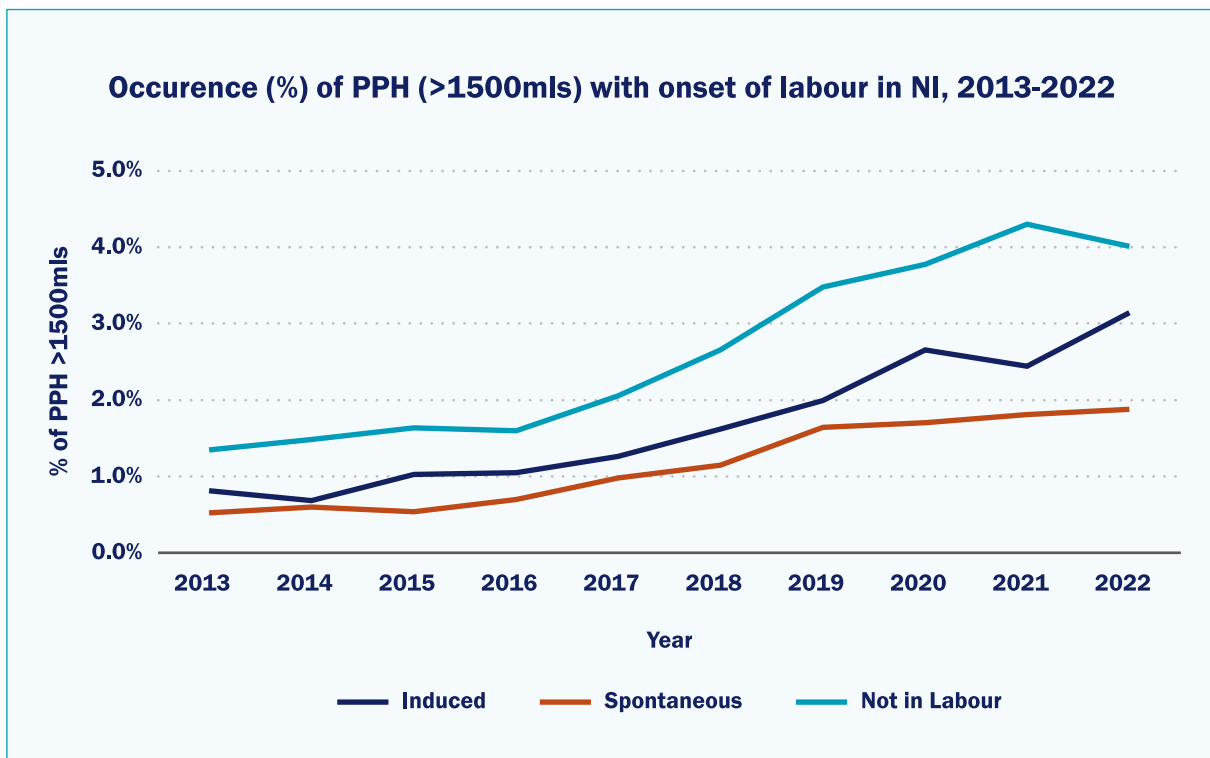


Figure 26: Postpartum haemorrhage and onset of labour in NI, 2013-2022. Source: NIMATS 2023 [7]

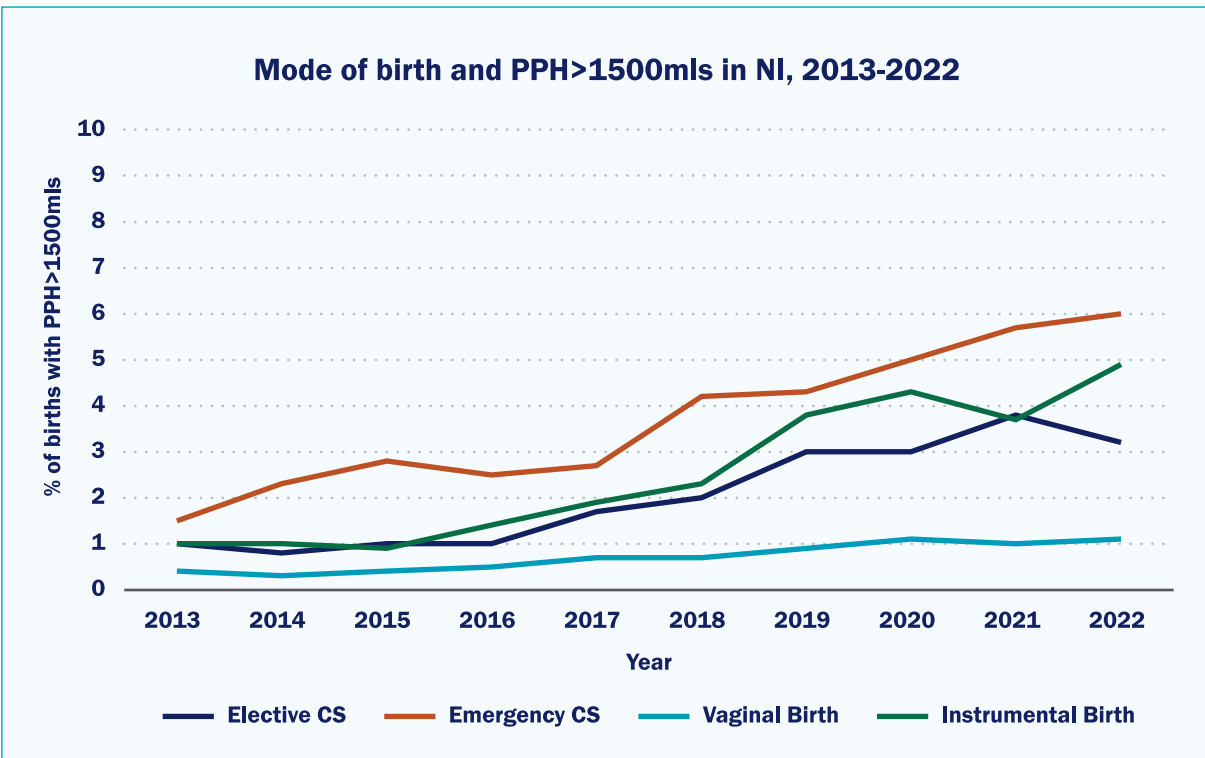


Figure 27: Mode of birth and postpartum haemorrhage (PPH) in NI, 2013-2022.
 *Vaginal breech births have been excluded due to small numbers. Source: NIMATS 2023 [7]

Perineal lacerations

There were 269 women who experienced 3rd and 4th degree lacerations in 2022. This represents 1.3% of all births (n=20683). [7] Of the 269 women, 94 (of 1150) had a forceps birth, 150 (of 10,502) had a spontaneous vaginal birth and 25 (of 1150) experienced vacuum extraction. (Figure 28). Sixty nine percent (185/269) of 3rd and 4th degree lacerations occurred in first time mothers, of whom 150 (of 3891) experienced spontaneous vaginal birth (4%), 94 (of 928) women had a forceps birth (10%) and 25 (of 764) had vacuum extraction (3%).

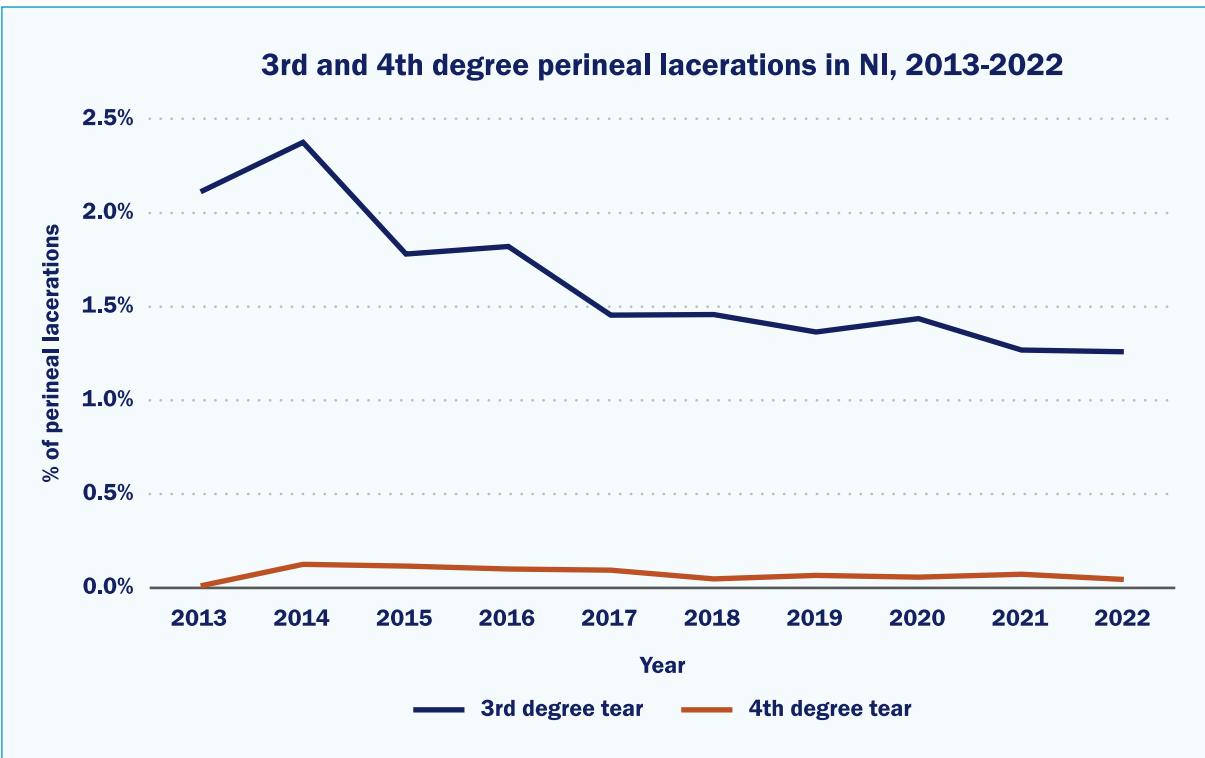


Figure 28: Percentage of 3rd and 4th degree lacerations in NI, 2013-2022. Source: NIMATS 2023 [7]

Breastfeeding

All maternity units in NI have received UNICEF UK Baby Friendly Initiative (BFI) accreditation, comparing favourably to the proportion in Scotland (94%), England (38%) and Wales (37%). Nine services including maternity, health visiting, and Sure Starts have achieved a BFI Gold Standard Award. [129] Breastfeeding initiation was reported for 61.8% of infants in 2021, representing an increase from 54.1% in 2012 (Figure 29). Older mothers were more likely to breastfeed, with small increases in breastfeeding initiation between 2017 and 2021 in mothers under 20 years and more than 40 years of age. Lower levels of breastfeeding initiation are associated with increasing deprivation; 47.6% compared to 76.3% in the most and least deprived areas, respectively.

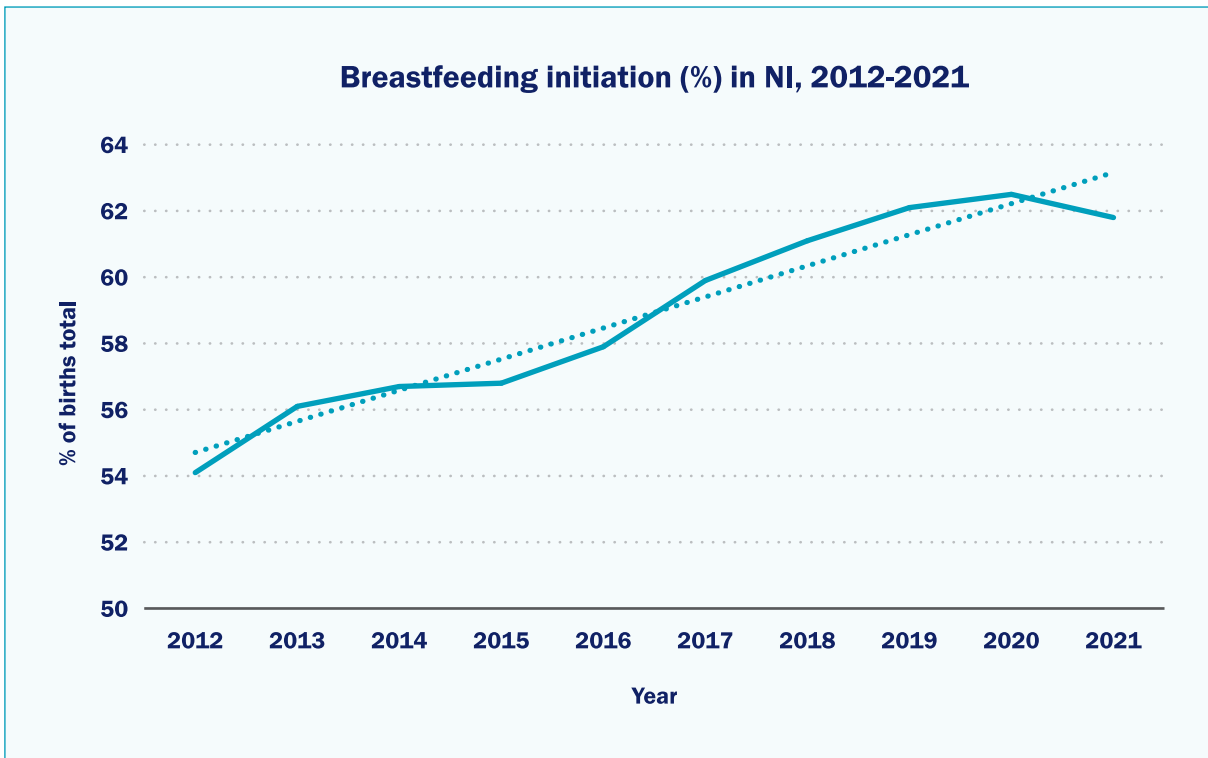


Figure 29: Breastfeeding initiation (%) in NI, 2012-2021. Source: PHA Health Intelligence Briefing 2022 p12 [129]

Prevalence of breastfeeding at key time points until 12 months is shown in Figure 30. Overall, there is an increase in breastfeeding prevalence, however data quality may be limited due to fewer visits by health visiting services during Covid-19. Direct comparison of data across the UK is not possible due to definitions used and variation in timepoints when data are recorded, but available comparison data indicate that this is a substantive improvement for NI at a time when other outcomes are showing a decline, and during a period when economic and social conditions have worsened.

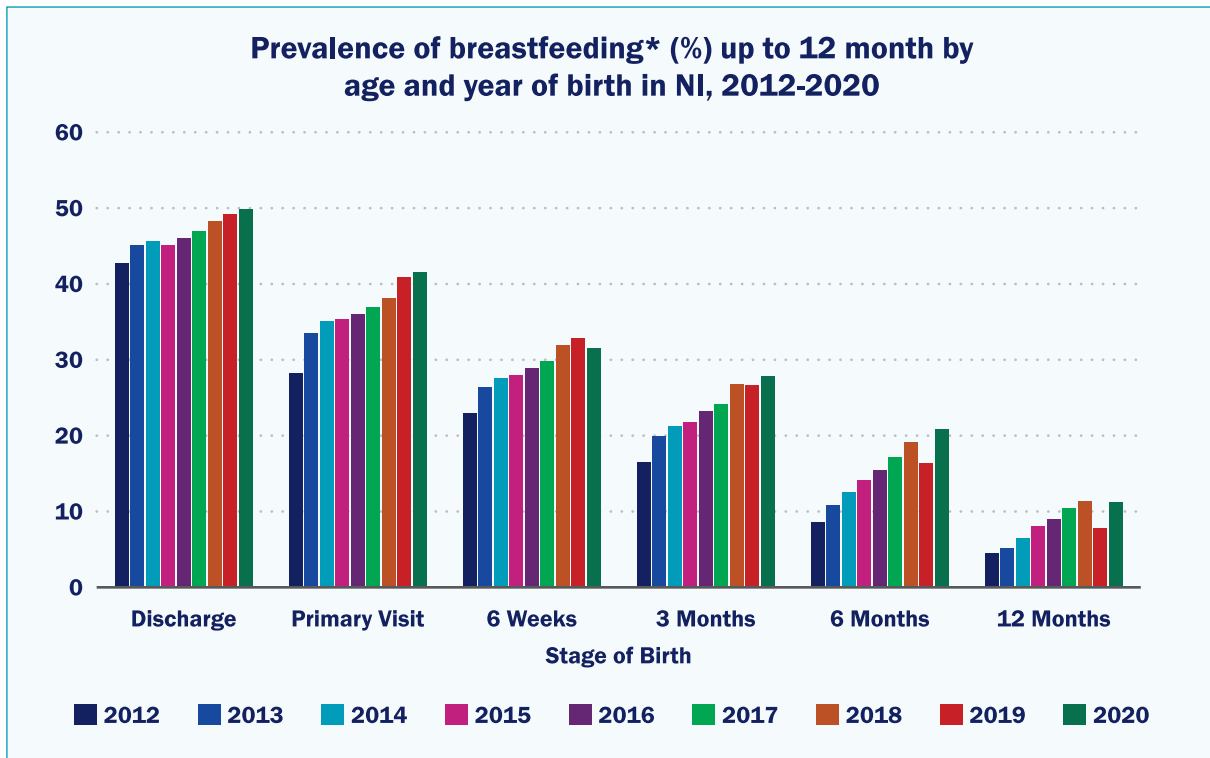


Figure 30: Prevalence of breastfeeding* (%) up to 12 months by stage and year of birth in NI, 2012-2020. Source: NIMATS and [129]

5.2 Findings 2: listening and engagement events

5.2.1 Preface to listening and engagement event findings

The purpose of the engagement work was to hear from a wide range of stakeholders about ways of improving the quality and safety of midwifery care and services across NI, both in hospital and out of hospital. Participants were asked their views both about problems and challenges and about good experiences. Information and questions shared with those attending is shown in Appendix 9.

The work took place between July 2023 and January 2024. Some of the respondents described experiences that were affected by the circumstances of the Covid-19 pandemic; where this was the case, this has been identified.

Details of the methods of this engagement work are described in Section 4.4.2. It was designed as a rapid engagement process, not as qualitative research. It is not possible to quantify the exact numbers or characteristics of respondents who made comments on each topic. Specific questions were provided to start the discussion (Appendix 9), but participants were free to discuss whatever they wished. Discussion ranged freely and not all groups discussed the same topics. Some respondents made both negative and positive comments.

The process of notetaking and analysis allowed for an assessment of approximate proportions of comments, and qualitative terms such as ‘most’, ‘many’, and ‘some’ have been used to indicate this.

The findings of this work are analysed and contextualised with other sources of information in Section 6.0.

All views and opinions described in this section are those of the women, partners, advocacy groups, staff, and students who so generously gave their time to participate in this work. We are very grateful to them for taking the time to inform this work and to describe their experiences and perspectives, sometimes at personal cost to themselves.

All input is anonymised and identifying details removed. Throughout these summaries, direct quotes from participants are shown in italics and quotation marks.

5.2.2 Insights and experiences from listening events with women, families, and service user advocates

Who did we hear from?

One hundred and seven women and partners participated in listening events, most of which were face-to-face. A small number of individual meetings were held and a further four women sent written accounts and comments about their experiences. Participants were from diverse backgrounds and locations from across NI, with a range of socio-economic circumstances and varied ethnicity including women from communities experiencing high deprivation. They included women with experiences in all five HSC Trusts, women who had experienced birth at home, in Freestanding and Alongside MLUs, in hospital labour wards in large and small hospitals, and women who had decided to freebirth at home without professional help. Some had experience of continuity of midwifery care since its recent introduction. Participants included women with complex needs with a range of complications in pregnancy, who had experienced emergency and elective caesarean birth, and who had experience of adverse outcomes including stillbirth, long-term damage to their baby, and mental health problems. They also included women who did not experience clinical complications, and those who had spontaneous vaginal births. They had varied experiences of postnatal care and recovery, and included women who had breastfed and those who had formula fed.

Participants included service users who were also advocates, peer supporters, and doulas with experience of supporting childbearing women and families, service user Chairs and members of MSLC/MVPs, and a number of community groups and charities working on behalf of parents and newborn infants including those with mental health problems, who had experienced a perinatal loss, whose babies needed care in a neonatal unit, who lived in circumstances of socio-economic deprivation, and who were asylum seekers.

What did they tell us?

In summary: While there was a range of experiences, both negative and positive, there were clear consistent messages. The dominant finding was the extent of negative, traumatic experiences reported by women and partners and the community groups and charities that support them. They reported deficits in care at all stages of their maternity journey, from pregnancy, labour and birth, and following birth. Many women reported extensive distress and described their experiences as traumatic, affecting their wider family and for some, resulting in long-lasting psychological trauma. Women's experiences did not seem to be consistently related to their clinical outcomes; women with adverse clinical outcomes reported both positive and negative experiences of their care, as did women with clinical outcomes that would normally be seen as good.

Women, partners, and charities also reported a range of positive experiences. There were fewer positive than negative comments, and they tended to relate to specific service developments or to individual members of staff rather than to embedded practices in mainstream services. Again, these were not necessarily related to birth outcomes; some women experiencing perinatal loss and difficult clinical circumstances described care that supported and helped them. There were examples of members of all staff groups providing excellent care in hospital, MLUs, and home settings, even when staff were under pressure. Positive experiences were often related to the quality of information and communication, and some positively affected the wider family. Participants reflected the value of individualised care and informed decision-making, and being listened to. Some specific services and care options were especially valued, including continuity of midwifery care; some of these are described in the section on positive service developments (Section 5.3).

Negative insights and experiences from listening events with women, families, and service user advocates

Disrespect and damaging interaction

There were serious examples of disrespect and damaging communication problems reported at every stage of women's care. These included procedures such as pessary insertion being carried out without consent, or more often with consent being assumed or without appropriate information being given. The most common example was induction of labour, with many women describing a lack of information about why an induction was needed, what the process involved, and consent being assumed.

Some women described feeling vulnerable, unsafe, and violated, and afraid of doing something wrong. They reported being ignored or their concerns dismissed, including their requests for pain relief both in labour and postpartum, feeling judged by midwives for not having a high pain tolerance, and being spoken to like children. Some partners recalled dismissive and curt communication, including interaction with consultant obstetricians that caused them extreme concern about their partner and their baby.

Many women described not being listened to, being ignored, and unkind and uncaring communication: *'I felt like I was inconvenience to the midwives'*. Disrespectful, rude, and damaging interaction with health professionals was reported by many women, especially at stressful times: *'A registrar or consultant, I'm not sure which, entered the room and made the decision [regarding Caesarean section] with zero compassion or empathy for my distress, to the extent that the senior midwife had to be called to calm me down'*. Examples given included interaction with a range of professional groups including senior staff and at all stages of the maternity journey, in pregnancy, labour and birth, and following birth including when the baby was in the neonatal unit. Information, when it was given, sometimes used technical words that women could not understand. One woman described her experience of people coming in and out of her room while she was in labour without knocking, and that as result it did not feel like a safe space and *'there was no dignity in front of such a big crowd'*.

Multiple errors and discourtesies that may appear small to the system but had a big impact on women were described, including being told the baby's sex in pregnancy despite requesting not to know, appointments - including for induction of labour - being cancelled at short notice, their concerns about reduced fetal movements or early labour being dismissed when they telephoned for advice, and being greeted discourteously on arrival on the labour ward. Some partners described being sent home without adequate information about what was happening, even when they had a distance to travel home and back; this was distressing both for them and for the women.

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Lack of inclusion, individualised care and services

Multiple barriers to inclusion were described which not only made life difficult for women but had the effect of removing individualised care and services. Barriers included:

- **Access to services:** Problems of accessing services were worse during the period when there were service limitations due to Covid-19, but many constraints persisted. Accessibility of hospital and out-of-hospital services was a commonly reported problem, with limited access for many, especially in Western and Northern HSC Trusts where women have bigger distances to travel. Reasons for this included distance from hospitals - a concern for many women who were worried about what to do if problems developed, and in early labour – closure of community units, and some services only being available in Belfast. Women described feeling that remote and rural services were not valued. Access to services was inconsistent; for example, although home birth was offered by community midwives across the HSC Trusts, women had access to a specialist Home Birth team only in one HSC Trust (Southern), and maternal mental health support was inconsistently provided across HSC Trusts. Many women across NI reported that postnatal care by midwives at home was often unavailable after five days and that they had problems travelling to access midwifery services at that early stage, especially following a caesarean birth. Access to breastfeeding support services was described by many women as especially problematic, partly because of distance they had to travel, and partly because of their lack of mobility following caesarean birth.
- **Financial constraints:** Women and advocacy groups reported that access to services was especially difficult for women with financial constraints, especially those who were reliant on public transport, and those with babies in neonatal units who may need to travel daily for weeks or even months.
- **Complexity of care:** Women with a range of additional care needs in pregnancy reported a lack of care options and individualised care. This included women with raised BMI, gestational diabetes, and neurodiversity, for example. Some women described this as ‘discrimination’, and feeling like the hospital was a ‘conveyor belt’, lacking individualised care and discussion about options for care. *‘Safe care is individualised care....but women across the board consistently tell of how they are not listened to’* reported one charity.
- **Discrimination:** Women from a range of communities reported other forms of discrimination including problems of equity and access. Women who were recent immigrants described examples of their concerns not being heard and reported finding the health system difficult to navigate, with particular difficulties in accessing maternity care. Women from one ethnic group described difficulties with accessing translation services. Several respondents from diverse communities noted that they had problems having their views heard; one said *‘Black and Asian women are not being listened to’*.

Lack of information, discussion, and evidence

A lack of information, education, and discussion was reported as severely limiting women's ability to engage in informed discussion and to make decisions. The majority of women described multiple obstacles to finding information, whether about fundamental issues such as changes to their body in pregnancy or about options for care in pregnancy and at birth. They commonly reported receiving poor information without sufficient rationale, and inconsistent information about services and about their options that varied according to the health professional they talked with or the HSC Trust in which they were booked for care. Opportunities for antenatal education were very limited, and women found few opportunities in pregnancy to have conversations about what they could expect and about what they wished. It was noted that language in verbal interactions was sometimes hard to understand: *'Doctors explain in their own terms, there is a language barrier'*, and that written material needed to be reviewed to consider levels of health literacy.

Many women were very aware that the lack of information severely curtailed their decisions and their navigation of the range of services they might need: *'It felt very clinical, nothing was explained to me'*. It was especially hard for women to find information about out-of-hospital care including home birth and Alongside MLUs. They reported that in the information they were given, whether verbal or written, it was assumed that hospital was the norm and indeed the only option on offer. They described many staff – both midwives and doctors - viewing out-of-hospital settings as *'alternative'*, while at the same time they were not given evidence to justify limiting place of birth and had limited opportunities for informed discussion. The lack of information was widely seen as disempowering: *'To get women's voices to the heart of the system, they need information first'*.

Fear, risk, and a focus on interventions dominating communication

A commonly reported concern was the sense of fear and risk that pervaded conversations. Many women felt disempowered and frightened by the *'fearmongering'* they felt was transmitted by staff. They described concepts of fear and risk commonly being used to reduce women's options. They described statements being made by staff about the risks of care options – most commonly for place of birth or induction of labour - without a rationale or evidence to justify them. They described a lack of discussion on positive outcomes and benefits as well as risks and being denied evidence-based care options without a rationale: *'Unfortunately, I have lost trust in the system because of my previous experience, particularly the unreasonable refusal to allow me to sit in water'*.

This contributed to women's experience of the over-riding power of the system, preventing individualised care and resulting in all choice being taken away from them; one couple said, *'When in hospital, we lost our voice'*. The lack of evidence-based information was reported as a major factor in limiting women's decisions and disempowering them.

They described how this amplified the sense of risk and fear as they could not set the risks into context, preventing their ability to make informed decisions. One charity working with vulnerable women gave their perspective on how this affected women: *'The higher incidence of interventions at birth are due to parents questioning and doubting themselves'*.

Many women described a focus on interventions in their interactions with midwives and obstetricians that became more dominant in the final weeks of pregnancy. Virtually all women had experienced discussions about induction of labour. During one engagement event, women in the group spontaneously started comparing what they had been told about induction; they were baffled by the inconsistent recommendations that they each recalled, sometimes from professionals working in the same HSC Trust. These included induction at term (noted as 39 weeks), at term plus seven days, and at term plus 10 days. None could recall being given evidence-based information on benefits and risks of the procedure: *'There was an inevitability to the induction with no real discussion of the alternatives, only the risks of waiting, which were not backed up during conversations with any statistical evidence'*. These conversations, in which many women reported being told that there was an increased risk that their baby would die if they were not induced, were reported as creating an atmosphere of heightened anxiety and fear in the final weeks of pregnancy.

Women described how their sense of fear was amplified by being separated from their partners at critical points, especially when they were having induction of labour. For some this was a result of Covid-19 restrictions, when partners were not allowed to stay with women until they were in active labour. Even after Covid-19 restrictions were lifted, women described the isolation they felt while they spent hours and sometimes days in hospital, having had the first stage of their induction (prostaglandins) then waiting to be taken through to labour ward for the next stage (rupturing their membranes and starting IV syntocinon) as emergency caesarean births inevitably took precedence. Women reported that during this time their partner could not stay with them other than visiting hours; many partners could not take time off work at this stage as they had to save their time off for when labour started, or because they had to care for children at home. Some women described this environment as *'chaotic'*. Women reported that during this time of waiting they did not sleep or eat well, and they became anxious and tired, they missed their other children, and by the time they were admitted for the next stage of their induction they were often exhausted and fearful: *'The whole time I felt like it was just leading to a caesarean, something I really didn't want but in the end happened'*.

They were aware that the hospital did not have the bed capacity and staff available for so many women to be waiting for induction and some reported feeling guilty that they were taking up a bed that was needed for other women.

Women noted that the pervasive sense of fear affected not only them, but also midwives and obstetricians; they sensed that the fear of litigation was driving decisions by professionals.

Lack of options for care, out-of-hospital birth, ‘out of guidance’ care

There was widespread concern among women about the lack of options for safe out-of-hospital care. At the time this work was conducted, no Freestanding MLUs were open in NI. Some women felt the lack keenly, especially as home birth services were limited and criteria for admission to Alongside MLUs had tightened and the process for agreeing admission to these was at times obscure, so for many there was no alternative to a hospital birth. Geography played its part in this, with inequitable access to midwifery-led services across rural areas, and closure of community units resulting in long journeys for women in early labour. Another factor was that some women found the care option they wished was ‘*outside of guidance*’; some women with additional care needs reported that no options for care were offered or even discussed, such as use of a birthing pool or an Alongside MLUs. This was especially problematic for those who had had previous difficult experiences in hospital and who wished to avoid a repeat experience, resulting in women opting for care ‘*outside of guidance*’. Women and partners described the hospital environment as being presented to women as normative, with out-of-hospital services seen by staff as ‘*alternative*’, but hospital labour wards were reported as being especially restrictive, where women felt that they lost their voice and handed over their power over their own bodies. As a result, some women reported that they wished to stay out of the hospital environment and to access a midwifery-led unit or to have a home birth. Some described a range of interactions where their concerns about the hospital environment and their wish to discuss the option of a home birth were dismissed. One woman was told by a midwife that home birth was ‘*from a different era*’.

A small number of women described hiring private doulas for support in pregnancy, birth and postnatally in these circumstances. A few women chose to freebirth at home without any professional help when they could not access home birth services. These women described such decisions as being the result of careful thought and painful experiences, and a lack of choice; some had previous traumatic experiences in hospital and wanted to avoid that happening again: ‘*In this pregnancy I have decided to take control. I cannot allow what happened to me previously to happen again*’. Others wished to have home births with midwives but were not given that option. Some wished to ensure they had access to practices they knew to be evidence-based but which they were told could not be guaranteed in hospital, including access to a birthing pool, delayed cord clamping, and skin-to-skin care with the baby at birth.

Isolation, lack of care, support and information after birth

Experiences of postnatal care in hospital were near-universally negative. Many women reported that staff shortages together with the increased number of women having caesarean births has had an extensive negative impact on postnatal care for all women and babies. These experiences were mainly not a result of pandemic restrictions.

Some parents who had experienced a perinatal loss described a number of distressing problems including a lack of information about what happened, long delays with receiving review reports, and difficulty with having informed conversations about what had happened. This was a serious and distressing occurrence for parents, making it difficult for them to understand the circumstances and delaying their emotional adaptation to their loss.

Many women reported not having been told about the postnatal interventions and complications following caesarean birth, including the use of negative pressure wound therapy and dressings, indwelling urinary catheters, pain, and difficulty in caring for and feeding their own baby. Without enough staff to help women even in the early hours after a caesarean birth, many women described having to care for and feed their babies without adequate – and at times any – support: *‘women were crying, and no-one was helping’*. Help with breastfeeding was very limited. Several women described having to wait, sometimes for many hours, for pain relief. They reported that there were times when cleaners were the only staff available to help them, and that women helped other women when staff were unavailable: *‘everyone had to muck in’*. Even though they were at times left on their own to feed and care for their baby, restrictions on visiting meant that partners were not always available to help even when they could have done so.

Some parents of babies in neonatal units and service user advocates reported that parents were not normally involved in the multidisciplinary team huddle ward rounds, and that breastfeeding and kangaroo skin-to-skin care were not always prioritised. There was variation between the neonatal units in these issues, and in the provision of mental health support for parents. Respondents reported that there used to be a specific role for a midwife to support parents of babies in neonatal units, but this role no longer existed; a charity working with parents in neonatal units reported that women’s needs for support have increased as a result. Practical challenges for parents visiting their baby who may be in the neonatal unit for some weeks or months were described by some, and there is a lack of consistency in provision and signposting to sources of financial support for travel. Hospital and community staff - neonatal, midwifery, and health visiting – were described as not always having the time to support and care for the mother whose baby might be in the neonatal unit for a long time: *‘Support for parents is key. There may be the will but there is not always the capacity’*.

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Many women commented on the impact of these very stressful experiences on their mental health and on their family: *'this impacted me as a woman'*. Women reported that there was no opportunity to discuss their birth experience or to have a de-brief session with a member of staff, even for those who had experienced a difficult labour and birth. Many women reported that despite their own anxiety, pain and distress on the postnatal ward, they were aware that the midwives were unable to respond because they were stretched beyond their limits. They understood the problem and felt sorry for the midwives: *'it was hard for me, but the midwives were getting slaughtered'*.

Once home, many women reported that the postnatal problems continued. This was aggravated by the enforced isolation of women recovering from caesarean birth who could not easily go out to access postnatal support and breastfeeding services, and to meet with other new parents at this intensely important time in the transition to parenthood and for family attachment. For single women and women with little family support, and for women with babies in neonatal units, this was especially traumatic.

Positive insights and experiences from listening events with women, families, and service user advocates

Information and respectful discussion

Information, discussion, and respect for women's views and decisions was the most common theme in women's descriptions of positive experiences. Women who had positive interactions recalled individual staff – most often midwives - providing information, discussing their concerns, responding to their questions, understanding their fears and anxieties, and respecting women's views and decisions. Clear information using language that women could understand was critically important in enabling women to make informed decisions and to be involved in planning individualised care. This was described both by women with complex clinical needs and by those whose experiences were more straightforward. Several women described very helpful individual discussions with midwives and with obstetricians about their specific circumstances, where they felt heard and included in decision-making. They recalled the importance of being able to discuss whatever they needed: *'There is no topic that is off the table'* and *'I can ask any question'*.

Information and respectful discussion were especially valued if women had previous difficult experiences; this helped to reduce their anxiety and reassure them that they were being listened to. One woman said: *'my second caesarean was informed and filled with choice, even though, on paper, the two experiences may look the same'*. Not all information was complicated or took much time; one woman was grateful to the doctor who gave her information on how to contact the hospital if she needed an urgent appointment, for example. Women valued discussion and individualised care, and noted the big difference that could result even from one positive interaction.

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One woman said: *'Just one person placing the mother at the centre makes her feel empowered and capable and has a positive impact on the family's journey'*.

The value of information and discussion on place and type of birth was described by some women who had experienced it. They described the importance of home birth being presented as an option, as well as having information about options for a hospital birth including caesarean births. They valued being given evidence-based information about both benefits and risks of all options to help them make informed decisions.

A few women reported that structured education programmes were helpful as well as one-to-one discussions. They described the benefits of taking part in antenatal education programmes such as the Getting Ready for Baby programme and the Hypnobirthing course provided by their hospital and valued the inclusion of partners in such programmes. One couple said: *'we both benefited....and I hope this support is still in place for other new parents'*.

Care, kindness, compassion

The central importance of care, kindness, and compassion was evident from many women's responses. One woman said, *'I would like to put on record that I am in awe of the incredible compassion and care that midwives provide'*, and this view was echoed by others. They described the long-lasting impact of such care; *'I will never forget her empathy and kindness'*. Although women were aware of the pressures on staff, some described meeting staff who were always friendly even when they were obviously stressed and tired.

Women with positive interactions described how care, kindness and compassion could transform their experience, even for those with adverse outcomes and previous traumatic experiences. Despite a previous stillbirth, one woman described how the midwives supported her through her whole maternity journey; *'I have never felt so held by the NHS'*. When faced with difficult decisions when traumatic experiences occur, such as a late stillbirth, women described being grateful for and valuing being able to talk through their decisions with their own community midwife. Kindness and compassion directly influenced women's decisions and helped them seek additional help if they needed it. One woman said; *'it was thanks to the very kind and caring midwife at my first booking appointment that I took the first steps towards help'*. Some women living in vulnerable circumstances such as those without family support, recent immigrants, or with mental health problems, described how kind and compassionate midwifery care helped and supported them.

Reassurance, calmness, a positive outlook

Women described valuing reassurance, calmness, and a positive outlook in their interactions with staff. Some women who were feeling scared and anxious in pregnancy described being calmed and reassured by midwives and by others including students and reception staff.

Some women who had spontaneous vaginal births valued the skill, care, and kindness of the midwives both at hospital and home births. They described births that were calm, with the partner and other family members present and involved. Women described midwives attending births both at home and in hospital as *'amazing'*, *'caring'*, *'understanding'*, *'human'*, *'warm'* and *'professional'*, and described how they organised a gentle environment and provided reassuring touch. Such calm reassurance was also valued in the context of more complex births including caesarean births. One woman said: *'it was the positive outlook of the midwives that made the difference'*.

Skilled, individualised care and respect for women's views and decisions

Some women described care that was tailored to their needs and wishes, even in complex clinical circumstances. When this happened, they valued being given clear information about risks and benefits to help them to make decisions, and ongoing discussion and communication with both midwives and obstetricians. Individualised care, including multidisciplinary discussions, was described by a few women who wished to birth at home *'outside of guidance'*. They reported having their decisions respected and receiving supportive community-based care, even though some ultimately had a birth in hospital. A few women who wished to avoid routine induction at term were similarly supported in this decision with additional monitoring and care.

Some women described the importance of skin-to-skin care at birth and positive skilled help and support for breastfeeding at birth and in the early weeks. They valued the communication between community midwives and Sure Start and breastfeeding groups.

Aspects of care over the first 36 hours following a stillbirth that were valued, for both women and partners, included being supported by midwives to hold and spend time with their baby until taken to the mortuary; this experience was described by one woman as being *'cocooned'*.

Continuity

CoMC over their maternity journey was described by the small number of women who had experienced it as fundamentally important. It helped women to feel supported and for information to be relevant to their circumstances.

Continuity of carer was especially valued by women in difficult circumstances or with previous traumatic experiences. They described how continuity of carer avoided them having to talk repeatedly to different health professionals about previous difficult experiences. One woman described how much she valued continuity of carer from her consultant obstetrician following a previous pregnancy loss. Another woman who had a previous stillbirth described the positive and compassionate care from one midwife throughout this subsequent pregnancy, supporting her and reducing her anxiety.

5.2.3 Insights and experiences from listening events with midwives, midwifery students and educators, maternity support workers, midwifery managers and leaders

Who did we hear from?

159 midwives, midwifery students, midwifery educators, MSWs, midwifery managers and leaders participated in listening events, most of which were face-to-face and group meetings with a small number of one-to-one and virtual meetings. A wide range of seniority and experience was represented including Band 3 MSWs, midwives ranging from Band 5 (including NQMs) through to Band 8 (including service managers and consultant midwives) and midwife leaders in a range of roles and organisations. Participants were from all five HSC Trusts. Midwives worked in a large range of roles with extensive responsibilities across community and hospital maternity services. They included midwives with experience in a range of hospital and community settings, including home births and roles with Sure Start and services for women from vulnerable population groups, Alongside and Freestanding MLUs, continuity of carer teams, midwives working in clinical governance, risk management, perinatal mortality review, perinatal mental health, and public health roles, midwifery managers and senior midwifery leaders in regional and professional organisations, and midwives who had left practice because of difficult working conditions and retirement. Midwife educators and researchers from university and clinical settings participated, as did students from all cohorts of BSc and MSc programmes.

What did they tell us?

In summary: Participants' experiences were diverse and not all experienced the same issues. There were clear and consistent messages, however. The dominant finding was the commitment of midwives at all levels and in all HSC Trusts and all settings across NI to providing safe, quality care, and their distress at not being able to provide such care because of longstanding workforce pressures, changing models of care, and a shift in work culture. Many midwives expressed a fierce determination to provide the best possible care even in difficult circumstances, and there were positive accounts of excellent care and good multidisciplinary team working.

Staff shortages and related workload stress over many years were worsened by the impact of Covid-19 and participants described continuing negative impact from the pandemic. Many midwives and students described a shift in the model of care with increased interventions in labour, reduced access to out-of-hospital care, and a culture of risk and fear, as a result of which they are unable to provide the midwifery care that they wished, and they knew women needed. Many reported the damaging impact both on the women and babies they cared for and on their own health and wellbeing, and the moral distress and the burden they felt of guilt and personal failure as a result. The hospital environment was described by some as at times unsafe for women, babies, and for staff. Almost all midwives in all settings described having to work additional hours and going above and beyond normal expectations on a regular basis. Some made the decision to leave the profession as a result, others stayed but described ongoing impact on their mental health and the quality of care they could provide. Many students and educators described the negative impact of this environment on learning, and NQMs were especially concerned about the difficulty in gaining good quality experience and being unable to consolidate their full range of knowledge and skills.

Negative insights and experiences from listening events with midwives, midwifery students and educators, maternity support workers, midwifery managers and leaders

Working conditions impacting on safety and quality

Many midwives at all levels of seniority, midwifery students, and MSWs described working in conditions that were at times unsafe, with ‘overwhelming’ challenges, and where they were unable to provide the midwifery care they knew that women and babies needed. They described their concern for women and babies, and also the impact on midwives’ physical and mental health: *‘The workload frequently leads to us working from 07.30-20.30 with minimal or no breaks, often eating at the desk as we complete paperwork and infrequent toilet breaks. Not only does this lead to patient safety being compromised and an increase in adverse incidents, it also leads to a range of issues with our own physical and mental health’*. Although staffing shortages have existed for some years, many experienced midwives reported that there has been a worsening of working conditions in the past few years: *‘I have never seen it like this – it’s worse than it’s ever been’*.

Some midwives described incidents of intimidation in response to requests for additional help and escalation of concerns, including withholding cover for breaks: *‘If I’m escalating, I shouldn’t be afraid of the consequences’*, and at times a lack of management response to unsafe situations. Managers described their distress at being unable to provide the support they knew was needed because of a lack of resources, and a lack of response of senior management to concerns about staffing levels. Many midwives at all levels described feeling disempowered with their voices not being heard by the wider system despite knowing that their role is crucial in monitoring and responding to safety concerns:

‘Midwives are safety critical, but we don’t have a voice’. Some reported that they were fearful of being blamed for harm resulting to women and babies as a result of unsafe working conditions: *‘we need to be able to look after women without feeling like we’re putting our registration on the line’.*

Participants reported that hospitals commonly respond to staff shortages by moving staff to areas where help is needed: *‘Nightshifts are the worst as they are always short, very rarely are they fully staffed, and if we are fully staffed, midwives are pulled to other departments to help’.* They expressed concern about the multiple impacts of this common practice, including staff being unfamiliar with processes in each clinical environment, the difficulty of building the skills and confidence of NQMs when they were moved frequently, and staff working constantly in unpredictable situations: *‘we come in for a shift and we don’t know where we’ll be that day’.*

Most participants identified some contributing factors to the workforce problems they described. These included:

- high sickness absence rates as result of work pressure.
- an increase in the number of midwives working part time.
- high number of midwives leaving, both as a result of retirement and retention issues resulting from work pressure and the more risk-focussed model of care.
- an increase in the clinical, psychological, and social additional care needs for women and babies.
- Band 7 managers and team leaders trying to deal with a range of management issues while also being pulled into help with clinical work.
- the workload model used to calculate midwifery staffing requirements not reflecting current conditions.
- midwives covering a range of work across the maternity services such as risk management and audit, and including non-midwifery work to fill gaps in other roles including sonography, housekeeping, administrative duties, project work, and social care for vulnerable women in the absence of a social work team assigned to maternity.
- night shift being especially problematic in the absence of support from e.g. porters and doctors, and with very high ratios of women and babies to midwives.
- limited time to orientate bank staff or to support less experienced midwives, so these midwives are unable to help as much as they could if effectively supported.
- a marked shift in midwifery work antenatally, on labour ward, and postnatally as a result of the increase in induction of labour and caesarean birth and the task- and risk-focussed model of care.
- not having time to attend mandatory training or CPD opportunities.
- an overriding focus of the system on managing the workload, taking focus away from women and babies: *‘in all of the dialogue about services and resources, the women are lost’.*

Many participants at all levels described the cumulative impact of these factors, which together they reported as adversely affecting safe, quality care for women and babies; limiting midwives' ability to provide essential aspects of midwifery care; impacting negatively on midwives' confidence, experience, professional development, team building, retention, and morale; and affecting midwives' psychological and physical safety.

Changing model of care

Many participants commented on the lack of a current Maternity Strategy for NI, with the result that there is no shared model of care or outcomes framework for the service. They noted that this is particularly important at a time when services are shifting significantly, with a process-focussed model of care becoming dominant and out-of-hospital options being more limited. They noted that midwives' knowledge and skills had a large contribution to make in the safe care of women and babies, but they are limited in being able to use them consistently.

Many participants noted that in pregnancy women were not consistently having the individualised conversations they needed to learn, understand, and make informed decisions about their care. They described the impact of changes in guidelines, with the GAIN guidelines for out-of-hospital care being withdrawn and increasing numbers of criteria in HSC Trust and NICE guidelines stipulating obstetric-led care for women. As a result, they reported having more conversations with women about having options for care outside of the guidelines. Some participants reported that midwives were '*hemmed in*' by current guidelines and unable to provide the care that women wish. Many participants reported wanting to have individual conversations with women and to provide the information they wish, but that there were limited opportunities to do this; '*Sending women to the labour ward is easier than having individual conversations with all women*'. In these circumstances they noted that some women turn to doulas who '*provide an unregulated voice*'.

The majority of participants described the substantive impact of the increasing rates of induction of labour and caesarean birth on women and on midwives and the service as a whole. They described the change as a very rapid shift over the past few years, and students described how the model of care had shifted from their first year to their third year. Their experiences mirrored women's accounts of this issue. Many participants reported that midwives on the labour ward now spend significantly more time managing the care and support of the increased number of women being admitted for induction, and the resultant workflow management while other women who are admitted for elective caesarean birth and in active labour take precedence. At the same time, participants reported that emergency caesarean births are being conducted more frequently and inevitably take priority. They reported that women having inductions are not only more anxious but are spending more time in hospital - waits of up to four days following the first stage of induction (prostaglandin administration) were reported - and that there are not enough beds or staff to accommodate them.

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Many comments illustrated the extensive impact on women that midwives observed, and also on the management of the labour ward and on the work of midwives and other staff: *'Elective caesarean sections and emergency admissions fall under the same team, which is putting them under great pressure'. 'The labour ward does not have the correct staffing ratio for the number of women with complications'. 'In some cases labour is being induced earlier than needed, leading to a high failed induction rate'. 'There is no individualised care, where is the gap between letting them dilate before they have any interventions? It feels like a conveyer belt'. Some noted that an impact of the increased focus on electronic fetal monitoring and frequent recording of the fetal heart in labour was to shift the focus from caring for the woman. They described how the unintended consequences of these shifts in practice, especially in the context of high workloads, have resulted in midwives at times not having time to provide midwifery care for women such as providing information, support and reassurance. They described midwives current work as 'processing': 'We are processing, not looking after women'.*

Many midwives described the increased complexity and intensity of postnatal care as around 40% of women have caesarean births, with the result that there is a substantive increase in women's additional care needs postnatally. Despite women's need to recover from the major abdominal surgery, they also reported that because of staffing shortages in postnatal wards women have to take almost total responsibility for their babies very quickly after their surgery. They described a situation in which much of midwives' time in postnatal wards involves managing the process of discharges and admissions for women and babies. They were concerned that early discharge and the pressure on staffing results in missed opportunities to support women and provide care and information at this important time.

Another important shift described by participants was the introduction of CoMC. Many recognised its importance and noted that funding was provided by DoH for a senior post in all HSC Trusts to support implementation. But they were concerned that midwives were being asked to work in a very different way from before and without additional midwives, raising questions about sustainability of the services: *'Continuity of Midwifery Carer will improve quality and safety but received no additional funding for establishing the teams that are now in place in each Trust..... DoH need to provide funding and supporting structures'.*

Some participants commented that a further shift that has affected midwives and women is in relation to GP practices where community midwives used to work routinely but now seldom do. They described how this has resulted in fragmentation of care for women, especially in pregnancy and postnatally for those with physical or social complexities, or who require prescriptions for complications such as urinary tract infections.

Limited birth options and out of hospital care

The lack of midwife-led settings for care was described as an important contributing factor to the changing model of care. Many participants reported that women's birth options had been significantly affected by factors including the withdrawal of the GAIN guidelines on out-of-hospital care and related information for women – which was described as *'devastating'* for midwives and for women. Community units and Freestanding MLUs had closed as a result of pandemic re-purposing and falling birth numbers. They remained closed in response to the baby death that precipitated this report. The tightening of admission criteria for Alongside MLUs was reported as further problem. As a result they reported that many more women are now being cared for on hospital labour wards: *'Midwifery-led services have been decimated'*.

Many participants reported that there was a lack of understanding of the midwife's role in MLUs - both Freestanding and Alongside - and a perception among some women and multidisciplinary and midwifery colleagues that MLUs and home birth are unsafe. They described differences across the HSC Trusts in how much support out-of-hospital settings received. *'Hospital-centric thinking'* was described, as well as a *'Them and Us'* situation with midwives describing a loss of trust between hospital midwives and obstetricians and community/MLU midwives. Participants reported limited multidisciplinary involvement with out-of-hospital care. This was a particular concern in regard to a perceived increase in the number of women requesting *'out of guidance'* care - *'Everyone is abnormal as the guidelines are so tight'* - including birth at home when women did not meet the increasingly tight criteria. With only one HSC Trust having a specialist home birth team many community midwives reported feeling unsupported by colleagues when they attended home births: *'I drive for miles to a home birth feeling scared and vulnerable'*.

Current policies and criteria for out-of-hospital care were described by almost all respondents as inconsistent across HSC Trusts and even within some HSC Trusts; *'There are significant questions about the position with future guidelines....Trusts ..have been told to wait for further DoH instruction and, in the interim, are following the NICE guidelines... However, there are issues with the NICE guidelines....they do not cover all the scenarios of the GAIN guidelines or contain enough detail'*. The grief that many midwives felt about the impact on women and families of the severe restrictions on out-of-hospital care was tangible: *'I have been brought to tears by what is happening to MLU services and women'*.

Again mirroring women's concerns about the lack of choice, participants reported being concerned about the impact of these changes on constraining women's decisions and choices and on their care, including for Alongside MLU provision: *'The withdrawal of GAIN guidelines has restricted the admission criteria. It is too late to develop individualized care plans when women reach delivery suite meaning there are lots of grey areas. There is no guidance to affect antenatal discussions.'*

Lack of antenatal education has resulted in women not sure what an MLU has to offer them or what it is’.

Midwives described how this shift away from midwifery-led services has had a negative impact on their autonomy and decision-making; many midwives are now sending women who request a home birth to an obstetric consultant for review and sign-off instead of taking responsibility for that decision. It was unclear if this was because protocols dictate this or because of a lack of confidence and support for decision-making by midwives.

Midwives and midwifery care not valued

Many participants described a dual set of problems that seemed to reinforce each other. On the one hand they noted having less time to provide skilled midwifery care for women and babies because of the workforce pressures and the changing, more process- and intervention-focussed model of care, so they feel at risk of being de-skilled. On the other hand they described their confidence being eroded because of what they feel is a lack of trust and support for the midwifery model of care and essential midwifery skills. Many midwives described not having the time to provide the essential fundamentals of midwifery care especially in pregnancy and following birth. They reported that the midwife’s scope of practice is more limited than in the past and does not meet the full range of NMC midwifery standards. Gaining experience and developing skill in spontaneous vaginal birth was reported as a particular challenge with students struggling to care for the required number of women having such births; some reported that students are being taught essential midwifery skills by inexperienced clinical staff. Some participants described the role of the midwife being reduced by increased obstetric care on one side, with a small number of women turning to private doulas to provide support on the other side.

Some midwives and students described feeling like obstetric nurses rather than autonomous midwives; *‘we should be offering a more holistic approach to women not just a cascade of interventions’*. They described how a perceived lack of support from senior midwifery colleagues in HSC Trusts amplifies this as it further harms both their self-confidence and the way in which they are perceived by colleagues; *‘we are ultimately not supported by those in senior management’*.

They reported that the consequence of this is that there is a disjunction between midwives’ knowledge and skills and the work they are asked to do on a daily basis. Some participants described the culture as *‘hierarchical’* and *‘patriarchal’*. Many reported that midwives are disempowered, and their voice is not heard in the system, and the midwifery model of care is not valued, reducing opportunities to support women and to prevent complications, with a direct negative impact on the quality of care for women and babies.

Inequalities in care

Participants described a range of inequalities in care. These included inconsistent provision of care and services across the HSC Trusts, such as for perinatal mental health, continuity of midwifery care, and home birth. Some commented that antenatal care is not meeting the needs of women with less education. Participants described witnessing ‘*subtle racism*’, for example in behaviour towards women from the travelling community and women from immigrant communities including refugees and asylum seekers. They described a lack of cultural awareness and generalisations and assumptions being made by colleagues on the basis of ethnicity. Concern was expressed about the lack of support for women who do not speak English; women from some communities may feel uncomfortable speaking with a man, and at times this is the only option available on the translation service used. Midwives are working in Sure Starts in areas of deprivation across NI; while their work was valued by women and Sure Start colleagues, these midwives noted that the importance of their work was not recognised with secure funding or support from the wider system.

Culture of fear and risk

Again mirroring the views of women, many participants described a culture of fear pervading the service. It was described as the primary feeling on a hospital ward, and as ‘*a cloud of worry*’. The increased social and clinical complexity of women receiving care combined with the workforce shortages frequently left midwives exposed. Midwives reported that being in charge of a ward without adequate staff for the number and complexity of women and babies was at times ‘*terrifying*’.

Participants reported that other underlying factors included ‘*a blame-centred culture*’ influenced in part by the media coverage of the maternity services, Coroner’s investigations, and the SAI process. Many noted that clinical decisions seemed to be influenced more by fear of litigation than by individualised care planning.

Fear was also reported as related to the risk-based approach to care and services. Participants described women being told by obstetric and midwifery colleagues about the risks involved in options for their care but without the related evidence on the likelihood of those risks. Many noted that such risk discussions with women often related to the risks of only certain kinds of care – such as out-of-hospital care or not having induction of labour – while neither the benefits of these options nor the potential risks of interventions were discussed; ‘*We need to have clear information, leaflets and advice given to woman in a universal fashion as not to scare but to inform in a non-bias manner, regards risks about delivery mode and choices*’.

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The culture of fear was seen as a powerful influence not only in discussions with women, but also on professional practice and decision-making. Many participants commented on decision-making in pregnancy and especially in labour as *‘based on fear, not evidence’*. They noted that *‘the risk- and fear-based culture is not about managing safety and it doesn’t promote safety’*, as decisions to intervene were taken more readily as a consequence. Mirroring what women reported, these participants noted that from a women’s perspective it can feel much more like a risk assessment rather than care tailored to their needs.

The fear culture was reported as affecting midwives’ decision-making about place of birth. Midwives were more anxious about caring for women in out-of-hospital settings because of the focus on risk and the judgement of hospital colleagues. The increase in caesarean birth rates was resulting in fewer spontaneous vaginal births, and midwives and students reported losing confidence; midwives and educators noted that *‘students.... are scared of normal birth’*. At the same time as a result of the criteria for out-of-hospital care tightening, more women are requesting care outside of guidance, especially home birth. Some midwives reported that they are caring for more women with complications at home, augmenting the anxiety and fear that some midwives feel.

As well as influencing the information given to women and clinical decision-making, the culture of fear was noted as having a number of consequences. Some commented on a tendency for the system to look for someone to blame, and a lack of respect, kindness and compassion of some colleagues for each other. Many commented on the lack of support specifically for midwives working in all settings, especially when problems occur. A commonly reported view was that *‘Midwives are more under the spotlight than others’*. There were descriptions of midwives receiving disproportionate blame in formal investigations. Many midwives described being anxious about the possibility of being unsupported by their HSC Trust if they were involved in an adverse incident, and many commented on their perceived lack of management support for the midwives involved in recent Coroner’s cases. Students reported that some of their peers had to attend for GP care because of anxiety and fear in the work environment.

The culture of fear and blame affected the general work environment and staff morale; *‘Our unit which I love and am so loyal to is toxic and disjointed presently. I just hope to work in a safer and more rewarding unit again’*.

Governance and leadership

Many participants reported a range of factors affecting governance and leadership. Communication was a commonly described problem. Examples included key information not being shared, not being involved in maternity improvement plans, a lack of transparency over decision-making, and a lack of opportunities for senior managers above the level of Head of Midwifery to hear midwives' views and experiences and to discuss midwifery care and services.

Despite the increase in complexity of care and the increased need for multidisciplinary working, some participants described limited opportunities for multidisciplinary discussion and problem-solving. They reported that it was hard to have midwifery care and services discussed at Clinical Directorate meetings or to have strategic discussions about service provision. The multidisciplinary regional Maternity Collaborative was seen as a positive development, but they noted that it is not funded and *'is reliant on "good faith" and the drive of the membership to provide mutual support and service improvements'*.

The lack of everyday support for staff was a widespread concern. Many participants reported that staff are not well supported even in difficult situations; *'staff must be looked after or they will not have the ability to care for each other or for students'*. NQMs who had felt well supported as students reported that the same level of support does not exist in the workplace. They described a lack of support after traumatic experiences including a lack of de-briefing, and also of positive reinforcement for good work.

There was widespread concern about governance structures, service development, monitoring of services and outcomes, and inadequate resources for service provision and education. Despite the perceived need for service development, participants reported that there are no structures in place or funding for development work, and there is limited funding for research. Similarly, it was noted that appropriate structures and support for effective service user involvement is lacking in most HSC Trusts. Many participants reported that there are inadequate systems for capturing data on service provision and outcomes, that the data that exist are not reported or interrogated in a timely way or made available to staff, service managers, senior managers, HSC Trust Boards, or the public, and that existing audit and governance mechanisms are not identifying the problems or the remedies required. Although midwives are responsible for the majority of data collection and recording, some important midwifery-appropriate indicators are not routinely collected and a midwifery dashboard with current information is not available.

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Many participants reported that the knowledge and experiences of midwives was not always utilised, supported, or heard in HSC Trust structures. Band 7 roles were described as *'a very lonely place to sit'*, with competing demands from the staff they are managing and more senior managers. Midwife managers lack adequate administrative support despite having demanding managerial responsibility. Participants reported that because there are no roles for midwives in senior management above Band 8, Heads of Midwifery report to senior professionals with no direct experience of providing maternity care; accountability for problems in delivering midwifery care and services seemed to be stalled at the level of Heads of Midwifery with no clear route to more senior discussion and decision-making or to strategic multidisciplinary debate. They reported that midwives are not included in key decision-making by HSC Trust Boards and clinical directors; Directorate and clinical governance meetings are obstetric-led and some reported that they did not believe that Boards have adequate information about midwifery services. The lack of midwifery leadership roles at more senior levels was a key concern for many participants and a fundamental factor in what was seen as a lack of management understanding of the problems in the maternity service.

Many participants reported that without an overarching Maternity Strategy or an agreed set of regional standards for the maternity services, an underpinning framework for commissioning services or for a regulatory/inspection mechanism is lacking. This results in a lack of transparency, difficulty in planning service improvement, inconsistent service provision, and confusion for women and staff.

The process for investigating serious adverse incidents (SAIs) was criticised by many participants as seeking to allocate blame rather than providing timely and accurate information to parents or supporting learning for staff and the service. Those handling these reports, who are mostly midwives, reported that they have a large backlog of reports to complete and that they lack support for this important work, either in terms of resources or an appropriate forum for discussion with multidisciplinary colleagues.

Training and career development inadequate

Participants from all levels of seniority and experience expressed concern about training and career development. Students and NQMs were distressed that they will not be able to implement the full scope of midwifery knowledge and skills that they have learned. Essential updating for all staff was described as challenging because of staff shortages, limiting the opportunities for professional development including mandatory updating. Many staff reported that they were attending training opportunities in their own time. The lack of consistency across HSC Trusts was a concern. Although a skills passport has been developed for students, it was reported as not being implemented consistently across all HSC Trusts. In some HSC Trusts it was noted that Practice Education Facilitators did not have a midwifery background and do not have the appropriate knowledge.

It was reported that students are aware of differences in HSC Trust support and were described as ‘*voting with their feet*’ to work in HSC Trusts with good support NQMs.

They described that the current environment has resulted in midwives becoming ‘*fearful and deflated*’ and that there is a need to build coping mechanisms. Midwives, educators and students commented that the current limited scope of midwifery practice was having an adverse impact on students. In addition to the widespread concern about gaining experience in caring for women having a spontaneous vaginal birth, they reported that although they learn the theory and fundamentals of public health, they struggle to see it in practice.

NQMs and senior midwives alike reported a desire for simulation to be embedded into clinical practice. Students in particular who had experience of the high-fidelity simulation suite at QUB in their undergraduate programme noted that it could provide a more effective environment in which obstetricians and midwives may learn together and from each other.

A lack of support for senior role development was a widespread concern. A pipeline to develop relevant senior leadership and management skills was described as urgently needed, along with the development of and support for senior midwifery roles at appropriate levels in HSC Trusts and more widely across NI in organisations including the DoH, PHA and RQIA.

Positive insights and experiences from listening events with midwives, midwifery students and educators, maternity support workers, midwifery managers and leaders

All participants recognised the challenges of the current context. There were also positive comments and examples demonstrating that even in challenging times, many midwives were doing their best to provide quality care for women, babies and families: ‘*The midwifery workforce are keen to provide excellent midwifery care despite the stresses and challenges faced. There is a desire by midwives on the ground and supporting staff to excel. This is a huge asset, which needs to be recognised*’.

Positive service provision

When positive service provision was in place, midwives and support staff were an important resource for each other, working together to problem-solve and providing support; ‘*I also work with a large group of mainly fantastic midwives, midwifery support workers, admin and ancillary team, without whom I’d be unable to get through my working day*’. Students reported similar positive support despite the pressures on staff.

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Individual examples of good multidisciplinary team (MDT) working with positive working relationships were described by some. One respondent noted: *‘the team support each other, giving praise when needed irrespective of grade’*. Some noted that they had seen good MDT support for women with complex additional needs. In one context, midwives described how they work out an individual care plan with women; this involves the MDT and support from practice development midwives to train and support midwives working with women who have requested care outside of guidance. Multidisciplinary working includes mental health and social care; in one example, a midwife specialising in care for women with socially complex additional needs worked alongside a perinatal mental health midwife to support engagement with women when social services were involved. Some students commented on the good teamwork they witnessed in community placements.

Increasing clinical, psychological, and social complexities have resulted in more specialised midwifery roles being developed. While participants recognised that this could result in fewer midwives being available for general care, they noted that specialist roles including infant feeding, smoking cessation, PROMPT training, bereavement care, and perinatal mental health could improve care and services for women, babies and families, and also enable midwives to develop their career and work in areas they were especially interested in.

Continuity of midwifery carer

Many participants commented positively and hopefully about CoMC developments and the regional intention to roll out this form of care for all women. While so far only available for a small number of women, it was noted as being very positive for both women and midwives, making care safer and providing job satisfaction for midwives; *‘it is leading the way, providing high levels of care whilst preventing anything being missed’*.

Leadership, communication, team working

Participants described positive examples of leadership and team working. Attributes that they valued included being given opportunities to speak in confidence with managers when needed; leaders providing a supportive environment especially in relation to staff mental health; managers and leaders being readily available; and team building activities through nights out or virtual nights in together, and a calendar of planned team activities. Some participants described the importance of staff participating in change processes. Many noted that formal and informal communication has improved since virtual meetings became possible as a result of the pandemic response.

Education, training, and staff development

Students reported that midwives they have worked with in their placements are *‘passionate’* about teaching students, noting that midwives have worked to support students in meeting their individual teaching objectives.

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Participants described a number of positive developments in education and training. Examples included the new curriculum for all student midwives based on the 2019 NMC standards for midwives and developed with the participation of service users and advocates. A skills passport for students including both basic and advanced skills has been developed, though not yet consistently implemented. Responses to retention problems have included effort and resource being put into pro-active support for NQMs. Preceptorship programmes in some HSC Trusts provide support for NQMs, both from Band 5 midwives with recent experience and from senior midwives. The programmes include planned rotation through different settings to enable NQMs to gain experience in different hospital settings and in community. Participants recognised that working in out-of-hospital settings was important in building confidence as a midwife; *‘working in an MLU, I found my feet as a midwife for the first time’*.

Participants noted the positive development of the clinical simulation facility at QUB, with joint working with clinical staff in its design and delivery. It was especially valued in regard to teamwork and multidisciplinary training for emergencies. Some also noted the benefit to students if they were able to gain confidence in midwifery-led settings as well as in hospital.

The important role of practice development midwives and practice education midwives was recognised, especially in coordinating guideline development and training and support with quality improvement.

Specific training opportunities were recognised as helpful by a small number of respondents. Virtual training opportunities were welcomed as training is now mainly completed in midwives’ own time. A Maternity Support Worker course which allows for transition from Band 2 to 3 was well received.

5.2.4 Insights and experiences from listening events with multidisciplinary colleagues

Who did we hear from?

Thirty multidisciplinary colleagues including obstetricians, ambulance staff, neonatologists/paediatricians, GPs, and colleagues from the Neonatal Network, the Maternity Collaborative, and Royal Colleges participated in listening events. Most of the events were virtual group meetings with a small number of face-to-face and individual meetings. All were senior colleagues – medical consultants and senior paramedics. Participants were from all HSC Trusts.

What did they tell us?

The dedication and commitment of all professional groups was clear. A powerful commitment to do the best job possible for women, babies and families was evident. All professional groups saw benefit for women and babies in improving communication and collaboration with midwives, and across hospital and community settings. They all reported that they experience substantive workload pressures that have an impact on the safety and quality of care, on communication between professional groups, and on their ability to work collaboratively and to plan and implement change. Discussions focussed mostly on care in labour and birth. Many described a culture of fear and risk in maternity and newborn services and recognised the challenge of high rates of intervention in labour. The prevailing, though not unanimous, view among obstetricians and neonatologists/paediatricians was a preference for labour and birth in hospital. There was little multidisciplinary engagement reported in community settings. GPs described no longer having a close working relationship with midwives, and a lack of integration between community and hospital services. Paramedics reported logistical and communication problems in supporting midwives in the community and maternity emergencies and inconsistent practices across HSC Trusts. Multiple problems with governance were described.

Negative insights and experiences from listening events with multidisciplinary colleagues

Working conditions

All multidisciplinary colleagues reported substantive workload pressures that have an impact on the safety, health and wellbeing of women and babies and on staff health and wellbeing. Some reflected that standards of care had declined in the past five years. Obstetricians mainly focussed on working conditions in hospital, and especially on labour ward. They reported that the workload pressures they experience *'echo those of midwives'* and described the extent of the work and responsibility they have on an everyday basis; there is *'far too much on our shoulders with very little support'*. They noted that the pressures on midwives and the shortage of midwifery staff directly affect obstetricians' workload; *'we are firefighting'* was a consistent view of all participants. Neonatologists/paediatricians reported vacancies in senior posts leaving some smaller units particularly vulnerable, with only a small number of specialist neonatologists.

Obstetricians noted that midwives' ability to provide midwifery care is constrained by staffing problems. There is very rarely a full complement of midwifery staff for the labour ward, and they reported a constant struggle to staff labour wards and Alongside MLUs and to support community midwives on call; *'this is causing panic with staffing levels'*. They noted that while staff numbers have increased, midwives responsible for labour ward remain under pressure because NQMs do not yet have adequate experience to be given the levels of responsibility required both in labour ward and in Alongside MLUs.

Participants described a range of factors affecting workload pressures for all staff. They reported that:

- Increasing acuity and changing demographics of women result in care being more complex.
- Existing shortages are aggravated by sick leave resulting from workload stress for obstetricians and midwives.
- Shortages in other professions mean that midwives have to fill the gaps; midwives and obstetricians regularly conduct ultrasound scans because of a shortage of sonographers.
- Substantive time is spent – usually by midwives - on the telephone in an attempt to find a bed on labour ward and postnatal wards.
- There are not enough senior midwives to support midwives and trainee obstetricians.
- Although there has been an increase in consultant obstetrician posts, numbers remain inadequate, and consultant time is at times limited by their gynaecology responsibilities.
- Workforce planning, including the workload tool used for midwifery staffing, does not reflect the current context of care.

Many obstetricians described the impact on women and babies of the current working conditions and the multiple consequences of what was described as the *'pitiful'* lack of resources. They described scanning and dating protocols as inconsistent, and some noted that sonographers are needed for the 12-week scans to ensure accurate dating. Some reported an increasing number of families requiring, but not receiving, perinatal mental health services, aggravated by constraints on postnatal care, a lack of de-briefing, and midwives in specialist bereavement and support roles being redeployed to labour ward. They described having inadequate time to provide appropriate care in pregnancy and to talk with women about their individual needs and preferences, especially for women with complex needs such as diabetes; and an inability to respond to women's complaints about their care within work time.

Some described the impact on staff, including problems of retention in obstetrics as consultants choose to retire early and trainees decide to change specialty. They described how these working conditions directly affect care and the ability of health professionals to provide the services they know are needed. They also limit the time available for discussion between professional groups and with senior managers, and for strategic thinking and planning; *'change cannot be driven without an adequately trained workforce'*.

Changing model of care

Obstetricians described a shift to a more intervention- and risk-focussed model of care over recent years, with fewer women having midwifery-led care and high intervention rates in labour and birth. Some perceived the obstetrician as the primary carer for all women. Many reported that there is a lack of individualised care and noted that *'more protocolised ways of working have been tolerated by both obstetricians and midwives'*. There was a range of views about the impact of the high rates of induction of labour on emergency caesarean birth. One obstetrician noted that if induction of labour is performed *'correctly'*, the evidence from a randomised controlled trial is that after 39 weeks it does not increase the caesarean birth rate. Many obstetricians noted that this is not the case in practice, and in reality, the unintended consequences for women and for labour wards is a backlog of women waiting sometimes for 48 hours or more for the second phase of their induction. Women were reported as becoming increasingly anxious as a result, and there is an increase in problems arising in the first stage of labour.

There was a view from some obstetricians that discussion with women around birth choices is limited by the strong views expressed by some women that caesarean births are straightforward, safe and predictable. These views were reported as being shaped by public debate and media coverage, with little debate about possible risks and adverse consequences of caesarean births. They reported that when some women make a decision to have a caesarean birth they are not open to conversations regarding alternatives, even if presented with information about the downsides to major abdominal surgery. Some obstetricians reported that there is a need to *'push back against over-normalisation of caesarean section rates'*. There was a concern that within 10 years the caesarean birth rates are likely to rise to around 60% as there is an increased likelihood of women requiring repeat caesarean births. Reasons given for the current increase in caesarean birth rates were described as multifactorial and included:

- Increased acuity and changing demographics of childbearing women; the age of women having babies is older than it used to be, with an increase in long term conditions such as diabetes and obesity.
- Women requesting elective caesarean birth for a range of reasons including previous trauma with inadequate debriefing and changed NHS guidance; *'NICE guidance has given women carte blanche to ask for a section'*.
- Coronal judgements, medico-legal cases and external reviews resulting in defensive practice.
- Midwives having limited time to provide antenatal education and for discussion with women.
- Workforce shortages affecting the quality of care.
- Loss of skills and experience in managing the first and second stage of labour, both obstetric and midwifery.

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The high levels of intervention were described as causing increased workload and concern for all professional groups. Many respondents, including obstetricians, neonatologists/paediatricians and GPs, described adverse consequences of the high rates of induction and caesarean birth for women and families, for babies, for midwives, and for the maternity service. These included increased anxiety for women in pregnancy and in labour, increased risk of preterm birth resulting from early induction, increased risk of emergency caesarean birth, postnatal complications for women including wound infection and pain, and long-term consequences for fertility and for future labour and births. Neonatologists/paediatricians noted that while decisions about induction are made by obstetricians, there are substantive consequences for babies and for paediatric services; they reported that are managing neonatal complications including more babies requiring resuscitation and having respiratory distress syndrome, more babies born at 37 and even 36 weeks of gestation and requiring paediatric intervention, and more babies requiring admission to neonatal units. They described being asked to attend most emergency caesarean births as these babies have more complex needs at birth. They noted that these consequences not only result in problems for women and babies, they also increase even further the workload of all health professionals. They described concern that care was focussed on treatment rather than early intervention and prevention, with a lack of strategic planning at population level in relation to infants, children, and young people. GPs reported that they are *'picking up the pieces'* for women with physical and mental health sequelae of caesarean birth. Accountability for care of women in the community following caesarean birth, for example with wound infections, was described as a problem, and GPs were also concerned about inadequate pain relief for women being sent home from hospital following caesarean birth.

GPs reported that changes in primary care have affected the changing model of care, with care and services becoming primarily hospital based. Previously, individual midwives worked closely with GP practices, but this was reported as no longer happening because of a shift in the organisation of services. As a result there is little face-to-face communication and little opportunity for building inter-professional relationships and for joint communication and consultation about women and babies, and a lack of integration between community and hospital: *'although we are stronger together, the system is pulling us apart'*. This was reported as being most important for women with additional needs such as long-term conditions or mental health problems, and when women need care outside of the normal schedule of antenatal visits; women have problems accessing services in a timely manner at these times. GPs noted that relationship-building and safeguarding are more difficult as a result of not having regular contact with midwives: *'the ability to provide help and support early is being lost across the board'*. Examples of problems that result included missed diagnoses, confusion over accountability, and delays in prescribing: *'there needs to be a clearer pathway for organising prescriptions'*.

Obstetricians described their concern about the impact of the roll out of the CoMC model on workload. They reported that its implementation has aggravated existing workforce problems and removed some experienced midwives from labour wards, and current processes and systems do not enable the shift in workload model required.

Birth options and out of hospital care

Obstetricians and paediatricians reported little or no direct engagement in care in the community or in Alongside MLUs, and there was concern about their capacity to provide support. There was a range of views about birth options for women, and especially about Freestanding MLUs, which were described by some as ‘contentious’. Some obstetricians and paediatricians expressed strong views that Freestanding MLUs should not reopen and that home birth options should be minimised. Some experienced participants recalled the difficulty in establishing Freestanding MLUs in the first place, with conflict between obstetricians and midwives that took some time to settle, and they were reluctant to revive that situation. Some obstetricians expressed the opposite view, that MLUs should be supported and developed: *‘when choice is taken away, out of guidance, complex and home births increase in a region, placing increased stress on community midwives. It is important this is addressed’*.

Some obstetricians reported that women are choosing to freebirth or have home births because of previous experiences or because hospitals do not consistently offer the care options that they wish to have. They reported that if Freestanding MLUs are removed permanently more women will opt for home births. They also reported that some women have unrealistic expectations about choice because of not having information. Some described the practical problems of providing midwifery-led care in the context of staffing constraints, noting that there are not enough midwives to safely staff both the labour ward and other birth settings.

Some obstetricians noted that if problems occur for women in an MLU setting, they will inevitably be involved and have to take responsibility, and that *‘emotions run high’* in such circumstances. They indicated that responsibility should be shared, and that there should be more multidisciplinary discussion. A few recognised that the decision on where to give birth is the woman’s, and that obstetricians should support women whether or not they support the decision.

Systemic lack of equity, inclusion, and integration of midwives

Some obstetricians noted a power imbalance and hierarchy that exists between obstetricians and midwives, with obstetricians seen as the primary carer for women. They described decisions being made – such as to increase the number of inductions – without full consideration of the impact on midwives’ work or in discussion with midwives. Some reported that this is different in other parts of the UK where they had observed roles as more equal.

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Some obstetricians and paediatricians reported that out of hospital care – currently including antenatal and postnatal care, home birth and care in Alongside MLUs, previously also Freestanding MLUs – and including out-of-guidance care, is not well supported by the multidisciplinary team. While some described examples of antenatal consultations and discussions with midwives about individual women who wished home birth, they noted that such care was not commonly available or fully supported by the multidisciplinary team and could be stressful for midwives who had to support women even if they did not agree with their decisions.

GPs reported that midwives are not being included in the ongoing drive to enhance multidisciplinary team working in general practice, despite there being clear opportunities to improve care and communication. Workforce issues and a lack of funding were identified as key factors in this decision.

Paramedics described particular problems when being called to out-of-hospital births, including not having contact numbers for midwives, being unable to access buildings, and midwives being unfamiliar with ambulance systems. They discussed differences in practice between midwives and paramedics in emergencies; for example, paramedic protocols dictate moving mothers and babies in separate ambulances to ensure adequate professional support for both, while midwives were reluctant to separate mothers and babies. They described inconsistent practices across HSC Trusts and a lack of opportunities for liaison with senior midwives to develop shared protocols and pathways.

Inequalities in care and services

Some obstetricians noted the inconsistent care for women across the region, with not all services available in all HSC Trusts. Some were concerned that the roll out of CoMC had the potential to increase inequality as some women will receive this service and others will not. Neonatologists/paediatricians noted that the ‘*medical model*’ of managing risks rather than prevention does not address inequality. They reported that pregnancy is a valuable opportunity to mitigate inter-generational inequality when social circumstances can be optimised for vulnerable families, and a multi-agency and community perspective is important.

Participants noted the potential for regional developments to be ‘*Belfast-centric*’, and that any solutions needed to be equitable across the region. GPs noted that the changes to primary care have resulted in inequality for women who live at a distance from the hospital and who have problems accessing care, including prescriptions when needed.

Culture of fear and risk

Obstetricians, neonatologists/paediatricians, and GPs described a culture of fear and risk in maternity and newborn services, influenced by factors including the media and by the potential for litigation, and aggravated by the limited time for discussion with women. The media was reported as blaming clinicians when problems occur; *'we are hung out to dry'*. The culture of fear is responsible for *'conservative, risk-averse'* practice. Obstetricians reported that risks define the decisions that they make and are the main issue in conversations with women; *'benefits are forgotten'*. They described a tendency to act defensively, especially in the already stressful atmosphere of *'firefighting'* on a daily basis. Participants noted *'this is not working co-operatively or to anyone's best interests. There has to be a better way of working'*.

Governance and leadership

All participants commented on issues of governance and leadership in the services – maternity, neonatal, and primary care, which they reported as underlying many of the challenges they described. They reported that these included:

- Long-term under-resourcing for NI: participants noted that health service funding is allocated on a different basis from the rest of the UK and has been *'appallingly poor for years'*.
- Maternity services and women's health not being a priority in NI: participants reported that the current lack of government and not having a maternity and a women's health strategy is having a critical detrimental effect: *'other governments in UK and Republic of Ireland have given women's health the kudos it requires'*. Regional developments and initiatives have been put in place but have not been adequately resourced or sustained.
- Maternity services not being a priority at HSC Trust level: obstetricians reported that there is a minimal voice from obstetricians and midwives at senior management and HSC Trust Board level across all five HSC Trusts. The approach of senior management is *'reactionary rather than proactive'*, and *'only heard because of adversity'* (ie adverse incidents occurring).
- Lack of a clear accountable governance structure at all levels: participants noted a lack of regional decision-making about services because of political considerations. They reported that there is no population health plan, no standardisation of service provision, and no targets for maternity services which would support resource allocation and described a lack of awareness of roles and responsibilities and *'no clear lines of responsibility'*. Data systems in HSC Trusts were described as *'not joined up'*, and participants noted the lack of relevant, accessible data to assess agreed outcomes. Senior management teams – above the level of Heads of Midwifery – were described as *'oblivious'* to major UK reports and unaware of the current stress. A *'disconnect'* was described, with maternity care having the highest litigation costs but no pro-active plan to address that.

There is a lack of presence of senior management in smaller units, and issues *'don't get dealt with'*. Participants reported that there is not enough administrative support in their roles, and until recently there was no time recognised in job plans for governance; recent improvements are not enough.

- Participants noted the importance of the Head of Midwifery role for obstetrics as well as for midwifery services but that there is little support for these roles, high potential for stress and burnout, and a lack of continuity.
- The lack of integration with primary care services has resulted in a lack of clarity over responsibility and ownership, and challenges in regard to pathways of care, governance, and ownership: *'There is a real need to tighten the ownership pathway'*. Missed opportunities result: *'the ability to provide help and support early is being lost across the board'*.
- The service taking on more than resources cover: all participants reported that the maternity and neonatal services absorb more work than resources cover. They reported that no additional resources are provided when women and babies are accepted from other HSC Trusts, and new work such as increased levels of induction of labour and new protocols are introduced without additional resource. They noted that the nature of the service is that women and babies must be cared for at the time rather than being put on a waiting list. Staff absorb additional work; *'maternity services have fulfilled their own destiny by always rising to the challenges and meeting needs'* and *'the work gets done because it has to, albeit not in the safest way possible'*, therefore senior management have not taken action.
- There is a lack of understanding at management level of the interdependencies between midwifery, obstetrics and paediatrics/neonatology, and that general paediatrics plays a critical role in the maternity services.
- Lack of an enabling environment for staff: obstetricians reported a lack of support for all staff, especially following traumatic experiences. There is a lack of time and opportunity for multidisciplinary discussion, debate, and joint decision-making.
- Lack of a learning environment: participants reported that NI does not tend to consistently benchmark its services and outcomes with other parts of the UK. They noted that incident reviews are not conducted in a timely manner and that there is a lack of follow-through and oversight of review recommendations. As a result, lessons are not learned by any of the relevant professional groups, who all need to work together to ensure improvement.
- Inconsistent practice and protocols: participants reported a limited regional approach in relation to guidelines, protocols, training and outcomes, with differing policies and protocols between HSC Trusts.
- Lack of a voice for women: some participants noted that women need to be more involved in decision-making about care and services.

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Training and career development

All discussion about education and training focussed on emergencies. Participants noted PROMPT training for emergencies included obstetricians, anaesthetists and midwives but not neonatologists/paediatricians or ambulance staff. Paramedics reported a need for improved education and training on maternity for ambulance staff; new cohorts receive training, but this is not repeated and there are no drills or exercises relating to maternity emergencies. Ongoing training is online as part of self-directed CPD. There are resource challenges for NIAS in obtaining backfill to release people from duty to attend training and education events.

Positive insights and experiences from listening events with multidisciplinary colleagues

Positive service provision

Obstetricians noted that although the multidisciplinary team achieve a lot, there is a collective desire to do better.

A positive development reported by some in regard to staffing has been a significant increase in consultant obstetrician presence due to an increase in the number of consultants on the hospital rota.

In addition, examples of positive multidisciplinary team working for women with additional needs and those who wished care out of guidance was described; examples included a monthly MDT meeting, ongoing team discussion with community midwives and consultant midwives to provide training, a support structure for midwives, back-up if problems occur, and recording MDT discussions in the notes. GPs noted the benefits for women of being able to self-refer to the maternity services. Some neonatologists/paediatricians noted that some neonatal units encourage midwifery-led care for women with babies in neonatal units, including baby checks and delivering antibiotics.

Some obstetricians noted the importance of Alongside MLUs, and some welcomed the introduction of CoMC provision, noting the positive feedback from women about these services.

Leadership, communication, team working

Some obstetricians reported strong positive relationships and interprofessional working with midwives: *'we're all in it together'*. Some noted recent positive changes in governance including the Oversight Group in the DoH.

Education, training, staff development

Some obstetricians welcomed the choices and wider career opportunities that midwives now have as a result of the development of specialist roles: *‘There is a need to enable choice, or they will vote with their feet and leave the profession’*.

Paramedics noted that training for maternity related emergencies has improved for students.

Obstetricians noted that one of the biggest drivers of change can be occasions where there has been a poor outcome, where people have subsequently been brave enough to make decisions: *‘some good can arise from tragedy’*.

5.2.5 Summary of engagement findings

- Many women, babies and families are experiencing deficits in care across their maternity journey - perhaps most notably in antenatal information and education, late pregnancy and postnatally - that are resulting in adverse outcomes and experiences and that are not always visible to staff or to the system.
- The model of care has shifted in recent years to one that is focussed on processes and interventions with limited time for prevention, support, information, and individualised relationship-based care. High levels of induction of labour and caesarean birth combined with workforce shortages are dominating women’s and staff’s experience of labour, birth and postpartum care. Women, midwives and interdisciplinary staff alike described a *‘culture of fear and risk’*.
- Low priority is given to community services, and there is limited interdisciplinary support for midwives working in community and Alongside MLUs.
- Some women, babies, and families have positive experiences of maternity care and services, most staff from all disciplines are deeply committed to providing the best care for women and babies, and there are individual examples of positive, sustained provision of high quality services; but the learning from these positive experiences and examples is not embedded across the service.
- Women’s experiences are not consistently related to their clinical outcomes. Some women with adverse outcomes including perinatal loss described excellent care. Others with outcomes that the system would consider to be positive described very difficult experiences affecting their mental and emotional health.
- Whatever their individual circumstances and throughout the continuum of care women and partners consistently value respect, kindness, trust, relationship-based care, continuity, support, and information.
- Staff from all groups, especially midwives, are experiencing intense work-based stress that is compromising their physical and psychological safety and at times their ability to provide safe, quality care.
- There are multiple system-level barriers to safe, quality care that prevent staff from providing the care that they wish to provide.

- Staff have the potential, the commitment, and the will to deliver a higher standard of safe, equitable, quality care and services if system-level issues are addressed to enable them to do that.

5.3 Findings 3: characteristics of positive service developments in midwifery care and services from Northern Ireland, Scotland, England, Wales, and Spain

To identify the characteristics of positive, sustainable midwifery care and services, 15 examples of positive developments were identified from across NI, other nations of the UK, and Spain. Some examples were identified by respondents during the engagement work, others through responses from senior colleagues, and others by members of the Expert Group. While not all examples have been formally evaluated, each one has a qualitative contribution to make to understanding aspects of positive service development.

Details of each example are in Appendices 11 and 12, and brief summaries are used throughout Section 6 to illustrate key points.

5.3.1 Examples of positive developments in care, services, and education in Northern Ireland

Eleven examples were identified across NI, from all five HSC Trusts, the PHA, and QUB. Examples were from across a range of hospital and community settings and across all stages of the continuum of care and included multidisciplinary and cross-sectoral ways of working. The topics were:

- **Midwifery care:** meeting the additional needs of women and babies in vulnerable situations including bereavement support and care for women outside of standard pathways.
- **Midwifery services:** home birth services, a Home from Home alongside MLU, services for women and babies with additional needs including women from minority ethnic groups and women with clinical and social complications, implementing evidence-based standards in a maternity service, and implementing a policy of CoMC.
- **Midwifery education:** service user involvement in developing a new curriculum for undergraduate midwifery education, and preceptorship for NQMs.

5.3.2 Examples of safe, quality, sustained Freestanding MLU services, training and education in the UK and Spain

Characteristics of safe, quality, sustained Midwifery Unit services were identified by examining Midwifery Unit provision in Scotland, England, Wales, and Spain. They addressed the topics of:

- Sustaining the integration of Midwifery Units with the wider maternity service.
- Assuring standards in Midwifery Units.
- Developing organisational readiness for implementing a Midwifery Unit.
- Training for emergency situations occurring in the community.

5.3.3 Characteristics of safe, quality care, services, and education

Analysis of all these positive examples identified shared characteristics of safe, quality midwifery care, services, and education:

Partnership working with women and families:

- Involving women in planning, delivery and assessment of services, working with the voluntary and community sector; including co-design and co-production of services and education.
- Respectful relationships, inclusion, building trust, sharing information.
- Providing continuity across the continuum of care and the whole maternity journey.

Shared focus, values, philosophy, vision, culture:

- Focusing on improving outcomes and experiences, and meeting the individual needs of women, babies, and families; including clinical, psychological, social, and public health needs.
- Developing a shared philosophy and vision and a positive, pro-active shared culture.
- Non-judgmental, open approach with women, families, colleagues.
- Learning and adapting to changing circumstances.
- Embedding commitment to improvement.

Ensuring evidence-based care and standards:

- Evidence-based care and decision-making.
- Evidence-based standards and standardisation of services.
- Regular monitoring, evaluation, and review, adjusting service provision as needed.

Enabling and supporting midwifery care and services for women, babies and families:

- Ensuring access to midwives for women in rural and remote areas.
- Ensuring midwives' readiness for emergencies.
- Developing knowledge of and support for midwifery care and services across the health system.
- Developing knowledge and experience in the midwifery model of care including physiological labour and birth.

Interdisciplinary team working and education at all levels of the system:

- Strong and courageous leadership and management.
- Strong integration of services, care, and education across the health system.

- Better support for all staff, including education and training for all staff to support service and behaviour change.
- Improved planning of care and services, with allocated time to deliver.
- Increased cross-agency communication and engagement.
- Respectful communication: between staff, with women and families, and with other parts of the health and social care system.
- Engaging and informing policy makers, politicians, and those with influence.

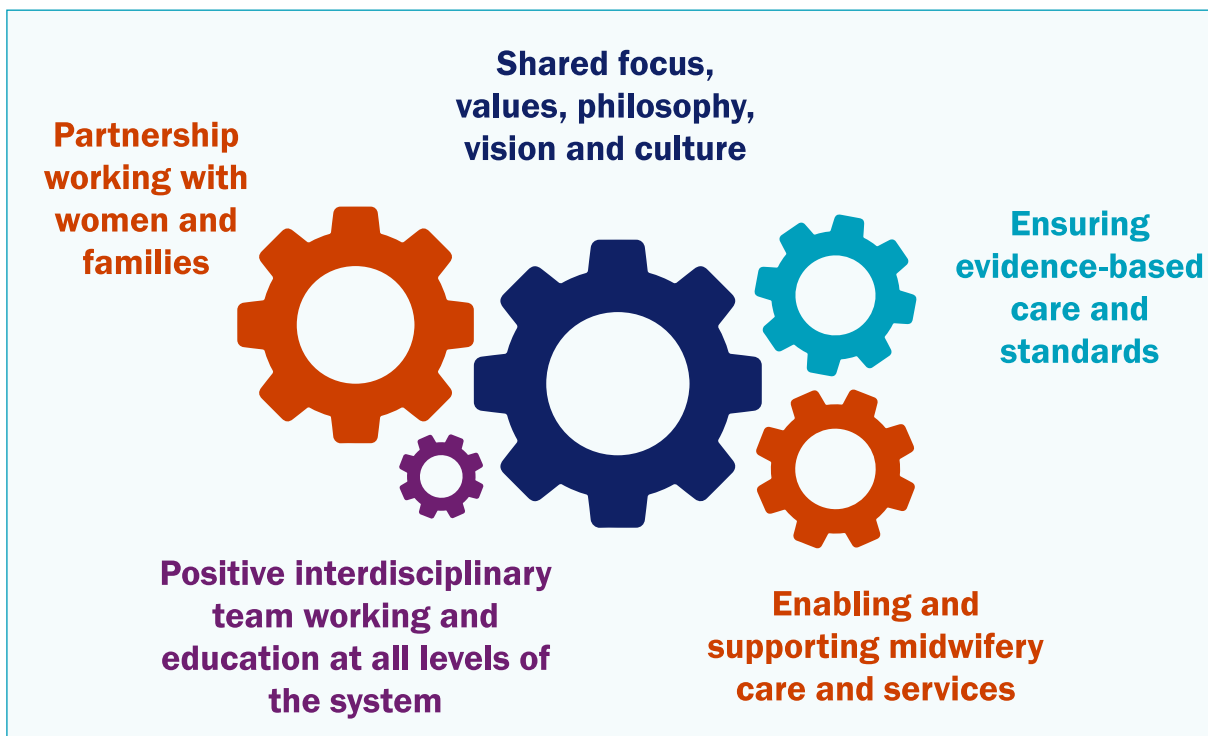


Figure 31: Safe, quality, equitable care for all: characteristics of positive services.

5.4 Findings 4: evidence reviews

Six evidence reviews were conducted to address the critical questions identified (Appendix 4). Most used the methods of rapid efficient evidence reviews; for some topics there was little formal evidence available and a broad evidence scan was conducted. [85]

Details of methods and findings from the reviews are in Appendix 5. They were:

- Quality and safety in maternity care. [81]
 - Guiding question: What approaches are most effective for sustainable improvement in safety and quality care in midwifery/maternity services?
 - This review examines definitions and current issues in the current approaches to safety, and the evidence for impact of different approaches.

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- Health system barriers and enablers to quality midwifery services. [9]
 - Guiding question: What are the key health systems conditions for safe, quality midwifery services across all settings (community, MLUs, hospital)?
 - This review identified root causes of system failure, and evidence-based components of safe, quality maternity services. This work has been used to identify seven key health system concepts used in the analysis of the report findings.

- Health economics aspects of midwifery and maternity care and services. [130]
 - Guiding question: What are the key recommendations from evidence in relation to cost savings and cost effectiveness of midwifery care while enabling quality and safety?
 - This review examined the evidence on economic costs, costs savings, and cost-effectiveness of midwifery care while enabling safety and quality. Topics included the model of care, place of birth, individual components of maternity care, and healthcare professional training.

- Maternal and neonatal outcomes associated with planning birth in different settings. [131]
 - Guiding question: what are the key maternal and neonatal outcomes associated with the safety of planning birth in different settings?
 - This review examined the evidence on the safety of different planned birth settings in countries with health systems similar to NI.

- Best practice in regard to shoulder dystocia, care of women with high BMI, and prevention of complications related to large for gestational age infants [132-134]
 - Guiding questions:
 - How best to prevent and treat complications related to shoulder dystocia.
 - To identify and summarise systematic review evidence around care and experiences of pregnant women with a BMI of 30kg/m² and above.
 - How best to prevent complications from a baby being large for gestational age.
 - These reviews examined evidence, guidance, and best practice in regard to the three topics; and evidence on women's views when this was available.

- Education and training to develop relevant and effective midwifery and multidisciplinary team performances. [135]
 - Guiding question: what are the key educational aspects relevant to the development and provision of safe and effective midwifery and multidisciplinary team performances, including emergency situations.
 - This review examined evidence on human factors education and high-fidelity simulation, establishing an extended faculty, conducting learning needs analyses, and establishing psychologically safe leadership.

5.5 Findings 5: sense-checking and confirming engagement findings and identifying solutions: findings from the cross-sectoral workshop

A large solutions-focused event was held in Belfast in November 2023. Around 80 invited participants from across NI considered early findings from the engagement and discussed potential solutions to the challenges. Participants included service users, advocates, and community groups; midwifery students and educators; midwives from Bands 5 to 8, MSWs, consultant obstetricians and neonatologists, GPs, ambulance staff, service managers and senior managers, HSC Trust Board members, representatives of Royal Colleges, regulators, organisations with responsibility for aspects of the maternity system, and senior policy makers. They worked together in mixed table groups to ensure a range of perspectives, with multidisciplinary facilitators drawn from the Advisory and Expert Groups. In their first discussion, participants were asked to identify the key positives and challenges for the maternity services. The views of each table group were recorded and summarised and shown to the whole group; there was good alignment with the themes that had been identified from the engagement work. Following presentation of the findings of the engagement work, table groups were asked to identify potential solutions in their second discussion. A rich set of ideas emerged.

The positive solutions resulting from the group discussion were analysed and themes identified. Details were incorporated in the overall qualitative analysis. The biggest theme that emerged related to transforming the system. This included strengthening midwifery, improving multidisciplinary working, changing the culture and the risk- and task- focussed model of care, improving governance, consistent policies, and strategic developments. Transforming the relationship with women to focus on their needs and preferences was a dominant message.

Themes identified were:

- Transforming the relationship with women:
 - Listening to women.
 - Inclusion.
 - Language and communication with women.
 - Support for women.

- Transforming the system:
 - Service solutions.
 - System solutions.
 - Staffing and workforce.
 - Leadership and management.
 - Training and development.
 - Communication.

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WHAT HAVE WE LEARNED? ANALYSIS OF FINDINGS

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6.0 WHAT HAVE WE LEARNED? ANALYSIS OF FINDINGS

6.1 Introduction to the analysis

Listening to the voices of around 400 women, their partners, advocates, midwives, MSWs, midwifery students and educators, interdisciplinary colleagues and professional and policy leaders over the past few months has been both a privilege and a challenge. The summary of their accounts in this report should make sobering reading for all who care about the health and wellbeing of women, babies and families in NI. There are also positive strengths to build on.

Many women and their partners described difficult and damaging experiences and outcomes that are affecting them in the short-, and for some women, in the longer-term. Changes in care provision, including a shift to a task- and risk-focussed culture and high rates of caesarean birth and induction of labour, are not resulting in improvements in key maternal and newborn outcomes. Many staff, especially midwives, reported concerns about workplace stress and their own health and wellbeing and psychological safety; and described work pressures that limited their ability to provide the quality of care they knew was needed. There are signs of long-term substantive stress across the whole system; the socio-economic stress of the past decade has affected families, communities, and the health service alike, aggravating the existing burden of deprivation that is higher in NI than other UK countries.

It is important to learn not only from problems but also to recognise and learn from the strengths in the current system. [136] Women and their partners described positive experiences and examples of safe, quality care from across NI. The biggest strength the maternity service in NI has its staff, from all disciplines; we encountered an overwhelming commitment from the great majority of staff to provide the best possible care and services. Their work was not enabled by the current system, however.

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Many of the significant challenges in providing good quality maternity and wider health services identified in this work are shared by other UK countries and indeed internationally (Section 5.1). But that recognition should not prevent us from seeking positive ways forward for NI. It gives us all the opportunity to review whether or not services are meeting people's needs, and there are important lessons to be learned about what has worked in other jurisdictions.

6.1.1 Comments on the methods of the report

The methods of this work (Section 4.4) were designed to learn from a range of sources; listening to the experiences of women, families, advocacy groups, staff, students and senior colleagues; data analyses and evidence reviews; examples of positive service developments; a large cross-sectoral workshop; and ongoing input and discussion with the Expert and Advisory Groups. What we heard and what we learned were consistent messages; from women who experienced care in all five HSC Trusts and who had a wide range of socio-economic circumstances and negative and positive clinical outcomes, from staff across NI and from all staff groups, and from the data. This information was validated and confirmed by the input of the participants at the cross-sectoral workshop. The findings of our work were also discussed and validated by the Advisory Group. Drawing on the concepts of data saturation and of triangulation we are therefore reasonably confident that while the 400 people directly involved in the listening events represent a small proportion of the women giving birth and the staff who care for them, what we heard, and what has been summarised in the Findings, is an accurate representation of the current situation in NI. There was strong and willing engagement from all these groups, which suggests not only that the collaborative approach was successful, but that there is a strong platform on which to build collaborative approaches to implementation of changes. Understanding the full range of women's views and experiences requires a large-scale study; this is addressed further in the Recommendations.

6.1.2 How was this analysis conducted?

The ambition of this analysis section is to understand the nature, extent, and causes of the current challenges and to identify solutions that will work to inform safe, quality care for all and thereby to improve health, wellbeing and experiences for all women, babies and families. It is also important to identify solutions to the challenges faced by staff in their day-to-day experience of working in cultures and environments that are sub-optimal.

The first step in this process was to identify and analyse systematically the key issues that must be addressed. For this analysis we have drawn on:

- What we learned in the engagement (Section 5.2) and the cross-sectoral workshop (Section 5.5).
- Analysis of positive service developments (Section 5.3).

- Questionnaire responses and information provided by Heads of Midwifery, HSC Trust Boards, commissioners of services and education, and relevant organisations and agencies (described throughout this section).
- Data on outcomes, processes, and workforce, with UK and international benchmarking (Section 5.1).
- Research evidence, including efficient reviews [85] conducted for this report (Appendix 5). [9, 81, 130-135]
- Relevant strategy documents and reports from NI and beyond.
- Input by members of the Expert and Advisory Groups.
- Systematic analysis based on concepts from The Lancet Framework for QMNC [8] (Section 4.3) and evidence-based characteristics of the health system needed to support safe, quality midwifery and maternity care and services (Appendix 5b). [9]

6.2 Key issues for safe, quality midwifery care and services for all women, babies, and families in Northern Ireland

Seven evidence-based concepts for safe, quality services have been identified from the Lancet QMNC Framework (Section 4.3). These provide a basis for systematic analysis of the findings of this work. Each of these concepts matter, but they do not stand alone. Inevitably there is overlap in the factors affecting them, and it is important they are seen as an integrated whole:

Table 3: Seven evidence-based concepts for safe, quality services based on the Lancet Quality Maternal and Newborn Care Framework (QMNC) [8]

QMNC Concept	Question
QMNC Concept 1	Are women, babies and families <i>the focus of care and services</i> ?
QMNC Concept 2	Do women and babies receive safe, quality care <i>across the whole continuum</i> ?
QMNC Concept 3	Do <i>all</i> women and babies receive <i>the universal care</i> they need? a) Equity b) Education, information, health promotion c) Assessment, screening, and care planning d) Optimising normal processes, preventing complications
QMNC Concept 4	Do women and babies with complications receive <i>the additional</i> care they need? a) Identifying complications and providing first line management b) Medical, obstetric, neonatal services
QMNC Concept 5	Does the organisation of care and services ensure safe, quality care <i>for all, with continuity and integrated across settings</i> ?
QMNC Concept 6	Is there a <i>shared culture, and shared values and philosophy that strengthens women’s own capabilities</i> ?
QMNC Concept 7	Are staff <i>supported and enabled</i> to provide the full range of their knowledge and skills?

6.2.1 QMNC Concept 1: Are women, babies and families the focus of care and services?

The concept: Women, babies, and families should be the focus of care and services. Safe, quality maternity care and services are those where women's needs, views, preferences and decisions are known and respected. [137-139] Their safety – physical, psychological, and cultural - the safety of their babies, and women's wellbeing and experience, are the whole point and purpose of the maternity system. Women's views and accounts of their experiences must be heard and understood; they are a fundamental marker of the quality of care. Women's decisions must shape the care they and their babies receive, and women's voices must inform and shape the system. All women have the right to have their views and decisions respected. [140] Multiple reports on healthcare and maternity care have demonstrated how critical this is for the physical, psychological, and cultural safety of women and babies. [48, 49, 52, 141, 142]

What we found: In the course of this work, we heard examples of both positive and negative interactions with care and services from women, their partners, and advocates. Women's experiences were not consistently related to their clinical outcomes; women with adverse clinical outcomes reported both positive and negative experiences of their care, as did women with clinical outcomes that would normally be seen as good.

Positive examples all demonstrated a focus on the needs of women and babies. Some women are undoubtedly being heard and their needs are being met by interdisciplinary staff providing respectful, kind and compassionate, individualised care. Women's positive experiences were related to:

- Information and respectful discussion, being listened to.
- Individualised care and respect for women's views and decisions.
- Care, kindness, compassion.
- Reassurance, calmness, a positive outlook.
- Continuity of care and carer, relationship-based care.

The examples of positive services that we examined from across NI (Section 5.3) are all focussed on meeting women's and babies' needs and women's preferences, demonstrating the ability of staff to provide this care when the system enables it. Partnership working with women was a consistent characteristic of these services, with respectful relationships, building trust, and involving women in planning and assessment of services.

Such positive care is not embedded across the system, however. Many women reported negative experiences, and a lack of focus on the needs of women and their babies was reported at all stages of their maternity journey, including pregnancy, labour and birth, and following birth. Their negative experiences were related to a lack of focus on their needs and views and difficult interactions with some staff, including:

- Disrespect, including lack of consent, disrespectful and distressing verbal interaction.
- A lack of response to women's safety concerns.
- Lack of inclusion of women, lack of individualised care and services.
- Lack of accessible information, discussion, and evidence.
- A focus on technical interventions dominating conversations, increasing women's fear and sense of risk.
- Lack of options for women for maternity care including out-of-hospital services.

The impact: many women reported extensive distress and described their experiences as traumatic, affecting their wider family and for some, resulting in long-lasting psychological trauma. The word '*trauma*' is powerful and indicates a long-lasting and deep impact, whether physical or psychological. For health professionals, '*trauma*' is a specific psychological diagnosis. This is undoubtedly the case for some women. But it was also used differently by many women who talked with us, who used it to describe the depth of their negative experiences. Some women described the lasting effect this had on their whole sense of self, feeling like their bodies had failed them.

Women's experiences of disrespect, not being listened to, curt communication, a lack of information including follow up to serious incidents, and lack of options for care, align with previous reports on maternity services. [3, 4, 48, 49, 137] They demonstrate a lack of consistently kind and compassionate care. Many women were understanding about the workforce pressures, and expressed sympathy for staff who may have been abrupt or who did not respond to requests when they saw the circumstances in which they were working. Some of the examples women described, however, indicated a more deep-seated lack of respect and a dismissive attitude to women and their partners by some staff, including obstetricians and hospital and community midwives. More commonly, women described an absence of discussion and options, without any focus on them as individuals. Some of their descriptions demonstrated a lack of response by staff to safety concerns; examples included dismissive responses on the telephone when they called the maternity unit with concerns in late pregnancy, and a lack of response by staff when experiencing heavy postnatal bleeding while in the postnatal ward. There was clear impact on their physical and psychological safety.

The extent and consistency of the negative experiences described was notable because we did not seek out women with traumatic experiences. Our methodological approach (Section 4.4.2) was to reach widely to hear about women's diverse experiences. We did hear from women whose babies had died or had severe impairment, or who themselves had been ill or injured, or who had mental health problems, and their input to this work has been very important. We also heard from many women whose clinical outcomes would have been considered good but who described a range of negative experiences and outcomes. What we found resonated with many health professionals, service managers, and advocacy groups and charities working with women, and was confirmed by the response and discussion at the cross-sectoral workshop we conducted (Section 5.5). It was, however, less expected by colleagues working further up the system who were not directly involved in providing maternity care, some of whom were reluctant to accept that many women were experiencing trauma. It is important to consider why this might be the case; for safe, quality care and services it is essential that women's views and experiences are known and understood, and any concerns are acted on at every level of the system.

Hearing, understanding, and acting on women's views and experiences

It has long been known that assessment of women's views and experiences of maternity care and services is complex. [143] Factors affecting women's reported experiences include their expectations, prior experiences, the risk status of their pregnancy, their socio-economic background, [144] whether they are treated with kindness by their caregivers, and the way in which the assessment is conducted. There is a tendency for women to feel relieved, grateful, and generally positive after the birth of a healthy baby, even though they may have had a range of negative and positive experiences and feelings across their maternity journey. Assessment of women's views is often made while the woman is still in hospital and has not had the opportunity to recover or reflect on what happened to her. Many women may not wish to speak critically about the care they received, especially to the staff in the place where they were cared for. They may fear that criticism will adversely affect their ongoing care. They may have a range of prior expectations, influenced by their own or others' experiences and what they have read or heard, which may influence their views of their actual experiences. Women may not know that care could perhaps have been different; options for care may not have been discussed, they may not know the relevant evidence, and their friends and family may all have had similar negative experiences. Importantly, women who are vulnerable because of ethnic and social inequality, or their mental health, or following difficult experiences and interactions with staff, are less likely to speak up and they are less likely to be responded to. [15, 145, 146] All of these factors and more affect any assessment of women's views and experiences. It is important to consider multiple ways of ensuring that their voices are being heard, and that their concerns are being responded to appropriately.

HSC Trusts and health care organisations in NI use the findings from the website resource Care Opinion to gauge service user experience across all areas of healthcare. What we heard differs from Care Opinion’s findings on maternity care; around 75% of stories reported on Care Opinion by women in 2022-23 were of positive experiences, and of the remaining 25%, only 6% were classed as serious negative experiences. [147]

Methodological differences may go some way to explaining the apparent differences between what we heard and the Care Opinion findings. Service users from across the full spectrum of health and social care services are invited to submit their stories on the Care Opinion website. This approach is not especially suited to maternity care for the reasons discussed above. In addition, all stories posted are publicly available. It may be psychologically unsafe for women to recount difficult experiences or to voice criticism of staff and services on a public forum, especially without support. Importantly, some women noted that they were concerned that using Care Opinion to publicly report an adverse incident may compromise any complaint that women may wish to take directly to HSC Trusts. It is possible that Care Opinion is not yet capturing the full extent of difficult experiences for women in NI.

It is of course possible that our engagement did not reach widely enough, or that despite our efforts to hear from a cross section of women (Section 4.4.2), women with negative stories to tell sought us out in a way that women with positive experiences were less inclined to do. This was not a full-scale research study, but a window into the lives and experiences of women, families and staff over a period of a few months, and we heard only from a small proportion of the women giving birth in NI. It was striking however that we heard very similar accounts from women and from staff across every listening event, with a consistency that suggests what we were hearing was an accurate picture. The discussion that women had with each other during these events seemed to be an important component of the engagement, where they could share, compare, and contrast their experiences. Other sources of information also support our findings. The negative stories that are reported on Care Opinion reflect what we heard in our engagement, as do the findings of the 2019 BirthWise survey, [148] and especially the early findings of the more recent BirthWise survey, [149] which had 1100 respondents across all HSC Trusts. The difference between the two sets of BirthWise survey findings (2019 and 2023 unpublished) indicates what others have told us, that women’s experience of maternity care is deteriorating. Our findings reflect the findings of recent reports in England, [3, 4, 30, 48, 49] and the key themes identified from Care Quality Commission (CQC) inspections of maternity services in England, including problems with communication, personalised care, leadership, staffing, and culture. [30] These findings indicate that problems are widespread but in the absence of a large, regular, well-designed survey of women’s views and experiences, the full picture of what is happening for women in NI is unknown.

Do women’s views inform the system, contribute to improving care, services, and education?

Safe, quality systems are those where the user’s voice is heard and embedded into planning, delivery, assessment, and review. [30] This was a key theme in the examples of positive services developments (Section 5.3), which have shown a range of ways in which this can be achieved. In one example, service users worked directly with educators at QUB to co-design the new undergraduate curriculum for midwives (Appendix 11j).

Summary of positive service development (Appendix 11j)

Developing a pre-registration curriculum through a co-production process involving maternity service users

In 2013, the Patient and Carer Education Partnership at QUB invited the contribution of service users and carers to have a voice in nursing and midwifery education. Maternity service users were specifically supported to be involved in pre-registration midwifery curricula development. As a result, women’s experiences have directly contributed to the teaching and learning of midwives. Women actively participate in simulated learning and assessment and help evaluate education programmes. It is now recognised that a formal, but flexible, structure for service user involvement in midwifery education is needed. It is recommended that a systematic approach to the evaluation of the impact of co-designing of curricula with maternity service users is established.

There are limited opportunities for service users in NI to truly be involved in the co-design of maternity services, however, the region-wide PPI programme, Engage, has limited involvement with maternity care. [150] One important mechanism should be Maternity Service Liaison Committees (MSLC) in each HSC Trust, composed of user representatives as well as interdisciplinary professionals and chaired by a service user. All of the HSC Trusts have MSLCs, however during the Covid-19 pandemic these groups did not meet on a regular basis. All HSC Trust have confirmed that they are trying to re-establish regular meetings or are planning to. Despite work in some HSC Trusts to move towards a more strategic model to better reach and engage service users, respondents still reported a lack of opportunities for substantive service user input and joint working. It was noted by respondents that meetings tend to focus on a HSC Trust update led by a staff member rather than enabling open discussion of issues. Recently, service users and advocates from across NI attended training facilitated by National Maternity Voices UK [151] and began work on developing Terms of Reference for MVPs in NI, following guidance from the National Maternity Voices Partnership. [151] The aim is to create regionally consistent, service user-led MVPs in each HSC Trust where service users can work in partnership with key maternity staff towards meaningful change, and where their time and voices are valued.

QMNC Concept 1: Are women, babies and families the focus of care and services?

What is needed: A culture shift is needed to re-balance the relationship between women and their families, and staff and the system. There will be more information about this in later sections. To understand the whole picture and inform service planning, assessment and improvement, other sources of information about women's views and experiences across the whole continuum of care must be available to policy makers, commissioners, HSC Trust Boards, clinical managers, staff, and the public. In addition to a regular, large, well conducted regional survey, a research study is needed to examine in depth the current views and experiences of women having babies in NI; ideally a study would be prospective, recruiting women in pregnancy and assessing their views and experiences across their maternity journey and avoiding the pitfalls of retrospective surveys.

To achieve genuine co-production for the maternity services, women need to have a clear and valued voice within the management and governance structures. To ensure that HSC Trusts listen to and reflect the views of local communities, that all groups are heard, and that women's voices have strategic influence and are embedded in decision-making, an effective MVP structure is needed. This would function most effectively at regional level, with local liaison mechanisms with each HSC Trust. Financial and administrative support from the HSC Trusts and/or the DoH will be needed to engage, support, and train service user Chairs and Co-chairs and establish and maintain an effective infrastructure.

See Recommendations 1, 3, 4, 5, 6, 7, 14, 27 and 30.

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6.2.2 QMNC Concept 2: Do women and babies receive safe, quality care across the whole continuum?

The concept: All women and babies require quality care and services to be implemented across their whole maternity journey from pre-pregnancy through to postpartum and the early weeks of life – from the service perspective, this is the whole continuum of care.

What we found: Individual examples of positive service developments in NI demonstrated continuity of care across the continuum (Section 5.3, including services for women with additional needs, the Home Birth Team, the CoMC teams, and the service for women from East Timor (Appendix 11a).

Summary of positive service development (Appendix 11a)

Addressing inequity in access to antenatal services by creating a dedicated antenatal clinic for women of East Timor ethnic origin

Women of East Timor ethnic origin can be at risk of adverse outcomes from pregnancy due to sociocultural, economic, as well as health factors. To improve outcomes in the Southern HSC Trust, a dedicated weekly midwife-led antenatal clinic, with an interpreter, was established. The impact includes a significant increase in antenatal attendance, reductions in post-partum haemorrhage and Intensive Care Unit admissions, as well as increased access to housing and other benefits. This positive development has highlighted that understanding the specific needs of women of ethnic minorities can improve outcomes, and that continuity of care and multidisciplinary working is essential. The overall recommendation is that dedicated midwife-led antenatal clinics, specialised in supporting women of diverse ethnic origins, should be established across Northern Ireland.

What we heard throughout the engagement work, however, was this concept is not embedded across the service. Attention and resources, especially in regard to safety, seem to be focused primarily on care in hospital, and on labour and birth. Further detail on this will be discussed in Section 6.2.4, but a key finding here related to postnatal care. We consistently heard from women, midwives, and interdisciplinary colleagues that there is a notable deficit in postnatal care, both in hospital and following transfer home, and the impact of this on their physical and mental health and wellbeing is evident. This is a consequence at least in part of limited resources, especially midwifery staffing, to support safe, quality midwifery care in pregnancy and postnatally, and of the high rates of caesarean birth resulting in increased need for care and support for many women. Women are being transferred home soon after birth, even for caesarean births sometimes within 24 hours, and with limited care by midwives at home.

The impact: Postnatal care matters. Most maternal deaths occur in the postnatal period, [15] babies have very specific needs in the early days, and it is a time when women have critical needs for care and support. [152, 153] Women experience a number of important challenges postnatally. They are recovering from their birth – especially complicated for those with a difficult birth or a caesarean birth - they are in the early stages of attachment with their baby, and they are starting to learn how to care for and feed their baby. The early days and the following weeks offer a very important opportunity to provide information and education about physical and mental health and emotional wellbeing for themselves, their babies and their families. This includes recovery from the birth, psychological support and de-briefing if women need and wish this, parenting support, nutrition, sexual health and family planning, and mental health support, but this is currently a lost opportunity for many.

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QMNC Concept 2: Do women and babies receive safe, quality care across the whole continuum?

What is needed: Individual positive examples demonstrated that some women are experiencing such care, but it is not embedded across the service. The problems identified with postnatal care by many women and midwives are a critically important deficit in care with direct impact on the short- and longer-term health and wellbeing of women and babies.

Safety and quality must be considered across the whole continuum of care. Postnatal care of women and babies including both physical and psychological care and support, in hospital and at home, is an urgent priority that must be addressed.

See Recommendations 1, 2, 3, 7, 8, 11, 17, 18 and 24.

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6.2.3 QMNC Concept 3: Do all women and babies receive the universal care they need?

The concept: There are aspects of care that all women and babies need - both with and without complications - to stay well, to prevent complications or recognise them early, to promote health and wellbeing, and to strengthen women's own capabilities and enable them to make informed decisions about their care and the care of their babies. This universal care is an essential foundation for the provision of consistent, equitable, provision of safe, quality care for all women and babies, and has the potential to make a substantive contribution to the transformative change that is the ambition for NI's health and social care services. [113] Experiences in pregnancy, birth, postpartum and the early weeks of life form the foundation of lifelong health, physical and emotional development, and positive attachment. [154]

Interdisciplinary working is important at all stages of the maternity journey, but midwifery knowledge and skills are fundamental to this category because midwives provide the majority of this care.

There are four essential aspects:

- Equity.
- Education, information and health promotion.
- Screening and assessment.
- Optimising normal processes, preventing complications.

QMNC Concept 3a: Equity

The concept: All women and babies require safe, quality care and services, without exception and regardless of factors including age, socio-economic status, ethnicity, culture, education, language, legal status, gender identity, physical and mental health, family circumstances, sexuality, their decision about their preferred birth options, or other factor. Care and services must reach all women and babies and ensure equity of provision.

What we found: There is evidence both from NI and the rest of the UK of inequality in outcomes and experiences for childbearing women and babies (Section 5.1.3). [15, 19, 20] Influences on this include socio-economic factors/determinants of health. We heard from women and partners of a range of experiences of inequality (Section 5.2.2). These included descriptions of inconsistent provision of care and services across the HSC Trusts; antenatal care not meeting the needs of women with less education; witnessing ‘*subtle racism*’ in the treatment of women from diverse ethnic groups and a lack of cultural awareness and generalisations and assumptions being made by colleagues on the basis of ethnicity. Midwives working in Sure Starts in areas of deprivation across NI noted that the importance of their work was not recognised with secure funding or support from the wider system. Positive service examples demonstrated the commitment of staff to providing services to communities that are often under-served, including asylum seeking women and women with social complexities, with a positive impact on outcomes and experiences (Appendix 11a and 11c). These services were not always securely funded, however.

Summary of positive service development (Appendix 11c)

Providing coordinated support and safeguarding to vulnerable women and infants

Globally, women experiencing social complexities such as domestic violence, substance abuse, trafficking and poor mental health, have the highest levels of maternal mortality. To address this in the Northern HSC Trust, a post for a Specialist Midwife - Social Complexities was created. The results are impressive, with vulnerable women describing that their experience is much improved. There has been increased coordination between midwives, the perinatal health coordinator and the advanced nurse practitioner in addictions, and increased referrals to the regional addiction unit and non-statutory agencies. Lessons learned include that regular, multidisciplinary reviews improve care quality, and compassionate, collaborative leadership is effective. The recommendation is that more vulnerable women should be cared for by midwives specialised in social complexities, working in a continuity of care model.

The impact: It is hard to overstate the importance of the contribution that maternity and neonatal care and services, and especially midwifery, can make to equity and to mitigating the impact of inequality. There is a missed opportunity to embed a pro-active approach to equity across the work of the HSC Trusts to ensure that the needs of all in the community are met without exception.

QMNC Concept 3a: Do all women and babies receive the universal care they need? Equity

What is needed: All levels of the service should work to ensure that all women, babies, and families are reached with a consistent quality of care. This will require respect for the human rights of every woman, baby and family and for all women to be culturally as well as physically and psychologically safe. Education for all maternity staff in working with women from all backgrounds and circumstances is needed. Partnership working with community groups and resources for pro-active partnership working for service planning and provision is needed. The unique contribution of midwives to the health and wellbeing of women and babies living in circumstances of social, psychological, and cultural complexity should be recognised and valued and this work adequately resourced. Secure funding and system-wide support for midwives working in Sure Starts will help to establish support and access to services for women living in areas of deprivation.

See Recommendations 1, 2, 3, 5, 8, 11, 14, 16, 18, 20 and 24.

QMNC Concept 3b: Education, information, health promotion

The concept: Providing evidence-informed antenatal education, information and discussion is an important opportunity to improve the health literacy recommended in NICE guidance [155] and is likely to improve outcomes and be cost-effective, especially for socially disadvantaged women. It is an important foundation for women to make informed decisions about care.

What we found: A small number of women described having access to antenatal education, and it was welcomed and valued by them and their partners. Many women and professionals alike described time constraints limiting discussion and information however, especially in pregnancy, and there was very limited provision of either antenatal or postnatal education. Women reported that not having such opportunities adversely affected their access to information and discussion about the physical and emotional changes they might experience, about the benefits and risks of options for care, and about services and support available. The question of translation of information for women whose first language is not English was raised by several respondents.

Written information is available for women in The Pregnancy Book (updated annually by the PHA), but women and midwives commented on the limitations of written information related to literacy and language, and the importance of women's individual circumstances. In regard to translation services, access to online translation of written information using the ReachDeck service is available through the PHA website. This service was not mentioned by any respondent, and it is not clear how widely it is known about or used. Online antenatal and postnatal education classes are also available to women in NI through the PHA website; again, this service was not mentioned by respondents and its use and acceptability is not known.

The impact: The lack of antenatal education is a missed opportunity to improve physical and psychological outcomes for all women and babies, longer-term public health, [154] and to tackle inequalities. [156] Together with the limited time for informed discussion with midwives and obstetricians, this substantively limits women's ability to participate in decisions about their care. [157] This limits their health literacy and their ability to participate in decisions, in particular their knowledge about their own and their babies' health and wellbeing and of access to resources available to support them, such as support for smoking cessation, breastfeeding support services, Sure Start, and additional support for women living in vulnerable circumstances. It leaves women and partners vulnerable to relying on a variety of internet-accessed information with no quality control. There is a need to consider how best to reach all women with consistent, evidence-informed information about their own and their babies' health and development, and about care and services.

QMNC Concept 3b: Education, information and health promotion

What is needed: Informed discussion with women must be recognised as an essential component of safe care and services, providing the foundation for partnership working and women's informed decision-making. [158] At the least, consistent regional evidence-informed information must be available for all pregnant women and new parents in accessible formats.

Midwives already work with Sure Starts and community groups across NI, and there are opportunities to strengthen these alliances, for example with perinatal mental health supporters, breastfeeding counsellors and peer supporters, and antenatal educators. This could help to ease the pressures on the system while at the same time improving physical and mental health for women and their babies.

Innovative approaches to combining antenatal education, care, and woman-to-woman support are emerging and should be considered; such an approach was piloted in NI pre-Covid, but not implemented. A large randomised controlled trial of group antenatal care and education is ongoing in England.

See Recommendations 1, 2, 3, 6, 14, 17, 18, 20 and 24.

QMNC Concept 3c: Assessment, screening, and care planning

The concept: Individualised care planning based on ongoing assessment and screening is essential to understand women's circumstances including clinical and psychological factors, their cultural, socio-economic and family context, and their needs, views and preferences for care.

What we found: Limited individualised care planning was described by women and by health professionals; for many women, their assessment, screening, and care planning were shaped in large part by the application of protocols. Care planning as described by women and health professionals alike was dominated by discussion of risks, and risk-based information was not always presented with evidence or with the balancing evidence on benefits of other options. Labour wards were often described as being presented as the default setting for birth, with MLUs - including Alongside MLUs - and home presented as 'alternative' and inherently more risky. There was little indication that the evidence presented in NICE guidance [109] on improved outcomes for women in midwifery-led settings was shared with women. Interdisciplinary working is especially important in individualised assessment and care planning for some women. Although individual good examples of such care were described [159] it was evident that genuine partnership working with women, interdisciplinary discussion and consultation, and effective joint planning were not consistently enabled by the current system.

Health professionals, especially midwives, identified factors that prevented midwives from giving the care they knew would make a difference. These included service pressures, the lack of information and education for women, the closure of locally accessible services, and the use of protocols and pathways to limit effective assessment instead of being used to guide discussion. Importantly, this included ongoing assessment and review of women's individual circumstances, their mental health, and their needs and preferences for care.

Assessment of the fetal heart in labour, either by intermittent auscultation or by electronic fetal monitoring, has been a feature of reports on failures in maternity service provision. [3, 4, 110, 160] This issue was raised in this work, though by a small number of women and staff. There was concern that following current guidance on fetal monitoring could at times be a barrier to providing care and support for women in labour. A recent study suggests that electronic fetal monitoring is a complex sociotechnical activity requiring tasks, people, tools, technology, organisational and external factors all to combine to have an impact on safety. [162, 163] In common with other factors identified in this work, effective fetal assessment in labour is not only a technical task but requires system-level factors to be in place including education and training, team working with good interdisciplinary communication and support, timely escalation, and effective response.

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One topic identified by many respondents was ultrasound scanning in pregnancy. The model of care in NI – different from the rest of the UK - is one in which most scans are conducted by midwives and obstetricians rather than by professional sonographers. [161] This raises questions of education and training, the quality and consistency of scan measurements, and the efficient use of workforce resources. Midwives must complete a Masters-level module on ultrasound scanning including clinical experience before conducting scans. Obstetricians normally learn ultrasound skills through supervised practice as part of their RCOG training. It is not clear how either discipline keeps skills updated. This model has implications for the workload of both midwives and obstetricians. It has not been tested for accuracy or efficiency by evaluation or audit despite a recommendation in a review of sonography in NI that this be implemented. [161] Neonatologists/paediatricians reported seeing some babies born earlier than intended following induction of labour; accurate dating scans are essential for important clinical decision-making, especially in a context where the rates of induction of labour are increasing.

The impact: is to constrain women’s involvement in decision-making about their care and to reduce their options. The clinical, psychological, family, socio-economic, and cultural circumstances of each woman and baby all affect their health and wellbeing, outcomes, and the woman’s experiences. A protocolised approach to decision-making without ensuring individualised assessment and care planning risks missing the issues that matter thereby failing to address problems in a timely manner, and it undermines the validity of informed consent.

QMNC Concept 3c: Assessment, screening, and care planning

What is needed: Development and implementation of knowledge and skills in individualised assessment and planning are needed. Structural and embedded working practices will need to be identified and addressed. Work is needed to identify ways of implementing effective fetal monitoring while also providing essential care and support in labour. An audit of the accuracy and consistency of ultrasound scans is needed, as recommended in the 2017 report on sonography services, [161] and of the impact of conducting scans on the workload of midwives and obstetricians.

See Recommendations 1, 3, 4, 24, 28 and 31.

QMNC Concept 3d: Optimising normal processes, preventing complications

The concept: Practices that support the normal physiological processes of pregnancy, birth, postpartum, and the baby's early life, and prevent complications occurring, are important in promoting health and wellbeing and the abilities of women's and babies' bodies. This includes practices such as mobility in labour, reassurance, support, and building women's confidence in their ability to give birth, access to labour and birth in water, skilled midwifery care during both physiological labour and birth and labour and birth with complexities, delayed cord clamping, skin-to-skin care at birth, breastfeeding, and enabling women's own feelings of control and women's engagement in decision-making. [162, 163]

What we found: There were clear indications from women and professionals alike that opportunities are being missed to do this important work. In part, this results from the limited information giving and discussion with women. It is also a consequence of the limitations on the time and scope of practice of midwives, especially to provide essential preventive, supportive care such as building a relationship with women in pregnancy, reducing anxiety through giving information in a timely way, enabling women's own decision-making through balancing information about risks and benefits of care options, providing one-to-one care in labour and birth, and providing care and support for postnatal recovery, help with breastfeeding, and adaptation to motherhood.

The knowledge and skills of supporting and caring for women in labour and during a spontaneous vaginal birth are core midwifery skills and are critically important to promoting safe, quality care and good outcomes for women and babies. [69] No other professional group learns these skills in depth. This knowledge and experience enable midwives to recognise deviations from normal physiological processes, and to identify and respond to complications in a timely and appropriate way. Many midwifery students, educators, and NQMs reported that it is currently a challenge to gain enough experience in and to consolidate these core skills in a context where the rates of spontaneous vaginal birth are declining.

Both midwives and obstetricians talked about the current challenges of providing and even discussing care that optimises physiological processes. The prevailing risk-focussed environment (Section 5.2.4) together with contentious professional and public debate around the term '*normal birth*' [72] has resulted in some criticism and mistrust of midwives and misunderstanding of this element of midwives' work in recent years. [42] Reports of maternity service failings in England have singled out what has been termed '*an ideology of normal birth*'. [3, 42, 45] There was no indication of this issue in this work, and the data (Section 5.1.3) suggest a different scenario, where NI currently has the lowest rate of spontaneous vaginal birth in the UK and across OECD countries.

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Women described hospital labour wards as restrictive, and some reported that they felt they ‘lost their voice’ and ‘handed over power’ over their own bodies. There is a notable deficit in facilities to support midwifery care in labour wards. Labour rooms tend to have an institutional feel, with the delivery bed positioned centrally and with equipment that might be needed already in the room. Women have limited privacy or agency over who comes in and out of the room. This is contrary to good quality evidence on the importance of the birth environment for women in labour and the effectiveness of a relaxed, supportive environment to optimise physiological processes. Women described limited equipment to enable midwifery care, including few birthing pools for labour and birth in water despite evidence on its safety and effectiveness, [164] and limited availability of birthing aids such as birthing balls, recliner chairs, and telemetry to enable mobility in labour during electronic fetal monitoring.

The impact: Women and babies were not consistently receiving key components of safe, quality midwifery care that optimise normal physiological processes, and this was resulting in opportunities being lost to prevent clinical and psychological complications and to promote health and wellbeing. This is likely to be a key influence on the increasing rates of interventions, on adverse outcomes, and on the high levels of anxiety described by women. [165] This is compounded by the institutional environment in labour wards and the scarcity of facilities to support midwifery care.

QMNC Concept 3d: Optimising normal processes, preventing complications

What is needed: The knowledge and skills in normal physiological processes underpin the ability to recognise deviations from normal physiology in pregnancy, labour and birth, postnatally, and in the early days of life and are essential to safe practice in this area. For safe, quality care for women and babies midwives must have experience in the many ways in which women experience physiological labour and birth. Not enabling midwives to build their knowledge and skills to the best possible standard would be a serious safety concern. This is a critical safety issue, and it is essential that students, NQMs and indeed all midwives are enabled to learn, build, and maintain their knowledge, skills and confidence in a supportive, non-judgemental environment. Facilities and practices to support the midwifery model of care on labour wards are needed. Shifting the environment to be more women-, baby- and family-friendly requires consideration of changes such as storing equipment in a central equipment store to be brought to the room only when needed; using dimmer switches to lower the lighting; enabling women to give permission to people to enter; purchasing inexpensive equipment such as birthing aids and telemetry; and supporting and educating staff. Investing in installation of more birthing pools would enable more women to access labour and birth in water. Such facilities can help all women, including those with complexities and including those having caesarean birth. Maternal assisted caesarean and skin to skin contact at caesarean birth are increasingly being implemented and evaluated internationally. [166, 167]

See Recommendations 1, 2, 3, 11, 14, 16, 20, 22 and 24.

6.2.4 QMNC Concept 4: Do women and babies with complications receive the additional care they need?

The concept: When physical, psychological, or social complications occur, women and newborn infants need a timely response. The person most likely to recognise complications occurring and to be in the key position to communicate concerns, respond or to refer in a timely way is often the midwife. Recognition and timely response are critically important midwifery skills, as is collaboration with other health professionals when paramedic, obstetric, neonatal, anaesthetic, medical, social care and other interdisciplinary skills are needed.

QMNC Concept 4a: Identifying complications and providing first line management

What we found: The workload pressures described by all health professionals, but especially by midwives, are limiting the opportunities for early identification of and response to physical or psycho-social complications, in pregnancy, in labour and at birth, or postpartum. Understaffing is serious safety challenge. Evidence from nursing shows that the quality of such first-line surveillance deteriorates with staffing shortages. [168] Recent evidence from a large cohort study found that understaffing by registered midwives resulted in an 11% increase in harmful incidents. [169] Studies have shown links between midwives' work environment and women's safety. [170]

Interdisciplinary communication, consultation, referral, and transfer need to be seamless and well-practised, but all health professionals and many women described problems related to this. This included inconsistent communication when women called the assessment unit for advice or support with a pregnancy-related concern. The care of women who have chosen care described as '*outside of guidance*', which falls in large part to midwives working in out-of-hospital settings, is of especial concern in this regard, and the recent PHA framework for health professionals working with women who decide to have care options that are outside of guidance is a welcome development. [159] Many midwives were concerned about the limited interdisciplinary support for midwives practising in settings outside of labour ward - including Alongside MLUs - and a lack of whole-team and context-specific training for maternity emergencies (Appendix 12c).

The impact: Constraints on time spent with women and babies are reducing opportunities to listen to women who may be worried, or to intervene in a timely way. This may affect, for example, listening and responding to a woman who is anxious about reduced fetal movements in pregnancy, or who is experiencing strong continuous contractions in the first stage of labour suggesting that the syntocinon dose requires modification, or who has a heavy blood loss on the postnatal ward or at home; women told us about all of these occurring without appropriate responses. The barriers to timely interdisciplinary action are likely to result in missed opportunities for preventing complications or treating them in a timely way.

QMNC Concept 4a: Identifying complications and providing first line management

What is needed: Workload pressures on midwives are reducing their ability to identify and respond to complications, as are barriers to timely interdisciplinary action. These are critical safety concerns and action is needed.

See Recommendations 1, 10, 12, 13, 17, 21, 23 and 25.

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QMNC Concept 4b: Medical, obstetric and neonatal services

What we found: As well as having midwifery care, the majority of women and babies in NI currently receive care from obstetricians in pregnancy, labour and birth. Factors that contribute to the increased involvement of obstetricians may include changes to the determinants of health in the population (Section 5.1.3), including increased maternal age and complications such as diabetes and obesity, and increased rates of poverty and deprivation, as well as changes to guidance suggesting obstetric involvement for an increasing number of criteria. [171]

Although overall rates of admission to neonatal units are falling (Section 5.1.3), neonatologists/paediatricians reported seeing more babies following difficult births, especially caesareans births. Rates of term admissions to neonatal units are rising, especially among babies born at 37-38 weeks. [172]

Increasing rates of induction of labour and caesarean birth

Rates of technical interventions in labour were the focal point of many discussions on whether or not women and babies with complications are getting the care that they need. Concerns about high intervention rates in labour and their sequelae were raised by many women, advocacy groups, midwives, and some obstetricians, GPs, and neonatologists/paediatricians throughout the engagement. These concerns are borne out by the data. 2023 rates (provisional data) of induction of labour (38.3) and of caesarean birth (40.1%) in NI are higher than they have ever been (Section 5.1.3). Just over 50% of caesarean births are elective. It is not known what contribution maternal choice makes to this decision. Notably, the 2023 rate of caesarean birth in Belfast HSC Trust (35.3% 2023) is lower than the other four HSC Trusts (41.2% Western HSC Trust, 41.5% Southern HSC Trust, 44.2% South Eastern HSC Trust, 39.4% Northern HSC Trust).

The rates of both interventions are broadly in line with the rest of the UK. UK-wide rates differ from international trends, however, and are significantly higher than other high income countries (Section 5.1.3). Induction rates in NI (38.3% in 2023) were higher than England (33%), and in the US (33.2%) which in the past has had a more medicalised model of maternity care. The average caesarean birth rate across OECD countries was around 27% in 2021.

It is very likely that rates of caesarean birth will continue to increase in NI. Women having their first baby have higher rates of caesarean birth (41.7%) than those having second or subsequent births (35.9%). Section 5.1.3 shows that the rate of vaginal birth after caesarean birth (VBAC) has significantly decreased in NI since 2016, meaning that when those first-time mothers return in subsequent pregnancies, they will be much more likely to have a repeat caesarean birth; it also indicates that staff experience of VBAC is declining, making it more difficult to reverse this trend.

Induction of labour and caesarean birth are important interventions that can save babies' lives. A key question is, are the current high rates resulting in more babies lives being saved? This is not an easy question to answer. A number of important determinants of health and risk factors in NI and the UK have worsened in recent years, including deprivation, obesity, and maternal age (Section 5.1.3); these could be driving increased need for these interventions, complicating interpretation of stillbirth and mortality data. Convincing evidence of a positive impact on stillbirth, perinatal, and neonatal mortality at a population level is absent, however. International comparisons raise questions; the high rates make the UK an outlier among high-income countries (Section 5.1.3), and many of the OECD countries with lower rates of induction of labour and caesarean birth have mortality rates that are lower than the UK. [41] Direct comparisons are complicated by differing population demographics, deprivation profiles, and immigrant/refugee profiles, by the availability of relevant data, and by different measures between countries. Euro-Peristat works to address the problems of international comparisons by producing comparable health data and promoting sustainable health reporting across Europe and is an important source of information. [173]

High rates of induction of labour: impact on safe, quality care and women's views and experiences

The intervention: Induction of labour is recommended in NICE guidance [109, 171] as an intervention to reduce stillbirth under specific circumstances including suspected fetal macrosomia and pregnancy lasting longer than 41 weeks. This guidance also identifies the potential risks of the intervention including increased risk of caesarean birth and instrumental vaginal birth, hyperstimulation of the uterus, and increased pain. The guidance recommends individualised care and time to discuss benefits and risks with women to inform their decision.

Studies indicate that induction of labour is not without risks, [174] including increased postpartum haemorrhage in women and increased resuscitation and respiratory disorders in babies as well as those identified by NICE described above. Studies also show that women do not experience induction as a benign or consequence-free intervention and suggest that health professionals can find themselves ill-equipped to discuss the relative risks and benefits of induction of labour and its alternatives. Some suggest that induction is now seen as a 'non-decision', perceived as a routine part of maternity care rather than an intervention to make an informed choice about. [175]

Wide variation in rates of induction of labour was found in a survey of UK maternity units, which included units in NI. [176] The median rate was around 34%, but reported rates ranged from around 19% to around 53%. Criteria for induction also varied widely and not all followed national guidance. Delays in induction processes were commonly reported, raising safety concerns. Delays were also reported in an in-depth study of staff in five UK units; this study found a substantive increase in workload for staff. [177]

The intended benefit of increasing rates of induction of labour have not been seen in the rates of stillbirth, perinatal and neonatal death across the UK or in NI (Section 5.1.3).

What we found: The research findings on the impact of high induction rates on women's experiences and staff workload described above were reflected in what we heard from the women, advocacy groups, midwives, midwifery students, and some obstetricians who talked with us. They consistently described the negative impact that the current high rates of induction of labour are having on women's experiences, midwives' time, and bed management. They are contributing to pressure on bed space antenatally and postnatally as women wait, sometimes for days, for their inductions and as more women and babies having emergency caesarean births require more complex postnatal care. Many women described increased anxiety, especially in late pregnancy, resulting from the possibility of being induced and from conversations about the risks of stillbirth from prolonging their pregnancy if they are not being induced. There were indications that NICE guidance is not being consistently implemented, with induction being offered sooner than NICE recommends, and without the informed discussion also recommended by NICE. Some women noted that they were not given statistical evidence about the risk of stillbirth in these conversations despite requesting it, or any balancing information about the risks of the procedure such as increased likelihood of caesarean birth and of postpartum haemorrhage (Section 5.1.3). NI is not alone in this; there are similar findings across the UK. [178]

The rising rates of induction in NI - more than 1:3 of all women experience induction of labour - and what we heard in the engagement suggests that induction may be becoming routine, with potential adverse consequences for women and their babies including increased maternal anxiety, increased use of pharmacological pain relief and reduced mobility in labour as well as contributing to the increased rates of caesarean birth and increased postpartum haemorrhage (Section 5.1.3). [174]

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High rates of caesarean birth: impact on safe, quality care and women's views and experiences

The intervention: Caesarean birth is major abdominal surgery requiring regional or general anaesthesia. When caesarean birth is needed it can be a life-saving, essential intervention. A decision to conduct a caesarean birth requires a trade off, however – balancing the risks of major surgery against the risk to the woman or the baby of not intervening. The balance of risks is not always clear, and sometimes the decision needs to be made quickly. As with any major surgery, it is important to implement it appropriately, [40, 179] ensuring informed decision-making, and care and support for post-surgical recovery including adequate pain relief. In the early days and weeks it is likely to affect pain, reduced mobility, and women's ability to feed and care for their babies, with additional time and support needed for healing and recovery, and with risks of short- and long-term complications including wound infection, breastfeeding problems and respiratory problems for babies. [38, 55] Longer term consequences can include fertility problems, problems in subsequent pregnancies including increased stillbirths, uterine and placental complications including placenta accreta – a growing concern across the UK - and an increased likelihood of repeat sections. [179] There are indications of longer-term impact on babies born by caesarean birth including the development of their gut microbiome and related impact on their immune system, [180] and potential association of caesarean birth with poor mental health, [181] that require further work.

What we found: Postnatal care was raised as a concern in Section 6.2.2, and it was a particular concern for women having caesarean births, whether elective or emergency. Many women described a lack of adequate support to care for their babies and themselves in the first hours and days after this major surgery. They described experiencing pain with inadequate pain relief, limited mobility, and drains and catheters in place, and many reported that they had not been informed about this before the surgery. We heard from some women who had experienced wound infections and ongoing pain, and problems feeding their babies. Many women talked with us about the impact caesarean birth had on their longer-term health and wellbeing including their mental health and the impact on their family.

For women who have had caesarean births and who are limited in their ability to get out of the house in following early days and weeks, visits from a midwife were especially important. Women and midwives commented on the replacement of postnatal visits at home with virtual contact; this practice started in response to Covid-19 but has not been consistently reversed.

Maternal request for caesarean birth has been cited in studies from several countries as a factor in the increasing rates; [182] reasons for women requesting an elective caesarean birth have been found to include fear of vaginal birth and previous traumatic experiences. Data are not available about the extent to which this is a factor in NI. Maternal request for caesarean birth was not raised by women, advocacy groups, or midwives in our engagement. It was mentioned by obstetricians who reported an increasing number of women requesting caesarean section, contributing to the increase in the number of elective caesarean births.

High rates of induction and caesarean birth: impact on staff and the services

The impact: We heard about a substantive impact on the work of obstetricians who are conducting the caesarean births, and on midwives who implement the inductions and who care for women and babies who have had caesarean births and anaesthetic services. Neonatologists/paediatricians described the need to attend more births than previously and related this to increased concern about respiratory complications in babies born following induction and/or a caesarean birth.

Workload problems across the service have been worsened by shifting work patterns resulting from the high rates of induction and caesarean birth, with increased demands on labour ward staffing, which is inevitably prioritised. Women, partners, advocacy groups, midwives, MSWs, and midwifery managers reported serious concerns about the safety and quality of postnatal care. The impact of this on postnatal care services was experienced by many women regardless of their mode of birth. Women who reported traumatic experiences in labour and birth, including perinatal loss, described limited opportunities for support and care postnatally. The opportunity for women to have a discussion and review of their labour and birth with a midwife, and a ‘*de-briefing*’ session if needed, is important for women who wish to learn more and talk about what happened during their labour and birth. [183] This intervention is especially important for women who have had a difficult or traumatic birth, including those who might have found the experience emotionally and psychologically difficult even when the clinical outcomes were good. We heard that there are very limited opportunities for such discussions because of the increased number of women with difficult labour and births, and because of staffing constraints both in the postnatal ward and in the longer term when women may have had time to recover and reflect. Although good bereavement services exist in some HSC Trusts, provision of such services is not consistent or equitable across HSC Trusts.

There are also challenges related to the sustainability of the service at a time of budget constraints. The NHS Payment Scheme shows the cost difference between spontaneous vaginal birth (£2191, or £3564 with epidural and induction) and caesarean birth (£5163 for elective, and £6503 for emergency caesarean birth). [184] These costs do not include the increased need for postnatal care following a caesarean birth, although with many women being transferred home 24 hours after a caesarean birth, much of the burden of care and support will fall on their families. Decisions about mode of birth or other forms of care should never be made on the basis of cost. But a health economic argument can be made for investing in care and services to optimise the rates of intervention needed while maintaining or improving safety (Lynn et al 2024 unpublished Appendix 5c).

The opportunity cost of such interventions is considerable in terms of staff time. The workload pressures resulting from high intervention rates also limit midwives' time to listen to women and to provide the care, reassurance and support that may help women in these difficult circumstances.

QMNC Concept 4b: Medical, obstetric, neonatal services

What is needed: The high, and increasing, rates of induction of labour and caesarean birth raise critical clinical and population health questions that need substantive evaluation and research resource, because these interventions are not without risk. [185] The negative impact of the high rates is extensive, [174] with adverse impact on aspects of safety and quality of care including perinatal and maternal outcomes and experiences, and on staff and services. It is essential to consider the optimum balance between intervening '*too much, too soon, or too little, too late*', to maximise the safety of women and babies. A spectrum of risks and benefits of these interventions confronts women and health professionals when making these decisions, and better knowledge and understanding is needed.

A large-scale interdisciplinary research study is needed to examine the inter-related factors in the important debate about high rates of induction of labour and caesarean birth.

Ongoing evaluation of the clinical benefits, resource implications, maternal experiences and perspectives, and long-term impact is needed to assess the impact of current practice in NI in regard to induction of labour, including the implications for clinical and psychological safety, and the resource impact including opportunity cost in staff time. This will require interdisciplinary and stakeholder discussion and consensus that there is a problem that needs to be addressed. Best evidence and detailed data on the women and babies receiving induction of labour and the reasons for intervention, and on the outcomes and experiences for women and babies in the short- and longer-term including subsequent pregnancies, and the impact on staff and the service, will help to inform this discussion.

Women having caesarean births and other difficult experiences and outcomes in labour and birth have an increased need for postnatal care and support in hospital and at home. Improved access to care and support is needed. Adequate pain relief following caesarean birth is essential, in line with evidence-based guidelines. [186]

Women's decisions including around caesarean birth should be respected and enabled [187] and women should be supported in this process; NICE guidance indicates that women considering requesting a caesarean birth in the absence of clinical indication should be offered balanced information about benefits and risks, discussions about birth options, and help and support with issues such as severe anxiety. [179] The importance of building trusting relationships with health professionals has been identified as an important factor in such discussions. [182] Continuity of midwifery care is especially important for women with perinatal mental health problems including anxiety, [188] and should be available for women who need it.

See Recommendations 1, 7, 8, 11, 17, 18, 20 and 26.

6.2.5 QMNC Concept 5: Does the organisation of care and services ensure safe, quality care for all, with continuity and integrated across settings?

The concept: All women need access to appropriate, acceptable and good quality services with continuity across their maternity journey, and integration across settings. Staff need to be supported by the appropriate organisation of services and by adequate resources to enable safe, quality care. Some elements of this (standards and policies, resources, staffing) will be discussed in Section 6.3.3. Two key components will be examined here: continuity, and integration of care and services across hospital and community, with access to midwifery-led care services for birth in out-of-labour ward settings.

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Continuity

Continuity of care and services across the continuum are an essential component of safe, quality care. Continuity is not dependent on continuity of carer; women and babies should receive continuity of care wherever they are, including consistent information and options for care, and with their individual circumstances and decisions known, recorded, and communicated effectively between staff members. CoMC is a fundamentally important complex intervention. It is founded in extensive high-quality evidence [60] demonstrating a substantive positive impact on clinical and psychosocial outcomes for women and babies and the health system, and on women's experiences. Women having this form of care feel more in control of their own care, and report being in receipt of more information, advice and explanation. There are indications that continuity of carer is especially important and effective for women with social complexities. [189-191]

Continuity of care

What we found: There were some good examples of services where continuity across the continuum of care (Appendix 11d), and the whole maternity journey was an important component including for women with social complexities (Appendix 11c). Many women described services that were fragmented however, with multiple different caregivers across different settings. This inevitably makes communication complicated and risks important information not being communicated between health professionals, and we heard examples of this happening. We also heard from women with previous traumatic experiences about the negative impact of having to recount their experiences repeatedly to different health professionals.

Continuity of carer

What we found: In recognition of the high-quality evidence on the positive effect of CoMC on outcomes for women, babies, and the service, a Continuity of Midwifery Care (CoMC) team has been established in each HSC Trust and all women who are eligible (ie who have all of their care in the same HSC Trust) are now offered this service. Three of the five HSC Trusts are offering the full continuum of care, with the other two currently offering antenatal and postnatal continuity. One HSC Trust, Southern HSC Trust, launched a second team in April 2024. Initial audit is promising, though small numbers and current data systems do not allow for relevant comparison in outcomes (Appendix 11d).

Summary of positive service development (Appendix 11d)

Enabling Continuity of Midwifery Carer to be available for all eligible pregnant women

Recent evidence confirms that CoMC improves outcomes for women and infants. In 2023 NI initiated the CoMC model. This has been implemented in full across antenatal, labour and birth and postnatal care in three of the five HSC Trusts. The remaining two currently provide antenatal and postnatal continuity. There has since been significant uptake by women of continuity of their carer although numbers are still small (508 women to December 2023). Data available to date show increases in continuity of carer and an increase in the rate of physiological birth. It is now clear that the future standardisation of CoMC across NI will require improvements in workforce recruitment and training, electronic data processes, and team building. It is recommended that sustaining progress across Northern Ireland will need increased administrative support, recruitment, and training in project management. Impact monitoring will also be required.

The policy decision to implement CoMC across NI was welcomed by women and by many staff, especially midwives, but many staff expressed reservations about its implementation in practice. Continuity of carer is a complex intervention requiring whole-system implementation. [192, 193] It is not surprising that implementation is slow, and although some additional resource has been allocated such an extensive change needs support at every level of the system. [194, 195] There is a risk that patchy implementation without whole-system support could have a harmful impact on service quality and on the health and wellbeing of the midwives working to implement it. Some staff were concerned about experienced midwives joining continuity teams and being moved away from labour ward. Until enough continuity teams are in place, labour ward is unlikely to see the benefit of continuity midwives caring for women in labour.

The impact: The important potential improvement to outcomes and experiences and to the service – including reductions in mortality, morbidity, inequalities, and cost savings, and increase in women’s satisfaction – are not yet being realised, and without an increase in pace and scale of resource and whole-system support it will take considerable time before that impact is seen across the population.

Access to safe, quality midwifery-led care and services for birth in out-of-labour ward settings, with integration across hospital and community settings

The integration of services affects every level of the system, and a system-wide response is needed. [196] This will be discussed further in Section 6.3.

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The accessibility, safety and quality of care in midwifery units is a critical question for this report.

What we found: There were examples of good quality services including the Home Birth Team in Southern HSC Trust (Appendix 11e) and some Alongside MLUs (Appendix 11h), but these were not consistently available. Support from senior experienced midwives and strong interdisciplinary working practices are critically important in supporting women and midwives in decision-making especially for care outside of guidance and outside of labour ward, and the input of the consultant midwives was valued by many respondents in this regard. A recent PHA publication offers important guidance on the care of women requesting care ‘*outside of guidance*’ and has been well received. [159]

Access to midwifery-led care and services: All Freestanding MLUs in NI are currently closed. Reflecting a similar trend across the UK, [126] the numbers of women cared for in these settings had declined in at least one unit prior to closure, partly as a result of Covid-19 and of the withdrawal of the GAIN guidance for MLUs. [197] The number of women using Alongside MLUs has also been declining (Section 5.1.3).

Not all HSC Trusts currently have Alongside MLUs. Section 5.1.1 shows the response from the five HSC Trusts to a request for information about access to Alongside MLUs in April 2024.

Numbers of home births are small but increasing (from 33 in 2017 to 91 in 2022), with the lowest numbers in Belfast and Western HSC Trusts. One HSC Trust (Southern HSC Trust) has established a Home Birth Team which is highly valued by women, partners, and staff (Appendix 11e). In other HSC Trusts, community midwives provide this service; we heard that some community midwives are concerned about being unsupported by colleagues when they attend home births.

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Summary of positive service development (Appendix 11e)

Establishing a Birth at Home team to support women in their choice of birthplace with compassionate, evidence-based, safe care

Following increases in requests for home births the Southern HSC Trust set up a Birth at Home team. This team collaborates with and is supported by the community midwifery team. Other staff have become more supportive of home births since the Birth at Home team has been established, and women who had chosen to freebirth are now choosing care with the Birth at Home team. Women with additional care needs report increased satisfaction when supported by the Birth at Home midwives at obstetric appointments. Both women and midwives now report experiencing joy from positive relationships throughout the home birth journey. Lessons learned include that improving outcomes requires shared decision making and positive communications, and that a Birth at Home midwife requires a specialised skill set. It is recommended that dedicated Birth at Home teams are established in each HSC Trust, and that work is needed to coordinate Birth and Home Teams with Continuity of Midwifery Care teams.

We heard widespread concern among women and midwives about the lack of options for midwifery-led care including safe, quality out-of-labour ward care (Section 5.2.2). In part this was related to concern about equity and access to services close to home and avoiding long journeys at a vulnerable time. In part, it reflected some women's concerns about and experience of the current hospital environment, where they felt that staffing problems were affecting safety, they had experienced a lack of individualised care, their requests for care options were not met, and they felt disempowered and at times disrespected. It was clear throughout the engagement that the labour ward environment was experienced by many women and staff as risk-, task-, and intervention focused, and that the option of midwifery-led care in the labour ward setting was limited.

There is extensive research evidence that many women value care outside of hospital labour wards for reasons including access, safety, and quality of care. [198, 199] Importantly, for many women care in labour and birth is seen by them as part of their maternity journey and is not a stand-alone decision but is integrated with their experiences of care in pregnancy and following birth. care. [200, 201] Women with substantive physical complications are likely to benefit from care in a hospital labour ward, but some women with psychological, social, and cultural additional care needs may benefit from the environment in a midwifery unit or at home. Problems of access to and support for out-of-labour ward care have, however, been reported both in NI and the rest of the UK. [199, 202, 203]

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We heard from women who had decided to freebirth – to labour and birth at home without professional assistance. Their motivation was grounded in their concerns about access to the forms of care they felt were important. This included avoiding the circumstances of previous traumatic births, avoiding unnecessary intervention, and having control over their birth environment; they described having been told by midwives that evidence-based supportive practices such as use of water in labour and birth, delayed cord clamping, and skin-to-skin care at birth [204, 205] may not be consistently available in labour wards. The lack of Freestanding MLUs and accessible home birth services amplified the problem. This aligns with UK-wide research with women who decided to freebirth. [206] It is critically important that this issue is addressed and appropriate care both in the community and in hospital is accessible to women. There are reports of women experiencing serious complications when freebirthing; in one recent case in Ireland a woman died as a result of postpartum haemorrhage in these circumstances. [207]

Integration across hospital and community settings is limited. Some midwives attending home births, and those with experience of both Freestanding and Alongside MLUs, described very limited interdisciplinary collaboration for their work in those settings, for example in regard to antenatal consultation and discussion for women with complexities, and in preparation for emergencies. Midwifery-led services need senior experienced midwifery input and oversight with ready availability for consultation and discussion, but it was not clear that such input was consistently available for MLUs. There was little interaction between midwives and GPs, and reports of confusion about accountability for the care of women and babies following transfer home. Midwives told us that ambulance services seemed not to give appropriate priority to maternity emergencies. We heard from ambulance staff that they do not receive regular updating on maternity emergencies. Importantly, they reported that there are inconsistent practices and equipment across HSC Trusts and limited communication, liaison and discussion with the maternity services.

Many, though not all, midwives reported that they wanted safe, quality care in labour and birth to be available for women, babies and families in out-of-hospital settings. They were concerned, however, about staffing levels in Alongside MLUs and about the isolation of midwives attending home births, and about the increasing number of women requesting care ‘*outside of guidance*’ and outside of labour ward, where midwives are the primary – indeed almost always the only – carer.

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Although there were individual examples of good interdisciplinary support, many midwives described feeling unsupported by the wider system when attending women in labour outside of labour ward, and being expected to provide care unsupported by the interdisciplinary team even in circumstances when women's needs were complex. This was reflected in comments by obstetricians and neonatologists/paediatricians, whose comments suggested they were mainly opposed to women exercising a choice to plan birth outside of a hospital labour ward especially when clinical factors meant that women's decisions were '*outside of guidance*'. Most were supportive of Alongside MLUs; some expressed serious reservations about out-of-hospital births, while others were supportive. There was little indication of – or appetite for – consistent, structured engagement of the interdisciplinary team in supporting community midwifery units or home births. This resulted in midwives working in these circumstances not being appropriately supported. There was virtually no discussion about addressing these concerns by increasing options for women who request care outside of guidance or decline aspects of recommended care. Such options could include improving access to Alongside MLUs and strengthening midwifery care on labour wards.

Women and midwives described barriers to access to Alongside MLUs including access to information and practical problems of confirming eligibility when women phone or arrive at the hospital in early labour; women described being routinely directed to labour ward. Midwives described an apparent lack of support from colleagues for Alongside MLUs, and the problems of ensuring sufficient staff as a result of midwifery unit staff being called to help in labour ward. Home births continue although service provision for women requesting a home birth and support for midwives caring for these women varies across the HSC Trusts. Some community midwives described feeling unprepared and anxious about attending home births.

Many midwives identified a gap in resources to support women in decision-making about place of birth and especially about informing women about the option of care in midwifery units. Resources for women that accompanied the withdrawn GAIN guidance were also withdrawn at the same time, and have not been replaced with appropriate, accessible information.

Place of birth: safety considerations. The evidence

The question of safety of different birth settings is fundamental. Research evidence relevant to high-income countries with health systems comparable to that of NI was examined in a rapid efficient evidence review [131] led by Dr Rachel Rowe (Appendix 5d). The findings of this review align with NICE guidance. [109] It found that for women having their first or subsequent baby who are at low risk of complications, giving birth is generally very safe for both the woman and the baby in all settings. For these women, benefits of planning birth in settings outside an Obstetric Unit included reduction in serious maternal morbidity, fewer interventions including episiotomy and caesarean birth, and higher rates of spontaneous vaginal birth. For first babies of women at low risk of complications, planning birth at home is associated with a small increase in the risk of an adverse outcome for the baby compared with planning birth in an Obstetric Unit. [109] The outcomes have been shown to be no different for second and subsequent babies. Adverse maternal outcomes have been shown to be less common or no different in births planned in settings outside of an Obstetric Unit.

A critically important factor for safe quality care in out-of-labour ward settings is that settings outside of labour wards must be well integrated into the maternity and neonatal system and adequately resourced, and with efficient emergency transport. [109] Transfers in labour from midwifery units are not an indication of failure, but an important component of a safe service. Evidence shows that around 36% of pregnant women who are giving birth for the first time in a Freestanding MLUs will be transferred to an Obstetric Unit, and around 40% from an Alongside MLU. [109] Not all of these are emergencies but all are important; ambulance services must be prepared and available for timely transfer in labour.

NICE guidance [109] states that women '*at low risk of complications*' should be supported to plan labour and birth in any birth setting; home, Freestanding or Alongside MLU, or Obstetric Unit. A detailed list of criteria is given to help in the identification of women at '*low risk*'. These cannot function as a fixed cut-off, however. It is important to have consistency of practice, but it is also important to discuss with women the specific context of each midwifery unit or the location of a home birth, and to assess each woman's individual circumstances and to identify deviations from normal physiology on an ongoing basis. Complications can change, develop, and sometimes resolve over time, and ongoing individual assessment is essential for all women. There are good examples to learn from (Appendices 11h, 12a, 12b).

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Summary of positive service development (Appendix 11h)

Respectful evidence based skilled personalised care in an Alongside Midwifery Led Unit.

The Home from Home (HFH) Alongside MLU in South Eastern HSC Trust supports and respects women's informed decision making and provides choice in place of birth. The unit provides respectful, evidence based, skilled care to women during physiological labour, birth and the transition to parenthood. Consequently, the unit has had the highest birth rate in an alongside MLU in Ireland and the greatest number of water births with over 5500 water births since opening in 2007. HFH also provides personalised care for women with complex pregnancies who choose to birth in the unit. The consultant midwife who with multidisciplinary consultant collaboration co produce individualised birth plans with women detailing their evidence informed birth choices. The midwives working in HFH role model and mentor their midwifery colleagues hospital and community based, students, medical students and ambulance staff along with colleagues from the Republic of Ireland and throughout Europe who opt to come to the unit to gain experience in normal physiological labour and birth including the use of water. The staff recognize the value of shared learning and working with all partners who provide maternity care to strengthen the service and improve the outcomes and safety for women and families.

Three issues related to planned place of birth are of particular concern for this report: the care of women with high BMI including their experiences, large-for gestational age babies, and shoulder dystocia (Heazell et al 2024, Gale et al 2024, McNeill et al 2024 all unpublished Appendix 5e).

Care of women with high BMI in out-of-hospital settings: Recent NICE guidance 235 [109] advises that the higher women's BMI at booking, and particularly with a BMI above 35 kg/m², the greater the likelihood of complications. This figure has changed since the NICE guidance in place at the time of the baby death that initiated this report. At that time, NICE CG190 [108] used the figure of 30kg/m², while the GAIN guidance in place in NI, now withdrawn, used the figure of 35kg/m², the same as current NICE guidance. This reflects challenges in the evidence base and reinforces the importance of individual assessment for every woman. Potential complications should be discussed with women when planning their place of birth. Individual assessment should include consideration of booking BMI, weight gain in pregnancy including a check in the third trimester, and individual physique and body composition.

In regard to the experiences of women with high BMI in the maternity services, one systematic review of good quality was identified, [208] which focused on the experiences of women with obesity in pregnancy (BMI of $\geq 30\text{kg/m}^2$) and their engagement with health care professionals. This review identified four key concepts which underlined the importance of respectful, individualised care:

- Women were not satisfied with communication around weight status.
- They felt they had missed out or were denied access to normal aspects of care.
- Discussions with health professionals in pregnancy focused on an over emphasis of risk.
- Women felt stigmatised or penalised due to their obesity, which prevented an inclusive experience of pregnancy and maternity care.

Babies who are large for gestational age (LGA) are at increased risk from shoulder dystocia. Around half of the cases of shoulder dystocia are in babies under 4kg, but the risk of permanently damaging the nerves in the arm (brachial plexus injury) is more common in babies over 4kg. [209] Multiple factors affect the occurrence of LGA babies; for example obesity is associated with diabetes, and diabetes is associated with babies who are large for gestational age. There are increased risks for mothers of babies who are large for gestational age, of caesarean birth, postpartum haemorrhage, and anal-sphincter injury.

There are no predictive tests for babies at risk of shoulder dystocia. RCOG guidance recommends caesarean birth if the expected fetal weight at term is 5kg. [123] Studies have found that when induction of labour was planned between 37+0 and 38+6 weeks based on a baby being large for gestational age there were no differences in rates of caesarean birth or instrumental vaginal birth compared to spontaneous onset of labour; shoulder dystocia and neonatal fractures were reduced by 40% and 80% respectively, noting that the number of babies experiencing these complications was small. [210] Risk assessment will differ for women with a baby who is LGA and who have diabetes. [123]

Shoulder dystocia: Shoulder dystocia occurs when the baby's head has been born but one of the shoulders becomes stuck behind the mother's pubic bone, delaying the birth of the baby's body. NI data on shoulder dystocia are reported in Section 5.1.3; it has occurred in around 230 births (1%) annually between 2013-2022, with 27 stillbirths or neonatal deaths; 24 in hospital and three in out-of-hospital settings.

Shoulder dystocia is a serious, time-critical emergency that can result in injury to the mother and baby. For the mother, this includes postpartum haemorrhage and severe tears to the perineum. For the baby, this includes permanent damage to the nerves in the arm (brachial plexus injury) and the possibility of hypoxia, cerebral palsy, and death if birth is not rapidly achieved. Factors that increase the likelihood of shoulder dystocia include raised BMI, having a baby who is large for gestational age, and maternal diabetes. But it cannot always be predicted; it occurs in the absence of risk factors, and many women with such risk factors will not experience this complication. Management algorithms for shoulder dystocia have been developed and these are associated with improved outcomes for the mother and baby. [123] Birth in water is likely to be comparatively safe in women who are considered to be low-risk and may help in the avoidance of shoulder dystocia. [204, 211]

All maternity staff need to be prepared to respond quickly and appropriately to shoulder dystocia in all settings.

Staff, experience, education and policies in Freestanding Midwifery Led Units:

Research evidence on the numbers of staff, experience, education, training and policies required for Freestanding MLUs, and indeed Alongside MLUs and home births, is limited. Standards have been established by a number of organisations, including the international Midwifery Unit Network and the British Association for Perinatal Medicine (BAPM). [212-214] In addition, four examples of established community midwifery units are described in Appendix 12, from Scotland, England, Wales, and Spain. Each example describes aspects of their practice and policies and ways in which they are integrated into and supported by the wider maternity system. These include senior midwives on call 24/7, identified link consultant obstetricians and paediatricians, context-specific interdisciplinary training for emergencies, virtual links to community midwifery units for senior midwife and consultant engagement for consultation and emergencies, students and less experienced midwives gaining experience in community practice, and daily interdisciplinary review of activity across all areas of the maternity services, hospital and community. Importantly, the example by Cooper et al (Appendix 12a) describes the regional use of a validated Maternity Unit Self-Assessment tool (MUSA) that helps units to assess and to standardise policy and practice and to identify areas for improvement. This tool is available at www.musaframework.org/musa-framework and can be used to plan and assess care in midwifery units.

Summary of positive service development (Appendix 12a)

Implementing the Midwifery Unit Self-Assessment framework to reduce operational variability and practice between Midwifery Units (MUs) in Northeast and Yorkshire regions, England

The Midwifery Unit Self-Assessment framework is a guide to checking the organisation and performance of a Midwifery Unit against international standards (<https://www.musaframework.org/musa-framework>). A multidisciplinary project team implemented the framework across all the midwifery units in the Northeast and Yorkshire region in 2023. This enabled the midwifery units to benchmark the quality of their services against international standards, plan and act on improvements where needed, and teach and discuss best practice principles. A regional community of practice has been created. A key lesson learned was that stakeholder engagement is crucial in embedding a sustainable quality improvement system. In future the Midwifery Unit Self-Assessment framework could be used annually to ensure a cycle of continuous quality improvement.

Education and training for emergencies in out-of-labour ward settings: this is a critical issue. Currently PROMPT [215] training is mandatory for all midwives and obstetricians in NI annually or bi-annually depending on local HSC Trust arrangements. The workforce pressures on midwives mean that meeting all mandatory requirements (145 hours per year plus each HSC Trust's individual requirements) is not feasible, however. PROMPT training does not take place in context-relevant settings, so interdisciplinary colleagues may not have the understanding or experience that midwives have of working without access to all the equipment and backup available in hospital. Neither does this training routinely include ambulance staff, who are essential in ensuring safe, timely response to emergencies, and it is important for the whole team to train together. Including neonatologists/paediatricians in this training would help them to understand the constraints midwives may be working under and to offer suggestions for improving practice and equipment. There are examples from other jurisdictions of excellent interdisciplinary education and training for out-of-hospital emergencies to draw on (Appendix 12c). See Section 6.3.8 for further information on education and training for emergencies.

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Summary of positive service development (Appendix 12c)

Increasing skills and confidence in the management of obstetric emergencies in the community or midwife-led settings, in Powys, Wales

In the rural county of Powys women can choose to give birth at home or in one of the six midwife-led Freestanding Maternity Units. Powys has no obstetric unit, but commissions nearby obstetric care. To ensure midwives and paramedics increase their skills and confidence in the management of obstetric emergencies, the Powys Teaching and Health Board have been running skills and drills training since 2003, the Appropriate Skills for Appropriate Places (ASAP) course since 2007, and the Community PROMPT Wales course since 2019. This education and training take place in home and community unit settings and is based on real life scenarios. The result has been a significant increase in confidence of staff in the management of emergencies in the community, and the PROMPT Wales course now is used throughout Wales. Education and training for emergencies in the community should take place in community settings, involve midwives and paramedics together, and be based on real life scenarios.

The impact: There is a missed opportunity to strengthen options for women to ensure safe, quality midwifery-led care for women and safe working conditions for midwives, especially those providing care for women 'outside of guidance'. There are good examples to learn from and to build on (Appendices 11h, 12a, 12b, 12c).

QMNC Concept 5: Does the organisation of care and services ensure safe, quality care for all, that is integrated across settings?

What is needed: Continuity: Consistent care for women and babies with improved communication and processes of referral and consultation between disciplines and across hospital and community settings, is needed. Whole-system support including increased resource for CoMC would support midwives providing this service, tackle some of the barriers and increase the pace of implementation. [193] Ongoing evaluation of the continuity of midwifery programme is needed, including outcomes and experiences for women, and experiences of staff, and cost-effectiveness. Consideration should be given to increasing access to continuity of carer for women with social complexities. [123, 159]

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What is needed: Integration: Interdisciplinary and cross-sectoral working is essential in the provision of safe, quality midwifery care for all women and babies. It is clear from UK and international standards and examples of positive services that essential pre-requisites for safe, quality care in midwifery units and home birth are that these settings must be fully supported by and integrated into the wider maternity system. No part of the maternity service should stand alone. The examples of positive services point the way towards what is needed to provide safe, quality care in out-of-hospital settings, and to addressing the questions posed by the Coroner following the case that precipitated this report. Whole system issues are further addressed in Section 6.3. Interaction with the ambulance services was a factor in the Coroner’s case that initiated this report, and this critically important component of care requires urgent attention.

Interdisciplinary working including education and training for emergencies is needed to ensure safe, quality care for all women and babies in settings outside of labour ward in line with NICE guidance (NG235). [109] Importantly, services should ensure the support and care of women who have some elements of complexity and who may fall ‘*outside of guidance*’ but would still like to opt for care in an MLU or at home and should appropriately support the midwives who care for them. Making safe, quality care available in the community is an important step in supporting women who might otherwise decide to freebirth.

Options for safe, quality community midwifery units need to be explored. Barriers to safe, quality midwifery-led care in Alongside MLUs need to be tackled, and these units should be developed and strengthened to enhance women’s options for safe, quality care. Training and support for community midwives attending home births is needed. The Home from Home team in South Eastern HSC Trust and the Birth at Home team in Southern HSC Trust offer models for Alongside Unit and home birth services (Appendices 11e and 11h), the Grampian community midwifery units offers a model for sustainable community unit provision (Appendix 12b), and the Powys education and training programme for community units demonstrates safe, quality care in community settings (Appendix 12c).

All women requesting out-of-hospital care should be aware of the evidence on both the risks and benefits of this option.

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Midwifery-led care in the context of a hospital maternity unit should be an option for women with additional needs. Evidence-based practices and resources such as labour and birth in water, one to one midwifery care in labour, and practices that should be universal such as uninterrupted skin to skin care at birth and delayed cord clamping, are offered in labour wards, but we heard that these are not implemented consistently and facilities for labour and birth in water are limited. Options for strengthening midwifery-led care in the labour ward should be implemented to ensure all women have appropriate options for care (Section 6.2.3, Blue Box 6).

Addressing the growing challenge of freebirthing requires a plan to provide safe, quality, and kind and compassionate care for all women, both in and outside of labour ward, especially for those with previous difficult experiences in hospital.

What is needed: Shoulder dystocia in all settings: All birth attendants should know how to diagnose shoulder dystocia and the techniques required to facilitate birth, and they should all take part in context-specific shoulder dystocia training at least annually. There are lessons to learn from experience in other jurisdictions (Appendix 12b and 12c), and the high-fidelity simulation suite at QUB (Section 5.1.2) can be used to support this. Shoulder dystocia should be managed systematically; this should include calling for additional help immediately after shoulder dystocia is recognised, with the problem clearly communicated. Management algorithms for shoulder dystocia have been developed and these are associated with improved outcomes for the mother and baby.

All staff should be alert to the possibility of postpartum haemorrhage and severe perineal tears in the mother, and all babies born following shoulder dystocia should be examined by a neonatal clinician looking for brachial plexus injury and other neonatal problems.

Midwives will need workload pressure to be eased before they are in a position to complete their mandatory updating. Ensuring appropriate education and training for emergencies is discussed in Section 6.3.8.

See Recommendations 1, 2, 3, 5, 7, 10, 11, 14, 19, 25 and 28.

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6.2.6 QMNC Concept 6: Is there a shared culture, and shared values and philosophy that strengthens women's own capabilities?

The concept: While perhaps less tangible and measurable than other aspects of care and services, culture, philosophy, and values have a substantive impact on the provision of safe, quality care. [3, 4, 142, 216] Underlying these are implicit assumptions about care and services. These may not often be clearly articulated, and they may not be shared at all levels of the system, across professional groups, with managers, or even between individual colleagues.

What we found: Our analysis of the positive examples of service provision found that a shared focus, values, philosophy and vision were fundamental to their development and sustaining safe, quality care and services (Section 5.3 and Appendices 11 and 12).

We heard multiple examples of how assumptions shape day to day life and decision-making in maternity care in NI. These assumptions were not shared by all, and it was evident that different values and philosophy resulted in different assumptions and divergent views about safe, quality care. Examples included:

- Hospital as the normative place to give birth, with out-of-hospital settings as separate and 'alternative'.
- 'Evidence-based care' referring to the use of technical interventions but not to relationship-based care or to communication with women.
- 'Safety' being measured primarily in short-term clinical outcomes.
- Women and babies being seen as separate, rather than a biological unit.

Some assumptions are accorded more weight than others and have a direct impact on how services are provided and how the system is governed. It is essential to understand how these manifest and why they matter if their impact is to be understood and positive change is to be possible. For example, some midwives participating in our engagement indicated that the assumption of out-of-hospital settings as 'alternative' has resulted in a lack of structured interdisciplinary support for midwives working in these settings and a view that women who choose these settings are misguided. Perceiving women and babies as separate rather than a biological unit may have contributed to neonatologists/ paediatricians not being routinely included in decision-making in maternity services, or the role of midwives in the care of babies not being widely understood or valued. An important aspect of developing a shared culture is identifying and understanding the assumptions shaping decisions about care, the attitudes and behaviour of health professionals and managers, and relationships between women and staff, and between different health professionals. Whose voice matters most?

Different staff groups have different responsibilities and perspectives, and they all matter. But creating balance and understanding between different cultures, and the respect and understanding of different values and philosophies, is essential for a well-functioning service. [216] A shared culture is needed to provide seamless care and to avoid tension and interprofessional and interpersonal difficulties, and this must be founded in shared values and philosophy. [217]

An essential foundation for shared values is the recognition that childbearing women and babies have human rights and these must be respected. [218] Focusing on preventing maternal and newborn morbidity and mortality is essential but not enough. Care during this period needs to include the rights to respect, dignity, confidentiality, information and informed consent, the right to the highest attainable standard of health, and freedom from discrimination and from all forms of ill-treatment. A woman's autonomy should be recognized and respected, as should her emotional wellbeing, decisions and preferences, including the right to have a companion of choice during labour and childbirth. Respect and recognition of the woman can benefit the baby, who also has rights and requires respect and recognition. The woman, her partner and family should be supported to care for and make the best decisions for their baby.

Informed by evidence and by a human rights perspective, essential aspects of shared values and philosophy include:

Respectful care is the foundation of quality care. [219]

What we found: Women did describe examples of respectful care and many health professionals were striving to provide it. There were examples of women being treated with discourtesy and with abrupt, dismissive language however, including women who reported traumatic experiences including perinatal loss, and women's views and preferences were not consistently respected (Section 5.2.2). The limited structures and processes in place for women's views to influence the planning, delivery and monitoring of services (Section 6.2.1) contributed to this.

The need for respectful interaction between colleagues was an issue raised by many. For a service to be safe, staff must feel able to speak up, to be heard, and to have their voices and concerns listened to, respected, and acted upon appropriately. [220-222] While some staff described strongly positive relationships, there were examples of dismissive and discourteous interaction. Some staff, predominantly midwives, felt disrespected and that their voices were not heard, with their concerns being ignored. They described being disempowered, that they did not feel safe, that at times their concerns were ignored, and that women's and babies' safety was compromised. Some used the term bullying, including when escalating concerns.

These examples resonated with those described in previous reports [3, 4, 48, 49] and in a recent House of Lords debate about bullying in midwifery. [223]

The impact: An environment that is not safe for staff to speak up is unsafe for women and babies. While some managers and staff described were working to promote such an environment, some staff described being anxious and afraid. This was especially important when escalating and raising concerns, which was at times treated inappropriately and without an adequate response; some described adverse consequences for the safety of women and babies. Psychological safety is defined as ‘a belief that one will not be punished or humiliated for speaking up with ideas, questions, concerns or mistakes’ [224] and this resonated with the accounts of difficult conversations that we heard from some staff, especially midwives. This is a critical safety concern.

Some staff described a lack of consistent support for staff following adverse incidents, and staff involved in investigations reported a lack of support from managers. There is an impact on staff wellbeing and mental health, and on their decisions to stay or leave their job.

Community knowledge and understanding is essential for the provision of appropriate services and particularly for addressing inequalities. [225] There were good examples of the services being connected to local community need and resources including services for the East Timor community (Appendix 11a) and for women with social complexities (Appendix 11c).

Much of what we heard, however, suggests that on the whole, there is a disconnect between the maternity services and community needs and resources and the voices of local community groups and people. The reduction in services available to women outside of the hospital setting has resulted in more women having to travel large distances away from their own communities for care. In addition they have less contact than in the past with their GP during their maternity care, and there are substantive constraints on community midwives’ time.

The impact: This has all had an impact on women’s own knowledge of community services and support and their ability to access local services. Women having caesarean births, the majority of whom are having their first baby, described difficulty getting out of the house in the early days and weeks following birth and as a result they have limited access to social interaction and to local services such as postnatal clinics, breastfeeding support and perinatal mental health services. This has resulted in social isolation at a time when they most need peer support and contact with their community. This situation seemed to be unrecognised by the health services.

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Tailoring care to women’s circumstances, views, and needs: the clinical, economic, family, cultural, and psychological circumstances of each woman and baby have an impact on their health and wellbeing, outcomes, and the woman’s experiences. Limited individualised care was described by women and by health professionals, resulting from service pressures, the limited information and education available, the closure of locally accessible services, and from the inflexible application of protocols and pathways reducing opportunities for women to make informed decisions. This was discussed in Section 6.2.3.

Strengthening women’s own capabilities, optimising normal processes, using interventions only when indicated: most childbearing women are not ill, and even if they have some degree of physical or social complexity the care they receive needs to support and enable them to be as well and healthy as possible, and to strengthen their own capabilities. As discussed in Section 6.2.3, women and midwives talked about the limitations of the current system on women’s ability to make decisions and to develop knowledge and confidence in their own bodies and their own abilities.

Reducing risk is an important component of safe, quality care. Health services in general have become more risk-focussed, [112, 226] and this is perhaps even more evident in the maternity services. But ‘risk’ is a multifaceted concept involving physical and psychological factors, and assessing risk requires consideration of multiple factors. Assessment of risk needs to be informed by evidence, and assessment of risk can vary between health professionals. [227] Reports on failures in maternity care in the UK [3, 4, 45] and the subsequent media reports have focused attention on labour and birth and on clinical risk and clinical interventions as the key to safety. Perhaps as a consequence, there is less focus on prevention and health promotion, on equity and managing inequalities, [228] on safety and quality across the continuum of care, on psychological, social and cultural safety for women and for staff, and on assessing the balance between risk and benefit for individual women. A strong focus on reducing clinical risk without balancing this with strengths and with potential benefits can skew services and paradoxically, take resources away from the prevention of complications.

There were examples of good practice in this regard, illustrated in the Home Birth Team (Appendix 11e), the Home from Home Alongside MLU (Appendix 11h), care of women choosing care ‘outside of guidance’ (Appendix 11f), and in the gestational diabetes pathway (Appendix 11b).

Summary of positive service development (Appendix 11b)

Establishing a multidisciplinary clinic to improve care of women with gestational diabetes

A weekly multidisciplinary clinic was established in the Western HSC Trust to enable teamwork in the development of individualised pathways for pregnant women experiencing gestational diabetes. The impact has been time and cost savings through reductions in waiting times and the number of hospital visits needed. Intrapartum blood glucose monitoring has been reduced to two hourly, and the experience for women and care providers has been enhanced. The lessons learned from this positive development include that the involvement of pregnant women in their own multidisciplinary management of gestational diabetes is essential, and that continuous collection and use of data, combined with evidence informed changes to care provision, is critical. The recommendation is that this multidisciplinary gestational diabetes clinics should be further developed, and others established.

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What we found: The concept of risk was raised by many women and health professionals in our engagement. Some women reported very helpful conversations about practices and interventions with midwives and obstetricians, and being enabled to make informed decisions. Many women commented that conversations about risk were often unsupported by evidence, or by balancing information about benefits of options (Section 5.2.2). [38, 229] Some women reported that they felt ‘coerced’ and had no option but to comply. Many women commented that conversations about risk were selective; for example risks of out-of-hospital birth were discussed in detail, but not the benefits of this, or any risks of hospital labour and birth. Women should be aware of the balance of benefits and risks, but the limited time for antenatal education and discussion precluded this for many (Section 6.2.3).

The impact: The accounts of women, advocacy groups, midwives, and interdisciplinary colleagues all described a service in which the model of care has become risk-, task- and intervention-focussed, rather than understanding and strengthening women’s own capabilities, and being focussed on meeting the needs and preferences of individual women and babies. Many women, midwives, and obstetricians described an endemic ‘culture of fear’ in the maternity services, where risk management – in part influenced by current professional guidance and media reports of service failures - has become the over-riding concern at all levels of the system. Once the ‘vicious cycle of suspicion and fear’ [226] has become a strong influence in health care it is difficult to shift; it affects staff, managers, women and their families, political leaders, policy makers, the media and the public alike, and can create a defensive organisational culture at every level of the system.

Fear, anxiety, and stress all have an adverse effect on women's physiology and their psychological wellbeing, especially in labour. [230] A key role of midwives is to support and reassure women, and to build confidence in women's own abilities. The current culture and the constraints on midwives' time act against that, however. Many midwives told us that they find this culture hard to accept, and are working to implement a woman-focussed, positive culture. It is difficult to work against the prevailing culture, and we heard about culture clashes, silo working, and increased stress as a result.

QMNC Concept 6: Is there a shared culture, and shared values and philosophy that strengthens women's own capabilities?

What is needed: Respectful care is the foundation of safe, quality care. All those working in maternity care must be educated, trained and supported to provide this care for women, babies and partners. It is also important to treat colleagues with respect and to tackle bullying and problems of escalation. Surveys and other ways of listening to the views of women, partners, and staff are essential.

Maternity services must enable opportunities for open discussion about the current pressures on practice and decision-making, the impact of current practice on women, babies, staff, and the service, and how best to jointly tackle the culture of fear and risk and to develop a more positive, women-focussed, physiology-informed culture. This will need shared leadership [231] (Section 6.3.6), valuing and strengthening midwifery knowledge and skills (Sections 6.2.7 and 6.3.5), capacity building, support, the involvement of advocacy groups to bring women's voice to the discussion, and education and training to examine relevant evidence and to identify ways of developing a safer, more positive, shared culture. [216, 226, 227, 232]

See Recommendations 1, 3, 5, 11, 20, 24, 27 and 28.

6.2.7 QMNC Concept 7: Are staff supported and enabled to provide the full range of their knowledge and skills?

The concept: for safe, quality care all staff must be enabled and supported to provide the full range of their knowledge and skills. [233]

What we found: What we heard in the engagement from virtually all participants, and what is apparent from the data (Section 5.1.2), is that a combination of workforce shortages and staff stress have been increasing over the past 10 or more years with a negative impact on safety and the quality of care and on the health and wellbeing of staff. Despite efforts to address the shortages, workload pressures for all staff remain intense.

Factors affecting this include:

- Safe, quality maternity care requires effective interaction with multiple other services but budget cuts to the whole health system are affecting all parts of the service.
- The acute stress of Covid-19 had a profound impact on women, babies and families and on staff, and the impact is still rippling through the system.
- There is a mismatch between current maternity service provision and staffing levels; the increasing complexity and increased intervention levels require more, and more focussed, obstetric, neonatal/paediatric, and midwifery input.
- While some colleagues and managers were sympathetic and supportive, many staff described a lack of support especially when workload was particularly intense and following adverse incidents. Staff described having to come back to work the next day without the opportunity to debrief or decompress, and without access to clinical psychology support. Studies have shown a link between staff distress, burnout, and the quality of care. [234, 235]

Maternity staff as a whole are experiencing serious service pressures. More than 80% of obstetric trainees have been reported as having considered leaving the profession, and attrition rates of obstetric staff are higher than most other medical specialities. [234-236]

There is something of a perfect storm affecting midwives, the result of which is that midwives are not consistently able to implement the full range of their professional standards. [68] Many midwives, midwifery students, and MSWs were distressed about this situation. Midwives described two sources of stress and distress. The first was workplace stress. Not only were many stretched to their limits on a daily basis with impact on their own physical and mental health, but they were also experiencing moral distress [237, 238] and indeed moral injury [239] as a result of not being able to provide the care they know women and babies need. The second was the impact of traumatic incidents, without adequate support and time to de-brief and to recover. This is likely to be complicated by the known tendency of midwives to keep going in the face of difficulties. [234] Sickness absence rates for midwives in NI have risen over the past five years; the leading cause is mental health problems, including workplace stress (Section 5.1.2).

This section will focus primarily on midwives as it is the key issue for this report, and because midwives are critically important for safety and quality for all women and babies and it is essential to ensure that the system is supporting them appropriately.

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Why do midwives matter? Midwives form the foundation of safe, quality maternity services. Midwives are accountable for their care of every woman and baby across the whole continuum of care. [68] Their knowledge and skills are essential in support for women and in the prevention of problems, as well as timely action, consultation and referral when complications arise. Midwives' skills range from public health, individualised care from pre-pregnancy through to postpartum and the early weeks of life, and collaboration with a range of other health and social care professionals to respond to complications. When midwives practice in the context of a supportive health system and are integrated into the interdisciplinary team, they have been shown to improve over 50 outcomes for women and babies, including reducing perinatal and maternal mortality, morbidity, and stillbirth, psycho-social and public health outcomes, and service outcomes including reduced resource use. [8, 61]

Midwives do not only provide direct care. Midwives have responsibility for many of the system-wide processes for safe, quality maternity care in hospital and community including safeguarding, infection prevention and control, risk management, clinical governance, audit, data collection, bereavement services, admission, transfer, and discharge procedures, coordinating responses to complaints and investigations, and driving the implementation of changes. [68] They are fundamental to safe, quality, whole-system working.

What is working well?

It was clear from our engagement that many midwives remain committed to providing the best care possible despite the difficult circumstances in which they work. Midwives are leading evidence-based developments in care and services, and they are working in a range of specialist roles such as Perinatal Mortality Review (PMRT), bereavement support, infant feeding co-ordinators, and social complexities services, that support women and babies, and colleagues, across the health system (Appendix 11g).

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Summary of positive service development (Appendix 11g)

Creating posts for Bereavement Support midwives to improve the care of families experiencing bereavement

NI has the highest neonatal mortality rate in the UK (2.37 per 1,000 live births). Action was taken to create specialised Bereavement Support Midwife posts across the five HSC Trusts. The impact has been increased satisfaction by parents, and recognition by multidisciplinary teams of the positive improvement in the type and frequency of communication with parents. The role of the Bereavement Support Midwives was described as “fundamental” in a recent Public Health Authority review, and a forum for Bereavement Support Midwives has been established. Consent forms and processes have been found challenging for providers and families. It is recommended that administrative processes are updated, as well as the scope of education and practice for Bereavement Support Midwives, along with increased partnership with the voluntary sector.

A consultant midwife has been appointed in each HSC Trust; they are supporting midwifery and interdisciplinary colleagues, working with women with complex needs, and taking the lead on strategic developments. There was very positive feedback about their work from women, other midwives, and interdisciplinary colleagues. Midwifery students and NQMs are highly motivated and knowledgeable and have much to offer the profession and to safe, quality care (Appendix 11k). The quality of undergraduate education is universally acknowledged by respondents to be high, and the programme benchmarks well on parameters such as the National Student Survey and university league tables (Section 6.3.8).

What are the challenges for midwives?

Workload and service pressures:

- There are workload problems and stress for all staff, but the impact on midwives is disproportionate and is causing serious problems of retention and recruitment. Data from the most recent Birthrate Plus® report (Section 5.1.2) show a deficit of more than 80 WTE midwives across NI; Western HSC Trust has the biggest staffing challenge. This is a significant underestimate of the actual level of need however; factors affecting this are outlined below. NI is not alone in experiencing severe midwifery shortages. All UK countries, especially England, report similar data. [240] The impact is severe: midwives came top in a ranking of burnout among NHS staff in the UK and UK midwives have been found to have higher levels of emotional distress and burnout than midwives in other countries. [241] Midwives in NI were for some time also the lowest paid in the UK. Now there is a government in place, this discrepancy has been addressed.

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- Both to take advantage of development opportunities and as a result of service pressures, midwives are taking on a range of service-wide non-midwifery work including conducting scans, and risk, governance, audit, and quality assurance roles. These responsibilities are important and provide midwives with good career development opportunities, but this work is not fully accounted for in the Birthrate Plus® calculations, and in the absence of backfill the negative impact is to remove midwives from core midwifery work.
- A number of important midwifery responsibilities are not accounted for in the current workload tool, Birthrate Plus®. These include:
 - The incident reporting and SAI processes absorb extensive midwifery time in activities such as reviewing records, writing statements, and coordinating meetings.
 - Provision of midwifery care for women with social complexities and safeguarding concerns is critically important, complex work that takes extensive time.
 - The mandatory training requirement for midwives in NI is high (around 145 hours plus individual HSC Trust requirements).
 - The implementation of CoMC is a substantial shift in working patterns affecting the whole service. There is a risk that core midwifery services especially on labour ward are depleted as experienced midwives move to the newly emerging continuity teams. Core services are unlikely to see benefit until those teams are able to take on a significant part of the workload.
- There are relatively few Maternity Support Worker posts to support midwives, and there is little clerical and administrative support for midwives including midwifery managers. As a result, a substantial amount of midwives' time is spent on tasks such as finding notes, contacting women to make appointments, and arranging meetings with colleagues, all of which reduce their time for providing midwifery care.
- Midwives are responsible for the majority of data entry in maternity care. This work is essential to the whole system but is often done under pressure of time.
- As a result of workforce pressures, midwives are regularly called to help in labour ward from community, postnatal, and Alongside MLUs. This not only leaves these areas understaffed, but it destabilises midwives who do not know where they will be working each day, compromises consolidation of knowledge and skills by less experienced staff and limits the contribution that bank staff can make in unfamiliar environments; one result is that the workforce pressures are not helped as much as they could be by the increased student numbers.

The changing model of care:

- The increase in the rate of inductions and caesarean births and the impact on women and on the work of midwives and learning for students was discussed in Section 6.2.4. This is not fully accounted for in Birthrate Plus®. The consequence is that midwives are not able to fully provide some evidence-based aspects of care that they know are important and that would prevent complications, especially relationship-based care and partnership working with women, information and discussion in pregnancy, postnatal care and support, and their public health role.

Increasing socio-economic vulnerabilities for women and families:

- The care of women in pregnancy and postnatally with psychological, social and cultural complexities may include women with addiction problems, safeguarding issues, women living in poverty, those who are anxious or who have additional mental and emotional health needs, and women who are asylum seekers and refugees, and women suffering domestic violence and abuse. This work is primarily the responsibility of midwives. Midwives have a fundamentally important role in tackling inequalities, [68, 190] and in coordinating the care and services for vulnerable women and families, including writing reports and participating in increasing numbers of case conferences due to the outworking of the regional safeguarding policies. Midwives refer women to other services such as social work and addiction services, they work with Sure Starts and community organisations to support women with social complexity, and they work with obstetricians and neonatologists/paediatricians as well as a wide range of other medical specialists such as anaesthetists, psychiatrists, and GPs to support clinical care; but the majority of the support, information, discussion and care in pregnancy and postnatally is the responsibility of the midwife. This work is not measured and is unaccounted for in workload calculations, and it is increasing as economic and social conditions and inequalities have worsened and women's mental health has become an increasing problem.
- The importance of this aspect of midwives' work should not be underestimated. NI has 38 Sure Starts across the region, providing a range of important services for families in low-income communities. Twenty-one midwives work in Sure Starts in four of the five HSC Trusts (April 2024); they are unable to work in Sure Starts in Western HSC Trust because of staff shortages. Sure Start midwives work in partnership with colleagues in the statutory, voluntary and community sectors to meet the needs of local women, babies and families. They promote good physical and mental health in pregnancy and support new mothers and their partners in forming and strengthening attachment relationships and the care of the infant. Their role aligns with the ambition of the Expert Panel on Educational Underachievement in NI; their 2021 report 'A Fair Start' [242] recognised the pivotal role of midwives, and recommended that midwives work with Sure Starts to provide targeted support to vulnerable families, work in partnership with the Sure Start teams, add value to core services, signpost families to other support services, and share their knowledge and influence the multi-professional practice in Sure Starts.

Lack of midwifery agency and voice:

- Despite strong evidence on the fundamental contribution that midwives make to safe, quality care [8][61] and to health and wellbeing for women and babies, and the positive perspectives and experiences of women who talked with us, we observed a lack of genuine understanding, support for and valuing of core midwifery skills and of their role across the whole continuum of care. Midwives commented that public and professional criticism of midwives especially in England (Section 3.4) has resulted in some midwifery knowledge and skills being devalued. We heard from midwives and interdisciplinary colleagues that this is substantially affecting morale, and the attitudes of some colleagues and the public in NI.
- Despite their unique perspective on the needs of women and babies across the continuum of care, midwives have limited input to strategic decision-making on service provision. This aligns with international evidence on barriers to safe, quality midwifery care (Appendix 5b [9]; further discussion in Section 6.3.5).
- There were many positive comments about the contribution of the Heads of Midwifery and consultant midwives to the maternity services. Even they, however, have limited access to Executive and HSC Trust Boards to contribute their unique knowledge and insight on midwifery and maternity issues. This is discussed further in Section 6.3.6.

The impact: These stresses are having a direct effect on the safe, quality care of women, babies, and families, as we clearly heard in the engagement. They are also affecting the health and wellbeing of midwives at all levels of the system. The physical and mental health of some midwives is being harmed, and some are leaving the profession as a result. This is affecting all levels of seniority, including Heads of Midwifery; there are currently interim postholders in three of the five HSC Trusts (May 2024), with minimal interest in applying for the posts because of the associated stress and risk of burnout.

Steps have been taken to support NQMs in several HSC Trusts (Example in Appendix 11k).

Summary of positive service development (Appendix 11k)

Creating a Clinical Skills Midwife role to support NQMs

The Clinical Skills Midwife role in the Southern HSC Trust was created in 2022. A three-day induction for NQMs was introduced, and an information starter pack provided. Skills support in clinical areas was given along with clinical rotation to diversify experience. One-to-one Clinical Skills Midwife support has been given, as well as peer support. This initiative has resulted in immediate and significant improvements in recruitment and retention of NQMs, and this HSC Trust is now attracting midwives from other HSC Trusts, the Republic of Ireland and from the UK. Staff morale has increased. A lesson learned is that NQMs should not be given additional responsibilities but should have time with the Clinical Skills Midwives. This model is being replicated in other HSC Trusts, and it is recommended that every HSC Trust should have dedicated Clinical Skills Midwives to provide practical and pastoral support to NQMs.

QMNC Concept 7: Are staff supported and enabled to provide the full range of their knowledge and skills?

What is needed: The under-valuing of midwives and apparent lack of recognition of their contribution to care and services across the whole continuum of care is a serious missed opportunity to improve not only the health and wellbeing of women, babies and families but also longer-term population health. [170]

The role and contribution of midwives, and the level of stress they are experiencing must be an important component of a new Maternity Strategy.

The severe workload stress and potential for moral injury experienced by midwives must be recognised and steps taken to alleviate this.

Work is needed to review the range of midwives' responsibilities and to support them appropriately, including with administrative and maternity support worker roles.

Ensuring high quality support for NQMs and for midwifery managers is a key priority.

Improved workload planning is needed to avoid services relying on calling midwives away from their place of work to help understaffed areas; this practice destabilises the workforce and prevents the consolidation of experience.

See Recommendations 1, 4, 5, 10, 11, 14, 16, 20, 22, 23 and 24.

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6.3 The maternity system: unique, complex, changing rapidly

System-level issues were raised by respondents throughout the engagement and were by far the biggest concern of participants in the cross-sectoral workshop (Section 5.5). For many women services are not meeting their needs and limited resources are a key challenge for all parts of the service. Structural, system-level challenges are adversely affecting all parts of the maternity services and are resulting in stressful working conditions for all staff groups. A systematic analysis of system-level factors is conducted in this section.

6.3.1 Informing and structuring this section

To examine how midwifery works within the wider system in NI we have drawn on engagement findings and from information provided to us on governance, commissioning, and workforce. Evidence on what the health system needs to assure is from a rapid systematic review conducted for this report by Mattison et al 2024 [9] (Appendix 5b) has been used to structure this analysis. Four reports from NI on organisation and governance of health services and on education have been especially useful. [2, 112, 118, 226]

The structure of this analysis is based on the findings of a rapid efficient review conducted for this report (Appendix 5b). Key health system issues addressed are:

Table 4: Seven health system concepts based on a rapid efficient review (Mattison et al [9] Appendix 5b)

Health System Concept	Topic
Health System Concept 1	Political will and policy direction that promotes and supports a quality service
Health System Concept 2	Consistent standards, policies, and practice based on all the best evidence
Health System Concept 3	Interdisciplinary team working, shared culture, purpose, respect
Health System Concept 4	Universal, whole-continuum, knowledgeable, skilled midwifery
Health System Concept 5	Governance: <ul style="list-style-type: none"> a) Impact of organisational structures on governance b) Leadership and management c) Commissioning of maternity services d) Data and monitoring e) Accountability
Health System Concept 6	Evidence and capacity building for research
Health System Concept 7	Education, training and staff development

6.3.2 Health System Concept 1: Political will and policy direction that promotes and supports a quality service

The concept: Maternity services require a positive, pro-active political and policy environment to realise their potential for long-term positive impact on children, women, families, and population health and wellbeing. The positive impact of a pro-active, evidence-based, region-wide approach with strong policy support is demonstrated by the breastfeeding strategy for NI (2013-23). [243] Despite the economic, social, and health service challenges of the past decade, breastfeeding rates have increased significantly in NI, one of only two maternal and newborn outcomes that have shown steady improvement; the other is the reduction in teenage pregnancy (Section 5.1.3). This is a result of significant coordinated work across sectors and disciplines and demonstrates what is possible in a positive policy environment.

What we found: An overarching strategy is essential to inform the direction of travel, but NI has been without a regional strategy for the maternity services since 2018. There has never been a women's health strategy; a listening exercise on this was announced by the Minister in March 2024, to be conducted by an interdisciplinary team including researchers from QUB and with community group participation. [244] The current early years strategy was published in 2010 and is currently under review. [245]

The impact: The consequence is a lack of strategic direction for the maternity services, which was evident throughout the engagement. In the absence of a pro-active, cross sectoral, evidence-based strategic direction, the new task- and process-focussed model of care has emerged apparently by default, and a culture of fear has been allowed to develop (Section 6.2.4).

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Health System Concept 1: Political will and policy direction that promotes and supports a quality service

What is needed: Political and policy support for maternity services must recognise the complexity of the challenge, and the critical issues in funding, organising and governing the services, including:

- Services must be focussed on health and wellbeing as well as on the management of complications.
- There is potential for physical and psychological harm that can have lifelong impact.
- Maternity services are intensely interdisciplinary and cross-sectoral and must be properly coordinated to avoid divergent perspectives and disputes over professional and service boundaries. [3, 246]
- The people served by the maternity services are women and babies, and midwives are predominantly women, and the potential for patriarchal assumptions to inform decision-making and resource allocation is well known (Appendix 5b). [62]

A new Maternity Strategy is urgently needed, recognising the issues raised in this report, and aligning with current and emerging strategies for Women's Health, Early Years, Inequalities, Mental Health, Breastfeeding, Nursing and Midwifery, and Population Health. Examples exist from other jurisdictions. [82, 247, 248]

See Recommendations 1, 5, 7, 13 and 19.

6.3.3 Health System Concept 2: Consistent standards, policies, and practice based on all the best evidence

The concept: A whole system approach to standards, policies and practice is essential to avoid inequality and confusion for women and staff, and to ensure that all care is founded on current best evidence. Services must be grounded in consistent, evidence-based standards and policies.

What we found: The Neonatal Network and the Maternity Collaborative (Section 5.1.1) are working to achieve a region-wide approach but are hampered by inadequate funding support and the need for interdisciplinary collaboration and cross-Trust working.

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Women, advocacy groups and staff identified barriers to consistent working, and there were multiple examples of confusion and inconsistent information and implementation. Each HSC Trust has its own process of producing policies and protocols, risking inequalities and inconsistent information between HSC Trusts, and requiring input from multiple staff across the five HSC Trusts. There was no evidence of women's representatives being involved in this process. Importantly, there was little indication that the implementation of policies was routinely evaluated to ensure they were working as intended, that outcomes are improving, and to examine unintended adverse consequences.

While NICE guidance was commonly accepted, it was not consistently implemented. We heard about inconsistency in the timing of post-term induction recommended to women, for example. Some elements of the NICE induction guidance [171] seemed to be prioritised while others less so; the guidance recommends prior discussion with women on their preferences, that information on the risks and benefits is discussed, and an explanation of the procedure is given, but women noted that such discussion was not occurring routinely.

Conversations with health professionals about standards of care and policies related almost entirely to specific technical forms of care such as induction of labour and caesarean birth. These are essential in the provision of safe care and timely access to quality provision for all women and babies must be assured. But safe, quality maternity care and services also requires evidence-based standards to be established and assessed on aspects including behaviour, communication, and models of care. Respectful care is an essential foundation for all services, and relationship-based care and one-to-one care in labour are highly effective interventions but are not always valued as such.

The impact: Inconsistent policies, guidelines and protocols between, and sometimes across, HSC Trusts results in confusion for staff and women alike. The absence of comprehensive regional standards for maternity care risks skewing care provision and devaluing aspects of care that matter to women, and to safety. NI is not alone in this; there are no comprehensive, evidence-based standards for system-wide safe, quality maternity care in the UK. This is a critical gap.

Health System Concept 2: Consistent standards, policies, and practice based on all the best evidence

What is needed: Development and implementation of region-wide, comprehensive, evidence-based standards, policies and protocols for system-wide safe, quality maternity care is needed. There are good examples to draw on. The UNICEF UK Baby Friendly Initiative (BFI) standards for maternity services, described above, are based in high quality evidence, include the whole spectrum of care and services needed by all women and babies, and are rigorously assessed and subject to regular re-assessment. The NMC standards of proficiency for midwives form a strong evidence-based platform for strengthening quality midwifery; services are regularly assessed against these to ensure they are appropriate for student placements. Many aspects of these standards are relevant across all health professions such as communication, partnership working, escalation of concerns, and managing evidence-based sustainable change.

See Recommendations 1, 7, 8, 18 and 20.

6.3.4 Health System Concept 3: Interdisciplinary team working, shared culture, purpose, respect

The concept: Interdisciplinary and cross-sectoral working is essential and must be seamless to avoid fragmented services, delays, and gaps.

What we found: We heard from some respondents of respect and good working relationships between individual professionals and between professional groups. Examples of positive interdisciplinary service developments included an interdisciplinary clinic for pregnant women with diabetes, and interdisciplinary working to provide safe care for women making challenging birth choices (Appendix 11f).

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Summary of positive service development (Appendix 11f).

Developing an interdisciplinary team approach to supporting women with challenging birth choices

The Belfast HSC Trust has developed an interdisciplinary approach to responding to requests for home births from women with additional care needs such as gestational diabetes, twins, and previous caesarean section. This includes individualised care planning, combined with education of midwives about specific care needs. Strong midwifery leadership has been demonstrated, personalised care plans have been developed, and there have been robust risk assessments by the interdisciplinary team. The importance of supporting each woman to understand her individual options, risks, and benefits has been recognised. Additional training about risk profiles and potential complications has been recommended, along with engaging women in evidence-based decision making.

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We also heard of the predominance of different cultures, values, and approaches to care that were resulting in fragmented communication and tension (Section 5.2.4). When interdisciplinary working was described, it was more likely to be setting-specific – in labour ward or antenatal clinic, for example - than to consider the perspective of women's interactions with the system and with health professionals across their whole maternity journey. There was little acknowledgement by hospital-based interdisciplinary colleagues of the valuable role midwives play in the community especially with women living in socially complex situations, and where liaison with GPs, mental health services, social care, and community services is critically important.

Despite the acknowledged importance of interdisciplinary team working by all participants in our engagement, there were few indications of or opportunities for interdisciplinary strategic discussion and decision-making. For example, we did not observe any forum in which GPs can have strategic discussions about shared concerns around prescribing with community midwives, or with obstetricians around questions of accountability for women discharged from hospital following a caesarean birth. Midwives described having difficulties having their voices heard at Clinical Directorate meetings, making it difficult to have joint strategic discussion. Some neonatologists/paediatricians raised concerns about the increase in respiratory difficulties for babies following caesarean birth, but indicated a lack of appropriate forums in which that could be discussed as a strategic issue with obstetricians. Decisions about substantive developments in practice did not seem to be preceded by interdisciplinary discussion about the implications for workload or for staff development for everyone affected – obstetricians, midwives, paediatricians, anaesthetists, service managers, and bed managers for example.

There appeared to be no discussion in any forum about private obstetric antenatal care and its potential impact on outcomes for women and NHS staff in labour wards. Although the number of consultants providing private obstetric care is small, it was described by some respondents as having a disproportionate impact on induction and caesarean birth rates, as reported elsewhere. [249, 250] Ambulance staff and neonatologists/ paediatricians are not involved in interdisciplinary routine training for maternity emergencies despite their critical importance.

The impact: as a consequence, there is silo working at the level of professional groups, at different stages of the continuum of care, and between specific care settings. The current task- and risk-focussed model of care (Section 6.2.4) seems to have evolved piecemeal, and it has not been a conscious strategic decision by any professional group. The implications of this model for midwifery staffing and the impact on postnatal care and on the physical and mental health and wellbeing for women and babies are not well understood. It is likely that there is not a shared service-wide understanding of the impact of the current model of care on colleagues, or on the quality of care for women and babies.

Health System Concept 3: Interdisciplinary team working, shared culture, purpose, respect.

What is needed: To build on the examples of good interdisciplinary working, opportunities are needed for regular structured, shared, equitable, respectful, interdisciplinary strategic discussion and decision-making at all levels of the system. Such forums are required for shared reflection, to address and prevent the development of silo working and the different cultures and assumptions that adversely affect interdisciplinary team working, and to ensure joint service planning, monitoring and assessment. They are needed to enable the development of a common purpose, best practice and the standard of interdisciplinary working required for safe, quality care for all women and babies.

See Recommendations 1,3 ,7, 8, 11, 14, 25 and 28.

6.3.5 Health System Concept 4: Universal, whole-continuum, knowledgeable, skilled midwifery

The concept: evidence shows that the universal provision of knowledgeable, skilled midwifery across the whole continuum of care has a positive impact on clinical and psycho-social outcomes for women and babies, on population health including inequalities, and on resource use. [8, 61] Midwives provide the foundation for safe, quality services, and their work has been shown to be cost-effective (Lynn et al 2024 unpublished Appendix 5c). [130] They not only provide quality midwifery care, they also act as a conduit to timely consultation and referral, and they signpost women to other health, social, and community services they and their babies may need. The contribution of midwives to care and services including important service developments was described throughout Section 6.2.

What we found: Midwives in NI have been educated to a level where they have the knowledge and skills to provide a good foundation for the provision of quality care, and many midwives are dedicated and determined to provide the best possible care. The standard of pre-registration education was widely recognised by respondents to be high and results from the National Student Survey 2024 place Queen's University Belfast as a provider of midwifery programmes in third place of Russell Group Universities; midwives' regulatory standards are strongly evidence-based. [68, 251]

Problems resulting from workload challenges for midwives and the change to a risk- and task-focussed model of care were described in Section 6.2.4. There is a less tangible but nevertheless important issue, described by many respondents. The situations that midwives described indicated that they have limited agency in the system. Midwives described not being listened to by some colleagues; *'it's just what midwives say'* was a phrase heard several times in the course of this work, in the context of dismissing midwives' concerns about the quality of care. There is a lack of recognition by some at senior levels and across organisations of the unique, valuable role midwives play in care and in system-wide safety and quality. There is limited evidence that the system recognises the profession as unique and separate from nursing, with different responsibilities and levels of accountability. Midwifery is professionally represented on HSC Trust Boards by the Executive Directors of Nursing (EDoNs), and the Heads of Midwifery are rarely asked to attend even when maternity service issues are raised. The ability to influence strategic decisions and to have their voice heard is limited. Their voice is further weakened by the shift to a generic management structure within the HSC Trusts; the Head of Midwifery may have management responsibility for other services, and it is possible that maternity service managers may not be midwives. These issues reflect the international evidence on barriers to safe, quality midwifery care, which include professional disempowerment of midwives, limits on scope of practice, and a workplace hierarchy and power structures preventing midwives working at appropriate levels in the organisation (Appendix 5b). [9]

The impact: These structural issues help to explain why decisions that impact on midwives are not always discussed beforehand, why midwifery service managers do not receive adequate administrative support, and why senior levels of the health system are not fully aware of the extent and impact of the stress on midwives and the impact of this on the quality of care. Unless these problems are addressed and midwifery in NI is strengthened, the safety and quality issues described by women and advocates cannot be resolved.

Health System Concept 4: Universal, whole-continuum, knowledgeable, skilled midwifery.

What is needed: The essential contribution that midwives make to the care of all women, babies, and families and to safe, quality services must be recognised within the governance structures at every level. The role and contribution of midwives must be recognised and understood at Board level and there must be senior midwifery representation at all Board discussions about maternity services. Heads of Midwifery must be enabled to provide the professional and service leadership they are uniquely prepared for, and their range of responsibilities and support must be reviewed (Section 6.3.6, Concept 5b). Examples from across the UK are available to inform these developments (Health System concept 5b).

See Recommendations 1, 11, 14, 15, 16, 22, 23, 24 and 29.

6.3.6 Health System Concept 5: Governance

The concept: Governance in health care is the system through which NHS organisations are accountable for continuously improving the quality of their services and safeguarding high standards of care by creating an environment in which excellence in clinical care will flourish. [252] This system should provide the conditions for staff to consistently provide the safe, quality care and services. Good governance enables organisations not only to function legally, ethically, sustainably, and successfully, but importantly it can lead to innovation and enhanced performance.

Health System Concept 5a: Impact of organisational structures on governance

What we found: Considering first the contribution of factors in the wider health system; obstetric negligence cases are by far the biggest contributor to litigation costs. [253] Almost three fifths (59.9%, £136.1 million) of the amount paid out on cases open at any stage in 2022/23 related to the 'Obstetrics' specialty (ie maternity care and services), of which 82.7% (£112.6 million) had been paid in damages (Figure 31). [253]

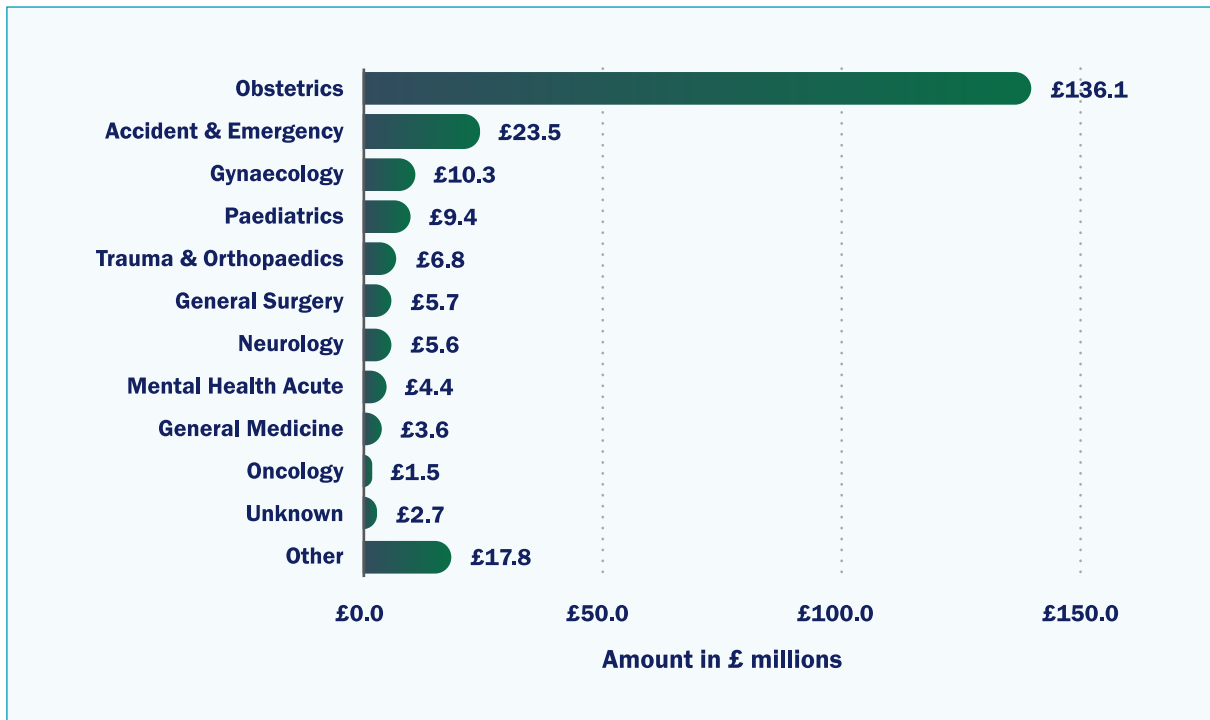


Figure 32: amount paid on the 10 largest specialities, NI. Source: [253]

There is no link, however, between the funding for litigation and maternity services, including service improvement mechanisms, so there is no incentive or funding support to invest in improvement to prevent such tragic outcomes and avoid future litigation. The adversarial system of litigation in serious cases adversely affects women, families, and staff alike, and does not support the essential open, learning culture.

We heard much about the substantive backlog with the investigation of Serious Adverse Incidents (SAIs), resulting in distress for parents as well as a loss of timely learning for the system and contributing to a blame and risk-averse culture. We heard that this system is under review, with consultation planned for Autumn 2024 and implementation in Spring 2025. Staff working in risk management, who are mainly midwives, reported that it was difficult to obtain timely consistent support and interdisciplinary engagement to complete reviews and to feed back the learning points to colleagues.

In regard to the maternity and newborn services; positive developments discussed by respondents included the potential for regional coordination resulting from the recent establishment of the DoH Maternity and Neonatal Services Safety Oversight Group. Its role is *‘to receive assurance that maternity and neonatal services are safe and appropriate for the NI population’*. A number of workstreams are planned as part of the overall action plan relating to this work, and it is envisaged that the DoH, PHA and SPPG will work in collaboration with key stakeholders to implement recommendations arising across these workstreams.

The Oversight Group currently lacks the range of service-level interdisciplinary clinical and service user perspectives needed to understand the whole continuum of care in and outside of hospital settings, however.

The five HSC Trusts have a critical role in governance and their decisions on priorities and resource allocation shape care and services. However what we heard from HSC Trust Boards themselves in their responses to our questionnaire and from participants in our engagement, is that Boards currently do not seem to have a clear line of sight to all the important outcomes and processes, or to the experiences of women and to the problems staff encounter. Their role and actions in the creation and leadership of an evidence-based, safe, respectful, compassionate, and learning culture either within their own HSC Trusts or jointly across the region is not evident. It was not clear from their responses how core values such as respect, equity, person-centredness, and meeting community needs – essential in maternity care and to all of health care - influence Board review and decision-making. Although costs are closely monitored, cost-effectiveness does not seem to be considered so there are missed opportunities to invest – or dis-invest – in services to both improve quality and maximise the efficient and effective use of resources. Boards are on the receiving end of large amounts of management information and data; however, decisions, recommendations, action and follow-up in the light of these data are not so observable. Consequently, the impact and effectiveness of the respective Boards on optimising safety and quality in the maternity services is hard to see. Because Boards generally oversee services in accordance with their respective organisational structures, maternity services are commonly subsumed within overarching Directorate reports. Maternity services are represented on HSC Trust Boards by the respective Director or individual with professional/management responsibilities. Staff and service user voices do not feature directly at Board level, and it is likely that Care Opinion - used by Boards and management to assess user experience across the HSC Trust – is under-reporting negative experiences in maternity care, especially for women with difficult experiences and those from groups whose voices are seldom heard (Section 6.2.1).

There is a missed opportunity for HSC Trust Boards to help in the development of region-wide maternity and newborn services. We heard from respondents about the problems of cross-Trust working, for example where women had part of their care in one HSC Trust and some care in another HSC Trust, whether this was planned or as a result of an emergency. Together with what we heard about the inconsistent policies and protocols across HSC Trusts, these challenges raise the question of cross-Trust cooperation and collaboration. There is an important opportunity for HSC Trusts to work more closely together to develop a region-wide, collaborative culture and more consistent practice.

In addition to HSC Trust Boards, directorates and senior management have an essential role to play promoting and embedding the culture and values of the service, in the safety and quality of care and services, and the safety, wellbeing, and development of staff. Problems were identified at this level too – the lack of opportunities for strategic discussion and review was discussed in Section 6.3.4 - and there seems to be a disconnect between staff concerns and timely action. Some midwives at all levels of seniority described inadequate responses to their safety concerns including staffing red flags and the shortage of midwives and workload problems affecting day to day provision of safe, quality care, access to continuing professional development opportunities, and the health and wellbeing of staff.

These concerns are not new; they resonate with the findings of other reports, [2, 112] and NI is not alone; similar concerns have been raised in reports from England. [3, 4] But it is notable that the recommendations of those previous reports have not yet resulted in the changes needed.

A recent RQIA report [2] notes that governance of maternity services in NI needs to be strengthened, and many of its recommendations, if implemented, would address some of the issues identified in this work. That report noted that *‘It is vital that HSC Trusts improve monitoring and oversight of maternity services, improve arrangements for safe staffing, and improve the systems and pathways for delivery of maternity care’*. The recommendations of this report are important. They should have a wider lens however, and consider all the components of the continuum of care across all settings, and consider the importance of developing shared values that shape the work of organisations.

The impact: All these factors are likely to complicate or even prevent joint planning and review within and across HSC Trusts and in DoH, RQIA, PHA and other organisations for the range of hospital and community maternity services, neonatal, mental health and ambulance services, primary care, and public health services needed, even though these all need to work seamlessly. As a result, it is hard to see the difference that the governance structures in each HSC Trust are making in terms of the safety and quality of maternity services, or the levers they could use to implement whole-system change to improve care and services for women and babies across the continuum of care.

Health System Concept 5a: impact of organisational structures on governance**What is needed:**

- It is critically important that the problems of responses to safety concerns including escalation are addressed with region-wide leadership and adequate resources.
- HSC Trust Boards have a key role in leadership and oversight and must ensure they have all the information and insight needed to inform effective action. Senior midwifery staff should be present whenever maternity is discussed, and a non-Executive Director should be appointed as a Maternity Champion, with the responsibility of liaison with the maternity and neonatal services.
- RQIA recommendations on maternity safety and governance should be implemented, augmented by consideration of all the components of the continuum of care across all settings.
- Steps are needed to tackle the blame and risk-focussed culture, to develop an open, learning culture at all levels of the HSC Trusts. A Just Culture approach should be developed across all HSC Trusts. [254]
- There should be a clear and timely feedback loop to learn from SAIs and other adverse incidents and to implement action, support, and learning. All levels of the organisation have responsibility for ensuring organisation-wide learning and improvement.
- The relationship between litigation costs and service investment should be examined; lessons learned from adverse events should drive investment in service improvement.

See Recommendations 1, 11, 12, 13, 14, 15, 17 and 21.

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Health System Concept 5b: Leadership and management

The concept: Maternity services are inherently complex with rapid shifts and uncertainties, and strong interdisciplinary leadership is essential. Decisive leadership is needed in emergencies, as is enabling and supporting staff and ensuring a kind and compassionate culture. For safe, quality services and an open and inclusive culture of learning and development, psychologically safe leadership is needed, where everyone's expertise is understood and respected and the leadership style is oriented to problem solving and identifying solutions. Equitable collective leadership, [231] with qualities of compassion, social justice, courage, and a focus on all the resources needed for high quality services - financial, human, technological, data and information - have been shown to be fundamentally important across health care. [233]

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What we found: Issues of leadership and management were raised throughout the engagement, and they were not limited to midwifery. Obstetricians described the lack of leadership and oversight of obstetrics, and those in management positions described problems in protecting the time they needed for management and leadership work. Leadership and management development is needed across all the professions.

There were positive examples. At regional level, the work of the Midwifery Officer (now the Chief Midwifery Officer) in the DoH was valued for championing midwives in policy and senior management forums. This role was acknowledged to have been influential in supporting senior midwives and in several positive developments, including enabling the appointment of the consultant midwives, and in the strong regional support for CoMC.

The work of the consultant midwives was another positive example, cited by women, midwives, and interdisciplinary colleagues alike (Section 5.2). The remit and level of experience and educational preparation of the postholders varies. These senior roles bring a range of knowledge and skills, including experienced clinical input and support for midwives in hospital and community settings, consultation and collaboration with interdisciplinary professionals, and analytical skills to support professional and service development. The postholders collaborate across the region – though such whole-region work is not included in their job descriptions - perhaps best demonstrated in their work with the PHA to develop a regional framework for midwives and obstetricians who support women requesting care outside of guidance in NI. [159] There is a need to build on this success, support their region-wide work, and develop and appoint more consultant midwives to lead on a range of service developments.

The Heads of Midwifery were widely supported by midwives and interdisciplinary colleagues and some interdisciplinary respondents indicated that this role is important not only for midwives, but in being the only role with some degree of leadership for the whole maternity service. Despite being recognised as critically important for the service and the staff, it was noted by many that the role as currently shaped is ‘*virtually impossible*’; the role has limited ability to influence resources and it was described as being pressured from below to address the problems, and from above to manage the service within budget. This leadership role is being diluted by the addition of other areas of management responsibility including dental, gynaecology, and fertility services for example, and by the appointment of non-midwifery service managers. The majority of postholders have little administrative support and few senior colleagues to deputise. The challenges of this role are demonstrated by three of the five posts being filled by interim postholders (May 2024). This may be a result of the demands on the role. It may also relate to system-level factors such as the structural issues described above, a lack of succession planning and leadership development, posts not being appointed on a substantive basis, a lack of overlap in appointments to allow for handover and continuity for new postholders, and postholders being appointed to senior posts on a temporary basis.

The most frequent issue raised was the lack of midwifery representation at levels above the Head of Midwifery. The result of this is perhaps best demonstrated in the comments throughout this section about the longstanding problems faced by midwives and of the difficulties faced by women. The conflation of midwifery with nursing, common in many jurisdictions, does not help in this regard. [56]

In each of the five HSC Trusts, the Head of Midwifery is the most senior midwife in each organisation, sitting at Assistant Director (Band 8C) in three HSC Trusts and at Head of Service level (Band 8B) in the two other HSC Trusts. There is a mixed model of who they report to; some report to the EDoN, some to the EDoN professionally and a different operational director and for some it is to a non-midwife assistant director.

Notably these posts are not in line with posts in other UK countries in level of seniority, remit, reporting arrangements, or salary. There are multiple examples of good practice from HSC Trusts and Boards in Scotland, England, and Wales. Many have developed Director of Midwifery posts, working at Executive level with direct access to the Board. An RCM publication on leadership provides helpful context and background to consider an appropriate structure for NI. [255] The Heads of Midwifery themselves are aware of the strengths and weaknesses of the various models.

It is evident that there is an endemic problem with leadership and management development in midwifery at every level. Band 7 managers have difficulty protecting time for their management and leadership responsibility because of the demands of service. There is a scarcity of suitably qualified applicants for senior posts and a need for mentorship and development for those in senior roles. Leadership development for staff in Bands 5 or 6 roles is mainly offered as HSC Trust-based training opportunities, without academic accreditation. Educational opportunities for midwives to develop knowledge and skills in leadership at Masters level and beyond are scarce in NI; we heard of some who had moved to study in Ireland or the UK as a result. There is an absence of robust induction programmes to support clinical staff to undertake senior management and leadership roles. There is limited provision for theoretical and practical training to gain a better understanding of leading the implementation of change, or of the general business management functions required to run a busy maternity service such as planning, strategy, organisational behaviour, business case development and budget and financial planning. This is all in contrast to other UK countries.

The impact: The impact of this deficit is demonstrated by the difficulty of appointing senior posts and the evident stress levels in senior staff. An adverse impact on the safety and quality of care, and on staff health and wellbeing, is an inevitable consequence. It hampers effective engagement of maternity professionals in general and midwives in particular at senior levels in the HSC Trust and across the region.

Health System Concept 5b: Leadership and management

What is needed: Essential developments to ensure safe, quality care and services include:

- Training, development and succession planning for all staff groups in collective, compassionate, leadership. Interdisciplinary leadership training both at consultant/Band 7/8 and trainee/Bands 5/6 levels would contribute to development of collective leadership.
- Protected time in job plans for midwives and obstetricians in service management roles.
- Ensuring protected time and funding for senior midwives (Band 7 and above) to attend and complete leadership programmes and Masters programmes.
- Tackling the barriers to the representation of midwives at senior management levels in the HSC Trusts.
- Reviewing and revising the level of responsibility and seniority, job titles and remuneration for Heads of Midwifery to ensure organisational and personal empowerment and to align with other UK countries.
- Ensuring Heads of Midwifery are present at all Board discussions about maternity services.
- Appropriate, equitable administrative support for all senior midwifery roles.
- Recognising the key contribution made by consultant midwives, ensuring adequate support for their role and the development and appointment of further consultant midwife posts, to support strategic and service development in both hospital and community, and across the region.

See Recommendations 1, 15, 16, 23, 24, 29 and 32.

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Health System Concept 5c: Commissioning of maternity services

The concept: Commissioning is the process of assessing needs, planning and prioritising, purchasing and monitoring health services, to get the best health outcomes. [256] The process for service commissioning in NI was detailed in Section 5.1.1.

What we found: SPPG acknowledges that the current Health and Social Care contracting and funding model is a historical model that does not reflect demographic and service changes and results in inconsistencies in funding and practice between HSC Trusts. It is not based on expected evidence-based standards and outcomes. A new ICS is currently being designed [257] in response to previous reports on health and social care in NI, [112, 113]; this offers an important opportunity for maternity care and services. There are examples of service improvement driven through implementation of evidence-based standards, in NI and other jurisdictions (Appendix 11i).

Summary of positive service development (Appendix 11i)

Becoming accredited as a UNICEF Gold Award partner of the Baby Friendly Initiative

The Northern HSC Trust had been accredited by the UNICEF Baby Friendly Initiative in 2003 and reaccredited in 2017; in 2018 they achieved Gold Award accreditation, reaccredited in 2022. The evidence-based BFI standards are service-wide and interdisciplinary. They are designed to provide parents with the best care to build close and loving relationships and to feed their baby in ways that will support optimum health and development. The process of achieving the Gold Award was transformational. The efforts behind this achievement, aimed at ensuring sustainability, monitoring and progression, have had significant impact. This includes an important increase in rates of mothers giving any breastmilk from initiation to one year. New pathways and referral processes have been implemented to support women experiencing complex challenges with breastfeeding. Continued staff training will be critical, and management involvement and engaged leadership essential. It has been recommended that a dedicated Infant Feeding team is established, and that training for parents should be available on-line.

Problems with service commissioning were raised throughout the engagement by all groups, and they were a key concern of participants in the cross-sectoral workshop (Section 5.2). Problems identified included:

- The current commissioning process is a blunt instrument, founded on a historic position and based on population numbers, and is not sensitive to the changes in the model of care or increased complexity of need. Commissioning HSC Trusts independently from each other does not account for women who live in one HSC Trust area accessing services in another HSC Trust, which disadvantages some HSC Trusts more than others and discourages cross-Trust collaboration.
- Changes to the block contract with each of the HSC Trusts seem to be piecemeal rather than strategic or related to evidence of what services should – and should not – be in place.
- Is not clear how specific HSC Trust requests for service developments are generated - whether they are evidence-based or consider opportunity costs across the service, and whether they include consultation with all relevant staff or respond to service user feedback.
- While potentially enabling the development of services that meet community needs, this process has the potential to further aggravate inconsistency in services between HSC Trusts.

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- The performance management process does not relate to expected standards or outcomes, and it does not include a health economics perspective to ensure cost effectiveness.
- Current workforce models do not account for changes in the model of care or in population need, so substantive changes needed to workforce are unlikely to be visible to SPPG.
- Some respondents indicated that some HSC Trust requests to SPPG would be better be managed up clinical and professional lines in the HSC Trust.
- Neonatal and maternity services are commissioned through different programmes of care, so there is no mechanism to link the interdependency of these services.
- There is no relationship between litigation costs and service commissioning, so there is no incentive for investment to address failures in care (above and Figure 31).
- The process does not allow for the consideration of unintended consequences or equity; documentation on commissioning was silent in relation to equality impact assessments.
- There is no formal mechanism to link service commissioning with education commissioning, limiting the potential for a strategic programme of interdisciplinary staff development; this is discussed further in Section 6.3.8.

The impact: There are multiple missed opportunities to drive improvement through commissioning, and to realise the potential of the maternity services to improve population health.

Health System Concept 5c: Commissioning of maternity services

What is needed: In regard to maternity services, the new commissioning model for Health and Social Care should consider a regional model for the maternity and neonatal services, focused on meeting the needs of women and babies across the whole health economy, improving health and wellbeing outcomes, and addressing inequalities. [259] This would require development and implementation of an overarching strategic plan, a regional infrastructure for maternity and neonatal services, with evidence-based regional standards.

It is essential that monies allocated to maternity services are tracked to ensure it is linked to improving outcomes. Identification, measurement, and review of key outcomes for women and babies, women's views and experiences, and resource use including assessment of cost-effectiveness should be built into performance review processes, along with evidence of addressing the key barriers to safe, quality care for all women, babies and families identified in this report. There are examples of using such evidence-based, outcome-focussed commissioning in services from other jurisdictions to effect transformational change in services.

See Recommendations 1, 6, 7, 8, 9, 10 and 30.

Health System Concept 5d: Data and monitoring

The concept: Measurement of outcomes, experiences, and processes, and linkage across the different data systems, are essential to informing the assessment and improvement of health services. Health systems must ensure oversight and adequate monitoring of service provision and outcomes, processes, and experiences including shared, accessible, relevant, timely data. Without this information, decision-makers, staff, and the public are in the dark about service provision and about its impact - positive and negative - and cost-effectiveness, and they cannot assess, plan or fund effective service improvements. [258]

What we found: the structures: Some data on maternal and newborn health, care and services are available to the public in an annual report on Children's Health in NI, [119] including birth weight, maternal BMI, maternal smoking, and breastfeeding rates. A wide range of data on outcomes, safety, quality, and experiences are not publicly available, however, in contrast with other jurisdictions. [259]

A new data management system, encompass, is being developed in NI. The aim is to create a single digital health and social care record for everyone in NI. It will be important in developing the role of digital information in health and social care, helping to remove current siloes and barriers. [113] Encompass was implemented in the South Eastern HSC Trust in November 2023 and the plan is to roll it out across all HSC Trusts in NI by the end of 2025. It is envisaged that this system will enable access to real time data across the five HSC Trusts that can benchmark practice, track improvements, and ensure consistency in presentation of data.

The introduction of encompass has resulted in delays and gaps in the system and at present timely data are less accessible than previously. The current version is compatible with Badgernet, the UK-wide system for data collection in neonatal units, for limited data points only and will require double data entry mainly by neonatal nurses, with the potential for deterioration in data quality. Work is ongoing between clinical leads and encompass developers to address this. Importantly, this development will result in the withdrawal of the region-wide Maternity HandHeld Record (MHHR), currently held by women and including information about care and services. It is essential to ensure that this change does not result in less information being available to women especially about their own health and wellbeing.

What we found: the experiences: The ability to produce and share accurate, timely data depends on accurate data collection and management at every level, starting with data entry about care and outcomes for each woman and baby. All health professionals have this responsibility, but the majority of data entry is done by midwives into the NIMATS. NIMATS is directly linked into the Child Health System as well as fulfilling the legal requirement of midwives to notify births. We heard from midwives that the burden of this responsibility for accurate data collection, especially in the context of workload pressures, is considerable. Most of the dataset for NICORE, comes from the national Badgernet system; data entry by neonatal staff at HSC Trust level is complex and the quality of the data is limited.

The impact: A theme across all of the engagement, with women and advocacy groups as well as with all staff groups and managers, was the problem of accessing timely data of appropriate quality to inform decision-making and accountability at individual and at HSC Trust levels, and for regional oversight. Indeed accessing the data needed for this report required significant time to ensure appropriate quality and conduct international benchmarking. A number of key variables needed to examine safety and quality are not reported on the regional dashboard or in HSC Trust KPIs, such as ethnicity, socio-economic status, women's experiences and wellbeing, staff wellbeing, planned and actual place of birth, labour and birth in water, delayed cord clamping, and skin-to-skin contact at birth. Indicators of longer term health and wellbeing for women and babies are difficult to collect as the six-week check has been discontinued. In contrast with other UK countries, a wide range of timely data are not publicly available. [259, 260] The introduction of encompass will have a number of adverse impacts on the quality of maternity and neonatal data and information for women and work is needed to address this. [259, 260]

Health System Concept 5d: Data and monitoring

What is needed: Maternity and neonatal services need a consistent platform for data access across all pathways and systems to facilitate real time decision making and analysis in addition to providing support for monitoring outcomes, research, benchmarking, service commissioning and quality improvement. Quality of data is important and investment in data cleansing, quality assurance and analysis is required along with robust arrangements for data accountability at HSC Trust and regional level.

Implementation of the encompass system should ensure consistent, region-wide, publicly available information on maternity care and services; timely, region-wide and Trust-level data should be accessible to the public and to all staff, managers, and decision-makers. Consistent, region-wide, evidence-based information should be accessible and available for all women. The impact of removing the Maternity HandHeld Record (MHHR) should be addressed; women should have access to information about their own health and wellbeing.

A set of core variables should be agreed by an interdisciplinary region-wide group, including the perspectives of service users, staff and managers, to include measures of processes and outcomes for women and babies and staff wellbeing. Longer-term data on outcomes for women and babies should be collected. Work is needed to examine the best timing for this, perhaps at health visitor checks or routine immunisation visits. There are examples from other UK countries.

See Recommendations 1, 11, 26, 27 and 28.

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Health System Concept 5e: Accountability

The concept: Accountability is central to the provision of safe, quality care and services and requires the ability to measure, monitor and review outcomes and experiences in a timely way and to assess those against expected standards and policy. It requires evidence-based standards, criteria with agreed targets, timely accessible data, and clear indications of who is responsible at every level.

What we found: Accountability problems were raised by respondents throughout this work, at every level of the system. Examples included:

- Critical parts of the maternity service – e.g. maternity, neonatal, primary care, ambulance services, mental health – have different commissioning and reporting mechanisms, and communication mechanisms and forums to enable collaboration and to discuss, clarify, and act on shared concerns are lacking.

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- Accountability and reporting mechanisms are split along professional/disciplinary divides. Respondents noted that the person with the clearest line of sight into the whole maternity service was the Head of Midwifery, but across the HSC Trusts the structures in which the Heads of Midwifery work are inconsistent and they have limited responsibility to effect change. They have no access to key strategic and governance forums, and as a result they may not know all the relevant information about resources and governance.
- HSC Trust Boards lack timely and complete data and a clear line of sight to service challenges and service users experiences across the whole continuum of care; they cannot discharge their responsibility for accountability without this information.
- At the clinical level, the problems women described with postnatal care especially following caesarean birth indicated problems of accountability in ensuring a safe recovery following surgery with adequate pain relief. Post-surgery accountability of obstetricians and anaesthetists seems to be transferred to midwives but workload pressures prevent them from fulfilling this adequately, with clear impact on women's wellbeing.
- There is unclear accountability for responses to maternity emergencies in the community. Paramedics described inconsistent practices across HSC Trusts, and problems identifying who to liaise with to discuss shared concerns.
- GPs were concerned about accountability for women following caesarean birth when they were transferred home, as the mechanism for maternity service follow-up for women requiring pain relief, or with complications such as wound infections or symptoms of thrombo-embolism was unclear to women, and varied across HSC Trusts.

The impact: There is clear negative impact of the unclear and disseminated lines of professional and managerial accountability on safe quality care and services for women and babies, and safe working conditions for staff.

Health System Concept 5e: Accountability

What is needed: Clear lines of professional and managerial accountability for the maternity service – reflecting all the elements of care that women and babies need across their whole maternity journey and in all settings – are needed in DoH, NIAS, and HSC Trusts, at all levels from Boards to practitioners. HSC Trust Boards must ensure they have the information needed to ensure accountability for maternity and neonatal services.

There should be clear, accountable pathways for maternity emergencies in the community, and for postnatal problems with both physical and mental health, when care is shared across community and hospital professionals. These changes must incorporate the knowledge and skills of senior midwives.

There is potential for the Maternity and Neonatal Services Safety Oversight Group to lead this change, but their membership needs to include the range of interdisciplinary clinical and service user perspectives needed to understand the whole continuum of care in and outside of hospital settings.

See Recommendations 1, 13, 14, 17 and 25.

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6.3.7 Health System Concept 6: Evidence and capacity building for research

The concept: All health systems require high quality evidence to inform services. Evidence is needed on what the services should provide (e.g. interventions, practices), and also on how the services should work (e.g. organisation of services, communication, behaviour change, organisational change). Evidence is also needed on how services are working, such as equity/inequality of access and quality of services, the effectiveness and cost-effectiveness of practice including inadvertent/unexpected consequences, the views and experiences of women, staff, and students, where the gaps are, and what is needed to improve equity.

Much of this evidence can be drawn from international studies, but it is important to conduct research that is relevant to NI, to examine aspects of the safety and quality of care and services and to develop context-appropriate, effective, evidence-informed approaches to change. It is important to build research capacity across disciplines in NI. This is important in its own right to build knowledge and skills among health professionals and academic colleagues, to enrich the services and under- and post-graduate education, and to offer career development opportunities. It is also important in the development of critical appraisal, data analysis, decision-making, and leadership skills.

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What we found: While there are some experienced researchers conducting relevant studies, [261, 262] and there is collaboration in UK-wide studies and good collaborative links with UK and international researchers, very little funded research on the maternity services led by NI researchers is in place in NI. The deficit is across all professional groups: there are no midwifery clinical academics in post and the scarcity of clinical academics in obstetrics and neonatology or other professions involved in maternity care is striking. A small number of experienced midwife researchers are conducting relevant and important work but with relatively little funding support. [263]

The DoH and PHA contribute to work by UK-wide organisations including MBRRACE-UK, NICE, and Royal Colleges. The HSC Research and Development Division makes an annual contribution to the National Institute for Health, so NI researchers can apply to a range of National Institute for Health and Care Research (NIHR) programmes. But there is no coordinated, strategic programme of research funding either for research studies or for capacity building. Funding from DoH, charities, and HSC Trusts is piecemeal, limiting the scale and scope of what research can be conducted.

Educational opportunities are limited for all maternity professionals. Few medical colleagues study for Doctor of Medicine (MDs) or Doctor of Philosophy (PhDs) in NI. Some midwives have PhDs; they are predominantly working in education rather than practice, management, or policy. This is a serious rate-limiter on the development of essential knowledge and skills that are needed to drive the development of midwifery and to optimise the contribution midwives make to women, babies, families and the health system.

QUB offers an MSc Advanced Professional Practice Programme with Midwifery Pathway, but this is not research intensive and is not a foundation for moving on to doctoral work. Funding for higher degrees is available, but not at the level commensurate with the salary of an experienced midwife, limiting those who are able to apply. As a result, midwives have studied for Masters and doctoral qualifications in universities in other jurisdictions.

This situation is in contrast to the rich landscape for research in the maternity services and specifically in midwifery has developed over the past few decades across the UK. The NIHR is currently investing heavily in research funding and developing research careers for midwives and nurses in England. [264]

The impact: The low level of funded research and post-graduate academic engagement across the maternity service has resulted in a deficit in a questioning approach, analytical and problem-solving skills and in driving an evidence-informed service. There is a particular need to invest in a pathway for postgraduate development and research leadership for midwives. There is a missed opportunity to benefit from the investment in postgraduate education of midwives with PhDs working in QUB as low staffing ratios mean that these post-doctoral university staff do not have time to develop strong research activity. A new Head of School and Professor of Midwifery was appointed in August 2024 at QUB and there is an opportunity to build a programme of capacity building under her leadership.

Health System Concept 6: Evidence and capacity building for research

What is needed: A coordinated, strategic programme of research funding both for research studies or for capacity building, whether specifically for NI or as part of the NIHR developments.

A pathway for research development for midwives in NI is needed to accelerate the development of knowledge and skills to improve safety and quality in maternity care. This should start from undergraduate level – NMC standards for midwives include the development of critical appraisal and scholarship knowledge and skills – and include funded places for midwives to study at Masters and doctoral levels, and support for post-doctoral and senior research positions. As well as project and programme funding, this will require investment in research leadership and would benefit from building on some of the existing strong collaborative links that NI midwifery researchers have developed. Strong support is needed to maximise the contribution of the incoming Professor of Midwifery to research and to capacity and capability building.

See Recommendations 1, 3, 6, 7, 31 and 32.

6.3.8 Health System Concept 7: Education, training and staff development

The concept: Safety and quality require well-educated staff who participate in appropriate, regular updating and development opportunities, and the development of a learning culture across organisations.

This section draws on information provided by the DoH on the education commissioning process, by QUB on their midwifery education provision (Section 5.1.2), and from a rapid review of effective interventions for interdisciplinary education for emergencies, conducted for this report; details of both are in Stockdale et al 2024, unpublished Appendix 5f. Midwifery students and educators were involved in the engagement and in the cross-sectoral workshop, and educators were members of the Advisory Group.

Pre-registration midwifery education

Details of current provision are in Section 5.1.2.

What we found: The quality of undergraduate/pre-registration midwifery education was widely acknowledged throughout the engagement to be high, and this perception is supported by positive findings of the National Student Survey 2024 [251]. Both the BSc and MSc programmes introduced a new curriculum in 2021, based on the new evidence-based NMC standards for midwives, [68] which have a strong focus on safety and quality. Students also benefit from use of the high fidelity simulation suite at QUB (Section 5.1.2). There was active involvement of service users in the design, implementation, and evaluation of the midwifery curriculum (Appendix 11j).

It was clear from our engagement that midwifery students and NQMs are knowledgeable, committed, and insightful, with a strong knowledge base, ability to draw on current evidence, an understanding of the system-wide challenges, and with a knowledge of quality improvement.

The ratio of NMC registered midwifery staff to midwifery students of 1:24 compares unfavourably with the RCM-recommended ratio of 1:19. Recruitment and retention of pre-registration MSc midwifery students (shortened programme), who are required by the NMC to hold registration (or be eligible to) as adult nurses, is challenging and may be due to current staff shortages in nursing, reluctance to resign from a permanent position, and the current negative profiling of midwifery and maternity care in the media.

Specialty training for paediatricians

The majority of neonatal care in NI, especially for emergencies and particularly in the DGHs, is provided by general paediatricians. The current consultant group have extensive neonatal experience, but changes in the new paediatric training curriculum are likely to have an impact on safe care for babies in the future in regard to airway skills. The new curriculum only requires general paediatric trainees to show airway skills up to the point of intubation, and these can be assessed in a simulated environment. Additional training will be required to ensure safe neonatal care in emergencies as new consultant appointments are made in the future.

Post-registration education

Details of current provision are in Section 5.1.2.

What we found: post-registration education and training: Strong collaborative working is in place between university, practice-based midwifery educators, consultant midwives, and clinicians within and across HSC Trusts to identify the best educational response to regional and local insights gained in relation to near miss events, Datix reporting and reported complaints.

A number of challenges were identified, related to midwifery and wider maternity services including:

Specific challenges for midwives and midwifery students:

- Midwifery students and NQMs are struggling to gain experience in some core midwifery skills in practice as a result of the workload issues and the reduction in the number of spontaneous vaginal births. As a result the high-quality undergraduate/pre-registration programme and the recent increase in funded student places are limited in their ability to mitigate workload challenges.
- Midwives are struggling to complete mandatory training requirements because of workforce pressures. It is essential that this is addressed and a programme of updating, informed by midwives and Heads of Midwifery, should be implemented to address essential knowledge and skills.
- Ongoing education/CPD for midwives lacks a strategic direction; it focusses on individual clinical topics such as antenatal screening, diabetes in pregnancy, and record keeping for midwives, with little provision on key skills of relationship-based care, behaviour change and interdisciplinary team working.
- The midwifery component of HSC CEC work is under-resourced relative to other professions; there is a relatively small midwifery teaching resource (2 WTE midwives out of a total staff of 35). Importantly, CEC programmes have no academic accreditation, they are not linked to pre-registration midwifery programmes, and there is significant potential to embrace greater alignment to NMC standards of proficiency for midwives. It is not clear how its programme of work relates to HSC Trust-based education provision.
- The work of Practice Education Facilitators (PEFs) includes supporting midwifery students and midwives in practice and liaising with academic partners. Respondents noted that while their input and support was well regarded, PEFs were not consistently registered midwives. This was reported as having led to significant problems and the need to work around issues relating to their lack of professional knowledge.
- None of the HSC Trust representatives on the Nursing and Midwifery Education Commissioning Group are midwives. On this group of around 20 core members, the Chief Midwifery Officer is the only midwife member. The CNO group and the Strategic Midwifery Sub Committee of CNMAC offer advice on commissioning. Communication about midwifery education is channelled through the HSC Trusts' Director of Nursing teams rather than negotiated directly with the Heads of Midwifery as the lead professionals.
- A 2022 report on post-registration education and training for nurses, midwives, and allied health professionals in NI has examined structural issues and identified important recommendations to improve provision. [118] Many of the concerns identified were reflected in our engagement. This report has not yet been implemented: implementing these recommendations would address many of the concerns raised in the course of our work.

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Challenges for interdisciplinary learning and development:

Deficits in interdisciplinary education and training, especially for emergencies, have been identified throughout this report. Commissioning and governance of education is currently siloed. There are different processes and different funding streams for different professions, and there is no obvious mechanism to link strategically to service needs or to services for women and babies from an interdisciplinary team perspective. There is no commissioning route for interdisciplinary education and training for emergencies. There are blind spots and missed opportunities in the commissioning of post-registration education for all staff; this includes relationship-based care and partnership working, working in out-of-hospital settings, and a range of public health topics including obesity and tackling inequalities.

An important gap for both education and research in that universities seem to be viewed as providers rather than partners in education. They do not have input into the annual planning process, making it difficult for them to plan strategically and provide cost-effective modules and programmes. There is potential for a more pro-active partnership to develop innovative approaches especially to post-registration interdisciplinary education.

Evidence on effective interventions in education and training for emergencies (Appendix 5f) indicates that what is needed is an open culture of learning, improved psychological safety, reduced incivility within the workplace, increased motivation to learn and most importantly, the provision of person-centred, more effective care. [268] New midwifery graduates are entering the workplace having learned these skills, but they struggle to apply them in practice as the current workplace culture does not consistently demonstrate these attributes.

Context-specific training is important for out-of-hospital emergencies to ensure familiarity with geography and available equipment. NHS Wales has developed a community PROMPT course that is relevant (Appendix 12c). [265] There is an important role for simulation. QUB's high fidelity simulation suite has experienced interdisciplinary staff to facilitate team learning. It is an important resource on which to build an effective programme of interdisciplinary learning especially for emergencies and offers opportunities for collaboration with CEC to share learning about simulation.

A Learning Needs Analysis is especially important in regard to emergency situations occurring in different contexts and environments such as midwifery units and home. Learning needs analyses should be informed by the perspectives of all those likely to be involved in emergency situations, including midwives, midwifery students, obstetricians, neonatologists, paramedics, doulas, women and partners. An example of a positive service development designed to meet the needs of interdisciplinary staff in Wales for emergency training is shown in Appendix 12c.

The impact: There is a critically important missed opportunity to enhance safety and quality by building a learning culture across the whole maternity service, with a unified, strategic approach to education and training programmes that inform and underpin service improvement and staff development. Staff development enhances retention and staff satisfaction, important outcomes in themselves and for the service.

Health System Concept 7: Education, training and staff development

What is needed: A learning culture is needed across the whole system, including HSC Trust Boards, all levels of the service, and all staff groups (Appendix 12c). [266, 267]

A unified approach to the commissioning of post-registration education is needed to enable strategic investment in evidence-based service improvement. A longer-term commissioning cycle – perhaps three years – and the involvement of universities in planning would enable most cost-effective provision. NHS Scotland and NHS England offer good examples of this. Education programmes should build on a learning needs analysis to understand what interdisciplinary teams need rather than offering pre-defined programmes. To work towards an open culture of learning within and across maternity care professions, there needs to be a comprehensive and systematic approach to interdisciplinary human factors education that builds on the foundational knowledge provided within the current PROMPT program. An important specific need will be to support general paediatricians to develop and maintain airway skills for neonatal emergencies, to ensure safe emergency care in the DGHs.

See Recommendations 1, 9, 10, 11, 29 and 32.

6.4 What does this all mean for safe, quality care and services?

This systematic analysis has identified some clear messages about midwifery and wider maternity care and services in NI:

6.4.1 System-level challenges

- The extent of women's and babies' adverse outcomes and experiences, and of the pressures on staff, especially midwives, are not always visible to staff or to the system. There is limited scrutiny and monitoring of appropriate indicators at HSC Trust and at regional levels.
- There is a narrow focus on safety and quality for women and babies. Safety, quality, and equity matter from early pregnancy through labour and birth to postpartum and the early weeks of life, across all community and hospital settings. Medium- and long-term outcomes for women and babies matter as well as short-term outcomes, including physical and mental health and wellbeing.

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- There are pockets of positive, sustained provision of high quality services but genuine partnership working with women, interdisciplinary discussion and consultation, and effective joint planning were not consistently enabled by the current system. Staff have the potential to deliver a higher standard of safe, quality care and services.
- Women, families, communities, and the majority of staff have very little voice in the system or influence on planning, provision, monitoring and review of services or provision of education and training.
- The high rates of induction of labour and caesarean birth in the context of high workforce pressures are driving a task-focussed service that is compromising safety and quality for women and babies and resulting in stress for staff and for the system as a whole.
- There is limited audit and evaluation of the implementation of the increased rates of technical interventions in labour to alert the system to impact and unintended consequences, or to guide service improvements.
- There are system-level barriers between HSC Trusts, between hospital and community services, between maternity and neonatal services, between staff groups, between staff and senior management, and between the needs of the service and the provision of education and training, that are compromising safety, quality, and equity.
- Current work on ‘safety’ and ‘quality improvement’ focusses on specific practices and interventions and a focus on short-term outcomes. This results in a narrow focus and higher value on specific actions that women and babies do receive (ie technical interventions) while not seeing what they do not receive (ie communication, partnership working, support, relationship-based care, continuity, kindness, avoiding adverse consequences of unnecessary intervention).
- The system as a whole - including all staff groups and workforce, audit, governance, accountability, commissioning, policy, and education - is not focussed on safety and quality for all women and babies and across all care settings equally, or across the whole continuum of care, or on the impact on short-, medium- and longer-term outcomes and experiences.
- There is a need to develop a more strategic approach to education and training that supports consistent region-wide interdisciplinary standards and practice, and to build capacity and capability in research to build an appropriate evidence base and to inform evaluation and service improvement

6.4.2 Challenges for provision of quality midwifery care and services

- Service pressures are affecting all staff, but there is something of a perfect storm affecting midwives, the result of which is that midwives are not consistently able to contribute the full range of their knowledge and skills.
- There is a lack of genuine understanding, support for and valuing of core midwifery skills and of their role across the whole continuum of care.

- A key role of midwives is to support, inform, and reassure women, and to build confidence in women's own abilities. The current culture and the constraints on midwives' time act against that, however.
- Women and babies were not consistently receiving key components of safe, quality midwifery care that optimise normal, physiological processes, and this was resulting in opportunities being lost to prevent clinical and psychological complications and to promote health and wellbeing.
- Midwives are the only staff group with responsibilities that include all women, babies and families, across the whole continuum of care, and in all settings; but even within midwifery there are barriers, for example between hospital and community services and between labour ward, alongside MLUs, and postnatal care.
- The care of women in pregnancy and postnatally with psychological, social and cultural complexities is primarily the responsibility of midwives. Midwives have a fundamentally important role in tackling inequalities, and in coordinating the care and services for vulnerable women and families. This work is not always recognised or appropriately supported.
- There is no backfill to cover their clinical work and limited support from other staff groups for the work of midwives who take on important responsibility for the delivery of service improvement, governance and quality agendas.

6.4.3 What is needed?

- A culture shift is needed to re-balance the relationship between women and their families and staff and the system.
- Equitable, sustained improvement needs effective evidence-based actions, the meaningful involvement of women, families and staff, and a whole-system response including governance, accountability, monitoring, funding, policy, education, and research as well as practice.
- A broader political and policy focus on maternal and newborn health and care is needed to realise the potential of the maternity services to improve population health and wellbeing.

6.5 Considering the death of the baby in the Coroner's report: a health system perspective

This report was commissioned in response to the Coroner's report on the circumstances resulting in the distressing death of a baby. A retrospective lens is always limited, but there are important lessons to be learned when considering what happened in this case in the light of the findings of this work. What would make a difference for the future?

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Access to consistent written information for women on all places of birth, including evidence on the benefits and contraindications/risks and information about indications and arrangements for transfer and emergency response times, and with adequate time for discussion with staff, would support all women in their decision-making. An open and supportive whole-service culture, with regular communication and support for midwives working in the very different environment of out-of-hospital settings, would enable regular consultation and collaboration with senior midwifery and obstetric colleagues. A senior midwife with experience of out-of-hospital working taking an accountable leadership role in the midwifery unit could support staff, be available for informal discussion, and ensure protocols and emergency procedures were in place. Effective administrative support to make the emergency calls and record decisions and actions, from an administrative colleague or maternity support worker, would allow the midwives to focus completely on the mother and baby. More immediately accessible senior staff familiar with and specifically on-call for the midwifery unit and with 24/7 access by phone and video link with staff - including a senior midwife with experience of out-of-hospital practice and link obstetric and neonatal consultants - could provide input during the episode. A better prepared and more streamlined ambulance response with clear shared regional protocols for maternity emergencies would enable a faster emergency response. Planned and supported context-specific interdisciplinary education and training for emergencies, involving midwifery unit midwives and MSWs, obstetric and neonatal consultants and ambulance staff training together would enable the whole interdisciplinary team to learn more, work faster, and to be better prepared. Prioritising communication with and support for the family would help the family, and also inform changes needed. A more rapid, streamlined SAI process, ensuring whole-system learning and follow-up to implement necessary changes, would improve services and help to prevent future adverse outcomes.

The learning from this work has influenced and has been incorporated in the Requirements for safe, quality care and services in midwifery units, Key Conditions, and Recommendations of this report (Section 8.0) and should be incorporated in future service provision.

The impact of this experience for the parents, and for the other parents who spoke with us about their perinatal loss and severe damage to their babies, cannot be forgotten. Their grief must act as a catalyst for positive change.



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WHY THIS MATTERS

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7.0 WHY THIS MATTERS

7.1 For women, babies, and their families

All women and babies must be safe - physically, psychologically, socially and culturally. Not only does their safety directly affect their survival and immediate health and wellbeing, but physical, emotional, and mental health problems can persist and affect them and their families in the longer term. This work has shown that in NI, outcomes and experiences for many women and babies are unacceptable, and out of alignment with current best evidence and international benchmarking.

For all women and babies to be safe, they need access to care and services throughout their maternity journey that do two things:

- helps women to stay healthy and to enjoy the birth of a new life and the formation of positive new family relationships, and to be ready for healthy subsequent pregnancies.
- provides timely appropriate treatment and intervention when necessary.

Both of these aspects are essential. The balance between calm, kind, skilled, care and timely action when problems occur is at the heart of safe, quality maternity services. Pregnancy and childbirth can go unexpectedly wrong and a range of interventions and sometimes emergency responses are needed. Women must have relevant information at the right time, with the right level of informed and clear discussion and support to enable evidence-informed decisions. Her chosen birth companions should have the opportunity to be with her, and if she knows and trusts her caregivers, her body is more likely to respond positively. If childbirth is treated like a high-pressure, high-risk environment, that is how staff will behave and women's physiology will respond accordingly, with high levels of stress hormones, fear and distress. This work has shown that the maternity system in NI does not currently have the optimum balance between these aspects.

Skilled care and kindness matters for women who experience the loss of a baby or damage to themselves or their babies; this is critical to their recovery. Adverse outcomes can happen even with excellent care and when they do this report has shown that there is an important opportunity to help parents at this very difficult time, and to help in the healing process, whether following this birth or in subsequent pregnancies. One woman who lost her baby said, *'I have never felt so held by the health service'*. Every woman should experience this standard of care.

This is formative time for the baby. It is the start of life, and what happens to the baby in pregnancy, birth, and in the early days and weeks will affect the rest of their life; it is well known that the first 1000 days of life influence lifelong health and wellbeing. [268] This time offers a unique opportunity not only to avoid harm, but to positively enhance the baby's health, wellbeing and development. This report has shown that the care of babies and their mothers in the early days and weeks is a significant challenge in NI. Implementing the recommendations outlined in this report will help to change this.

7.2 For staff and the services

The quality of the maternal and newborn services matter for the staff too – they are the most important resource the health service has. Their physical and psychological safety and wellbeing matter so they can provide the best possible care for women and babies. Their health and wellbeing matters to them, to their families, and to their communities. All staff including midwives, obstetricians, paediatricians, neonatal nurses, MSWs, ambulance staff, community workers, and managers have the right to be treated well at work. Staff matter to the system; staff who are treated well, remunerated appropriately, supported at work, and enabled to do the best job possible are more likely to stay and to continue to work. There is also an important return on the investment of educating and supporting them, and this is likely to act as a magnet to attract new staff and good quality students to join the workforce. This work has shown that staff in NI have the potential to provide safe, quality, kind and compassionate care but the maternity system is not enabling them to do this consistently and is not effectively supporting them to excel or to do the work to the standard they know they is needed.

This report has a special focus on midwifery. Midwifery matters and has an impact right across the system. Midwives provide essential care for all women and babies across their whole maternity journey from pre-conception to the postnatal period and the early weeks of life, laying the foundation for longer-term population health. They have a unique contribution to make to mitigating the impact of inequalities, providing care and support for all women and babies, including those who need additional care because of clinical, psychological, social, and cultural factors. They also enable the work of others in both community and hospital, and they collaborate with a wide range of health and social care colleagues. Obstetric services in particular need the collaboration and support of midwives, and midwives are critically important for system-wide functions such as quality improvement, audit, risk management, and bereavement services. Strengthening midwifery as a key component within the wider health system is increasingly recognised internationally as an important strategy for strengthening quality care for women and babies. [58] This report has shown that midwives in NI are not consistently able to provide all of the safe, quality care that they know is needed.

There is an important economic argument for investing in quality maternal and newborn services. Investing in improving the service is likely to reduce adverse outcomes – important in itself, and also to free up resource that can be put to better use. There is consistent evidence that midwives provide quality care that is safe and reduces costs for maternity services resulting in efficient use of resources [130] – if they are supported and enabled by the health system. Investment in these very early stages of a baby’s life and the formation of a family has long term benefits and cost savings. [269, 270] This report has shown that such investment is lacking. At the same time, the costs of litigation arising from cases of negligence in maternity care equal the cost of providing the whole maternity service. Implementing the recommendations of this report could help to turn this round.

7.3 For population health and equity

Maternity and newborn care and services have unique potential to build a foundation for sustained improvement in children’s health and development in early years and beyond, in women’s health and wellbeing, mental health, attachment and family relationships, in equity of outcomes and experiences and tackling inequalities, and in broader population health and wellbeing. [8, 154] To fulfil its potential, the system as a whole needs to recognise that safe, quality care and services must incorporate promoting health, wellbeing, and equity, enabling and supporting all women in pregnancy and birth and their transition to parenthood, and building a platform for strong, healthy children, families, and family relationships. [271] To achieve this, the current model that focusses on acute care needs to shift to a model based on the needs of all women, babies and families across the whole continuum of care, aligned with the ambition of the Bengoa Report and Health and Wellbeing 2026 (Figure 32). [112, 113] and benefitting from the opportunity afforded by Integrated Care Services to transform maternity and newborn care and services. The positive impact would resonate out across the lives of families and communities.

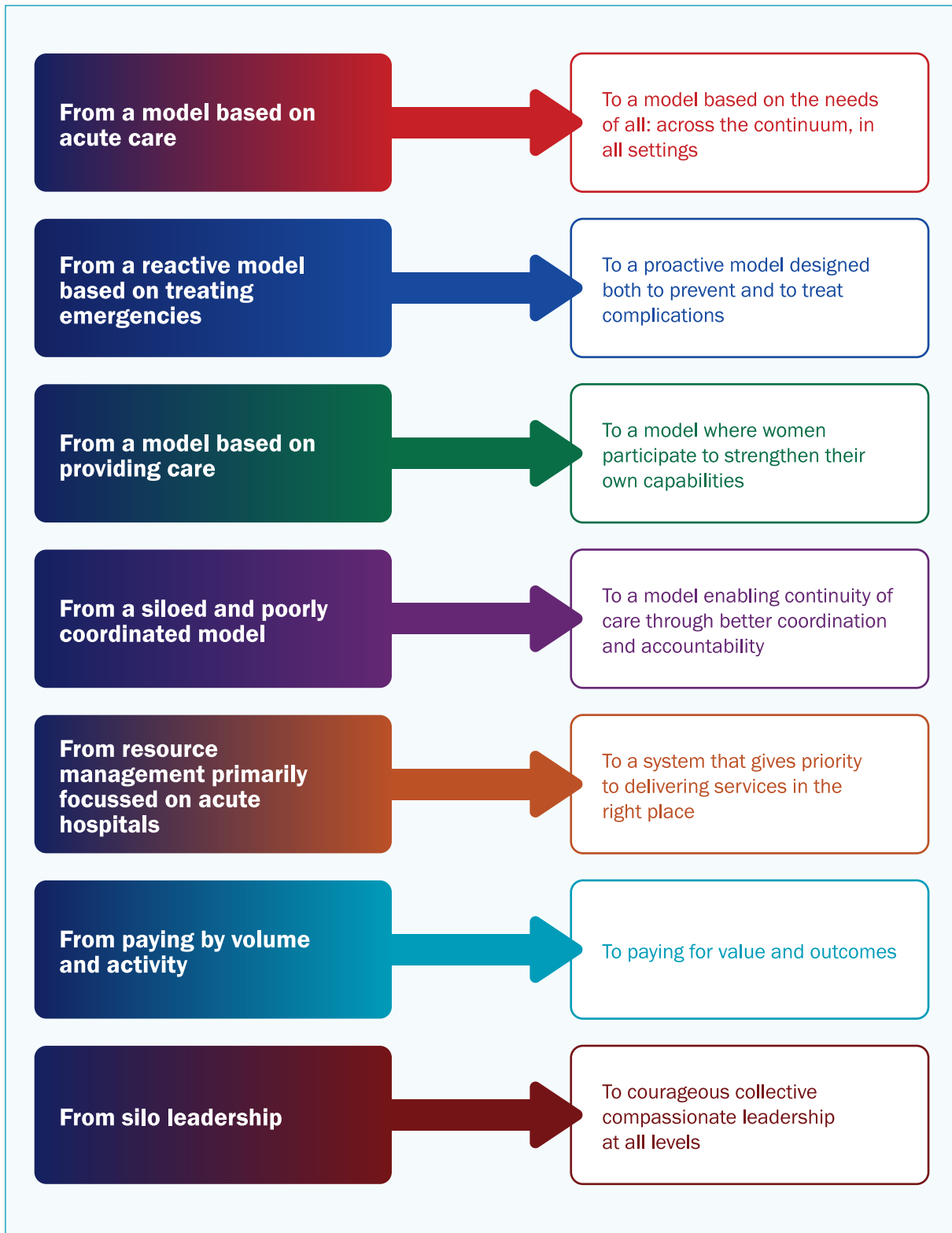


Figure 33: Model of maternity and newborn care based on the needs of all women, babies and families across the whole continuum of care, aligned with the ambition of the Bengoa Report and Health and Wellbeing 2026. [112, 113].



FROM EVIDENCE TO ACTION: TRANSFORMING MATERNITY AND NEWBORN CARE AND SERVICES

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8.0 FROM EVIDENCE TO ACTION: TRANSFORMING MATERNITY AND NEWBORN CARE AND SERVICES

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The extent and diversity of the issues identified indicate that a regional transformation plan is needed. There are strengths to build on including existing positive examples and developments; committed staff, women, families, and advocacy groups who want to engage; and an appetite for change among many senior colleagues. There is learning from other UK countries about structures and processes that work, and there is good quality evidence to inform care and services and approaches to implementation.

This final section of the report identifies the key conditions for safe quality care in all settings. Recommendations are made for regional strategic developments; safe, quality care in all settings; data, monitoring and review; research and evaluation, and building for the future.

8.1 Building a shared understanding: the importance of language and shared concepts and values

In the course of this work it became apparent that some terms were inadvertently contributing to misunderstandings. Language can reflect culture and assumptions, and can inadvertently cause barriers and misunderstanding, or prevent communication of important information. It is an important consideration in developing shared concepts and values and improving communication with women and families, between staff, and across organisations. From this point on, the language used in this report will reflect the importance of building shared concepts and values. For example:

The terms '**community midwifery unit**' and '**alongside midwifery unit**' will be used in place of Freestanding and Alongside Midwifery Led Units. No part of the system should stand alone. Working across disciplines is essential for safe, quality care in all settings.

Community and alongside midwifery units and home births are distinct and different settings but they share many attributes and challenges including a different culture, staffing, and distance from labour ward. Whenever these shared characteristics are relevant the term **‘out of labour ward’** will be used to denote all three settings.

Multiple disciplines provide care in hospital. The term used will be **‘Maternity Unit’** in place of Obstetric Unit.

The term multidisciplinary is commonly used in health care, [272] but it does not reflect the extent of common purpose and integration needed for respectful team working and coordinated care and services. This coherence is better reflected in the term **‘interdisciplinary’**.

Maternity care and services and neonatal care and services are commissioned separately, and often seen as separate within governance structures. For women and babies, however, they are both critically important at different stages of their care. The mother is essential to her baby at all times. They form a biological unit [273]; keeping women and babies together is an ethical imperative, and separation of babies from their mothers should be prevented/minimised whenever possible. The services must be considered as closely interlinked. The terms **‘maternity and neonatal’** and **‘maternal and newborn’** will be used to denote the whole scope of the services needed for women and babies.

8.2 Requirements for safe, quality care and services in midwifery units: addressing Terms of Reference 1 and 2

This section addresses Terms of Reference (ToRs) 1 and 2, as requested by the Coroner for NI:

1. Conduct a comprehensive review of the number of staff, experience, education, training and policies required birth for Freestanding Midwifery Led Units (as outlined in para 195 of the Coroner’s report).
2. Consider the need for further guidance to all HSC Trusts in relation to the Coroner’s findings regarding the management of BMI and shoulder dystocia.

These ToRs require identification of requirements specifically for Freestanding MLUs (described as community midwifery units hereafter). This work has shown that there is also a need to ensure safe, quality care in alongside midwifery units, and for home births. For this reason, these other out-of-labour ward settings should also meet these requirements.

This work has shown that no part of the maternity service can safely stand alone. There should be a system-wide infrastructure in which midwifery units are fully supported, and they should be integrated seamlessly into the wider maternity services. The requirements for community and alongside midwifery units and home births detailed here must therefore be implemented in the context of a supportive health system and the whole-system key conditions described in Section 8.2.3.

8.2.1 Identifying the requirements: methods

There is limited research evidence to inform specific requirements for out-of-labour ward settings including midwifery units and home birth services. Research evidence was summarised in Section 6.2.5. Sources of information used to answer these specific questions includes:

- Systematic analysis of evidence-based guidance and standards:
 - NICE guidance: NG 235, NG4, NG 201. [109, 155, 274]
 - RCOG Green Top guidance. [123]
 - BAPM service and quality standards for provision of neonatal care in the UK. [275]
 - BAPM practice framework for neonatal support for Freestanding MLUs and home births. [212]
 - The All Wales Midwifery-Led Care Guideline. [276]
 - the international Midwifery Unit Network (MUNet) Standards [213]
- International examples of positive service developments in community midwifery units (Appendix 12).
- Evidence reviews by Expert Group members (Appendix 5).
- Best practice consensus of Expert Group members when relevant research evidence is weak or does not exist.

Grampian, Scotland provides an example of sustainable safe, quality care and services in community midwifery units, integrated into the wider maternity services (Appendix 12b):

Summary of positive service development (Appendix 12b)

Demonstrating sustainable safe practice in Community Midwifery Units across NHS Grampian, Scotland

The two Community Midwifery Units in NHS Grampian provide 24-hour midwife-led intrapartum care, a range of antenatal and postnatal services, and obstetric-led clinics. To ensure safe practice, an interdisciplinary ‘huddle’ takes place twice a day, involving staff both from the Community Midwifery Unit and the maternity unit, to jointly review all the women in labour in all settings and to plan together any changes needed. Virtual attendance is supported. Each Community Midwifery Unit has 24/7 senior midwifery cover and a lead consultant obstetrician. Providing this level of maternity care in areas of high socio-economic deprivation has improved access for women, including for complex problems such as substance use and other mental health concerns. An important lesson learned is that a combination of experienced, core and newly qualified staff are needed within each Community Midwifery Unit team to enable development and succession planning of the interdisciplinary workforce. Teamwork, strong relationships, and positive communications are essential to ensure positive outcomes.

8.2.2 Requirements for community and alongside midwifery units and home births

Eight requirements for community and alongside midwifery units and home births have been identified:

Table 5: Eight requirements for community and alongside midwifery units and home births

Requirements for community and alongside midwifery units and home births	
1	Development and implementation of consistent, evidence-informed and context-specific standards, policies, guidelines, with commitment to evaluation and ongoing improvement
2	Ensuring evidence-informed decision-making, information for women, and knowledge and skills of staff
3	Ensuring appropriate staffing and experience in midwifery units and home birth
4	Implementing interdisciplinary support, consultation and regional referral pathways for midwifery units and home births including regional protocols and procedures
5	Pathways and regional policies and protocols for emergency procedures in out-of-hospital settings a) Considering shoulder dystocia and other emergencies in out-of-labour ward settings
6	Ensuring education and training for safe, quality care and services in out-of-hospital settings, and interdisciplinary learning opportunities including for pre-registration students
7	Appropriate funding, leadership, and governance for out of-hospital settings
8	Community engagement to ensure equity and inclusion, local relevance, meeting community needs

Details of each requirement are:

Requirement 1: Development and implementation of consistent, evidence-informed and context-specific standards, policies, guidelines, with commitment to evaluation and ongoing improvement

- One set of evidence-based regional standards, policies and guidelines must be agreed and implemented for all women and babies in all out-of-labour ward settings in NI, to avoid confusion for women and staff alike. They should be regularly updated in line with new evidence and evaluated to monitor the impact for women and staff.
- A whole-region approach to operating procedures and protocols must be implemented, to be adapted for local relevance in regard to local circumstances such as geography and access to appropriate services. This should be led by a consultant midwife and developed by an interdisciplinary group with service user membership, to include senior midwives with experience in out-of-hospital settings, obstetricians, neonatologists/paediatricians, anaesthetists, paramedics, GPs, maternity/neonatal service user group representation, researchers, and representation from HSC Trust senior management.
- These standards must be publicly available and used to inform commissioning, monitoring, and review of services and outcomes.
- The GAIN guideline for admission to midwife-led units in NI [197] was developed through a collaborative, interdisciplinary, and evidence-based process. This guidance should be the starting point for the new regional guidelines, updated in line with these requirements and informed by the following resources:
 - NICE NG235. [109]
 - BAPM practice framework for neonatal support for Freestanding MLUs and home births. [212]
 - the international Midwifery Unit Network (MUNet) Standards. [213]
 - PHA framework for working outside of guidance. [159]
- A positive service development by Cooper et al (Appendix 12a) describes the regional use of a validated Maternity Unit Self-Assessment tool (MUSA), endorsed by NICE, that helps midwifery units to assess and to standardise policy and practice and to identify areas for improvement. This tool is available in <https://www.musaframework.org/musa-framework> and can be used to support monitoring and review of the service.

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Requirement 2: Ensuring evidence-informed decision-making, information for women, and knowledge and skills of staff

- Women have the right to make decisions about their care and to have those decisions respected and supported.
- Regional resources should be developed with and for women and families, aligned with the regional standards, policies, and guidelines and evaluated to monitor impact and accessibility. Evidence-informed information should be provided to the woman and her family in accessible, appropriate language and format. This should include information on who to contact to book birth in midwifery units or at home.
- The resources for women that accompanied the GAIN guideline for admission to midwife-led units in NI [197] should be updated in line with the revised guideline as the basis for this regional information and made available to women.
- All women must be given the opportunity to discuss all places of birth including evidence on the benefits and contraindications/risks, with information about indications and arrangements for transfer and emergency response times.
- All staff should have the knowledge and skills to work in partnership with women, and to provide balanced, timely, evidence-based information about both risks and benefits of options.
- It is important to have consistency of practice, but it is also important to assess each woman's individual circumstances and to identify deviations from normal physiology on an ongoing basis. Complications can change, develop, and sometimes resolve over time, and ongoing individual assessment is essential for all women.
- Support from clinically based senior experienced midwives and strong interdisciplinary working practices are critically important in supporting women and midwives in decision-making.

Specific consideration of high maternal BMI in out-of-labour ward settings

- NICE guidance on management of BMI has been recently revised. [109] It has been endorsed by the DoH in NI and must form the basis for practice.
- Individual assessment of all women is required when planning place of birth, which should include consideration of booking BMI, weight gain in pregnancy, individual physique and body composition, and previous birth experiences.
- Women should be advised that in general, the higher their BMI at booking and particularly with a BMI above 35 kg/m², the greater the likelihood of complications such as caesarean birth, postpartum haemorrhage, stillbirth, or neonatal death, and there is a higher risk of transfer to a maternity unit. [109] The risk of complications is higher for women having their first baby.

Requirement 3: Ensuring appropriate staffing and experience in midwifery units and home birth

- A core team should be available for midwifery units 24/7, on call or on site, to ensure safe care for women and babies at all stages of the continuum of care. For women in labour this should include one-to-one care in labour, with a second midwife on site once the woman is in established labour, and with at least one maternity support worker to assist throughout. Administrative support should be available, for example for supporting communication, finding notes, making telephone calls and appointments, as a minimum 9-5 on weekdays with on-call weekend cover.
- For home births a midwife should be available to provide one-to-one care in labour with a second midwife on site once the woman is in established labour. At least one of these midwives should have experience of working in settings outside of labour ward.
- There should be visible and consistent leadership for midwifery units and home births. A senior midwife (Band 7 or above) with experience of out-of-hospital care must be on call or on site 24/7 to provide clinical advice or attend as required.
- All senior midwives on the on-call rota should be familiar with the midwifery units in their HSC Trust and have knowledge and experience of working in out-of-labour ward settings.
- A staffing escalation policy in the event of workforce shortage should acknowledge the distinct staffing of the midwifery unit and for home birth. Maternity units should have their own on-call system for midwifery staffing to avoid 'pulling' midwives from the community or alongside midwifery units.
- Support for community and alongside midwifery unit and home births should be included in consultant job plans.
- The on-call consultant obstetrician and neonatologist should know that they may be asked to provide advice 24/7 for the whole HSC Trust including midwifery units and home births. They should be familiar with the out-of-labour ward settings and the equipment available.

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Requirement 4: Implementing interdisciplinary support, consultation and regional referral pathways for midwifery units and home births including regional protocols and procedures

- Interdisciplinary working, consultation and referral pathways must be easily accessible and seamless. The woman and partner should be included in interdisciplinary discussions either virtually or in person.
- Consultant obstetricians should work in partnership with midwives who work in out-of-labour ward settings and be available for discussion if needed. For women planning birth 'outside of guidance' interdisciplinary consultations should involve a senior midwife with a remit for out-of-labour ward settings. [159]
- A forum for regular interdisciplinary meetings will build knowledge, relationships, and trust between the team members providing and supporting care in out-of-labour ward settings.
- Procedures must be in place to ensure effective and timely interdisciplinary communication. This should include consideration of all women in labour in out-of-labour ward settings in handover briefs and labour ward safety reviews, with the option of virtual involvement of midwives caring for those women.

Requirement 5: Pathways for and regional policies and protocols for emergency procedures in out-of-hospital settings

- A regionally agreed pathway must be developed and agreed with NIAS to support community midwifery units and midwives conducting home births, with operational transfer procedures that promote the integration of services and seamless pathways for women and babies transferring to maternity and neonatal units. Paramedic pathways should be developed for direct access/referral for women and babies transferring to obstetric and neonatal units for use when a midwife is not present on scene.
- NIAS staff should follow national guidelines for maternity emergencies, [277] and standardised equipment should be available in all ambulances in line with national guidelines and minimum equipment recommendations.
- Clear, definitive, and collaborative guidelines should be developed and agreed by NIAS for midwives to follow when placing a call to request support/transfer. This will allow for allocation of an appropriate vehicle/clinician grade as well as call priority level.
- There should be clear regional and locally appropriate operating protocols procedures for midwives and ambulance staff to follow during transfers. These should include a clear outline of roles/responsibilities, an escalation process and telephone numbers and scripts to aid appropriate escalation as required, to both midwifery on call managers and NIAS senior clinicians, with appropriate priority for maternity and neonatal emergencies. A senior midwife should be responsible for liaison and planning with NIAS in each HSC Trust, and a consultant midwife should advise NIAS at regional level.
- Specific protocols should be in place for interdisciplinary and cross-boundary referrals including emergency transfers.

Requirement 6: Ensuring education and training for safe, quality care and services in out-of-hospital settings, and interdisciplinary learning opportunities including for pre-registration students

- A Training Needs Assessment (TNA) should be conducted to assess the readiness of all staff – midwives, senior managers, obstetricians, neonatologists/paediatricians, MSWs, and ambulance staff – to support out-of-labour ward settings (Appendix 12a), and an evidence-based regional education plan should be developed to build midwives' skills and experience and to develop team working.
- All staff should be enabled to participate in appropriate and timely CPD, to include dedicated time for team building and interdisciplinary working.
- There should be a framework for preceptorship and orientation of midwives working in out-of-labour ward settings including personalised care, women's autonomy, and physiological labour and birth; with access to current evidence and demonstrating the ability to share that with women.
- HSC Trusts should work in partnership with each other to ensure that senior midwives, midwives, and midwifery students have the opportunity to gain experience in the range of out-of-labour ward settings.
- All midwives should have experience of working in out-of-labour ward settings, and rotations for midwifery students and NQMs should include work in midwifery units and home births; to help to develop experience of physiological labour and birth and of caring for women and babies in out-of-labour ward settings.
- Trainee obstetricians, neonatologists/paediatricians, and ambulance staff should have some experience of work in out-of-labour ward settings.
- Preparation for emergencies should include simulation, either using the high-fidelity simulation suite at QUB or HSC Trust-based simulation, and context-specific interdisciplinary team training to ensure knowledge of the community and alongside midwifery unit and home facilities and equipment if needed; to include midwifery, maternity support worker, obstetric, neonatal/paediatric, and paramedic staff (Appendix 12b and 12c).
- Community midwifery units should have equipment on site to regularly practice context-specific emergency procedures for all maternity and neonatal emergencies.

Specific consideration of shoulder dystocia in out-of-labour ward settings

- All midwives and obstetricians should know how to diagnose shoulder dystocia and the techniques required to facilitate birth.
- All midwives and obstetricians, maternity staff working in and supporting midwifery units, and students should participate in maternity emergencies training, including shoulder dystocia, at least annually. Training should be in situations that simulate real-life conditions, including responding to emergency simulations in out-of-hospital settings. This is unlikely to be possible in real time situations given the infrequency and urgency of shoulder dystocia when it occurs.

- Shoulder dystocia should be managed systematically; this should include calling for additional help immediately after shoulder dystocia is recognised, with the problem clearly communicated.
- Management algorithms for shoulder dystocia are recommended by RCOG guidance and should be used. [123]
- Techniques to expedite birth can be implemented by two health professionals with the support of a birth partner, or three staff if available. Having more than three people involved in these techniques may not be physically possible and could impede access to the woman.
- Senior experienced support and advice for staff by phone or possibly video link may be helpful; any arrangements should be tested locally for feasibility during training.
- Following an episode of shoulder dystocia all staff should be alert to the possibility of postpartum haemorrhage and severe perineal tears, and all babies born following shoulder dystocia should be examined by a trained clinician looking for brachial plexus injury and other neonatal problems
- Women and partners should be offered support and de-briefing following an episode of shoulder dystocia.
- Staff may require support and de-briefing following an emergency episode including shoulder dystocia. A rapid de-brief should take place ideally within 48 hours to ascertain staff wellbeing. Any lessons learned should be reviewed and implemented.

Requirement 7: Appropriate funding, leadership, service improvement, and governance for out-of-hospital settings

- Commissioners and HSC Trust Boards must ensure that the budget for maternity services covers the required midwifery staffing establishment for all settings including community midwifery units and home births, and assessment of safety and quality of care in midwifery units should be included in the regular review of maternity services.
- All staff, managers, and HSC Trust Board members should have an awareness of maternity services activity in all settings, including mode and place of birth.
- A commitment to ongoing service improvement should be evident with mechanisms and procedures in place including a monitored complaints procedure from both staff and service users, routine collection and monitoring of feedback from service users, staff, students, educators and assessors, rapid dissemination of learning from incident reviews, and continuous improvement processes drawing on clinical outcomes and the experiences of maternity and neonatal service users, staff and students.
- This information should be shared appropriately within the maternity and neonatal services and the HSC Trust senior management team, with evidence that themes and trends are being identified and further analysis completed when deviations are shown.
- Evidence of good practice should be shared and staff celebrated and awarded for good practice.

- Regular midwifery unit team meetings should be scheduled and resourced; importantly they should include review of all transfers. They should have administration support, planned agendas, minutes taken, and responsibility allocated for actions required, and include celebration of progress and success.
- Midwifery units should have support from and involvement of a group with the participation of maternity and neonatal service users and local communities, with interdisciplinary staff representation, and liaison with the local hospital and ambulance service; aligned with HSC Trust/regional Maternity Voices Partnership structures.

Requirement 8: Community engagement to ensure equity and inclusion, local relevance, meeting community needs

- While shared standards are essential, there may be some local variation in their implementation taking local factors into account including population need and geography.
- The community midwifery unit should be a hub integrated with and familiar with the local community and its needs and resources.

Summary of positive service development (Appendix 12d)

Ensuring organisational readiness before the introduction of the first Midwifery Unit in Valencia, Spain

La Plana public hospital in Valencia, Spain is recognized nationally and internationally for quality maternity care. Interdisciplinary planning is underway to establish the first Midwifery Unit, which will provide midwife-led care for an estimated 30% of births. A positive, collaborative organisational culture and continuous improvement ethos has been developed, and there has been engagement with local and regional governments. Providing evidence and data has been essential, along with transformational leadership. In future, sustaining a focus on personalised care for women, and on autonomy for midwives, will be essential as well as the wider engagement of policy makers to promote more Midwifery Units.

8.3 Safe, quality midwifery and wider maternity and neonatal care and services in all settings: Addressing Term of Reference 3

8.3.1 Key conditions for safe, quality maternity and neonatal care and services in all settings: Addressing Term of Reference 3

Term of Reference 3 is:

3. Undertake further work to inform a consistent approach to provision of midwifery services, including integration across wider maternity services.

The learning from this report (Section 6.0) has shown that enabling safe, quality, equitable maternity care and services for all women, babies, and families requires seven inter-related system-wide key conditions (Table 6, Figure 33). These key conditions for the health system inter-relate, and for the whole system to function effectively, efficiently, and safely, they all need to be in place across the whole continuum of care.

Table 6: A quality maternal and newborn health system: key conditions for safe, quality care for all women, babies and families in all settings

Key conditions for maternal and newborn care and services in all settings		
1	Core focus on respectful, individualised care and services and partnership working for all women, babies, families across the whole maternity journey	<ul style="list-style-type: none"> Reaching all women, babies, families without exception Listening to women, building trust, strengthening women’s own capabilities Evidence-based information, discussion, education Listening to communities to understand their needs and resources
2	Meaningful participation of women and babies, families, communities, staff	<ul style="list-style-type: none"> In design, planning, provision, monitoring and review of care, services, education and training Equity of inclusion to ensure all voices are heard
3	Integration of evidence-based standards, services, and education across the continuum of care and all disciplines and settings	<ul style="list-style-type: none"> Consistent evidence-based standards, policy, practice Respectful interdisciplinary team working with shared purpose Continuity of care across the whole maternity journey, in all settings, between all disciplines
4	Enabling environment, psychological safety for all staff and students	<ul style="list-style-type: none"> Culture of respect, mutual support, kindness Shared values Safe staffing levels Student voice Interdisciplinary education and training Management and leadership development
5	Whole-system support for universal, whole-continuum, accountable, knowledgeable, skilled, kind midwifery	<ul style="list-style-type: none"> In hospital and community settings Meeting NMC standards of proficiency for midwives
6	Structures, processes, and resources to assure whole-continuum, evidence-based planning, monitoring, governance and commissioning	<ul style="list-style-type: none"> Funding that covers the required staffing establishment for all settings Informed by evidence-based information and evaluation of services Access to timely and reliable data on outcomes and experiences Clear lines of accountability Commissioning processes based on standards and evidence of impact
7	Political will, evidence-informed policy directions for safe, equitable, quality maternal and newborn system, with ongoing commitment	<ul style="list-style-type: none"> That promotes and supports a safe, sustainable, equitable, quality maternal and newborn system with adequate resources

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Figure 34: A quality maternal and newborn health system: seven key conditions for safe, quality care and services for all women, babies, and families

8.3.2 Developing the Recommendations

The recommendations identified here have been developed from all the learning throughout the process of this work. The rationale for each can be found in Section 6.0, informed by the learning from evidence, data, engagement, and positive service developments. The evidence that informed each recommendation is shown along with operational considerations. All the components in the ‘What is needed’ boxes in Section 6.0 have been incorporated; additional detail in that section may help in implementation.

The recommendations are aligned with key reports and policy directions in NI; Health and Wellbeing 2026: Delivering Together, [113] the RQIA review of governance arrangements for maternity services, [2] The Mental Health Strategy 2021-2023. The Chief Nursing Officer's vision for Nursing and Midwifery in NI 2023-2028, [278] and the Nursing and Midwifery Retention Report 2022. [279] The Maxwell Review [118] of commissioning and delivery of post-registration education for nurses, midwives and allied health professionals in NI offers a strong foundation for reform of education commissioning and provision. The NMC regulatory standards of proficiency for midwives [68] have a fundamental contribution to make. Important lessons from reports on maternity services in other jurisdictions [3, 4, 15, 45, 160] have been incorporated.

Fundamental to all Recommendations is the ambition **to deliver whole-system working across the whole maternity journey and the continuum of care for every woman, baby and family (Figure 34).**

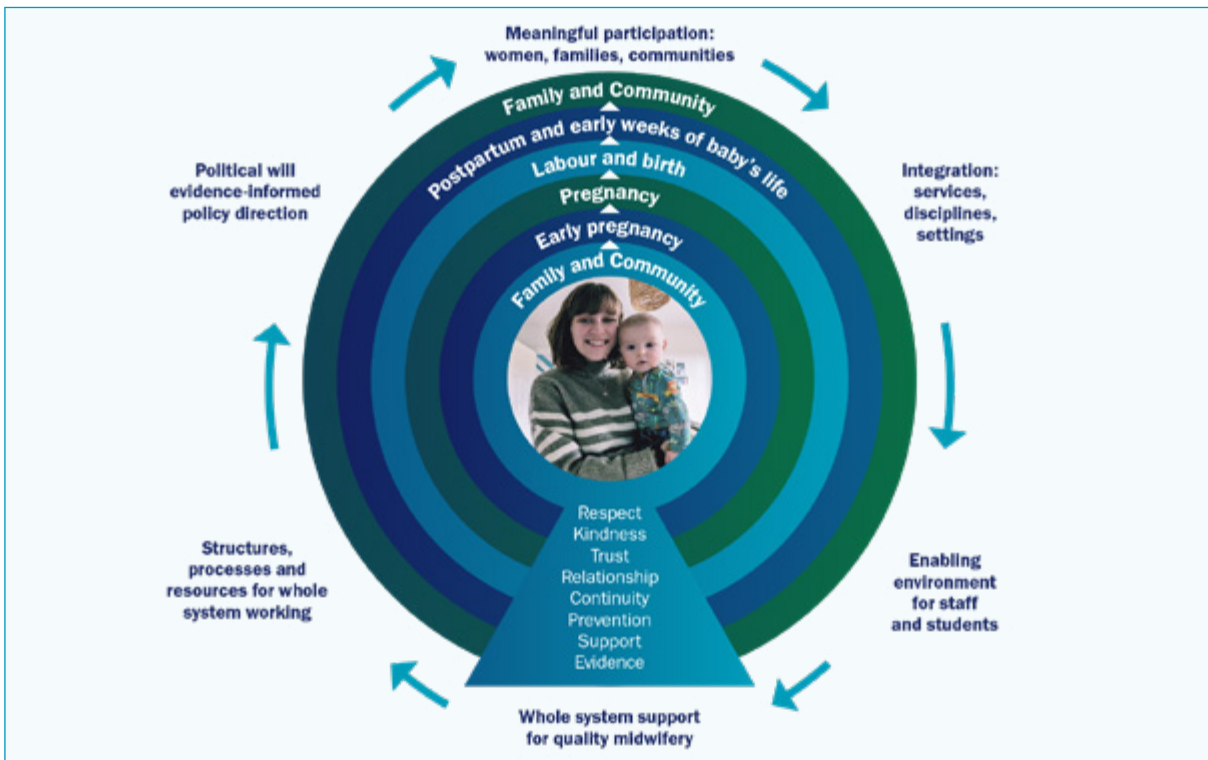


Figure 35: Implementing the key conditions for safe, quality care across in all settings, across the whole system and the whole maternity journey

The recommendations have been informed by the core principles established at the start (Section 4.1). To these are added considerations of sustainability and cost effectiveness, building on existing strengths, alignment with existing developments, and consideration of what the system can feasibly deliver.

Sustainability is a critical issue for the future. All aspects of the service should be grounded in evidence of effectiveness and of cost-effectiveness, considering short-, medium- and long-term outcomes for women, babies and families. It will be important to discontinue ineffective or harmful practices as well as implementing effective ones. Capacity and capability building is essential for sustainable services.

Strengths include the dedication and commitment of the staff, examples of good practice, the willingness of advocacy and community groups to engage, and existing reports and the positive policy direction already in place.

Alignment with existing developments is essential to avoid cutting across work already in development. Where such developments exist these have been considered.

Feasibility is essential for effective implementation and has been considered in framing the recommendations. Involving staff in tackling barriers and identifying solutions is fundamentally important for this. [280]

The challenges of implementation at scale have been considered in the framing of the recommendations; this is discussed in Section 8.5. Important evidence on effective approaches for sustainable improvement in safety and quality, and on education and training, are summarised in Appendices 5a and 5f. [81]

8.3.3 Responsibility and accountability for implementation

Accountability was an important challenge identified in this work. For effective and sustainable change, it will be essential to identify a) which organisation(s) has accountability, and b) which organisations/individuals have responsibility for aspects of implementation. An assessment of this aspect is included in the table of recommendations, but this will need to be refined as the work develops and as new organisations evolve, including the ICS (Recommendation 6) and the new Maternal and Newborn Partnership (Recommendation 7). These new organisations may replace or take on responsibility from current structures.

The Maternity and Neonatal Services Safety Oversight Group has a key role in leading these changes. Their membership must be augmented to include the interdisciplinary clinical, public health, and service user perspectives needed to understand the whole continuum of care in and outside of hospital settings.

Table 7 shows the Recommendations (R), operational considerations, where the evidence for each can be found, and an assessment of responsibility and accountability considerations.

Appendix 13 shows two worked examples of implementation/action planning, grounded in the principles that have informed this work (Section 4.1).

8.3.4 Recommendations 1: summary of the changes needed

Thirty-two recommendations have been identified (Table 7). In summary, the changes needed are:

- **A shared strategic vision for safe, quality midwifery and wider maternal and newborn services in Northern Ireland with a regional framework for action.** A co-ordinated regional plan is urgently needed, to be fully implemented over five years, informed by evidence of what will work, and with targeted investment that reflects the level of need and the benefit that will result. It should be developed with extensive participation of women and families, advocacy groups, and interdisciplinary staff, and with strong policy and political support, building on the work of this report. Recommendations 1, 3, 4, 5.

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- **A reconfigured relationship with women, families and communities must be at the heart of the changes;** where women consistently receive care that demonstrates the qualities that participants identified as important: respect, kindness, trust, relationship, continuity, prevention, support, and evidence; and where women, families and communities have meaningful input into the design, delivery and monitoring of services. *Recommendations 1, 2, 3, 4, 5, 6, 7, 15, 17, 18, 30.*
- **A consistent, region-wide, evidence-informed approach to planning, commissioning, standards, provision, monitoring, and review of maternity and neonatal services.** A funded interdisciplinary regional partnership with strong service user and advocacy voice is needed to lead and drive all regional work, and evidence-based regional standards are needed to inform commissioning, governance, and practice across hospital and community. *Recommendations 5, 6, 7, 8.*
- **Improving clinical, psychological, and cultural safety and equity for women, babies and families across the whole continuum of care and in all settings:** recognising the diversity of factors influencing safety, equity, and quality for all women and babies in pregnancy, labour and birth, postnatally, and in the early weeks of life. This should include access to antenatal education and individualised antenatal care, improving care in late pregnancy/early labour especially in regard to induction of labour, and critically, improved postnatal care for all women and babies. *Recommendations 2, 5, 11, 12, 14.*
- **Changing the prevailing work culture to implement an enabling environment for all staff and managers and an open learning culture at every level of the system.** Culture is fundamental to safety, and all staff must be psychologically safe and supported to provide safe, respectful, kind, evidence-informed, interdisciplinary, individualised care for all women and babies, to effectively escalate concerns when needed, and for investigations of adverse incidents to optimise learning rather than blame. *Recommendations 9, 11, 12, 14, 21, 23.*
- **Investment in community as well as hospital services, strengthening midwifery care and services across the whole continuum of maternal and newborn care, and increasing midwives' influence over the safety and quality of care and services.** This should include a phased programme to establish and sustain safe, quality community midwifery hubs and alongside midwifery units to enable women to access options for labour and birth; continuity of midwifery care; support for midwives' work with women living in challenging circumstances and those who wish care 'outside of guidance'; support for midwifery care in labour wards including physiological birth; all in the context of appropriate interdisciplinary working and with recognition of the necessity for midwives' involvement in service planning and decision-making. *Recommendations 1, 2, 5, 11, 13, 15, 16, 17, 19, 20, 22, 24, 25, 32.*

- **Better oversight through improved accountability, monitoring, evaluation, and research:** with monitoring, review, and accountability based on accessible, appropriate information and data from research and evaluation, and improved metrics on clinical, psychological, and cultural safety, including assessment of the views and experiences of women and families, and of staff. *Recommendations 11, 13, 15, 26, 27, 28, 31.*
- **A unified approach to education and training of all staff, including leadership development - especially for midwives - and capacity building for the future.** This should include support for NQMs to gain the experience they need, and evidence-informed interdisciplinary post-registration/postgraduate education and training at all levels, including training for emergencies and courageous leadership development; with a midwifery career pathway and opportunities for clinical academic careers for all professional groups to build capability for the whole workforce. *Recommendations 9, 10, 22, 29, 31, 32.*

8.3.5 Recommendations 2: priority actions

All of the Recommendations matter. Together they form the basis of a quality system to provide safe care for all women, babies and families and whole-system implementation is needed. Individual actions cannot create sustainable, equitable change. But there are three critical priorities that address immediate safety challenges:

1. Postnatal care both in hospital and at home is essential for all women and babies to support physical and mental health, to promote optimal infant feeding and attachment between mother and baby, and to provide additional care for women who had difficult experiences in labour and birth. Women having caesarean births have increased need for care and support postnatally, but the high rates of caesarean birth combined with staffing shortages on postnatal wards are leaving many women vulnerable, sometimes without adequate pain relief or essential care for themselves and their babies. This is affecting the quality of care for all, aggravated by limited postnatal home visiting by midwives. *Recommendations 11, 12, 17, 23, 27, 28, 31.*
2. Improved interdisciplinary working for women requesting care ‘outside of guidance’, and improved safety for the midwives who care for them. Midwives providing care for women who request care ‘outside of guidance’ are often working in circumstances where there is inadequate staffing and little interdisciplinary support. Women need better options for such care in both community and hospital settings, and midwives need to be supported throughout by senior midwives and interdisciplinary colleagues. *Recommendations 1, 2, 11, 20.*

3. Psychological safety for all staff. This is critically important both to ensure their own health and wellbeing, and to enable them to speak out and to escalate concerns without fear, confident that their voice will be heard and acted upon. Related to this is the lack of support and voice at Executive and Board levels for several Heads of Midwifery, who play a vital role in management and leadership of the maternity services in both hospital and community and across the whole continuum of care for both women and babies. Without their direct input Boards and Executive do not have adequate information or assurance about the safety and quality of the maternity services. *Recommendations 12, 14, 15, 16, 21, 22, 23, 26, 29.*

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8.3.6 Recommendations 3: Details of the recommendations

Table 7 - details of the recommendations

Recommendation (R)	Operational considerations and next steps	Evidence base and additional information	Responsibility and accountability considerations *Lead role • Responsibility
Addressing Terms of Reference 1 and 2			
Safe, quality care in midwifery units and home births			
<p>R1 A regional plan should be developed to ensure that women across NI have access to safe, quality midwifery care in midwifery units and for home births, and that midwives are supported to provide this care. Implementation of this plan should be adequately funded and evaluated.</p> <p>To ensure consistent practice across the region, development and implementation of this plan should be led by a consultant midwife working at regional level with experience of out-of-labour ward care.</p> <p>The requirements described in Section 8.2.2 are essential and must form the basis for regional standards for the safe, quality operation of community midwifery hubs, alongside midwifery units and home birth.</p> <p>These include specific requirements in regard to the management of shoulder dystocia, and the care of women with high maternal BMI, and care provided 'outside of guidance' in out-of-labour ward settings (see also R2).</p> <p>The GAIN guideline for admission to midwife-led units in NI should be the starting point for new regional guidelines; it should be updated in line with these requirements and informed by the key resources identified.</p> <p>To meet the individual needs of women and babies across the continuum of care and to maximise cost-effectiveness, community midwifery units should be established as midwifery hubs, providing community-based antenatal care and education, care in labour and birth, and postnatal care for women and babies; and enabling access to other community services.</p> <p>At least one community midwifery unit should be available in all HSC Trusts. Sites of the previous Freestanding Midwifery-led Units should be developed and opened as community midwifery hubs, in a phased programme to ensure safe, quality care.</p>	<p>Safe staffing levels, support from clinically based senior midwives (Band 7 and above) with experience in out-of-labour ward settings, strong interdisciplinary working practices, and education and training for all staff involved are critically important for community midwifery hubs, alongside midwifery units, and home births.</p> <p>Community midwifery hubs: Implementation of the community midwifery hubs should be phased, with ongoing audit, evaluation, and review of processes, outcomes for women and babies, experiences of women, families and staff, and cost-effectiveness. One site should be funded as a pilot to examine implementation processes and impact. A suggested programme of opening community midwifery hubs with facilities for labour and birth is:</p> <ul style="list-style-type: none"> • Year 1: Lagan Valley to be established, acting as a pilot for implementation. • Year 2: Downe to open, building on the experience in Lagan Valley, and a community midwifery hub to be established at Causeway Hospital. • Year 3: the Mater to open. <p>Cross-Trust working should be developed to enable women to access community hubs closest to them, and for staff to gain experience in community midwifery hubs.</p> <p>Alongside midwifery units should be available in all HSC Trusts. They should be open 24/7, with core staff retained and current barriers to accessibility addressed. Pacing implementation to improve staffing and allow for staff development will be important. Reducing the number of beds available in the alongside units until safe staffing can be assured may be needed. A suggested programme of implementation is:</p> <ul style="list-style-type: none"> • Year 1: Royal Jubilee, Ulster, Daisy Hill, and South West Acute Hospitals to build on and strengthen existing units where core staff are already retained. Craigavon and Altnagelvin to improve staffing and strengthen services. • Year 2: Antrim to develop and open an alongside midwifery unit. 	<p>Relates to QMNC concept 1, 2, 3a, 3b, 3c, 3d, 4a, 4b, 5, 6 and 7 and Health systems concept 1, 2, 3, 4, 5a, 5b, 5c, 5d, 5e, 6 and 7.</p>	<ul style="list-style-type: none"> * Department of Health/Maternity and Neonatal Services Safety Oversight Group * HSC Trust and NIAS Boards and Executive * Heads of Midwifery * Public Health Agency • Regulation and Quality Improvement Authority • Nursing and Midwifery Council • Advocacy and community groups • Consultant midwives • All professional groups • Royal Colleges • Education providers • Universities

Recommendation (R)	Operational considerations and next steps	Evidence base and additional information	Responsibility and accountability considerations *Lead role • Responsibility
<p>Alongside midwifery units should be available in all HSC Trusts, and should be strengthened to ensure safe, quality care and services for all women who wish to use their services.</p> <p>Services for home births should be strengthened in all HSC Trusts.</p> <p>All of these settings must be supported by HSC Trusts and NIAS and by service and education commissioners to implement the requirements identified in this report, with adequate funding for staff, facilities, and equipment, and with support and oversight from the wider maternity and newborn services.</p> <p>CoMC has an important contribution to make (R19) and work is needed to align the implementation of CoMC with the care of women in these out-of-labour ward settings.</p> <p>All Recommendations below provide the essential whole-system environment to support safe, quality care in these settings.</p>	<p>Home births: The Birth at Home team in Southern HSC Trust is a model that should be replicated across all HSC Trusts, supported by the community midwifery team. All community midwives attending home births should be supported to gain experience and confidence in out of hospital birth.</p> <p>Positive examples of community and alongside midwifery units and home births from across NI and the rest of the UK can be used to inform developments (Appendices 11 and 12).</p> <p>Planning, monitoring, and review of midwifery hubs can be supported by the validated Maternity Unit Self-Assessment tool (MUSA) to assess and to standardise policy and practice and to identify areas for improvement (Appendix 12a).</p> <p>These services, once established, should offer education, training and experience for interdisciplinary staff and students to learn knowledge and skills in midwifery care outside of a high intervention setting.</p>		
<p>R2 Services should ensure the support and care of women who have some elements of complexity and who may fall ‘<i>outside of guidance</i>’ but who would still like to discuss options for care in either an alongside midwifery unit, community midwifery hub, or at home. This should include women who have previous traumatic experiences and may wish to avoid the hospital environment.</p> <p>For the safety of women and babies, and the psychological wellbeing of midwives, women requesting care ‘<i>outside of guidance</i>’, or declining aspects of recommended care, must be given the option and support to plan birth in a labour ward, and where available a midwifery unit, as well as at home.</p> <p>Options for care should be strengthened in labour ward settings to improve care for women who wish care ‘<i>outside of guidance</i>’.</p>	<p>Barriers to access to alongside midwifery units and to midwifery care in labour wards, especially for women with some elements of complexity, will need to be addressed.</p> <p>Barriers to the provision of care for women who wish options for care ‘<i>outside of guidance</i>’ in labour wards should be identified and addressed.</p> <p>At least one room in all labour wards should be developed to be more conducive to women’s comfort and relaxation and equipment to support evidence-based quality midwifery care for women who wish care ‘<i>outside of guidance</i>’ (R20).</p> <p>Care should be informed by the Public Health Authority Regional Framework for midwives and obstetricians requesting births outside of guidance.</p>	<p>Relates to QMNC concept 2, 3a, 3b, 3d and 5.</p>	<ul style="list-style-type: none"> • Department of Health/Maternity and Neonatal Services Safety Oversight Group * HSC Trust Boards and Executive * Heads of Midwifery, midwifery managers, consultant midwives • Advocacy and community groups • All professional groups at all levels • Royal Colleges

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Recommendation (R)	Operational considerations and next steps	Evidence base and additional information	Responsibility and accountability considerations *Lead role • Responsibility
Addressing Terms of Reference 1, 2, and 3			
Regional strategic developments			
<p>R3 All care, services, systems and processes must enable and respect the human rights of women and of babies. This includes the right of women to make decisions, informed by evidence-based information, and the right of women and babies to be enabled to stay together.</p> <p>Shared values of respect, equity, trust, person-centredness, evidence-based information, and meeting community/population needs should be evident in all governance and commissioning processes.</p> <p>All interdisciplinary staff must have the knowledge and skills to listen to and work in partnership with all women, to offer evidence-based information and to discuss evidence-based options for care, to strengthen women's own capabilities, and to implement individualised assessment and planning. They must know how to implement cultural safety for all women and families.</p>	<p>Education and training, and support and mentorship for interdisciplinary staff, managers, HSC Trust Board members, and professional leaders will be needed to help to identify and address structural and embedded working practices. A regional programme of interdisciplinary workshops should be commissioned and developed, drawing on evidence-based approaches to education and behaviour change (Appendices 5a and 5f).</p>	<p>Relates to QMNC concept 1, 2, 3a, 3b, 3c, 3d, 5 and 6 and Health systems concept 3 and 6.</p>	<ul style="list-style-type: none"> * Department of Health/Maternity and Neonatal Services Safety Oversight Group * HSC Trust Boards and Executive Strategic Planning and Performance Group * Regulation and Quality Improvement Authority • Nursing and Midwifery Council • All professional groups at all levels of seniority • Royal Colleges • Service and education providers and commissioners • Advocacy and community groups • Universities • Researchers
<p>R4 The whole maternity and newborn system should ensure the meaningful involvement of women, families, communities, and staff in design, planning, provision, monitoring and review of care, services, and education and training.</p> <p>Service user representatives should be present and enabled to participate at all Board discussions about maternal and newborn services.</p> <p>Participation and engagement of women, families and communities should be funded, and service users and advocates should where appropriate receive remuneration for their time, in line with best practice procedures in other UK countries.</p>	<p>Processes should be developed at regional level to ensure the genuine involvement of women, communities, and interdisciplinary staff at regional and HSC Trust levels. Development and implementation should be led by the regional Maternal and Newborn Partnership (R7) and implemented consistently across HSC Trusts. Implementation should be monitored.</p> <p>Processes should ensure equitable engagement, with diversity of inclusion of women, families and communities, and with service users taking lead roles as appropriate.</p> <p>Staff responsibilities should be backfilled when staff are involved in this work.</p> <p>Support and training will be needed for service user representatives to participate effectively in this work (R30).</p>	<p>Relates to QMNC concept 1, 3c and 7.</p>	<ul style="list-style-type: none"> * Department of Health/Maternity and Neonatal Services Safety Oversight Group * HSC Trust Boards and Executive Strategic Planning and Performance Group * Public Health Agency • Regulation and Quality Improvement Authority • Advocacy and community groups • Royal Colleges • All professional groups, at all levels of seniority • Education providers • Universities • Researchers

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Recommendation (R)	Operational considerations and next steps	Evidence base and additional information	Responsibility and accountability considerations *Lead role • Responsibility
<p>R5 A Maternal and Newborn Strategy for NI should be developed and implemented. It should recognise and respond to the critical issues raised in this report. Its implementation should be fully costed and appropriately funded and monitored and evaluated.</p> <p>The Strategy should build on the evidence on what all women and babies need and want across the whole maternity journey and in all settings.</p> <p>The Strategy should strengthen a regional approach to maternity and newborn services, to reduce inconsistency in service provision. Cross-Trust working is essential.</p> <p>The Strategy should recognise and maximise the critical contribution that maternity and neonatal services make to the mental health of women and children, to addressing inequalities, and to population health/health and wellbeing. It should look beyond the health sector to address the wider determinants of health and to optimise longer-term societal benefits.</p> <p>The role and contribution of midwives must be an important component.</p>	<p>There should be alignment of the Strategy with action plans/strategies for tackling inequalities, women’s health, early years, population health, primary and community care, mental health, and breastfeeding; and with workforce, education and training for all staff.</p> <p>The Strategy should recognise that maternal and newborn services do not fit well with the current structures of HSC Trusts or the DoH. These services include both women and babies; reach across hospital and community settings and home; span public health and primary care through to acute and emergency services; and include elements of clinical care, mental health, and early years, with long-term impact on population health. Mechanisms to ensure that maternal and newborn services are appropriately supported and governed should be put in place by DoH and HSC Trusts.</p> <p>Participation and engagement of women, partners and families and all staff groups in the development of the Strategy is essential.</p> <p>The potential benefits of a single maternal and newborn service for NI should be considered.</p>	<p>Relates to QMNC concept 1, 3a, 5, 6 and 7 and Health systems concept 1.</p>	<ul style="list-style-type: none"> * Department of Health/Maternity and Neonatal Services Safety Oversight Group * Strategic Planning and Performance Group * Public Health Agency • HSC Trust Boards and Executive • The Health Committee • Department of Finance • Royal Colleges • Advocacy and community groups • All professional groups • Researchers and educators
<p>R6 The unique potential for maternity and newborn care and services, especially midwifery care, to be the foundation for improving health and wellbeing and reducing health inequalities should be recognised in the development of the new ICS. Integrated care and services should be planned and commissioned across the whole continuum of care and in all settings.</p> <p>Evidence-based, outcome-focussed commissioning should be based on regional standards (R8).</p> <p>Maternity service users and midwives with experience of working in areas of deprivation must be meaningfully involved in Area Integrated Partnership Boards and the Regional ICS Partnership Forum when discussions and decisions about maternity services take place.</p>	<p>Commissioners should consider a regional model for the maternity and neonatal services, focussed on meeting the needs of women, babies, and families across the whole health economy, improving health, wellbeing, development, and educational outcomes, and addressing inequalities.</p> <p>It is essential that monies allocated to maternal and newborn services are tracked to ensure funding is linked to improving outcomes. Identification, measurement, and review of key short-, medium-, and long-term outcomes for women and babies, women’s views and experiences, and resource use including assessment of cost-effectiveness should be built into performance review processes, along with evidence of addressing the key barriers to safe, quality care for all women, babies and families identified in this report.</p>	<p>Relates to QMNC concepts 1 and 3b and Health systems concepts 5c and 6.</p>	<ul style="list-style-type: none"> * Department of Health/Maternity and Neonatal Services Safety Oversight Group * Strategic Planning and Performance Group * Public Health Agency • HSC Trust Boards and Executive • Heads of Midwifery • Advocacy and community groups

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Recommendation (R)	Operational considerations and next steps	Evidence base and additional information	Responsibility and accountability considerations *Lead role • Responsibility
<p>R7 A funded interdisciplinary regional Maternal and Newborn Partnership should be established to lead the development, implementation, and oversight of evidence-based, safe, quality maternity and newborn care and services; and to maximise the contribution of these services to maternal and newborn health. It should be accountable to the DoH for these critically important responsibilities.</p> <p>The Partnership, alongside the Public Health Agency, should be the focus for providing interdisciplinary clinical expertise and input to the commissioning of maternity and neonatal services.</p> <p>The Partnership should have adequate funding to ensure equitable professional leadership and involvement from midwifery, obstetrics, neonatology/paediatrics, neonatal nursing, and service user advocacy, and with support posts to ensure strategic, governance, administrative and business skills are enhanced.</p> <p>Terms of Reference should include:</p> <ul style="list-style-type: none"> • Leading regional strategic developments in maternal and newborn health, care and services. • Working with HSC Trusts and NIAS to ensure consistent cross-Trust policies, protocols, and practices and addressing cross-boundary issues. • Informing systems for data collection and analysis including KPIs. • Driving quality and safety systems and processes and quality improvement initiatives for regional maternity and neonatal services. • Driving development of outcome measures, data requirements and analysis, and ensuring access to appropriate dashboards to monitor and review processes, outcomes, and experiences at regional level. • Establishing evidence-based regional standards for care and services (R8). • Development, implementation, and monitoring of region-wide policies and protocols. • Informing postgraduate/post-registration education required to ensure safe, quality service provision. • Identifying research priorities in maternal and newborn health, care, and service provision. <p>Responsibilities should include:</p> <ul style="list-style-type: none"> • Establishing a single region-wide MVP, with links into HSC Trusts. • Interface with the Oversight Group in the DoH, ICS, SPPG, RQIA, HSC Trust Boards, Royal Colleges, universities and other education providers, PHA, and other relevant networks. 	<p>This partnership should learn from the experience of the Neonatal Network and the Maternity Collaborative and the MSIG; it should replace all of these.</p> <p>Its role, responsibilities, and accountability in regard to the Maternity and Neonatal Services Safety Oversight Group should be clarified; it may take on most of the functions of the Oversight Group to avoid duplication and for clear lines of accountability. If the Oversight Group is to continue with its role, its membership must be augmented to include the interdisciplinary clinical, public health, and service user perspectives needed to understand the whole continuum of care in and outside of hospital settings.</p>	<p>Relates to QMNC concept 1, 2, 4b and 5 and Health systems concept 1, 2, 3, 5c and 6.</p>	<ul style="list-style-type: none"> * Minister of Health * Department of Health/Maternity and Neonatal Services Safety Oversight Group * Strategic Planning and Performance Group * Public Health Agency * HSC Trust Boards and Executive • The Health Committee • Department of Finance • Advocacy and community groups • All professional groups • Researchers and educators

Recommendation (R)	Operational considerations and next steps	Evidence base and additional information	Responsibility and accountability considerations *Lead role • Responsibility
<p>R8 Fully funded evidence-based interdisciplinary regional standards for care and services should be developed and implemented. These should be used to inform commissioning, governance, policies and protocols, monitoring and review of services. These should be aligned with national/international standards where these exist and should be developed with participation and engagement of all professional groups and of advocacy and community groups. Regional standards should include behavioural and organisational factors as well as individual interventions.</p> <p>Commissioning of maternal and newborn care should be founded on these evidence-based interdisciplinary regional standards.</p>	<p>All settings and relevant evidence should be considered, across all the components of the QMNC framework. [8]</p> <p>The NMC standards of proficiency for midwives form a strong evidence-based platform for strengthening quality midwifery; services are regularly assessed against these to ensure they are appropriate for student placements. Many aspects of these standards are relevant across all health professions such as communication, partnership working, escalation of concerns, service improvement, and managing evidence-based sustainable change.</p> <p>The revised and updated GAIN guideline for admission to midwife-led units in NI (R1), and the Public Health Authority <i>Regional Framework for midwives and obstetricians requesting births outside of guidance</i> can be incorporated in these standards.</p> <p>The potential for a NI Pathway for Maternal and Newborn Care should be explored, aligned with these evidence-based standards.</p>	<p>Relates to QMNC concept 2, 3a and 4b and Health systems concept 2, 3 and 5c.</p>	<ul style="list-style-type: none"> * Department of Health/Maternity and Neonatal Services Safety Oversight Group * HSC Trust Boards and Executive Strategic Planning and Performance Group * Public Health Agency Regulation and Quality Improvement Authority • Advocacy and community groups • Education providers • Universities • Researchers • Royal Colleges • All professional groups
<p>R9 A unified structured approach to the commissioning of post-registration education for all relevant professionals is required to enable strategic investment in evidence-based interdisciplinary service improvement, in line with the recommendations of the Maxwell Report.</p> <p>Management support and funding is needed to enable staff, especially midwives, to attend mandatory updating and ongoing professional development opportunities. This should include backfill to release them safely from clinical duties.</p> <p>Education programmes should be based on a learning needs analysis to understand what interdisciplinary teams need rather than offering pre-defined programmes.</p>	<p>A three-year commissioning cycle is needed to enable the most cost-effective provision.</p> <p>Post-registration/postgraduate education and training should align with:</p> <ul style="list-style-type: none"> • pre-registration education programmes. • evidence-based standards; for midwives these would include NMC Standards of Proficiency for Midwives. <p>The potential for awarding academic accreditation for appropriate CPD provision for all staff groups should be explored.</p>	<p>Relates to Health systems concept 5c and 7.</p>	<ul style="list-style-type: none"> * Department of Health/Maternity and Neonatal Services Safety Oversight Group * Strategic Planning and Performance Group * HSC Trust Boards and Executive Northern Ireland Medical and Dental Training Agency * Universities * HSC Clinical Education Centre * Royal Colleges • All professional groups, at all levels of seniority
<p>R10 Education commissioning and planning should recognise the critical need for interdisciplinary education and training for emergencies for all relevant staff, and fund this appropriately, including equipment and space for simulation.</p> <p>Interdisciplinary education and training for emergencies should use effective educational approaches including team building, include human factors and training the trainers approaches, and be relevant to the context in which emergencies may occur.</p>	<p>Relevant staff should include midwives, obstetricians, neonatologists/paediatricians, neonatal nurses, AHPs, anaesthetists, paramedics, students, and MSWs.</p> <p>The high-fidelity simulation suite at QUB provides a high quality resource and experienced staff to implement high-quality interdisciplinary training for emergencies</p>	<p>Relates to QMNC concept 4a, 5 and 7 and Health systems concept 5c and 7.</p>	<ul style="list-style-type: none"> * Department of Health/Maternity and Neonatal Services Safety Oversight Group * Strategic Planning and Performance Group * HSC Trust and NIAS Boards and Executive • Universities • Clinical Education Centre • HSC Clinical Education Centre • Northern Ireland Medical and Dental Training Agency • Royal Colleges • HSC Trust Boards and Executive • All professional groups, at all levels of seniority

Recommendation (R)	Operational considerations and next steps	Evidence base and additional information	Responsibility and accountability considerations *Lead role • Responsibility
Safe, quality care and services in all settings			
<p>R11 All hospital and community settings for maternal and newborn care should be supported to improve safety and quality.</p> <p>Regional and HSC Trust-based quality improvement work on maternity and neonatal safety must work to improve clinical, psychological, and cultural safety and equity for all women, babies, and families across the whole continuum of care and in all settings.</p> <p>The very high costs of litigation in maternity care should be addressed by investing in staff and in a regional evidence-based programme of quality improvement.</p>	<p>Education and training at all levels of the organisation will be needed, including human factors training; this should be based on evidence-based approaches (Appendices 5a and 5f).</p> <p>A senior midwife with QI training and experience should advise the QI teams in HSC Trusts and the midwifery care of women and babies in all settings should be incorporated in QI work.</p> <p>Work to review and improve the current SAI process is ongoing, led by the Department of Health. This work should consider the findings of this report to improve the timeliness of the process and communication with women and families, and to focus on learning for the organisation rather than blame for individuals.</p>	<p>Relates to QMNC concept 2, 3a, 3d, 4b, 5, 6 and 7 and Health systems concept 3, 4, 5a, 5d and 7.</p>	<ul style="list-style-type: none"> * Department of Health/Maternity and Neonatal Services Safety Oversight Group * HSC Trust Boards and Executive • All those responsible for safety and quality • Education providers • Heads of Midwifery • All professional groups
<p>R12 Approaches to the detection and escalation of safety concerns and ensuring appropriate timely responses must be regionally led and adequately resourced.</p> <p>All HSC Trusts should review their processes for response to escalation of safety concerns and should ensure that all staff have information about processes for raising concerns including when they feel their concerns are not being listened to (www.health-ni.gov.uk/sites/default/files/publications/health/doh-concern-whistleblowing-hsc-framework.pdf).</p> <p>They should ensure that all staff feel able to speak up, to be heard, and to have their voices and concerns listened to, respected, and acted upon appropriately.</p>	<p>There should be a clear and timely feedback loop from a range of processes and systems to ensure the implementation of action, support, and learning and to ensure that responses are acted upon and fed back to those most affected in a timely way. This should include:</p> <ul style="list-style-type: none"> • Systemic, regional learning from adverse incidents including SAI investigations. • Positive and negative feedback from women, partners and families. • Positive and negative feedback from staff and students, for example through appraisals, staff and student surveys, SAIs and other incidents. <p>Education and training may be needed for managers and senior staff on appropriate responses to staff who indicate concerns.</p>	<p>Relates to QMNC concept 4a and Health systems concept 5a.</p>	<ul style="list-style-type: none"> * Department of Health/Maternity and Neonatal Services Safety Oversight Group * HSC Trust Boards and Executive • Regulation and Quality Improvement Authority • Northern Ireland Practice and Education Council • Heads of Midwifery • Advocacy and community groups • Universities • Royal Colleges • Trade Unions • All those responsible for safety and quality • All professional groups, at all levels of seniority
<p>R13 Clear lines of professional and managerial accountability for the maternity and newborn service – reflecting all the elements of care that women and babies need across their whole maternity journey and across hospital and community settings – should be developed at DoH and HSC Trust levels.</p>	<p>This information should be available to all staff and levels of governance (e.g. in a flow chart) so it is transparent, visible, understood, monitored, and regularly updated.</p> <p>It should include clear lines of accountability for the postnatal care of women and babies following transfer home, especially for women who have experienced perinatal loss and difficult births including caesarean births.</p>	<p>Relates to QMNC concept 4a and Health systems concept 1, 5a and 5e.</p>	<ul style="list-style-type: none"> * Department of Health/Maternity and Neonatal Services Safety Oversight Group * HSC Trust Boards and Executive * Regulation and Quality Improvement Authority • Public Health Agency • All professional groups, at all levels of seniority
<p>R14 HSC Trust Boards and Executive must lead on the development of a positive, responsive, open, learning culture across the maternal and newborn services.</p> <p>Processes that contribute to a blame culture including SAI investigations and litigation should be reviewed to identify less adversarial approaches that draw on principles of restorative justice and promote learning.</p>	<p>Work to develop a Just Culture across all HSC Trusts at all levels would contribute to a) identifying and understanding the underlying causes when things go wrong, b) supporting the staff involved in adverse incidents, and c) tackling the blame culture and developing a learning culture across the organisation.</p>	<p>Relates to QMNC concept 1, 3a, 3b, 3d, 5 and 7 and Health systems concept 3, 4, 5a and 5e.</p>	<ul style="list-style-type: none"> * HSC Trust Boards and Executive * Clinical Directors * Heads of Midwifery * Advocacy groups • Regulation and Quality Improvement Authority • Education providers • Universities • All staff groups

Recommendation (R)	Operational considerations and next steps	Evidence base and additional information	Responsibility and accountability considerations *Lead role • Responsibility
<p>Structured opportunities should be developed for safe, trusting, interdisciplinary discussion about the influences on practice and decision-making, the impact of current practice on women, babies and families and on staff; and how best to jointly tackle the culture of fear and risk described by women and staff, and to develop a more positive, women-focussed culture.</p>	<p>This will need leadership, capacity building, support, the involvement of advocacy groups to bring women's voice to the discussion, and education and training to examine relevant evidence, to identify ways of developing a more positive, trusting, shared culture, and interdisciplinary practice.</p> <p>External facilitation, evidence-based interventions for behaviour change and workshops to develop collaborative working practices will be needed.</p>		
<p>R15 A review and revision of governance arrangements for maternity and newborn services in all HSC Trusts is needed, informed by the findings of this report.</p> <p>Governance processes should ensure robust oversight of the whole maternity journey and the continuum of care in all settings, both hospital and community.</p> <p>At Board level, a non-Executive Director should act as a champion for the maternity and newborn services.</p> <p>There must be senior midwifery representation at all HSC Trust Board discussions about maternity services.</p> <p>Recommendations of the RQIA <i>Review of Governance Arrangements in Place to Support Safety Within Maternity Services in NI</i> should be implemented, with additional consideration of these issues.</p>	<p>Core values of respect, equity, trust, person-centeredness, evidence-based information, and meeting community/population needs should be evident in structures, processes, and action at all levels of the system.</p>	<p>Relates to Health systems concept 4, 5a and 5b.</p>	<ul style="list-style-type: none"> * Department of Health/Maternity and Neonatal Services Safety Oversight Group * HSC Trust Boards and Executive Regulation and Quality Improvement Authority • Advocacy and community groups • Royal Colleges • Heads of Midwifery • All professional groups, at all levels of seniority • Education providers
<p>R16 The essential contribution that midwives make to the safety of all women, babies, and families and to safe, quality services in both hospital and community must be recognised and understood at Executive and Board level.</p> <p>Heads of Midwifery must be enabled to provide the professional and service leadership they are uniquely prepared for. They should be appointed at the level of Assistant Director or equivalent with appropriate support including administrative support, deputising arrangements, mentoring, and succession planning, in line with other UK countries They should have a portfolio of responsibilities that enables them to provide operational management and professional and strategic leadership of the maternity service, and to represent midwifery and maternity services at Executive and Board levels.</p>	<p>The Head of Midwifery/Assistant Director portfolio should only include related services such as neonatal and women's services and should not include other unrelated services.</p> <p>All other UK countries are working towards appointing Director of Midwifery posts, at Bands 8d-9. The potential for this to be developed in NI should be considered.</p>	<p>Relates to QMNC concept 3a, 3d and 7 and Health systems concept 4 and 5b.</p>	<ul style="list-style-type: none"> * Department of Health/Maternity and Neonatal Services Safety Oversight Group * HSC Trust Boards and Executive Heads of Midwifery, senior midwives • Regulation and Quality Improvement • Royal College of Midwives

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Recommendation (R)	Operational considerations and next steps	Evidence base and additional information	Responsibility and accountability considerations *Lead role • Responsibility
<p>R17 Important deficits in care for women and babies resulting in adverse outcomes must be addressed. They should be examined to understand the root causes, including system-wide barriers and assumptions.</p> <p>Most notably, this includes</p> <ul style="list-style-type: none"> • Antenatal education, preparation for birth, infant feeding, and parenting, and provision of information and listening/discussion to enable women's decision-making: based on current best evidence and using appropriate language and methods of communication for all women. • Care in late pregnancy, during induction of labour and in early labour; to reduce anxiety, minimise delays, and enable informed decision-making. • Immediate and ongoing care following birth for women and babies both in hospital and at home to provide care for women, adequate pain relief, help with infant feeding, and support for attachment and the transition to parenthood. 	<p>Antenatally:</p> <ul style="list-style-type: none"> • All women must have the opportunity for fully informed discussion with midwives in pregnancy, during labour and birth, and postnatally, and with interdisciplinary colleagues if needed. • Antenatal education opportunities should be co-designed with service users. New approaches such as group antenatal care should be considered and evaluated. <p>In late pregnancy/induction/early labour:</p> <ul style="list-style-type: none"> • NICE guidance (NG 207) on discussion with women about induction of labour should be implemented. • Audit and evaluation of the implementation of induction of labour is required to consider the impact on women, babies, staff, resources, and the service. (R28, 31) <p>Postnatally:</p> <ul style="list-style-type: none"> • Safe staffing must be implemented in postnatal wards and community to ensure care and support for all women and babies, including women who have had difficult births and caesarean births. This should include the opportunity for information and discussion about women's experiences of birth as requested. De-briefing and if necessary, clinical psychology services should be available for women who need this service. • Women should receive individualised postnatal care at home based on their needs; especially for those who have had difficult or caesarean births. Longer-term follow up is needed to promote health and wellbeing of women and babies. Reinstating the routine six-week check should be considered, in line with NICE QS37. <p>A clear, accountable pathway is needed for postnatal problems including both physical and mental health to support care that is shared across community and hospital professionals.</p>	<p>Relates to QMNC concept 2, 3b, 4a and 4b and Health systems concept 5a and 5e.</p>	<ul style="list-style-type: none"> * Department of Health/Maternity and Neonatal Services Safety Oversight Group * HSC Trust Boards and Executive Public Health Agency • Regulation and Quality Improvement • Advocacy and community groups • All professional groups, at all levels of seniority • Universities • Researchers

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Recommendation (R)	Operational considerations and next steps	Evidence base and additional information	Responsibility and accountability considerations *Lead role • Responsibility
<p>R18 Consistent evidence-based regional information should be provided to all woman and families about options for care and services in pregnancy, labour and birth, and following birth</p> <ul style="list-style-type: none"> aligned with regional standards, policies and guidelines for staff. in appropriate language and format; face to face, written, and digital. informed by current best evidence. taking into account their individual clinical, psychological, social and cultural circumstances. 	<p>Information should be included on how and who to contact to access hospital and community services, and advocacy and support services. The revised information for women that accompanies the revised GAIN guideline for admission to midwife-led units in NI (R1) will provide a basis for information on out-of-hospital options.</p> <p>Information for women in the Pregnancy Book and the Maternity HandHeld Record (MHHR) should be reviewed and updated to ensure they are consistent with NICE guidance (NG235) and with each other, and that they are easily accessible to all women. Preparation for the implementation of encompass programme and the planned withdrawal of the MHHR must include development of accessible information for women.</p> <p>The possibility of implementing the Healthier Together platform in NI should be considered. [281]</p>	<p>Relates to QMNC concept 2, 3a, 3b and 4b and Health systems concept 2.</p>	<ul style="list-style-type: none"> * Department of Health/Maternity and Neonatal Services Safety Oversight Group * HSC Trust Boards and Executive Public Health Agency • Advocacy and community groups • Universities • Researchers
<p>R19 Implementation of CoMC should be prioritised in recognition of the strength of the evidence of its impact for women, babies, and the maternity system. Barriers to its implementation should be identified and addressed at regional and HSC Trust levels. There should be effective support from HSC Trusts including senior leadership and interdisciplinary support. Implementation should be fully supported by adequate resource, interdisciplinary involvement, and appropriate oversight, and robust data collection and evaluation.</p> <p>Safe staffing levels and support for midwives providing CoMC is essential. A regional approach is needed to address cross-boundary concerns.</p> <p>Continuity of midwifery care is especially important for women with perinatal mental health problems including anxiety and should be available for women who need it.</p>	<p>Work is needed to align CoMC teams with care provision in community midwifery hubs and alongside Midwifery Units (R1).</p> <p>In addition to routine data collection of appropriate indicators, a regional evaluation should be funded and implemented.</p> <p>NQMs should be enabled to gain experience in CoMC provision.</p>	<p>Relates to QMNC concept 5 and Health systems concept 1.</p>	<ul style="list-style-type: none"> * Department of Health/Maternity and Neonatal Services Safety Oversight Group * HSC Trust Boards and Executive Strategic Planning and Performance Group * Public Health Agency • Regulation and Quality Improvement • Heads of Midwifery • Advocacy and community groups • Royal Colleges • All professional groups • Universities • Researchers
<p>R20 All labour wards should promote a positive, calm, supportive environment for women and families to prevent anxiety and optimise outcomes and experiences, and to offer an option for women who wish care <i>'outside of guidance'</i>.</p> <p>Evidence-based practices including one-to-one care in labour, mobility in labour, delayed cord clamping, and skin-to-skin care at birth should be available for all women and babies – when feasible and safe to do so – regardless of complexity or mode of birth.</p>	<p>Service user input should be used to reconsider the design of labour wards.</p> <p>Rooms in all labour wards should be developed to be more conducive to women's comfort and relaxation and equipment to support evidence-based quality midwifery care such as facilities for labour and birth in water, and telemetry when continuous electronic fetal monitoring is indicated, should be consistently available.</p>	<p>Relates to QMNC concept 3a, 3b, 3d, 4b, 6 and 7 and Health systems concept 2.</p>	<ul style="list-style-type: none"> * Department of Health/Maternity and Neonatal Services Safety Oversight Group * HSC Trust Boards and Executive Heads of Midwifery • Advocacy and community groups • All professional groups

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Recommendation (R)	Operational considerations and next steps	Evidence base and additional information	Responsibility and accountability considerations *Lead role • Responsibility
<p>R21 A coordinated regional programme to promote and support the development of a psychologically safe, enabling environment for all staff and students in all HSC Trusts must be developed and implemented, drawing on evidence-based interventions for behaviour change, culture shift, and education.</p> <p>Timely de-briefing for staff following difficult and traumatic incidents should be available. This should include access to professional psychological support for all staff.</p> <p>Examples of strength and success should be celebrated.</p>	<p>This will require a whole-region shift, with coordination across HSC Trusts and with support from DoH and HSC Trust Boards.</p> <p>Staff should inform the development of mechanisms to identify areas of concern and areas of strength, including mechanisms to feedback staff concerns such as staff surveys, and to support a positive culture including recognition of good practice and progress.</p>	<p>Relates to QMNC concept 4a, and Health systems concept 5a.</p>	<ul style="list-style-type: none"> * Department of Health/Maternity and Neonatal Services Safety Oversight Group * HSC Trust Boards and Executive Regulation and Quality Improvement Authority • Nursing and Midwifery Council • Advocacy and community groups • Chief Executive Forum • Royal Colleges • Heads of Midwifery • All professional groups, at all levels of seniority • Education providers • Universities • Researchers
<p>R22 All midwifery students and NQMs must be enabled and supported to learn, consolidate, and practice the full scope of midwifery knowledge and skills as defined in the NMC Standards of Proficiency for Midwives, across the whole continuum of care and in all settings. [69]</p> <p>For safe, quality care for women and babies, midwives must have experience in the many ways in which women experience physiological labour and birth. Not enabling midwives to build their knowledge and skills to the best possible standard would be a serious safety concern.</p>	<p>A consistent regional approach to mentorship for students and a preceptorship programme for NQMs is needed, based on best practice and evidence, to ensure that midwives are able to practice the full scope of their regulatory standards in both hospital and community settings.</p> <p>The knowledge and skills in normal physiological processes underpin the ability to recognise deviations from normal physiology in pregnancy, labour and birth, postnatally, and in the early days of life and are essential to safe practice in this area.</p> <p>Each HSC Trust is responsible for ensuring that students, NQMs and indeed all midwives are enabled to learn, build, and maintain their knowledge, skills and confidence in a supportive, non-judgemental environment.</p>	<p>Relates to QMNC concept 3d and 7 and Health systems concept 4.</p>	<ul style="list-style-type: none"> * HSC Trust Boards and Executive Universities * HSC Trust Boards and Executive Heads of Midwifery • Nursing and Midwifery Council • Consultant midwives • Practice Education Facilitators • HSC Clinical Education Centre • Royal College of Midwives • All professional groups
<p>R23 The working environment for midwives must be comprehensively reviewed and a programme to ensure midwives work in a safe and rewarding environment must be implemented.</p> <p>Practical support for midwives should be implemented in all HSC Trusts including administrative support for senior midwives (Band 7 and above) including those with management and specialist roles and consultant midwives, and an increase in MSWs.</p>	<p>This will require:</p> <ul style="list-style-type: none"> • a workforce plan based on revised Birthrate Plus® workforce calculations in light of the analysis in this report. The Birthrate Plus® questionnaire should be completed by appropriately experienced staff with knowledge of both community and hospital services. They should be supported to complete it, and there should be consistency across HSC Trusts in the data used. • as a minimum, midwives should receive remuneration, terms and conditions equivalent to England. • review of midwifery roles by HSC Trust Human Resources Departments. • a regional plan to implement evidence-based support for recruitment and retention, drawing on examples of best practice (Appendix 11k). • individualised support to maximise retention and recruitment. 	<p>Relates to QMNC concept 4a and 7 and Health systems concept 4 and 5b.</p>	<ul style="list-style-type: none"> * Department of Health/Maternity and Neonatal Services Safety Oversight Group * HSC Trust Boards and Executive Heads of Midwifery • Consultant midwives • Royal College of Midwives • Trade Unions

Recommendation (R)	Operational considerations and next steps	Evidence base and additional information	Responsibility and accountability considerations *Lead role • Responsibility
<p>R24 Midwives are the key professional group working with women and babies living in challenging circumstances. The importance of this work should be recognised, valued, and adequately resourced.</p> <p>The time needed for midwives to work with women with additional social complexities and for work in public health should be included in BirthratePlus® calculations.</p>	<p>Midwives already work with Sure Starts and community groups across NI, and there are opportunities to strengthen these alliances, for example with health visitors, perinatal mental health supporters, breastfeeding counsellors and peer supporters, and antenatal educators. This could help to ease the pressures on the system while at the same time improving physical and mental health for women and their babies.</p>	<p>Relates to QMNC concept 2, 3a, 3b, 3c, 3d, 6 and 7 and Health systems concept 4 and 5b.</p>	<ul style="list-style-type: none"> * Department of Health/Maternity and Neonatal Services Safety Oversight Group * HSC Trust Boards and Executive Public Health Agency • Advocacy and community groups • Sure Starts • Heads of Midwifery • Consultant midwives
<p>R25 In addition to the requirements for ambulance services supporting out-of-labour ward settings for labour and birth (Section 8.2.2):</p> <p>A regionally agreed pathway should be developed and agreed with the NI Ambulance Service (NIAS) for all maternity and neonatal emergencies. There should be operational triage and transfer procedures that promote the integration of services and seamless pathways for women and babies transferring to maternity and neonatal units.</p> <p>Paramedic pathways should be developed for direct access/referral for women and babies transferring to obstetric and neonatal units for use when a midwife is not present on scene.</p> <p>Specific protocols should be in place for interdisciplinary and cross-boundary referrals including emergency transfers.</p> <p>NIAS staff should follow national guidelines for maternity emergencies, and standardised equipment should be available in all ambulances in line with national guidelines and minimum equipment recommendations.</p>	<p>A senior midwife should be responsible for liaison and planning with NIAS in each HSC Trust, and a consultant midwife should advise NIAS at regional level.</p>	<p>Relates to QMNC concept 4a and 5 and Health systems concept 3 and 5e.</p>	<ul style="list-style-type: none"> * Department of Health/Maternity and Neonatal Services Safety Oversight Group * HSC Trust and NIAS Boards and Executive * Heads of Midwifery • Consultant midwives • Ambulance staff

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Recommendation (R)	Operational considerations and next steps	Evidence base and additional information	Responsibility and accountability considerations *Lead role • Responsibility
Information, data, monitoring, review			
<p>R26 Issues that must be addressed in regard to information and data include:</p> <ul style="list-style-type: none"> Investment in data cleansing, quality assurance and analysis is required along with robust arrangements for data accountability at HSC Trust and regional level. Measures of outcomes and processes for women and babies should include both physical and mental health, and longer-term outcomes for women and babies. Staff wellbeing should be monitored using standardised measures. A consistent regional safety critical dashboard should be developed by the Maternal and Newborn Partnership (R7) and HSC Trust-level data should be reviewed at HSC Trust Board and management meetings to assess progress. This should include indicators of physical, psychological, and cultural safety, and equity. Factors associated with inequalities in outcomes and experiences for women and babies including ethnicity and socio-economic disadvantage should be closely monitored and actions evaluated and reviewed. Safety-critical data include staffing red flags, numbers of adverse incidents, the time taken to conduct SAIs, and data on mandatory updating for health professionals. Regular reports on learning from escalation and adverse incidents should be reviewed along with information on support for staff involved. HSC Trust Boards should have a consistent approach to monitoring the safety and quality of maternal and newborn services, using KPIs to assist ongoing monitoring developed regionally, and with input from staff and service users with a clear line of sight to the current practice environment. <p>Data should be readily accessible to the public and to all staff, managers, and policy-makers.</p>	<p>Monitoring data on stillbirth and on maternal, perinatal, and newborn mortality is essential but because of the small population of NI fluctuations in numbers can be misleading. Monitoring of longer-term trend data is important, as is scrutiny of maternal and newborn morbidity, experiences, processes, and inequalities, with appropriate benchmarking.</p> <p>Information at regional and HSC Trust levels should be publicly available and women should be informed about how to access this information at their booking visit. There are examples of publicly-available data on maternal and newborn care from other UK countries (https://publichealthscotland.scot/publications/scottish-pregnancy-births-and-neonatal-data-dashboard/scottish-pregnancy-births-and-neonatal-data-dashboard-a-new-home-for-maternity-and-neonatal-data-visualisations-16-january-2024/).</p> <p>It is expected that the encompass programme will produce consistent, region-wide data by the end of 2025. The implementation of this programme should be monitored to ensure timely and effective implementation across the maternity and neonatal services and to assess unintended adverse consequences.</p>	<p>Relates to QMNC concept 4b and Health systems concept 5d.</p>	<ul style="list-style-type: none"> * Department of Health/Maternity and Neonatal Services Safety Oversight Group * Strategic Planning and Performance Group * Public Health Agency • Chief Digital Information Officer • Regulation and Quality Improvement Authority • Northern Ireland Practice and Education Council • HSC Trust Boards and Executive • Advocacy and community groups • Royal Colleges • All professional groups • Universities

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Recommendation (R)	Operational considerations and next steps	Evidence base and additional information	Responsibility and accountability considerations *Lead role • Responsibility
<p>R27 A range of sources of information about women's views and experiences across the whole continuum of care must be available to policy makers, commissioners, HSC Trust Boards, clinical managers, staff, and the public, to ensure that the whole picture is understood and to inform service planning, assessment, action planning, and improvement.</p> <p>New processes should be developed to assess the views and experiences of women and families on a regular basis, and to make that information widely available. Work with community and advocacy groups will be essential to ensure inclusion of a wide range of women from groups who are seldom heard, including women with mental health problems, who are living in areas of deprivation, who do not speak English, or who may not be literate.</p>	<p>There are models to draw on from other jurisdictions, including the CQC Maternity Survey. NI previously ran the BIRTHNI survey, aligned with the Maternity Surveys for England.</p> <p>Relevant audit and research recommendations are in R28 and R31</p>	<p>Relates to QMNC concept 1 and 6 and Health systems concept 5d.</p>	<ul style="list-style-type: none"> * Department of Health/Maternity and Neonatal Services Safety Oversight Group * HSC Trust Boards and Executive Public Health Agency • Regulation and Quality Improvement Authority • Patient and Client Council • Universities • Researchers • Advocacy and community groups
<p>R28 Audit is an essential tool to alert the system to impact and unintended consequences of practices, and to inform and drive service improvement. All HSC Trusts should participate in and respond to regional and national audits of priority topics.</p>	<p>Priority topics for NI include:</p> <ul style="list-style-type: none"> • The impact of current policy and practice in regard to induction of labour and caesarean birth including compliance with NICE guidance 207 and 192, [171, 282] anxiety in late pregnancy, waiting times, impact on bed management, and postnatal care including pain relief, post-surgical complications, and women's mental health and wellbeing. • The accuracy and consistency of ultrasound scans, as recommended in the report on sonography services, [161] and the impact of conducting scans on the workload of midwives and obstetricians. • The implementation of CoMC. • Education and training for emergencies, especially timely response to shoulder dystocia in all settings. 	<p>Relates to QMNC concept 3c, 5 and 6 and Health systems concept 3 and 5d.</p>	<ul style="list-style-type: none"> * Department of Health/Maternity and Neonatal Services Safety Oversight Group * HSC Trust Boards and Executive Public Health Agency • Northern Ireland Practice and Education Council • All professional groups * Universities

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Recommendation (R)	Operational considerations and next steps	Evidence base and additional information	Responsibility and accountability considerations *Lead role • Responsibility
Building for the Future			
<p>R29 Training, development and succession planning is needed for all staff groups in collective, courageous, compassionate, leadership.</p> <p>To address the acute problem of leadership and management in midwifery, education and development opportunities are needed for all midwives to develop knowledge and skills in leadership, as well as more opportunities for midwives to take up senior management and leadership roles.</p> <p>Succession planning, and opportunities for leadership development and learning management skills for midwives including coaching and mentoring should be in place for roles at Band 7 and above.</p> <p>Robust induction programmes and coaching are needed to support clinical midwifery staff to undertake senior management and leadership roles.</p>	<p>Leadership programmes should be developed for all staff groups, to start in the early stages of professional careers to build skills at every level.</p> <p>There is a clear need to build leadership and management skills for the senior professional management level to ensure strong succession planning.</p> <p>Theoretical and practical training is needed to gain a better understanding of leading the implementation of change and the general business management functions required to run a busy maternity service such as planning, strategy, organisational behaviour, business case development, and budget and financial planning.</p>	<p>Relates to Health systems concept 4, 5b and 7.</p>	<ul style="list-style-type: none"> * Department of Health/Maternity and Neonatal Services Safety Oversight Group * HSC Trust Boards and Executive Strategic Planning and Performance Group * Universities * Education providers * Northern Ireland Practice and Education Council * HSC Clinical Education Centre • Royal College of Midwives • Trade Unions • All staff groups at all levels
<p>R30 To enable the meaningful engagement of a diverse range of service users in the design, delivery, monitoring and review of care and services, a funded programme of capacity and capability building is needed.</p> <p>Financial and administrative support from HSC Trusts and/or the DoH will be needed to support and train Maternity Voices Partnership Chairs and members and service users to contribute to HSC Trust and regional committees.</p>	<p>The UK Maternity Voices Partnership programme provides guidance and training that should be used to underpin capacity building and the engagement of user and advocacy voices across all HSC Trusts and the Maternity and Neonatal Partnership.</p>	<p>Relates to QMNC concept 1 and Health systems concept 5c.</p>	<ul style="list-style-type: none"> * Department of Health/Maternity and Neonatal Services Safety Oversight Group * HSC Trust Boards and Executive Strategy Planning and Performance Group • Advocacy and community groups • UK Maternity Voices Partnership Programme • Universities • Education providers
<p>R31 A coordinated, strategic programme of research on safe, quality maternity and neonatal care and services – including both research studies and capacity building - should be developed.</p> <p>A capacity building programme is needed from early career research to senior levels, for academics and clinical academics in all relevant disciplines.</p> <p>Clinical academics work across clinical practice, leadership, research and innovation, and education and are uniquely positioned to bridge the gap between evidence and implementation in practice, management, governance, and policy. [286]</p>	<p>Priority research studies should include:</p> <ul style="list-style-type: none"> • In depth examination of the current views and experiences of women and their families using the maternity and neonatal services in NI; including those living in challenging circumstances • Evaluation of the clinical benefits, unintended. consequences, resource implications with a health economics analysis, and long-term impact of current policy and practice in regard to induction of labour and caesarean birth. • Evaluation of the implementation of CoMC, to include assessment of barriers to its implementation, and of outcomes, experiences of women, families and staff, and a health economics analysis. 	<p>Relates to Health systems concept 6.</p>	<ul style="list-style-type: none"> * Department of Health/Maternity and Neonatal Services Safety Oversight Group * HSC Trust Boards and Executive Strategic Planning and Performance Group * Universities • Education providers • All professional groups • Professor of Midwifery and Head of School, QUB

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Recommendation (R)	Operational considerations and next steps	Evidence base and additional information	Responsibility and accountability considerations *Lead role • Responsibility
<p>R32 A specific Midwifery Career Pathway is needed, with regionally defined midwifery roles and responsibilities to promote consistency across HSC Trusts and to benchmark with other UK countries.</p> <p>A specific pathway for research development for midwives is needed to accelerate the development of knowledge and skills to improve safety and quality in maternity care.</p> <p>Capacity and capability building should start from undergraduate level and include funded places for midwives to study at Masters and doctoral levels, with support for post-doctoral and senior research positions to develop research leadership, and for senior clinical academic posts.</p>	<p>Clinical, management, leadership, research, and education opportunities should be included.</p>	<p>Relates to Health systems concept 5b, 6 and 7.</p>	<ul style="list-style-type: none"> * Department of Health/Maternity and Neonatal Services Safety Oversight Group * Strategy Planning and Performance Group * Public Health Agency • Universities • Education providers • Midwives and midwifery managers • Professor of Midwifery and Head of School, Queens University Belfast

8.4 The way forward 1: Developing a sustainable transformation programme

The transformation in care and services needed to enable safe, quality care and services for all requires a shift in strategy, policy, commissioning, governance, monitoring, education, culture, and practice. It will require the development of different relationships between disciplines, between hospital and community services, and between organisations including HSC Trusts, commissioners, and universities. There will need to be a different view of relevant evidence, to include knowledge and understanding of relationships, behaviour, and organisations as well as effective interventions. Better and more timely access to more relevant data will be needed, for the public and for staff as well as managers and decision-makers. A shift in post-registration/postgraduate education and training is required to move from fragmented provision to a strategic planned programme of change, aligned with and building on pre-registration/undergraduate knowledge and skills and building a pathway for academic development. New research will be needed to develop a better understanding of the impact of current practice and to design better systems to ensure safe, quality care for all. It will require the ‘*culture of fear*’ described by staff and women to be challenged and changed, and old established barriers to be removed. Capacity and capability will need to be built to ensure that the system has the leadership and the workforce it needs, with the active participation of women, families and communities. And above all it will require a radically different view of women – as empowered participants rather than passive recipients. It will not be easy, and it will take time. But the alternative is the continuation of a maternity system in which women and babies are experiencing the outcomes and experiences evidenced in this report, and in which women have to fit the system instead of the system shaping itself to meet the needs of women, babies and families.

Such extensive change, even when supported and recognised as beneficial, can feel daunting. The system is already stressed and under-resourced at every level, and ‘*you can only do so much on a shoestring*’, as one senior manager said. It will be important to consider that everyone has a role to play, and many changes can be implemented at a smaller scale to contribute to the overall shift.

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A labour ward team can work together to improve interdisciplinary communication; a HSC Trust Board should regularly meet and listen to service users, midwives, and students; and a review of processes for admission of women in labour to alongside midwifery units can be conducted to identify and tackle barriers. An important step will be to examine existing examples of good practice and to consider how to support and embed them, and how to turn *'best practice into common practice'*. Positive developments, large and small, can be recognised and celebrated.

Such change also needs investment of resources and time. Some of this will need new investment, but it is important to identify ways in which existing resources can be re-directed to support positive changes. Feasibility was a consideration in framing the recommendations, and evidence shows that several of these changes are likely to result in cost savings and to be cost-effective. [130]

8.4.1 Managing change

Starting with a structured process of involving service users, staff at all levels, managers, leaders and policy makers in joint problem-solving – in a process similar to the cross-sectoral workshop conducted for this report – will enhance the feasibility of recommendations and help to tackle barriers and identify effective strategies.

Implementing changes will take time and support for all involved. Effective, sustainable implementation will require an agreed action plan with clear lines of responsibility and accountability, indicators of achievement, monitoring of outcomes and processes, appropriate resources, and a timescale for delivery. A phased programme will be needed, likely to take up to 5 years to complete. It will need to be audited, evaluated and refreshed along the way with regular feedback to staff, managers and leaders, and the public, about progress at regional and at HSC Trust levels. [280]

An essential first step will be to agree what the system should look like – the key components that matter. Figure 35 summarises the essential components needed to build safe, equitable, quality care and services for all. At the heart is a reconfigured relationship with women, families, and communities, both in the way care is provided, and in their engagement with planning, provision and monitoring of services. This must be supported by an enabling environment for all staff and students in all hospital and community settings, and by better information to inform better commissioning and governance. These components will result in better safer care and improved experiences and outcomes.

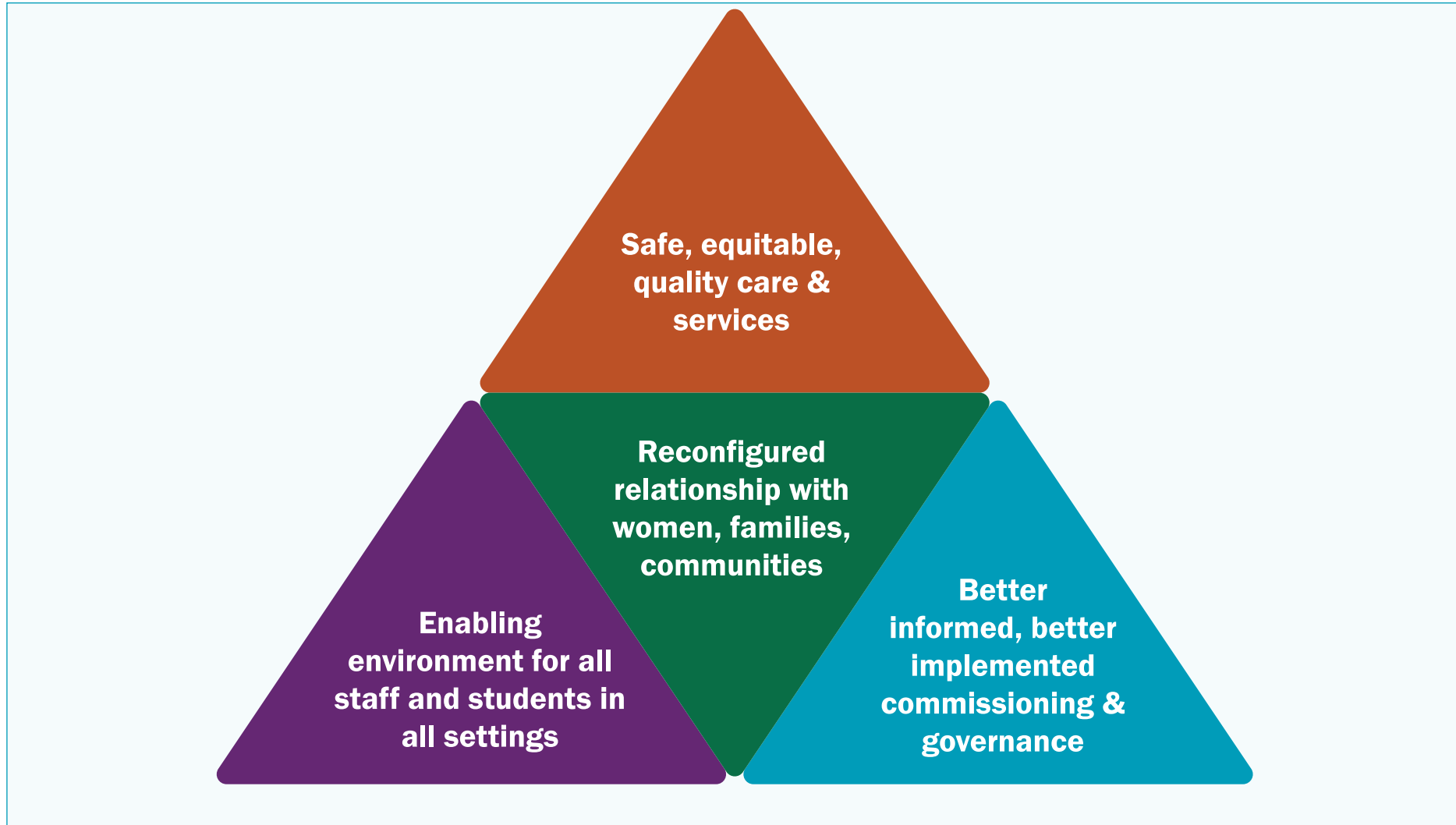


Figure 36: Three essential components to build safe, quality maternal and newborn care and services for all

8.5 The way forward 2: a framework for transformation

The plan for action and implementation of these recommendations should be grounded in the same principles as this report (Section 4.1) to ensure participative and collaborative working, an equity lens, development of services across the whole maternity journey, and evidence-informed change at scale.

Implementation of the changes will require:

- Assessment of the readiness to engage in change and the associated programme of work.
- Establishing region-wide partnership working that effectively engages the HSC Trusts.
- Building on strength – learning from examples of good practice and from advocacy groups and staff about what is needed.
- Development of robust structures for the participation of women, families, and communities.
- Development of structures and mechanisms for staff discussion and planning.
- Support for all staff.
- Education and training for staff.
- Developing new commissioning mechanisms to recognise evidence-based core standards.
- Monitoring the implementation of change, with indicators and expected outcomes.

An exemplar of indicators and outcomes for two specific Recommendations are shown in Appendix 13, to demonstrate an evidence-based and data-informed approach.

Some of the key indicators of achievement will be outcomes for women, babies and families, but it is unlikely that these will shift substantively until some at least of the changes are embedded. Some key indicators will be experiences, for women and families and for staff – these may change in medium term.

The implementation programme will need to be phased across 5 years; for example:

Year 1 – months 1-3: Preparatory phase:

- plan and conduct cross-sectoral workshop to engage all sectors and levels of the system to consider and agree underpinning values, outline theory of change, identify ways of tackling barriers, and identifying enablers.
- assess readiness and necessary conditions for change: engage with HSC Trust Boards, staff groups, and advocacy groups.

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Year 1 – months 1-12: Phase 1:

- establish a regional implementation group including all relevant perspectives: women’s advocacy, community groups, interdisciplinary staff and leaders, managers, researchers, educators, health economics expertise, policy makers, experience of leading large-scale change: to move under the auspices of the regional Maternal and Newborn Partnership when that is established.
- start the conversation with advocacy and community groups, interdisciplinary staff, managers, Boards, policy makers, and the public about what is needed, with external facilitation as required.
- develop a logic model/programme theory with agreed processes and outcomes.
- agree indicators with measures and relevant activities, and revised KPIs.
- identify resources needed, establishing budget to support sustainable implementation at scale.
- start work to develop regional maternity strategy.
- develop and commission mechanisms to assess the views and experiences of women and of staff.
- commission programme of research and evaluation to address priority questions.
- establish new regional and HSC Trust structures.
- agree and implement priority changes in consultation with service users and staff: e.g. strengthening staffing, education and training; intensive support for midwifery recruitment and retention; support for Alongside MLUs and home births; ensuring consistent evidence-informed emergency response by ambulance services in all HSC Trusts; developing evidence-informed consistent information for women; improving access to antenatal education; improving structures and processes for ambulance service responses to maternity and neonatal emergencies.
- implement education and training for all staff to support new ways of working.
- establish programme of leadership training.

Years 2-3: Phase 2:

- ensure all structures and processes are in place and working effectively with collaborative working and participation.
- establish consistent region-wide policies, protocols, and practice.
- establish two community midwifery units/hubs, fully supported by interdisciplinary team and ambulance services.
- implement accessible timely reporting of data including dashboards.
- establish unified education programme/commissioning.
- support conduct of surveys and of research and evaluation programmes.

Years 3-5: Phase 3:

- move to regional evidence-based, outcome-focused model for commissioning.
- ensure all new and existing staff have access to relevant ongoing education and training.
- continue to build and strengthen services, drawing on lessons from surveys, research and evaluation.

8.5.1 Developing a logic model/programme theory

A logic model or programme theory will be needed to ensure that all actions are coordinated and aiming for the same outcomes. A draft logic model is shown in Figure 36, illustrating the activities, outputs, changes in culture and practice, and the impact on short- and long-term outcomes for women, babies and families, staff, population health, and for the health system. This can act as a basis for discussion and further development.

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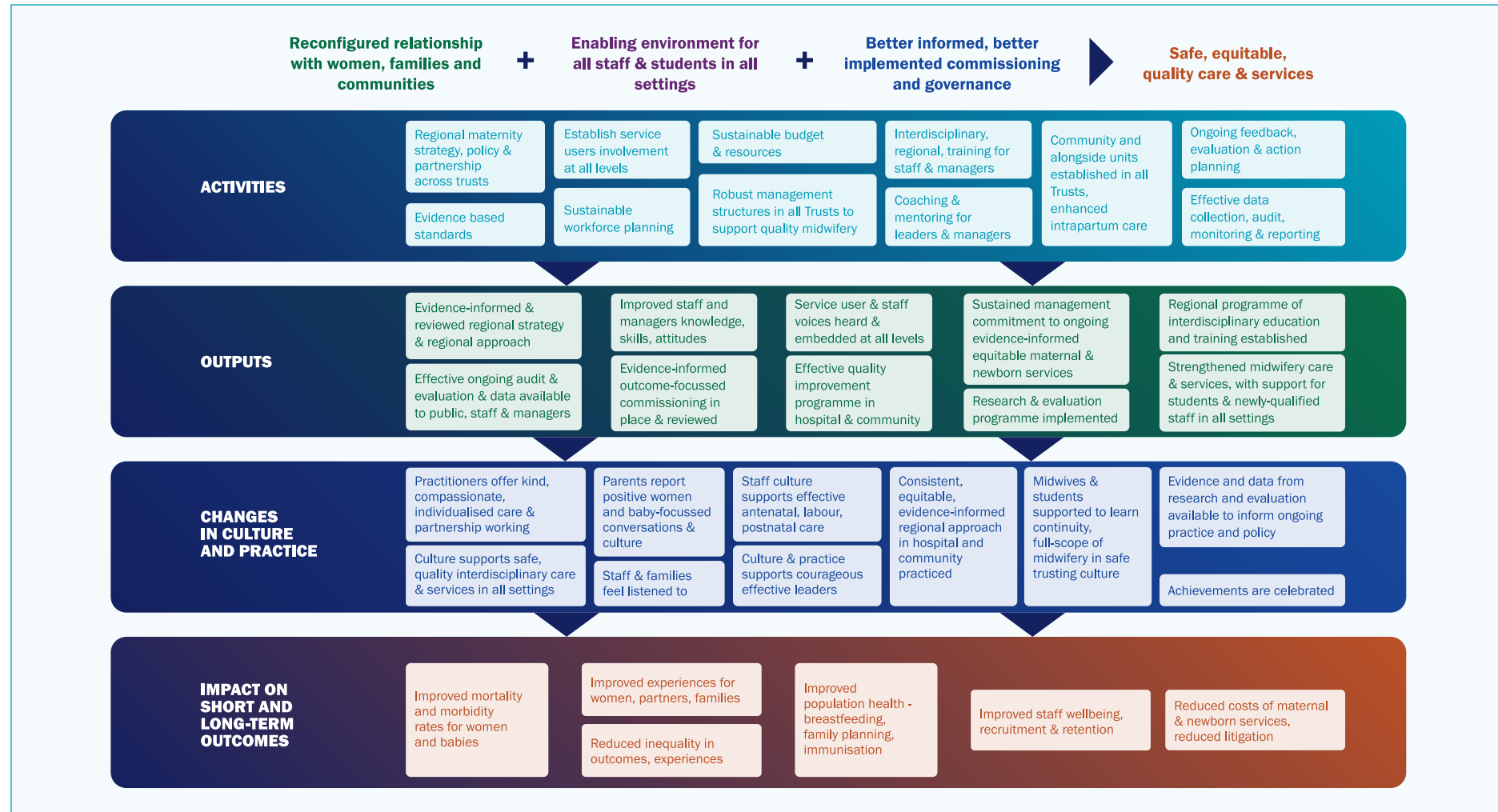


Figure 37: Programme theory logic model: creating transformative change



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GLOSSARY

Term	Definition
AIMS	Association for Improvements in the Maternity Services, a registered charity supporting women and families to achieve the birth that they want.
Alongside MLU	Alongside Midwifery Led Unit is a clinical location offering care to women with straightforward pregnancies during labour and birth in which midwives take primary professional responsibility for care and provide a more homely and normal environment for labour and birth, usually with the option of a waterbirth. They are situated in the same hospital or on the same site as a maternity unit, so have access to obstetric, neonatal or anaesthetic care as well as midwifery care on site, although women may need to be physically transferred to the maternity unit if they need obstetric care. Most of the maternity units in Northern Ireland have midwife-led units attached to them.
Anaesthetics	Medicines that prevent pain during surgeries and other procedures. A general anaesthetic means you will be put to sleep. Regional anaesthetic makes a specific part of the body numb to allow surgical procedures to be done. A doctor trained to administer this medicine is called an Anaesthetist.
Antenatal	Before the birth.
Assisted/ Instrumental birth	When special instruments (forceps or ventouse) are used to help the baby to be born.
B@H team	Birth at Home team based in SHSCT.
Bereavement	In maternity and neonatal care, this can be a result of miscarriage, stillbirth, the death of a newborn baby (perinatal or neonatal death) or the death of a mother (maternal death).
BHSCT	Belfast Health and Social Care Trust.
BirthWise	A grassroots movement of expectant and new parents and those who support them. They campaign for continuous improvements in maternity services and other relevant services.
BMI	Body mass index, a measurement to work out the range of healthy weights for a person. It is calculated by dividing weight (in kilograms) by height (in metres squared – that is, height in metres multiplied by itself). The healthy range is between 19 and 2.
BOMOKO	Northern Ireland Refugees and Asylum Seekers Women Association.
BSc	Bachelor of science degree
Caesarean birth	Birth of a baby through an incision made in the mother's abdomen and then into her uterus. It may be done as a planned (elective) or an emergency procedure.

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Term	Definition
Care Opinion	A feedback platform launched in August 2020 that enables service users, carers and families to share their experiences of health and social care across Northern Ireland.
Care outside of guidance	Care outside of guidance refers to care for women who wish individualised care during pregnancy, labour, birth or the postnatal period in a birth setting of their choice that differs from guidance or protocols.
CEC	The HSC Clinical Education Centre is a unit of the Business Service Organisation (BSO). CEC design and deliver education that supports Nurses, Midwives and Allied Health Professionals across Northern Ireland. In collaboration with clients they design, develop and deliver a wide range of programmes across a wide variety of fields of practice and settings to meet the learning and developments needs of local workforces. The CEC operates from four sites across Northern Ireland.
Centred Soul	A Newry based social enterprise, supporting women.
CMidO	Chief Midwifery Officer.
CMO	Chief Medical Officer in the Department of Health, NI.
CNO	Chief Nursing Officer in the Department of Health, NI.
Continuity of care/ CoC	Continuity and consistency of management and care including providing and sharing information and care planning and necessary coordination of care.
Continuity of Midwifery Care/CoMC	Continuity of Midwifery Care Model; this aims to provide a woman with care from the same midwife or team of midwives during pregnancy, birth and the early parenting period, as well as interdisciplinary care as needed.
Community Midwife	A registered midwife who provides care for women in a community setting, including antenatal and postnatal care and home birth.
Complications	Problems that develop during pregnancy, labour and birth, or postnatally.
Continuum of care	The provision of care across the whole childbearing period from early pregnancy, pregnancy, labour, birth, postpartum and the early weeks of the baby's life. See also Maternity Journey.
CWA	Chinese Welfare Association, Northern Ireland's Largest Chinese Community Organisation. Positively engaging to promote racial equality and foster a welcoming, diverse, equal, fair NI.
Day Assessment Unit/ Day Obstetric Unit	A hospital or community-based facility that provides care and assessment during pregnancy and follow up postnatal care for a wide range of issues. The unit is staffed by midwives and maternity support workers with access to or the ability to refer to obstetricians as required for ongoing care.
DoH	Department of Health is a devolved Northern Irish government department in the Northern Ireland Executive.
Doula	A doula is a person who supports women through labour and birth, and/or after she has her baby. Doulas UK offers standardised training for doulas.

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Term	Definition
Early pregnancy assessment unit	A clinic that specialises in problems in early pregnancy (under 12 weeks) where a woman receives medical care, counselling and treatment as required.
Emergency Assessment and Admissions Unit	This unit provides urgent and emergency care during pregnancy and the postnatal period. The unit is staffed by midwives and maternity support workers with the support of obstetricians.
Family	The people considered by the woman to be her family. This may include her partner, other children, relatives or close friends.
Fetal Assessment Clinic	A clinic specialising in the assessment of the wellbeing and growth of the unborn baby.
Fetal Macrosomia	The term used for a baby who is larger than expected for gestational age; usually defined by an absolute weight (for example an estimated fetal weight of more than 3500g at 36 weeks) or in relation to centiles (for example, an estimated fetal weight above the 95th percentile at or after 36 weeks of gestation).
Fetal Medicine Clinic	A clinic that provides a range of expertise in the care and management of a high risk pregnancy and fetal anomaly.
First stage of labour	The time from when a woman is experiencing strong, regular contractions until she is fully dilated (10cms).
Freestanding MLU	Freestanding Midwifery Led Unit is a clinical location offering care to women with straightforward pregnancies during labour and birth and in which midwives take primary professional responsibility for care. These units can be in a smaller community hospital or completely separate. During labour and birth diagnostic and treatment medical services including obstetric, neonatal and anaesthetic care, are not immediately available but are located on a separate site should they be needed. Care in labour will be provided by midwives and if there is a problem, women and babies are transferred by ambulance to the local obstetric or neonatal unit.
Forceps	A pair of hollow blades which are placed either side of the baby's head to assist with the birth. When this happens, it is known as a forceps birth.
Fourth-degree laceration/tear	A laceration during childbirth which extends from woman's perineum to her anus and rectum.
Freebirth	Freebirthing is where the woman chooses to birth at home without professional assistance.
GAIN guideline	Guidelines that have been published by the Guideline and Audit Implementation Network to promote quality in the Health Service in Northern Ireland.
Gestational age	The age of the baby in the womb, measured in weeks from the first day of the woman's last menstrual period. The baby is considered to be full term after 37 weeks. Recent evidence suggests that 37-38 weeks should be considered 'early term', 39-40 completed weeks full term, 41-41 completed weeks late term, and 42+ weeks post term.

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Term	Definition
GP	General Practitioner, a doctor who provides general medical treatment for people who live in a particular area.
Gynaecologist	A doctor who treats medical conditions and diseases that affect women and their reproductive organs.
Haemorrhage	Sudden and severe bleeding. In pregnancy this is called antepartum haemorrhage and after the birth it is called postpartum haemorrhage.
Home birth	Giving birth at home, with care provided by a midwife.
HSC	Health and Social Care.
HSCT	Health and Social Care Trust. There are six Health and Social Care Trusts in Northern Ireland - Belfast, Northern, South Eastern, Southern and Western HSCTs and NIAS, the Northern Ireland Ambulance Service.
ICS	The Integrated Care System is a single planning system for health and social care in NI and will bring together a range of partners to plan health, social care, and other services, with the aim of improving health and wellbeing and reducing health inequalities in Northern Ireland, with an anticipated launch in April 2024.
Induction of labour	A method of artificially or prematurely stimulating labour.
Intrapartum	During birth.
KPI	Key Performance Indicator.
Labour	The stages of childbirth. Labour is divided into three stages; first, second and third.
Maternity and Neonatal Services Safety Oversight Group	DoH-led Group established to oversee the maternity and neonatal services.
Maternity Collaborative	A subgroup of MSIG that has a cross-trust multiprofessional collaborative which aims to improve the safety and outcomes of maternal and neonatal care by reducing variation in practice and to provide a high-quality healthcare experience for all women, babies and families across the maternity services.
Maternity Hub	A service that provides antenatal and postnatal services but does not provide services for inpatient and hospital births.
Maternity journey	The woman's view of her journey from early pregnancy through pregnancy, labour, birth, and the early days and weeks following birth. See also Continuum of care.
Midwife	A midwife practising in the UK is a registered professional who has successfully completed a midwifery education programme meeting the NMC Standards of proficiency for midwives. Midwives are fully accountable for their care and support of women and babies, and partners and families.

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Term	Definition
Minding Mums	A maternal mental health programme funded by the Big Lottery Community Fund, which aim to improve perinatal mental health for women in the Waterside, Derry
Multidisciplinary team	A group of health and care staff who are members of different organisation and professions that work together to make decisions regarding the treatment and care of patient
MSc	Master of Science degree
MSIG	Maternity Strategy Implementation Group is a group that has cross-trust and multi-professional input.
MSLC and MVP	Maternity Services Liaison Committee and Maternity Voice Partnership are forums to gather opinions, feedback, and advice from local maternity service users and those who work with them. The aim is to work together and improve services in response to the needs of women.
MSW	A Maternity Support Worker is an unregistered employee providing support to a maternity team, mothers, and their families. The MSW undertakes duties in a maternity setting for which midwifery training and registration are not required, under the direction and supervision of a registered midwife.
Neonatal care	The care given to sick or premature babies. It takes place in a neonatal unit, which is specially designed and equipped to care for them.
Neonatal unit	A special or intensive care unit designed with special equipment to care for premature or seriously ill newborn babies. There are 3 levels within a neonatal unit: intensive care (level 1), high dependency (level 2) and special care (level 3).
Neonatologist	A doctor who specialises in caring for newborn babies.
NHS	National Health Service is the publicly funded healthcare system in in United Kingdom, comprising of NHS England, NHS Scotland, NHS Wales and Health and Social Care in Northern Ireland.
NHSCT	Northern Health and Social Care Trust.
NI	Northern Ireland.
NIAS	Northern Ireland Ambulance Service, an ambulance service that serves the whole of Northern Ireland.
NICE	National Institute for Health and Care Excellence, an independent organisation responsible for providing national guidance on promoting good health and preventing and treating ill health.
NICORE	Neonatal Intensive Care Outcomes Research and Evaluation collates outcomes data from Northern Ireland neonatal units which can be used for national benchmarking. NICORE is funded by DoH and is jointly overseen by PHA and QUB.

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Term	Definition
NIMACH	The Northern Ireland Maternal and Child Health Office is based within the Public Health Agency. NIMACH collects and analyses mortality outcomes in relation to stillbirths, neonatal and maternal deaths. NIMACH contribute to national audits via MBRRACE-UK, which is responsible for conducting the National Confidential Enquiry into Maternal Deaths and national surveillance of late fetal losses, stillbirths, and infant deaths.
NIMATS	Northern Ireland Maternity System contains a range of demographic and clinical information on mothers and infants.
NIMDTA	Northern Ireland Medical & Dental Training Agency, responsible for the education and training of doctors and dentists in Northern Ireland.
NIPEC	The Northern Ireland Practice and Education Council for Nursing and Midwifery supports the development of nurses and midwives by promoting high standards of practice, education, and professional development. NIPEC also provides advice and guidance on best practice and matters relating to nursing and midwifery.
NISRA	Northern Ireland Statistics and Research Agency, the principal source of official statistics and social research on Northern Ireland.
NMC	The Nursing and Midwifery Council is the UK independent regulator for nurses, midwives, and nursing associates.
NNNI	Neonatal Network Northern Ireland is committed to maintaining safe, high quality, family focused and sustainable neonatal services in Northern Ireland.
NPEU	National Perinatal Epidemiology Unit is a multidisciplinary research unit based at the University of Oxford.
NQM	Newly Qualified Midwife.
Obstetrician	A doctor specialising in the care of women during pregnancy and labour and after the birth.
Obstetric Unit (OU) or Maternity Unit	A hospital unit in which care is provided by a team. Midwives offer care to all women in an OU, whether or not they have complications; they take primary responsibility for women with straightforward pregnancies during labour and birth. Obstetricians take primary professional responsibility for women with complications during labour and birth. Diagnostic and treatment medical services including obstetric, neonatal, and anaesthetic care are available on site, 24 hours a day. Access to services such as epidurals to relieve pain and a paediatrician to provide care for the baby will also be available.
Paediatrician	A doctor who specialises in the care of babies, children, and teenagers.
Paramedic	A registered professional responsible for managing the pre-hospital treatment, care, and movement of patients to hospital without unnecessary delay. In maternity care this includes women and babies.
PCC	Patient and Client Council aims to provide an independent voice for patients, clients, carers and communities on health and social care issues in NI.

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Term	Definition
Partner	The person considered by the women to be her life partner. This may include the biological father and other- or same-sex partners
Perinatal	The time shortly before and after the birth of a baby.
Perinatal mental health	The mental health of women during pregnancy and that can last for up to one year after childbirth.
Perineal laceration/tear	A laceration to the woman's perineum during childbirth, which is the area between the vagina and anus. Small lacerations can heal naturally but may require stitches.
Pessary	Medication designed to be inserted into the vagina. Prostaglandin pessaries are sometimes used to induce labour.
PHA	Public Health Agency is responsible for providing health protection and health and social wellbeing improvement to every member of every community in Northern Ireland. The Public Health Agency was established in April 2009 as part of the reforms to Health and Social Care (HSC) in Northern Ireland.
Postnatal care	The professional care for women and babies from the birth until the baby is about six weeks old. It usually involves home or virtual visits by midwives in the first 10-28 days, and then by health visitors, to check that both mother and baby are well.
Postpartum/Postnatal	The period beginning immediately after the birth of a baby until about six weeks after the birth.
Premature birth/Preterm birth	The birth of a baby before the 37th week of pregnancy.
Physiological birth	Birth of the baby where woman do not receive medical interventions such as caesarean section, forceps or ventouse. Normally the responsibility of midwives. See also Spontaneous vaginal birth.
QUB	Queen's University Belfast, Northern Ireland.
RCGP	Royal College of General Practitioners is the professional body for general practitioners in the United Kingdom.
RCM	Royal College of Midwives the only professional organisation and trade union dedicated to serving midwifery and the whole midwifery team.
RCoA	Royal College of Anaesthetists Northern Ireland is the professional body responsible for the specialty of anaesthesia throughout the United Kingdom.
RCOG	Royal College of Obstetricians and Gynaecologists is the professional body who oversee the medical education, training and examination of obstetricians and gynaecologists in the UK and many places overseas.
RCPCH	Royal College of Paediatrics and Child Health is the professional body for paediatricians in the United Kingdom.

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Term	Definition
Regional Maternity and Neonatal Dashboard	A dashboard managed by Performance Management and Service Improvement (PMSI) at Strategic Planning and Performance Group (SPPG). It can be accessed by management and clinical staff within HSC Trusts. The Maternity Dashboard extracts data from NIMATS, the regional information system for HSC maternity services. This allows for regional comparison across a range of clinical indicators. At the time of fieldwork, dashboard indicators were being updated to align with 'Saving Babies Lives 2'.
RJMH	Royal Jubilee Maternity Hospital.
ROI	Republic of Ireland.
RQIA	Regulation and Quality Improvement Authority, the independent body responsible for monitoring and inspecting the availability and quality of health and social care services in Northern Ireland.
SAI	Serious Adverse Incident is any event or circumstance that led or could have led to unintended or unexpected harm, loss, or damage.
Sands	Sands is a charity that exists to reduce the number of babies dying and to support anyone affected by the death of a baby, before, during or shortly after birth, whenever this happened and for as long as they need support. Sands works in partnership with health care professionals, Trusts and Health Boards and offers a range of training programmes and bereavement care resources to ensure that every bereaved parent and family receives the best possible care wherever they are in the UK. Sands supports and promotes research to better understand the causes of baby deaths, improve maternity safety and save babies' lives. The charity also raises awareness of baby loss and works with governments, key influencers, and other stakeholders to make reducing the number of babies dying a priority nationally and locally.
Screening	A test or set of tests to check for a condition in a person who shows no symptoms.
Second stage of labour	Second stage of labour: the time from full dilation of the cervix to the moment when the baby is outside the mother's body.
SEHSCT	South Eastern Health and Social Care Trust.
Shoulder dystocia	A complication during the birth when the baby's head has been born but one of the shoulders becomes lodged behind the mother's pelvic bone preventing the birth of the baby's body.
SHSCT	Southern Health and Social Care Trust.
Skin-to-skin contact	Skin-to-skin contact is the practice where a baby is dried and laid directly on the mother's bare chest after birth, both of them covered in a warm blanket and left for at least an hour or until after the first feed. Skin-to-skin contact can also take place any time a baby needs comforting or calming and can help to boost a mother's milk supply. Skin-to-skin contact is vital in neonatal units where it is often known as 'kangaroo care'. It helps parents bond with their baby and supports better physical and developmental outcomes for the baby.

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Term	Definition
Spontaneous vaginal birth	The birth of a baby through the vaginal canal without instrumental intervention. See also Physiological birth.
SPPG	Strategic Performance and Planning Group (formerly HSCB) is responsible for monitoring the quality and safety of the services it commissions. Each HSC Trust provides SPPG with assurance information on a quarterly basis. Since the closure of HSCB in March 2022, and the establishment of SPPG as a branch of the DoH, work is underway to modernise the model of commissioning and performance monitoring in Northern Ireland.
Stillbirth	When a baby is born with no sign of life after the 23rd completed week of pregnancy.
Sure Start	A programme that support parents with children aged under four years old, living in disadvantaged areas in Northern Ireland. The programme can help a parent from pregnancy until their child starts school.
SWAH	South West Acute Hospital.
The Parent Rooms	A charity that aims to develop and grow a safe, accessible, and regional peer support network across Northern Ireland for parents experiencing mental health difficulties.
Third-degree laceration/tear	A laceration during childbirth which extends downwards from the vaginal wall and perineum to the anal sphincter, the muscle that controls the anus.
TinyLife	Northern Ireland's only dedicated premature baby charity here to help provide support services both in the Neonatal Unit and in the community.
Trimester	A three-month period of time. Pregnancy is divided into three trimesters: First trimester – up to around 13 weeks. Second trimester – to around 13 to 26 weeks. Third trimester – around 27 to 40 weeks.
UK	United Kingdom.
WHST	Western Health and Social Care Trust.
Woman/Women	This reflects the biology and identity of the great majority of those who are childbearing. These terms include adolescent girls. They also include people whose gender identity does not correspond with their birth sex or who may have a non-binary or fluid identity.
WTE	Whole Time Equivalent expresses the total contracted hours as a multiple of full-time contracted hours.

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APPENDICES

Appendix 1: Expert group membership

Name	Role	Affiliation
Dr Carol Beattie	Senior Medical Officer	Department of Health Northern Ireland
Katie Colville	Associate Director of Midwifery	NHS Grampian, Scotland
Dr Tracey Cooper	Regional Chief Midwife	North East England NHS
Emma Fraser	Northern Ireland Maternity Service User Representative	Independent
Dr Chris Gale	Reader in Neonatal Medicine and Honorary Consultant Neonatologist	Faculty of Medicine, School of Public Health Imperial College London and Chelsea and Westminster NHS Foundation Trust
Professor Gwendolen Bradshaw	Professor Emerita, former Pro Vice Chancellor (Learning, Teaching and Quality)	University of Bradford
Dr Alex Heazell	Professor of Obstetrics and Consultant Obstetrician	University of Manchester
Brenda Kelly	Co-Chair of Strategic Midwifery Sub Committee of Central Nursing and Midwifery Advisory Committee	Belfast Health and Social Care Trust, Northern Ireland
Lorna Low	Team Leader	Argyll and Bute (NHS Highland)
Dr Fiona Lynn	Health Economist	Queen's University Belfast
Cristina Mattison	Research Affiliate	Canada (McMaster) and Sweden (Karolinska)
Kade Mondeh	Consultant Midwife – Maternity Education	Barts Health NHS Trust
Mary Newburn	Patient and Public Involvement and Engagement Lead	King's College London, Maternity and Perinatal Mental Health for National Institute for Health Research Applied Research Collaboration South London, King's College Hospital NHS Foundation Trust
Dr Rachel Rowe	Associate Professor and Senior Health Services Researcher	National Perinatal Epidemiology Unit, University of Oxford
Professor Jane Sandall	Professor of Social Science and Women's Health	King's College, London
Verena Wallace	Senior Policy Advisor (Midwifery)	Nursing and Midwifery Council

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Appendix 2: Advisory group membership

Name	Role	Affiliation
Dr Beverley Adams	Consultant Obstetrician & Gynaecologist	Southern Health and Social Care Trust (HSCT)
Professor Fiona Alderdice	Senior Scientist, National Perinatal Epidemiology Unit	National Perinatal Epidemiology Unit, University of Oxford
Leslie Altic	Northern Ireland Maternity Service User Representative	Independent
Dr Eliz Bannon	Dr of Midwifery Practice, Honorary Fellow RCM, former Head of Midwifery and Clinical Co-Director Belfast HSCT	Freelance
Paula Boyle	Interim Head of Midwifery	Southern HSCT
Dr Caroline Bryson	Consultant Obstetrician & Gynaecologist	South Eastern HSCT
Wendy Clarke	Head of Midwifery & Gynaecology	Southern HSCT
Caroline Diamond	Assistant Director of Women's Health and Head of Midwifery and Gynaecology	Northern HSCT
Simon Fell	Clinical Service Improvement Lead, Acute Care	Northern Ireland Ambulance Service (NIAS)
Heather Finlay	Head of CEC	Clinical Education Centre (CEC)
Dr Kevin Glackin	Consultant Obstetrician & Gynaecologist	Western HSCT
Shona Hamilton	Chair of the Consultant Midwife Northern Ireland Forum	Northern HSCT
Dr Maria Healy	Co-author of the Guidelines and Audit Network (GAIN) guideline for admission to midwife-led units (MLUs) in NI (2016, updated 2018) and the Regional Quality Improvement Authority (RQIA) Guideline for Planning to Birth at Home (2019)	Queen's University Belfast (QUB)
Dr Penny Hill	Chair of Maternity Collaborative and Consultant Obstetrics and Gynaecology	South Eastern HSCT
Brenda Kelly	Divisional Midwife and Head of Midwifery Specialist Hospital & Women's Health	Belfast HSCT

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Name	Role	Affiliation
Linda Kelly	Chief Executive of NIPEC	Northern Ireland Practice and Education Council (NIPEC)
Dr Alison Little	Midwife Consultant	Public Health Agency (PHA)
Brenda McCabe	Interim Head of Midwifery	Western HSCT
Hannah McCauley	Interim Head of Midwifery	South Eastern HSCT
Claire McGuigan	Midwifery Team Leader	South Eastern HSCT
Dr Sinead McGuirk	RCOA Representative	Royal College of Anaesthetists (RCOA)
Maureen Miller	Head of Midwifery, Gynaecology & Newborn Hearing Screening	Western HSCT
Gillian Morrow	Midwifery Team Leader	Belfast HSCT
Dr Mary Murnaghan	RCOG Representative and Consultant Obstetrician & Gynaecologist	Belfast HSCT and Royal College of Obstetricians and Gynaecologists (RCOG)
Karen Murray	Northern Ireland Director	Royal College of Midwives (RCM)
Valerie Porter	Former Head of Midwifery & Gynaecology	South Eastern HSCT
Heather Reid	Director of Nursing, Midwifery and AHPs	PHA
David Robinson	Executive Director of Nursing, Midwifery and AHPs	South Eastern HSCT
Katherine Robinson	Midwifery Team Leader	South Eastern HSCT
Professor Julia Sanders	Professor of Clinical Nursing and Midwifery	University of Cardiff
Dr Nita Saxena	Consultant Neonatologist	South Eastern HSCT
Dr Janine Stockdale	Lead Midwife for Education and Senior Lecturer	QUB
Dr Rory Sweeny	Deputy Officer for RCPCH	Royal College of Paediatrics and Child Health (RCPCH)
Susanne Thomas	CoMC Lead Midwife	Belfast HSCT

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Appendix 3: Secretariat team membership

Name	Role	Job title and Affiliation
Professor Mary Renfrew	Report lead	Professor Emerita, University of Dundee
Sharon Balmer	Policy support (August 2023 – December 2023)	Former Chief Nursing Officer Group - Policy, Department of Health NI
Lisa Hill	Policy support (August 2023 – January 2024)	Chief Nursing Officer Group - Policy, Department of Health NI
Caroline Keown	Professional midwifery advice lead and oversight on behalf of Chief Nursing Officer from January 2024	Chief Midwifery Officer, Department of Health NI
Dr Jenny McNeill	Senior Researcher	Reader in Midwifery Research, Queen's University Belfast
Maureen Ritchie	Professional midwifery advisor	Midwifery Support Officer, Department of Health NI
Dr Dale Spence	Professional midwifery advice lead until September 2023 and continued oversight on behalf of Chief Nursing Officer	Former Midwifery Officer, Department of Health NI
Claire Williams	Policy support lead	Chief Nursing Officer Group - Policy, Department of Health NI

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Appendix 4: Critical questions

Questions identified to address the three ToRs of this work and to guide the methods of the rapid efficient reviews

Term of Reference/ section	Critical questions	Methods
1. To conduct a comprehensive review of the number of staff, experience, education, training and policies required for Freestanding Midwifery Led Units (as outlined in para 195 of the Coroner's report)	What are the key conditions for safe, quality midwifery services in Midwifery-led Units in Northern Ireland, including identification of the enablers and the barriers?	Evidence reviews, positive service examples, consensus
	What are the most effective approaches to education and training for maternity emergencies in all settings?	Evidence reviews, consensus
	What examples of successful/positive midwifery services exist and what are the enabling factors and conditions for success/sustainability?	Positive service examples
2. To consider the need for further guidance to all HSC Trusts in relation to the Coroner's findings regarding the management of BMI and shoulder dystocia	What is current best practice around care of women with BMI of 30 and above?	Evidence and guideline reviews
	What is current best practice around care of women with suspected or confirmed fetal macrosomia?	Evidence and guideline reviews
	What is current best practice around the management of shoulder dystocia?	Evidence and guideline reviews
3. To undertake further work to inform a consistent approach to provision of midwifery services, including integration across wider maternity services	What are the key conditions for safe, quality midwifery services across all settings in Northern Ireland, including identification of the enablers and the barriers?	Evidence reviews, positive service examples, consensus
	What are the most effective approaches to improving the quality and safety of maternity/midwifery services across all settings?	Evidence reviews, consensus
	What examples of successful/positive midwifery services/developments exist in NI and what are the enabling factors and conditions for success/sustainability?	Positive service examples, engagement

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Appendix 5: Rapid efficient evidence reviews

- Appendix 5a: Quality and safety in midwifery and maternity services (*Sandall 2024 unpublished*)
- Appendix 5b: Health system barriers and enablers to quality midwifery services (*Mattison et al 2024 unpublished*)
- Appendix 5c: Health economics (*Lynn et al 2024 unpublished*)
- Appendix 5d: Maternal and neonatal outcomes associated with planning birth in different settings (*Rowe 2024 unpublished*)
- Appendix 5e: Best practice of 1) Shoulder dystocia; 2) Care of women in pregnancy with BMI of 30 and above including their experiences; and 3) Prevention of complications related to large for gestational age infants (*Heazell et al 2024, Gale et al 2024, McNeill et al 2024 unpublished*)
- Appendix 5f: Education and training (*Stockdale et al 2024 unpublished*)

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Appendix 5a

Rapid efficient evidence review: Quality and safety in midwifery and maternity services

Guiding question: What approaches are most effective for sustainable improvement in safety and quality care in midwifery/maternity services

Author: Sandall J (2024)

Background and context

How do we define safe and high-quality care?

Patient safety is defined as “the absence of preventable harm to a patient and reduction of risk of unnecessary harm associated with health care to an acceptable minimum.” Within the broader health system context, it is “a framework of organized activities that creates cultures, processes, procedures, behaviours, technologies and environments in health care that consistently and sustainably lower risks, reduce the occurrence of avoidable harm, make error less likely and reduce impact of harm when it does occur. [1]

Quality health care can be defined in many ways but there has been an acknowledgement that quality health services should be: Effective, Safe, People-centred, Timely, Equitable, and Efficient [2]

What are issues with current approach to safety?

Current issues raised in numerous safety inquiries [3, 4] include evidence of ongoing variation in experience and outcomes, and inequities linked to socio-economic status and ethnicity. Identification of barriers to improvements in safety and quality include culture and workforce challenges, organisational secrecy, and protection of organisational and individuals’ reputation. Staff don’t feel safe to raise concerns, service users don’t feel safe or get listened to, and there is a lack of a proactive approach, silo thinking, and in-group thinking. [5, 6]

Methods

A search was undertaken in April 2024 of PubMed using search terms (“Systematic Review” quality improvement patient safety maternity services), or (“Systematic Review” quality improvement patient safety health services). The Cochrane Library was searched using the terms ‘effectiveness of safety’ and ‘quality improvement programmes.

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Results - key themes identified

Improvement in safety and quality of care is hard, [7] and new approaches to safety take the view that variability is inevitable in healthcare, the source of both success and failure, that safety is an ongoing system capacity rather than freedom from error, [8] and of the importance of learning from everyday work rather than adverse events. [9, 10, 11] Furthermore such approaches have provided a critical examination of the role of social inequality, and power and control in the framing of safety events. [4, 5, 12, 13]

What approaches been used in maternity/healthcare and what is the evidence and impact?

In terms of looking at 'what good looks like' seven features of safety in maternity units have been described as including: (1) commitment to safety and improvement at all levels, with everyone involved; (2) technical competence, supported by formal training and informal learning; (3) teamwork, cooperation and positive working relationships; (4) constant reinforcing of safe, ethical and respectful behaviours; (5) multiple problem-sensing systems, used as basis of action; (6) systems and processes designed for safety, and regularly reviewed and optimised; (7) effective coordination and ability to mobilise quickly. [14, 15]

The evidence on the impact and sustainability of healthcare improvement programmes is poor, limited by lack of an evidence base, support for implementation, and the use of inconsistent definitions and measures of programme sustainability. [16, 17, 18]

Evaluations of service improvement programmes and interventions seldom used theoretical frameworks designed to assess sustainability, [10] used different success criteria, [19] and measures [20] and were uncosted.

Escalation

A challenge for health providers is recognising clinical deterioration early in pregnant women. Professional bodies recommend the use of clinical assessment protocols or evaluation tools, commonly referred to as physiological track-and-trigger systems or early warning systems, as a means of helping maternity care providers recognise actual or potential clinical deterioration early. They may be helpful in reducing outcomes such as haemorrhage and maternal length of hospital stay, through early identification of clinical deterioration and escalation of care. However, the evidence suggests that their use compared to standard care probably results in no difference in maternal and neonatal death. [21]

Women and their families not only need to be made aware of red flag signs and symptoms and information on the most effective ways to seek urgent medical assessment and care, [20] but find that they are often ignored. [23]

Interactional patient/family-facing interventions and multi-component programmes (which include staff) to increase patient and family involvement in escalation of care for acute life-threatening illness may improve patient and family knowledge about danger signs and care-seeking responses, and probably have few adverse effects on patient's anxiety levels when compared to usual care, but probably have little impact on mortality rates. [24]

There is evidence that a positive organisational culture is related to positive patient outcomes, [25, 26] and what good implementation of Duty of Candour and Open Disclosure looks like for families, staff and organisations. [26] However, a culture of fear is a barrier to staff reporting, [28] staff need to feel 'psychologically safe' and able to speak up when things are felt to be going wrong. A safe organisation should be proactive in learning from incidents, staff and patients how to improve care quality and safety. [15]

Summary of findings

Some issues in maternity services are structural, including workforce shortages, poor quality estates and facilities, and inadequate technological infrastructure. These require specific action backed by policy support and investment. Barriers to improvements in maternity safety and quality of care include culture and workforce challenges, and protection of organisation and individuals' reputation. Staff don't feel safe raise concerns, service users don't feel safe or get listened to. However, there is an ongoing debate about how to change organisational safety culture. All improvements need to be evidence based, informed by programme theory and ongoing evaluation to assess impact and unintended consequences.

Conclusions/caveats

The evidence base on solutions and impact in maternity care is limited and as a result we are letting women, families and staff down. In light of the limited evidence, we have also considered the work of organisations and organisational reports relevant to this area as listed below. There is a need for more structured and systematic large scale studies to improve quality and safety in maternal and newborn care.

Relevant organisations and organizational reports

- <https://www.patientsafetylearning.org/>
- <https://www.ihl.org/>
- <https://kingsimprovementscience.org/>
- <https://www.thisinstitute.cam.ac.uk/>
- <https://www.health.org.uk/>
- <https://www.hssib.org.uk/>
- <https://resolution.nhs.uk/>
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Appendix 5b

Rapid efficient evidence review: Health system barriers and enablers to quality midwifery services

Guiding question: What are the key health systems conditions for safe, quality midwifery services across all settings (community, MLUs (alongside & freestanding), and hospital) in Northern Ireland?

Author: Mattison, C.A., McNeill, J., Lynn, F., Renfrew, M., J. (2024) [9]

Methods

On July 5, 2023, we searched Health Systems Evidence using the broad search string: midwi* OR midwives OR midwife OR midwifery. Health Systems Evidence is a bibliographic database storing health systems-focused syntheses which we specifically searched for systematic reviews that provided insight into the guiding question listed above.

Each included systematic review underwent data extraction and included the following fields: review characteristics (date literature last searched, number of studies included, review methodology, focus of the review, context of the review, and continuum of care); health system components (health system integration, regulation, governance, monitoring, models of care, involvement of women/families/communities, staffing, education and training, implementation of policies/guidelines/standards, experience, support, culture, leadership, multidisciplinary team working, and resources and cost-effectiveness); synthesis of key barriers and enablers to safe, quality midwifery services; and narrative summary.

Results

There were 83 results, which we independently reviewed (MJR, CAM) for inclusion. We prioritized reviews that were recent and relevant to the context of Northern Ireland and identified 27 relevant systematic reviews [1-27] for data extraction (CAM, JM, FL). The reviews were published between 2015 and 2022 with AMSTAR quality ratings between 10/11 and 3/9. The AMSTAR checklist is a methodological quality appraisal tool for systematic reviews.

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Table 1: The root causes of system failure - a compound problem

Root causes	Summary of the evidence
Institutional culture, low quality practice and limited decision-making	<ul style="list-style-type: none"> The largest social barrier to midwifery is related to gender inequality, low status of midwifery and professional disempowerment.[1] The culture of birth work as ‘women’s work’. Midwives felt underappreciated and not taken seriously. Self-esteem is important to professional identity and societal recognition of the profession. [2] Short-staffing and high workload impacted delivery of care,[3] and there was a strong relationship between higher working hours and emotional distress in midwives (high levels of fatigue, exhaustion, distress, and anxiety).[4] Professional barriers to quality midwifery care include inadequate staffing levels and increased workload.[1] Health professionals reported not being given sufficient training to carry out their role and cited poor knowledge of standard antenatal care practices, inability to deal with complications or a lack of understanding of cultural practices as examples.[5] While informed decision making is the gold-standard in providing safe and respectful maternity care, in practice, this is not well executed as information provision was insufficient and inadequate in many cases or presumed consent, overlooking freedom of choice.[6]
Deficient governance: leadership, transparency, dealing with bullying	<ul style="list-style-type: none"> Policies limit how midwives are allowed to practice and may hinder the potential of midwife-led continuity.[1] Midwives working in tertiary hospital setting were found to have to provide care to acutely ill women, which was made more challenging when maternity care spanned large geographic regions.[7]
Inter-professional and inter-personal conflict and blame	<ul style="list-style-type: none"> The dominance of biomedical model affects interprofessional collaboration. [2] Workplace hierarchy and power structures limit quality midwifery care.[1] Collaborative efforts are challenged by different professional philosophy and practice style, and also conflicting inter professional views.[2] GPs acting as gatekeepers to midwives in maternity care limits interprofessional collaboration.[8] Workplace conflict may be associated with midwives’ wellbeing via a number of mediating factors (e.g., pressures of high workload and organisational change, strong hierarchies impacting newly qualifies midwives).[4]
Lack of effective monitoring and evaluation of outcomes, experience, practice	<ul style="list-style-type: none"> Insufficient capacity to allocate women to a continuity of care model will limit cost-effectiveness in comparison to alternative models of care.[9] Size of caseload may impact on economic costs of midwife-led care.[10]

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Root causes	Summary of the evidence
<p>Lack of political will to support a quality service</p>	<ul style="list-style-type: none"> Professional barriers to quality midwifery care included lack of investments in midwifery education and training.[1] Health systems are often functional rather than supportive leading to maternity care that was task focused and failed to treat the patient as a person.[3] Economic barriers can prevent quality midwifery care due to inappropriate remuneration and lack of government financial commitment.[1] Some evidence suggests that low salaries are correlated with emotional distress in midwives.[4] Barriers to the provision of routine quality antenatal care services: 1) long wait times; 2) overcrowded clinics coupled with a lack of physical space impact privacy; 3) low salaries, heavy workload and a high staff turnover; 4) use of screening procedures to determine risk status hindered their ability to deliver quality antenatal care; 5) midwives felt that the amount of time required to complete all of the necessary screening procedures during a relatively short antenatal appointment left little time to discuss any woman-initiated concerns or offer genuine care; and 6) poor accessibility and availability of local transport to ANC services.[5]

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Table 2: Towards evidence-based safe, quality maternity services and care for all

Components for safe, quality maternity services	Summary of the evidence
<p>Women, families, and communities at the centre</p>	<ul style="list-style-type: none"> • Higher satisfaction for midwife-led continuity of care.[10, 11] Women preferred being seen by the same health professional to build caring and trusting relationships.[5] • Personalised care, trust and empowerment underpin the relationship between the midwife and the woman in continuity of care models.[12] • The continuity of midwifery care model supports “relational continuity”, which is the therapeutic relationship between the health professional and patient which results when the knowledge of the patient and care is consistent with the patient’s needs.[12] • Collaboration and partnerships with third-sector organisations are necessary parts of care and help to build trusting relationships with mothers and provide continuity of care.[13] • Enablers to routine antenatal care services: 1) proximity of ANC clinic; 2) ability to hold private conversations with women; 3) flexible approach to service delivery (e.g., drop-in clinics, out-of-hours services, home visits and the ability to contact midwives directly); and 4) offers safety and reassurance during pregnancy and encouraged ANC attendance.[5] • When using midwife navigators to facilitate transitions across models of care and health professionals, midwives need to have visibility, as they are known for community-based service.[14] • Cultural and language barriers may be overcome if community health workers, who had been integrated into midwifery practices, had a similar cultural background to the women they cared for during pregnancy.[13]
<p>Education and training that includes implementing best evidence</p>	<ul style="list-style-type: none"> • Midwives are uniquely positioned to be able to provide maternity high-dependency care, which combines midwifery and critical care nursing skills but requires extra training and skills in order for midwives to be able to support maternity high-dependency units in tertiary maternity hospitals.[7] • Post-registration education and training activities can enhance core capabilities and minimise organisational risk while supporting staff role expansion.[13] • Continuity of care settings was positive for Australian midwifery students and supported: belonging, hands-on experience, and good role modelling, with preceptors who were motivated to teach (and modelled the value of woman-centred care).[15] • Students who were taught by midwives who had participated in preceptor training reported that they created an environment that was conducive to learning, which can support students’ confidence and competence.[15] • Teamwork education programs should include teachings that are practical and authentic and support constructive debriefing and reflection.[16] • For optimal care for women and their babies, staff should be provided adequate support and guidance through clinical supervision.[17]

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Components for safe, quality maternity services	Summary of the evidence
<p>Inter-professional team working, shared purpose, respect</p>	<ul style="list-style-type: none"> • Strong integration between health professionals leads to better health outcomes for the woman, and integration of care consists of the essential components of interconnected roles (i.e., clinical integration), functional integration (e.g., human resources, strategic planning, information and financial management), and normative integration (i.e., achieving connectivity).[14] • With respect to midwifery and nurse staffing levels and outcomes: increased midwifery staffing reduced incidence of epidural use, augmentation, perineal damage at birth, postpartum haemorrhage, maternal readmission, and neonatal resuscitation.[18] • High fidelity simulation in acute hospitals for the training of teamwork skills in addition to clinical skills. Scenarios provide realistic opportunities for participants to practice communication strategies that enhance teamwork.[16] • Collaboration strategies in relation to task-shifting to ensure appropriate workloads optimised staff performance.[13] • Good collaboration central to delivery of ‘culturally competent care’. • Working as members of health teams was key to improving care delivery.[13] • A collaborative model where specialist and advanced nursing and midwifery practitioners work in a team-based approach appears optimal.[19]
<p>Universal, whole-continuum knowledgeable, skilled, kind, midwifery</p>	<ul style="list-style-type: none"> • Integrating Midwifery Units into the broader maternity care system includes educating health professionals on the evidence and impact of Midwifery Units; midwifery training and exposure to the model; and promoting a collaborative approach to support integrated working relationships.[20] • A systematic review on midwife-led continuity of care found important benefits (less likely to experience regional analgesia, instrumental vaginal birth, preterm birth less than 37 weeks, and less all fetal loss before and after 24 weeks plus neonatal death, and more likely to experience spontaneous vaginal birth), more likely to be satisfied with their care, and showed no adverse outcomes.[11] • Women receiving alternative models of care (midwife-led continuity care models or specialised care) were less likely to experience pre-term birth, C-section and induction of labour than women in routine care models, and they were more likely to experience spontaneous vaginal birth. No other significant differences between groups observed.[10] • The key components of continuity of care model (CoCM) that women value was the midwife–woman relationship, personalised care, building of trust and empowerment.[12]

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Components for safe, quality maternity services	Summary of the evidence
<p>Reformed organisational structures, governance, monitoring</p>	<ul style="list-style-type: none"> Monitoring was identified as a critical feature of specialist and advanced nursing and midwifery practice.[19] One literature review identified 80 indicators that should be used to measure the quality of low-risk intrapartum care, which should be able to be monitored through hospital databases.[21] Process indicators are important for monitoring as they measure the activities performed and can be examined as to whether they are evidence-based.[21] Limited evidence but it is suggested that midwife-led continuity models of care are cost saving when compared to medical-led care.[11] If additional financial resources unavailable, non-financial incentives (such as further training and career development) for staff may be important to delivering quality care.[13] Reported evidence that CoMC had an estimated cost saving of £12.38 (2010 prices) per woman compared to obstetric led care in the UK. “This provided aggregate health savings of £1.16 million per year for the health system if only half of all eligible women received continuity of midwifery care.”[9]
<p>Recruitment, retention of staff, support, resources</p>	<ul style="list-style-type: none"> National/State-level policies related to human resources management strategies have been successful in increasing staffing and coverage and improving services in rural communities.[13] Continuity of carer is protective for midwives’ emotional wellbeing.[4] There is a link between emotional wellbeing to the quality of relationships with colleagues, including low support from colleagues, senior staff, peers and medical colleagues.[4]

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Appendix 5c

Rapid efficient evidence review: Health economics

Guiding Question: What are the key recommendations from evidence in relation to cost savings and cost effectiveness of midwifery care while enabling quality and safety?

Authors: Lynn F., McNeill J., Renfrew M.J. (2024)

Background and context

Current demands on resources require decision makers to maximise efficiencies in the design and delivery of maternity services, without compromising safety and quality. The aim of the health economics cluster was to identify and summarise evidence on economic costs (cost savings) and cost-effectiveness of midwifery care while enabling safety and quality.

Methods

A scoping search was developed and conducted in Medline (via OVID) and in economic-focused bibliographic databases: Tufts Medical Center Cost-Effectiveness Analysis Registry database, Global Health CEA Registry database, Paediatric Economic Database Evaluation (PEDE), NHS Economic Evaluation Database (via CRD), IDEAS economics database (via RePEc), EconPapers (via RePEc) and EconLit (via EBSCO). Narrow search terms related to two concepts of exposure and one concept of outcome, which were combined to provide the following search syntax: ((Matern\$ or Midwi\$) adj2 (service or model)).mp. and (Econom\$ or cost\$ or resource\$).ti. The latter of which was only entered in Medline for the search to be sensitive to pulling records indexed as economic-related. The search was limited to studies published in the English language, due to time limits in conducting the rapid review of evidence, and from 2014, to better reflect current patterns of care.

All titles and abstracts returned were screened for relevance in terms of (i) including services or models of care delivered by a midwife, (ii) economic evidence reported, and (iii) conducted in an OECD setting. Records deemed eligible at title and abstract screen were assessed at full text for relevance to the review question. Data were extracted and a judgment of the limitations (minor serious limitations, potentially serious limitations or very serious limitations) were made, following guidance [1], along with a judgment of applicability to the NI setting. Study findings were deemed directly applicable if they were conducted in a similar maternity care system to NI in terms of a publicly funded universal health system and a regulated midwifery profession. Studies were deemed partially applicable if one of these two criteria were met and not applicable if neither criterion was met. A brief narrative summary was developed, which also assessed the uncertainties in the evaluations and the level of consistency in findings between evaluations, providing concluding remarks.

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Results

Following removal of duplicates, 584 records were screened at title and abstract stage with 142 progressing to full text screen, where 19 publications were deemed eligible for inclusion.

Summary of findings

A summary of the characteristics of each economic evaluation included in this rapid review of the literature, along with a judgment on the limitations and applicability of the evidence, is presented in the following sections.

Economic evidence on model or provider of care

Nine studies reported economic evidence comparing models or providers of care. [2-10] Partial economic evaluations in the form of cost comparisons were reported in three of these studies [2, 3, 7], which focused on women identified as ‘low-risk’ across timeframes of <1 year. The economic evidence was consistent in terms of midwifery-led care being cost-minimising, with no differences in clinical and patient safety outcomes, when compared with obstetric-led care. The findings suggested that further investment in midwifery care may provide efficiencies in care provision by reducing hospital costs through lower staff costs and shorter length of hospital stays required for mothers, as well as fewer interventions (cervical ripening, labour induction, epidural use, Caesarean section, instrumental delivery), while maintaining patient safety. Evidence from full economic evaluations were reported in five studies. [4-6, 8, 9] There remained consistency in the economic evidence of midwifery models of care having lower costs than other models of care and being more cost-effective. The cost-effectiveness has been driven largely by cost savings associated with lower rates of Caesarean section [4, 5, 8] and a greater effect in outcomes, including QALYs gained [5], adverse health outcomes avoided [4] and neonatal intensive care admission avoided. [4, 8]

One study assessed the cost-effectiveness of alternative approaches to assessing risk for allocating women to care provider (midwife or obstetrician). [10] They reported lower costs for the risk prediction tool compared to care-as-usual, which used a singular risk checklist for allocating women. However, the tool was not cost-effective in terms of cost per QALY gained due to limited group difference in maternal health-related quality of life.

Economic evidence on place of birth

Economic evidence on place of birth were reported by two studies [11, 12] and were limited to cost analyses. There was consistency in the findings. Both studies reported that, for women with a ‘low-risk’ status, planned attendance by a midwife either with a home or hospital birth or starting in a freestanding midwifery unit were less costly than the alternative. Cost savings were driven by lower staff costs, lower pharmaceutical costs and lower hospital costs due to fewer interventions, such as induction of labour and Caesarean section.

While attendance at birth by a midwife was cost-minimising for maternity services, there was no evidence of resource use assessed beyond one year, particularly accounting for costs associated with subsequent pregnancies/births, nor evidence for cost-effectiveness.

Economic evidence on a component of maternity care

Seven additional studies assessed the cost-effectiveness of different components of maternity care: enhanced women-centered care intervention to promote vaginal birth after caesarean compared to usual care in Europe [13]; different modes of induction of labour for low-risk indications in Australia [14]; induction of labour at 39 weeks' gestation for women >35yrs versus a policy of expectant management in the UK [15]; and, changes to guidance for active labour management in the USA. [16-18] Each of these cost-utility analyses reported evidence of cost-effectiveness for the change in care for the base case. For four of the studies, the change in care was dominant over the alternative, with lower costs and greater effect reported. [14-17] A cost analysis alongside a before and after study was also reported for the implementation of the Saving Babies Lives care bundle in the UK. [19] While modest implementation costs per woman were reported and a fall in stillbirth rates were reported in early adopter sites, higher secondary costs were observed related to an increase in cases of preterm birth, Caesarean section, ultrasound scan, and admission to the neonatal unit. However, these costs could not be attributed to the implementation of the care bundle, due to the lack of a "step" in the time series analysis, and further monitoring is required.

Economic evidence on healthcare professional training

One study conducted a model-based cost-utility analysis comparing annual Practical Obstetric Multi-Professional Training (PROMPT) for obstetrical emergencies and standalone shoulder dystocia training to current practice, where small proportions of midwifery units have been providing training. [20] With a time horizon of 30 years, the model presented evidence of large net benefit with cost savings of at least £1 million per QALY gained. The dominant strategies of annual or standalone training compared to current practice were largely due to the number of cases of permanent obstetric brachial plexus injuries averted, resulting in QALY gains for the mother and for the baby. While this is evidence from a single study, and a first to assess the cost-effectiveness of professional training in terms of cost per QALY gained, it provides a template for further economic modelling for additional areas of training.

Conclusions/caveats

There is consistent evidence that midwives provide quality care that is safe and reduces costs for maternity services resulting in an efficient use of resources compared to other models of care.

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In terms of caveats, firstly, this was a rapid review of the literature and, while several databases were searched systematically, relevant literature could have been missed. Secondly, most of the economic evaluations were judged to have very serious (n=7) or potentially serious (n=11) limitations, which indicated that the findings on cost-effectiveness would likely change in a real-world setting. It is probable that the studies have under-estimated the true cost-effectiveness, due to the narrow scope taken for identifying and measuring resource use, as well as the limited time horizons. As an example, cost savings reported for lower rates of Caesarean sections are likely to impact on care for women during subsequent pregnancies. Such longer term impacts were not accounted for in the studies assessed. A final caveat is that the evidence focused primarily on women that did not have additional care needs (referred to as low-risk women in most studies). There was limited evidence for the economic benefits/costs of midwifery care for women with additional care needs. Further research is required for this cohort to determine if efficiencies could be made without compromising the safety or quality of maternity care.

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Appendix 5d

Rapid efficient evidence review: Maternal and neonatal outcomes associated with planning birth in different settings

Guiding question: what are the key maternal and neonatal outcomes associated with the safety of planning birth in different settings?

Author: Rowe R (2024)

Context

The aim of this rapid review is to summarise the evidence about the safety (both maternal and neonatal) of different planned birth settings, in high-income countries with health systems comparable to that of Northern Ireland, to inform the provision of safe, quality midwifery services and care across all birth settings in Northern Ireland.

The evidence to answer this question was systematically reviewed by the National Collaborating Centre for Women's and Children's Health on behalf of the National Institute for Health and Care Excellence (NICE) in England for their 2014 clinical guideline Intrapartum care for healthy women and babies (CG190) (updated in 2017 and subsequently in 2022) to support their guidance about choosing planned place of birth. [1] As part of a surveillance review, searches for further evidence relevant to this question were updated in October 2018. [2] The additional evidence identified by these searches did not alter the conclusions of the review and the guidance about planned place of birth was not changed. An 'exceptional surveillance review' was conducted in February 2023 and, based on further relevant evidence published in 2019-20, NICE announced their decision in May 2023 to update their recommendations about choosing planned place of birth. [3]

The evidence summarised here is based on NICE CG190. It also incorporates evidence from a relevant systematic review published since 2018, which summarised outcomes for babies and mothers among women planning birth at home compared with those planning birth in hospital in two separate papers, [4, 5] and a small number of other studies published since 2018 identified by the NICE exceptional surveillance review in 2023. [3]

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Summary of findings

NICE CG190

NICE CG190 summarises the evidence using systematic reviews addressing several different comparisons between planned birth settings: home vs freestanding midwifery unit (FMU), home vs alongside midwifery unit (AMU), home vs obstetric unit (OU), FMU vs AMU, FMU vs OU, and AMU vs OU. Different studies were included in the evidence synthesis for each comparison, but the Birthplace study, [6, 7] a large well-conducted prospective cohort study designed to answer questions about the relative safety of different planned birth settings, conducted in England in 2008-11, was included in all systematic reviews.

Based on the evidence systematically reviewed for NICE CG190, NICE makes the following recommendations: [1]

- For both multiparous and nulliparous women who are at low risk of complications, giving birth is generally very safe for both the woman and the baby.
- For 'low-risk' multiparous women, planning birth at home or in an FMU or AMU is associated with a higher rate of spontaneous vaginal birth and a lower rate of intervention during labour and birth, including episiotomy, instrumental vaginal birth and caesarean section, and the outcome for the baby is no different, compared with planned birth in an OU. Planning birth at home or in an FMU is associated with a higher rate of spontaneous vaginal birth than planning birth in an AMU. (refer to Tables 1 and 2 in NICE CG190)
- For 'low-risk' nulliparous women, planning birth in at home or in an FMU or AMU is associated with a higher rate of spontaneous vaginal birth and a lower rate of intervention during labour and birth, including episiotomy, instrumental vaginal birth and caesarean section, compared with planned birth in an OU. Planning birth at home or in an FMU is associated with a higher rate of spontaneous vaginal birth than planning birth in an AMU. There are no differences in outcomes for the baby associated with planning birth in an FMU, an AMU or an OU. Planning birth at home is associated with a small increase in the risk of an adverse outcome for the baby, compared with planning birth in an OU. (refer to Tables 3 and 4 in NICE CG190)

Other systematic review evidence

The evidence from one other relevant well-conducted systematic review and meta-analysis published since 2018 relates to neonatal and maternal outcomes for women planning birth at home, compared with those planning birth in hospital. [4, 5] Searches for this review were completed in April 2018 and included studies published in or after 1990.

While the review included studies carried out in non-UK settings, with a potential impact on generalisability to the UK, results were presented separately by degree of support for home birth within the health care system (classified independently as “well-integrated” or “less well-integrated”). ‘Well-integrated’ settings were defined as those “where home birth practitioners: (1) are recognised by statute within their jurisdiction; (2) have received formal training; (3) can provide or arrange care in hospital; (4) have access to a well-established emergency transport system; and (5) carry emergency equipment and supplies,” and would therefore be comparable to Northern Ireland. Results were also presented separately by parity.

Baby outcomes

The primary outcome for babies considered by this review was perinatal or neonatal death after the start of labour. [4] A number of other secondary outcomes were also presented. Overall 17 studies were included, 13 of which were in ‘well-integrated’ settings, reporting outcomes for around 500,000 intended home births. Among ‘low-risk’ women planning birth at home at the start of labour in ‘well-integrated’ settings there was no difference in perinatal or neonatal mortality (or other baby outcomes including neonatal admission, Apgar scores, and need for resuscitation) compared with similarly ‘low-risk’ women who planned birth in hospital. This finding was consistent among women having a first baby and those having a second or subsequent baby.

Maternal outcomes

Secondary maternal outcomes considered by this review included interventions (assisted vaginal birth, caesarean birth, epidural, episiotomy and augmentation) and adverse outcomes (mortality, postpartum infection, postpartum haemorrhage and perineal trauma). [5] Overall 18 studies were included, 15 of which were in ‘well-integrated’ settings. ‘Low-risk’ women planning birth at home at the start of labour in ‘well-integrated’ settings were less likely to have an intervention compared with similarly ‘low-risk’ women who planned birth in hospital. Adverse maternal outcomes were also less common or showed no difference. Findings were generally consistent among women having a first baby and those having a second or subsequent baby.

Other evidence published since 2018

Six other studies and one further systematic review [8-14] investigating the effectiveness and safety of different birth settings in a range of countries were identified as potentially relevant in the exceptional surveillance review carried out by NICE in early 2023. [3] These studies all found comparable or better outcomes for mothers (lower rates of intervention) and no difference in outcomes for babies associated with planning birth in midwifery units or at home, compared with planning birth in hospital. Several of these studies were carried out in settings that may not be generalisable to Northern Ireland.

Table 1: Rates (number of events per 1,000 multiparous women giving birth) of spontaneous vaginal birth, transfer to an obstetric unit and obstetric interventions for each planned place of birth among low-risk multiparous women (data sources: Birthplace 2011 and Blix et al 2012) Source: NICE CG190 [1]

	Home		Freestanding midwifery unit		Alongside midwifery unit		Obstetric unit
Spontaneous vaginal birth	984		980		967		927
Transfer to an obstetric unit	115		94		125		10
Regional analgesia (epidural and/or spinal)	28		40		60		121
Episiotomy	15		23		35		56
Caesarean birth	7		8		10		35
Instrumental birth (forceps or ventouse)	9		12		23		38
Blood transfusion	4		4		5		8

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Appendix 5e

Rapid efficient evidence reviews: Best practice of:

- 1) Shoulder dystocia
- 2) Care of women in pregnancy with BMI of 30 and above including their experiences
- 3) Prevention of complications related to large for gestational age infants

Members of review: Fraser E, Gale C, Heazell A, McNeill J, Renfrew M.J.

Overview

The Best Practice cluster undertook three reviews utilising rapid review methodology to identify key evidence to best practice related to shoulder dystocia, current best practice for women in pregnancy with a BMI of $\geq 30\text{kg/m}^2$ including their experiences, and best practice for the prevention of complications relevant to large for gestational age infants. The NICE checklist for systematic review methodology was used to assess quality. This consists of five screening questions aligning to a well conducted systematic review (NICE SR checklist NICE 2013).

1) Best practice related to shoulder dystocia

Guiding question: how best to prevent and treat complications related to shoulder dystocia

Authors: Gale C, Heazell A, McNeill J, Fraser E, Renfrew MJ (2024)

There are several components when considering how best to prevent and treat complications related to shoulder dystocia (when the baby's head has been born but one of the shoulders becomes stuck behind the mother's pubic bone, delaying the birth of the baby's body). Firstly, whether shoulder dystocia can be predicted and prevented, secondly how it can best be managed when identified, and finally how best to manage the mother and baby after it has occurred.

Shoulder dystocia is seen in about 6-7 out of every 1000 vaginal births and there is an increased risk of injury to the mother and baby. The most common injuries to the mother are bleeding after birth (postpartum haemorrhage) and severe tears to the perineum (third and fourth-degree perineal tears), permanent damage to the nerves in the arm (brachial plexus injury) is the most commonly seen severe injury in the baby. [1]

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Having a baby that is large for gestational age (LGA) is one recognised risk factor for having shoulder dystocia, the evidence around large for gestational age babies is discussed in the 'Top Level Summary Evidence on Large for Gestational Age'. Raised maternal body mass index (BMI) has also been shown to be linked with shoulder dystocia in some studies, this factor is discussed in the 'Top Level Summary Evidence on raised maternal BMI'. Other factors, such as maternal diabetes and having a previous baby affected by shoulder dystocia are also associated with higher risk of shoulder dystocia. [1]

2

There is no evidence that birth in water is associated with a higher risk of shoulder dystocia, birth in water is therefore most likely comparatively safe in women with a pregnancy considered low risk. [2]

3

There are no research findings to support or refute the use of intrapartum manoeuvres or maternal positioning to prevent shoulder dystocia. [3]

4

Because shoulder dystocia cannot always be predicted, there is expert and consensus guidance that all birth attendants should know how to diagnose shoulder dystocia and the techniques required to facilitate delivery. [1]

5

There is low-quality evidence that all maternity staff should participate in shoulder dystocia training at least annually, and that where all staff have undertaken annual training this has been associated with better outcomes for the baby. [1]

6

There is expert and consensus guidance that shoulder dystocia should be managed systematically, this should include calling for additional help immediately after shoulder dystocia is recognised with the problem clearly communicated. [1] Management algorithms for shoulder dystocia have been developed and there is low quality, non-randomised trial, evidence that these are associated with improved outcomes for the mother and baby. [1]

7

There is significant maternal and infant morbidity associated with shoulder dystocia; expert and consensus opinion are that birth attendants should be alert to the possibility of postpartum haemorrhage and severe perineal tears in the mother, and that all babies born following shoulder dystocia should be examined by a neonatal clinician looking for brachial plexus injury and other neonatal problems. [1]

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2) Care in pregnancy of women with BMI of 30 and above: best practice and women's experience

Guiding Question: To identify and summarise systematic review evidence around care and experiences of pregnant women with a BMI of 30kg/m² and above

Authors: McNeill J, Heazell A, Gale C, Fraser E, Renfrew MJ (2024)

Systematic review evidence identifies gestational diabetes, pre-eclampsia, gestational hypertension, depression, instrumental and caesarean birth, and surgical site infection as more likely to occur in pregnant women with obesity compared with women with a healthy weight. Maternal obesity is also linked to greater risk of preterm birth, large-for-gestational-age babies, fetal defects, congenital anomalies and perinatal death. Breastfeeding initiation rates are lower and early breastfeeding cessation is more likely to occur in women with obesity compared with healthy weight women.

Publications/resources identified

Three high quality reviews [4-6] including studies mostly from high income countries and 2 clinical guidelines [7-9] were included relative to best practice. One systematic review of good quality was included which focused on the experiences of obese pregnant women and their engagement with health care professionals. [10]

Summary of findings

Provision of care

- Direct measurement of maternal height and weight of pregnant women who are obese was recommended as early in pregnancy as possible. [6]
- Fetal monitoring should be based on women's preference & obstetric indication (no clinical evidence), which aligns with current NICE guidance for healthy pregnant women [11].
- Recommendations based on current practice and expert opinion [8] included: USS at start of labour to determine fetal position for women with BMI over 30kg/m²; positioning in second stage of labour (optimal positioning encouraged if women with BMI ≥30kg/m² had adequate mobility and lateral position advised if reduced mobility); risk assessment at booking appointment for availability of essential intrapartum care equipment of women with a BMI over 30kg/m².

Impact on Choice of Birth Setting

NICE guidance on Intrapartum Care was updated and published in September 2023 which included an evidence review of the benefits and risks of different places of birth for women in relation to their BMI. [9] Five studies were identified, three of which were from the Birthplace in England study [12-14], a UKMidSS cohort [15] and a retrospective cohort study. [16] The evidence considered was of moderate to high quality and applicable to UK settings. Key recommendations included:

- That women should be advised that a higher BMI and specifically above 35kg/m² at booking is more likely to result in complications such as unplanned caesarean birth, postpartum haemorrhage, transfer from home to an obstetric unit, stillbirth, neonatal death or the baby needing neonatal care.
- The risk of complications varies with parity but is mostly higher for women with an increased BMI who have not given birth previously compared to women who have given birth previously with higher BMI.
- If complications occur, additional care can be provided more quickly in an obstetric unit or alongside midwifery unit.

It was determined by the guideline committee that rather than recommending a cut off point as in the previous version [17] a table of risks should be included in the updated version. [9]

Women's experience

The review [10] identified four key concepts which suggested that women were not satisfied with communication around weight status, felt they had missed out or were denied access to normal aspects of care and discussions in pregnancy with health professionals focused on an over emphasis of risk. Data across the review suggested that women felt stigmatized or penalized due to their obesity which prevented an inclusive experience of pregnancy and maternity care. Despite an over emphasis on risk, women did not always report clarity about their risk status, in particular what they or their babies were specifically at risk of.

Conclusion

Evidence to support clinical recommendations for care was limited. For women with increased BMI an increased risk of complications is more likely, and this should be considered when choosing place of birth. There was no evidence available for all different places of birth compared to each other.

3) Summary Evidence on Large for Gestational Age

Guiding question: how best to prevent complications from a baby being large for gestational age

Authors: Heazell A, Gale C, McNeill J, Fraser E, Renfrew MJ. (2024)

Summary of evidence

There are several steps to consider when preventing complications from a baby being large for gestational age. The first is to identify which complications are more frequent in babies which are large for gestational age (LGA), second is to determine whether tests to identify babies are LGA are accurate and lastly to determine whether intervention for babies identified as being LGA reduces the risk of complications.

Being LGA increases the risk of shoulder dystocia. If the predicted weight is $>4\text{kg}$ shoulder dystocia occurs in 1 in 20 cases (making it about 10x more frequent than in babies $<4\text{kg}$). If the predicted birthweight is $>4.5\text{kg}$ shoulder dystocia occurs in 1 in 7 births (making it 15x more common than in babies who were $<4.5\text{kg}$). [18]

The risk of permanently damaging the nerves in the arm (brachial plexus injury) is also more common in babies $>4\text{kg}$ affecting about 1 in 142 babies $>4\text{kg}$ compared to 1 in 1600 babies $<4\text{kg}$ (11x more frequent). [19] This increases to 1 in 53 babies if baby is $>4.5\text{kg}$ compared to 1 in 1000 babies $<4.5\text{kg}$ (20x greater risk). The risk of a baby having a fracture if it is $>4\text{kg}$ is 1 in 200 compared to 1 in 1000 babies $<4\text{kg}$ and which rises to about 1 in 100 babies if baby is $>4.5\text{kg}$. [19]

There are also increased risks for mothers of Caesarean birth, post-partum haemorrhage and anal-sphincter injury. [19]

Ultrasound scanning can be used to measure the size of the baby. The sensitivity for detection of LGA baby (how many LGA babies are identified) is 53.2% with a pooled specificity of 93.9%. [18] Thus, on the balance of probability ultrasound scanning would identify a baby that is LGA.

To predict shoulder dystocia, the sensitivity is less good at 22%, with a specificity of 89.6% i.e. an ultrasound scan would only be able to predict the occurrence of shoulder dystocia in 22% of cases [18]

If estimated weight of the baby was $>4\text{kg}$ the chance of Caesarean birth is 2.6 times greater. The prediction of birth by Caesarean was improved further if the ratio of Abdominal Diameter – Biparietal Diameter was $\geq 2.6\text{cm}$ to 4.2 times greater. [20]

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When induction of labour was planned based upon a baby being LGA there was no difference in Caesarean section or instrumental vaginal birth. However, shoulder dystocia and neonatal fractures were reduced by 40% and 80% respectively. To prevent one fracture 60 women would need to have induction of labour. [21]

2

Several neonatal (and maternal (not reviewed here)) complications are increased when a baby is LGA, though the risk of these events is comparatively infrequent – at worst 1:7 cases >4.5kg have shoulder dystocia and ~1% have a neonatal fracture. However, ultrasound scanning only identifies just over half of babies that are LGA, approximately 6% of babies identified as LGA are not. However, ultrasound scans are much less reliable to predict shoulder dystocia. Intervention based upon a baby being diagnosed with LGA reduces the risk of should dystocia and neonatal fractures.

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Conclusion

There is no evidence in this review that indicates women with an LGA baby should not give birth in a midwifery-led unit.

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Appendix 5f

Rapid efficient evidence review: Education and training

Guiding Question: What are the key educational aspects relevant to the development and provision of safe and effective midwifery and multidisciplinary team performances, including emergency situations.

Authors: Stockdale J., Gormley G., Mondeh K., McNeill J., Renfrew M.J,(2024)

Methods

A rapid efficient evidence review was conducted, and key databases were scoped in September and October 2023 using search terms relevant to human factors education and high-fidelity simulation, collaborative working (practice and academia) in simulation, learning needs analysis and developing psychologically safe leadership. Expert opinion and experience of designing and delivering simulation in educational settings was also integrated in the summary of findings.

Results

A synthesis of the key findings in relation to important aspects of providing education and training for emergencies in maternity settings is outlined below:

1. Human Factors Education and High-Fidelity Simulation

The evidence related to the importance of human factors education experienced through high-fidelity, scenario-based team simulations [HFS] is associated with the creation of an open culture of learning, enhanced psychological safety, reduced incivility within the workplace, motivation to learn and most importantly, person-centredness in optimising care. [1] Currently, new midwifery graduates at Queen's University Belfast are entering the workforce having therefore, systematically studied human factors and applied this knowledge through HFS facilitated in Queen's University Belfast's KN Cheung SK Chin InterSim Simulation Centre. However, it is recommended that all healthcare professionals are educated in human factors applied through HFS. [2, 3] To work towards an open culture of learning within and across maternity care professions, the following recommendations are made:

- That there is a comprehensive and systematic approach to multidisciplinary human factors education that builds on the foundational knowledge provided within the currently applied PROMPT program.
- Multidisciplinary teams should experience high-fidelity simulations as a means of learning to apply their knowledge of human factors. For team members unfamiliar with HFS initial university-based simulation learning maybe a useful scaffold ahead of regular in situ simulations in the workplace.

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- The portfolio of HFS learning opportunities should be determined as a result of a learning needs analysis that reflects the diversity and depth of challenges that midwives and the multidisciplinary team encounter in the workplace.
- As experts in human factors and simulated learning resides mainly within the university sector (particularly InterSim and Health professions Schools at QUB), a means of engaging this expertise within and across learning environments should be developed.
- Simulations in addition to creating psychological safety and high team performance, should aim to enable systems-thinking, testing and rehearsal that prevents, traps and mitigates latent errors – including human error.

2. *Establishing an “Extended” Faculty*

Relationships between university and practice-based colleagues already exist in relation primarily to university-based, undergraduate simulated learning, however, the following recommendations propose a more formal, systematic and sustained approach that aims to create an open culture of learning within the caring environments. Collaborative working between university and practice-based educators and clinicians within and across Trusts will ensure the best educational response to regional and local insights gained in relation to near events, Datix reporting and reported complaints. Key considerations include:

- Establishing an extended simulation and human factors faculty that is not restricted to teaching only in practice or higher education.
- Ensuring this extended faculty is representative and includes nominated multidisciplinary healthcare professionals from across the Trusts and educators with experience of teaching human factors and HFS as it relates to the results of ongoing learning needs analyses.
- Engaging this faculty in a systematic learning needs analyses across and within Trusts. Consideration should be given to the different caring contexts, culminating in an agreed strategic approach to developing an open culture of learning (psychologically safety, improved civility, creativity), robust clinical pathways and safer and more effective women-centred care.
- Demonstrating improved psychological safety within maternity care teams should be a key indicator of progress towards a highly reliable organisation (HRO) with improved outcomes for women and babies. [4]
 - Using a cascading approach, it is anticipated that the faculty will address learning challenges related specifically to human factors, simulated learning and systems improvement such as those evidenced in other NHS Trusts within the UK, such as:
 - managing the practice of hot and cold debriefs after significant clinical events.
 - establishing regularly, facilitated team debriefs for improving the safety culture.
 - opening channels of communication across team members as they identify, own and improve their systems.

3. Conducting Learning Needs Analyses

There is a general consensus among educators that autonomy-focused education is more relevant and effective than education that is pre-defined by the educators in isolation from the instructional system[s]. [5] A learning needs analysis (LNA) is required, to not only identify the need for multidisciplinary education related to obstetric emergencies, but to identify what the learning provision should be for midwives and the multi-professional teams when challenged to provide optimal care in different contexts and environments. Recommendations include:

- Conducting an inclusive learning needs analysis that identifies an initial portfolio that is regionally relevant and locally focused.
- Providing access to the extended faculty as a means of supporting sustainable systems, through ongoing learning needs analyses that are situationally appropriate to the individual Trusts' systems and teams.
- Ensuring that the learning needs analysis is inclusive and representative of all stakeholders, including midwives, obstetricians, neonatologists, anaesthetists, paramedics, doulas and women.

Examples of aspects of learning where need was identified in other UK Trusts included:

- Multidisciplinary education and training for emergencies in different environments.
- Optimal care for women whose preferences are outside the recommended guidance.
- Concise counsel for transferring women in labour or women and babies in the postnatal period, where risk factors have been identified at home or in the MLU setting.
- Education for best practice in use of communication approaches for eg: sharing of mental models with all of the multi-professional team, including attending paramedics.
- Training with manual handling team for pool evacuation and transfer of women (Maternal collapse in pool).
- With permission the following useful resources are included in the appendices:
 - An exemplar learning needs analysis is provided in the appendices: "Midwifery Unit: Training Needs Analysis and Training Plan North-east and Yorkshire Regional Template".
 - Links Related to Ambulance Response Times <https://www.england.nhs.uk/wp-content/uploads/2018/10/ambulance-response-programme-review.pdf>.
 - Ambulance response times | The Nuffield Trust <https://www.nuffieldtrust.org.uk/resource/ambulance-response-times#background>.

4. *Establishing Psychologically Safe Leadership*

Within healthcare literature, psychological safety requires a culture that supports all members of the multi-professional team; however, it needs to be matched with an inclusive leadership approach that promotes and sustains psychological safety. [6, 7] The following recommendations draws mainly on a synthesis [8] where the main mediators of psychological safety are outlined. Recommendations relative to leadership and the development of team-based psychological safety include ensuring that leaders are educated and supported to develop and sustain their:

- “Commitment-based and behaviourally integral leadership style”, where their communication of a psychologically safe environment is consistently matched with their actions and words. Coaching specific to maternity care providers should be explored.
- “Change-orientated” perspective that encourages problem finding, innovative thinking, solutions and team envisaging of proposed changes. This is likely to include accepting a degree of personal risk and facilitating open discussions about errors and failed systems.
- Team-orientation where leaders purposively and actively develop “familiarity” within and across diverse teams within the system. This way, all areas of expertise (including midwifery) will be understood, and everyone’s expertise (within and across teams) is leveraged for the benefit of women and babies.
- There may be a need to invest in a bespoke Leadership and Development Programme that is available to those in a leadership position.

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Appendix 6: Questionnaires issued to each HSC Trust Chief Executive and Chairpersons

Board-level functioning and priorities in regard to maternity and neonatal services

Governance and oversight of maternity services

Information requested for Independent Report on Enabling Safe, Quality Midwifery Services and Care in Northern Ireland

Aim: To capture the quality, impact and value-added nature of maternity services governance

1. General board context:

Is the approach to the oversight of maternity services set out in the individual HSC Trust Board terms of reference? If yes, please give details of this.

What specific values guide the work of the individual HSC Trust Boards and where are these recorded?

What is the frequency of HSC Trust Board meetings in the last 3 years? With what frequency are maternity services discussed at these meetings?

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How are individual HSC Trust Boards equipped to scrutinise maternity services? Are maternity services represented at Trust Board level? If so by whom (i.e. what role)?

What assurance do HSC Trust Boards have that all relevant information has been gathered/scrutinised in regard to: all relevant outcomes for women and babies; experiences of women and families; workforce issues and the health and wellbeing of all professional groups providing maternity services?

2. Specific questions concerning maternity services oversight:

How do the individual HSC Trust Boards assess the quality of their respective maternity services provision?

- Are maternity services a standing item on the agenda?
- What maternity services management information do the individual HSC Trust Boards receive and scrutinise? Are external benchmarking data used?
- What reports concerning maternity services – including internal/external/professional body reviews etc. – have been received and discussed by the HSC Trust Boards in the past three years? Have discussions led to any recommendations/actions and have the implementation of these been monitored?
- Do HSC Trust Board members visit maternity services, including (when they were open) Freestanding Midwifery Led Units? How frequently do visits happen and have the visits resulted in any recommendations/actions? [Please provide examples for the last 3 years]
- Have maternity services strategies been discussed by the HSC Trust Boards? – If yes, has strategy implementation been reviewed for impact? By which HSC Trust Boards and how often?
- Have service development plans been discussed at HSC Trust Board level?
- How are maternity services policies overseen and approved?

3. Surveys of views and experiences

Have the results from maternity services staff questionnaires been considered and discussed by the HSC Trust Boards? Have any recommendations been made by the HSC Trust Board members regarding the outcome of these staff surveys?

Have maternity services user questionnaires been considered and discussed by the HSC Trust Boards? Have any recommendations been made by the HSC Trust Board members in relation to the outcome of the surveys?

Are there any other comments you would like to make in regard to HSC Trust Board oversight of the maternity services?

THANK YOU – your input is greatly appreciated

Appendix 7: Questions for Strategic Planning and Performance Group

Questions for SPPG regarding the commissioning of maternity and neonatal services

Section 1: Funding

1. What is the budget for maternity and neonatal services for each of the five HSC Trusts?
 - a. How has this budget allocation changed over the past 10 years, and how were any changes decided?
2. On what basis are the costs of maternity and neonatal services allocated?
 - a. How was this allocation system agreed, and when was it last reviewed?
 - b. How are changing needs such as increased complexity of care, evidence re services that should and should not be provided, and population factors such as health needs, socio-economic deprivation, and geography etc taken into account?
 - c. How are imbalances resulting from women's decisions re location of care accounted for, eg to have antenatal/postnatal care in one HSC Trust, and labour and birth in another?
 - d. How is value for money determined?
3. Are there conditions applied to budget allocations, eg minimum staffing requirements for all professional groups, provision of community services including options for midwifery care at home and in community units?
4. Is the maternity and neonatal budget integrated with any other care systems (ambulance services, child health, women's health, social care, mental health services, primary care, public health etc)?
5. What are the budget/service planning processes?
 - a. Are service providers involved in the determination/review of their budget allocation?
 - b. What data do you require in relation to service costs?

Section 2: Quality

6. Is there a relationship between budget allocation, outcomes, and quality standards and ongoing improvement?
 - a. If so what are those quality standards? What are the key outcomes?
 - b. How are they assessed/monitored?

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7. How are you assured that quality services are being provided?
 - a. What reports do you receive from HSC Trusts re performance?
 - b. How do you respond to any quality issues identified?
 - c. Do you utilise performance indicators?
 - d. Do you have any concerns around the lines of accountability?
8. What is the mechanism for HSC Trusts to request additional funding and how is your response decided?
 - a. How are service changes and new service developments funded, eg increased caesarean section and induction rates, continuity of midwifery carer?
 - b. How is consistency across HSC Trusts assured eg re service improvements?
9. How are litigation costs allocated?
 - a. What relationship is there between quality of care and allocation of litigation costs?

Section 3: Education

10. What is the relationship between service commissioning and education commissioning – for a) under-graduate or b) post-graduate education and CPD?
 - a. What is the mechanism for this?
 - b. How is effectiveness and value for money of education commissioning in relation to service provision determined?

Section 4: The commissioning system

11. Who is responsible for overseeing commissioning?
12. Do you think there are issues with the relationship between the HSC Trusts and the commissioning system? Could this be improved?

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Appendix 8: Acknowledgements for those involved in engagement events

Acknowledgement of those individuals and groups involved in engagement events – with grateful thanks for their time and insight

Contributing Individuals/Organisations	Further Information
All women, babies, partners and families who participated in the Enabling Safe Quality Midwifery Services and Care in Northern Ireland engagement events	
All Cross- Sectoral Workshop attendees, chairpersons and facilitators (8 November 2023)	
Association of Improvements in the Maternity Services	For a better birth AIMS
Birth at Home Team	Southern Health and Social Care Trust, Northern Ireland
Birthwise Breastfeeding Support Group, Lurgan	Birthwise Lurgan Breastfeeding Support Group Breastfed Babies
Centred Soul	Centred Soul Newry Community & Therapy Space
Consultant Midwife Northern Ireland Forum	Health and Social Care Trusts, Northern Ireland
Derry/Londonderry Sure Start	Sure Start Services nidirect
Dungannon and Coalisland Sure Start	Sure Start Services nidirect
East Belfast Sure Start	Sure Start Services nidirect
HSC Trust Executive Teams	Health and Social Care Trusts, Northern Ireland
Heads of Midwifery	Health and Social Care Trusts, Northern Ireland
Maternity Collaborative, Northern Ireland	Health and Social Care Trusts, Northern Ireland
Maternity Services Liaison Committee and Maternity Voices Partnership	Health and Social Care Trusts, Northern Ireland
Maternity Support Workers	Health and Social Care Trusts, Northern Ireland
Midwives (Band 5 to 8B)	Health and Social Care Trusts, Northern Ireland
Midwifery Students and Educators	School of Nursing and Midwifery Queen's University Belfast (qub.ac.uk)
Minding Mums, Derry/Londonderry	

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Contributing Individuals/Organisations	Further Information
Non-Executive Chief members of the HSC Trust Board	Health and Social Care Trusts, Northern Ireland
Obstetricians, including the Royal College of Obstetricians and Gynaecologists Northern Ireland	Health and Social Care Trusts, Northern Ireland Northern Ireland Committee RCOG
Paramedics	NIAS NIAS (hscni.net)
Pediatricians and neonatologists, including the Royal College of Paediatrics and Child Health Northern Ireland	Health and Social Care Trusts, Northern Ireland Northern Ireland RCPCH
Royal College of General Practitioners Northern Ireland	Northern Ireland (rcgp.org.uk)
Royal College of Midwives, Northern Ireland	Northern Ireland hub - RCM
Sands	Sands Saving babies' lives. Supporting bereaved families.
Strategic Planning and Performance Group (SPPG)	About Us - DOH/HSCNI Strategic Planning and Performance Group (SPPG)
The Parent Rooms Ltd	The Parent Rooms – Creating a Circle of Support For Parents
TinyLife	TinyLife – Northern Ireland’s Premature and Vulnerable Baby Charity
West Belfast Sure Start	Sure Start Services nidirect

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Appendix 9: Introduction and initial questions for participants in listening events

Brief introduction to the report and initial questions: prepared for participants in listening events

Women, partners and advocate listening events

In preparation for all listening events, the following information was shared those attending:

- We are working to identify ways of improving the quality and safety of midwifery care and services across NI, both in hospital and out of hospital – so the outcomes and experiences of women, babies and families are as good as they can possibly be.
- We would like to learn from your experiences and views:
 - What does good and not-so-good midwifery care look/feel like?
 - Do you think women have enough information to make decisions about their care (e.g. where to give birth), either in writing or in discussion?
 - What is the best thing about midwifery in Northern Ireland, and is there one thing you would suggest to improve midwifery in NI?

Staff and students listening events

In preparation for all listening events, the following information was shared those attending:

- We are working to identify ways of improving the quality and safety of midwifery care and services across NI, both in hospital and out of hospital – so the outcomes and experiences of women, babies and families are as good as they can possibly be. And so midwives can work in a supportive environment with all the resources and collaborations they need to be able to provide best care.
- We would like to learn from your experiences and views, both about the problems/challenges and about the strengths of the current midwifery/maternity services – and what needs to change to enable you and your colleagues to give the best care

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Appendix 10: Maternity and neonatal service provision in Northern Ireland

Maternity and neonatal service provision within the five HSC Trusts

Health and Social Care Trust	Belfast	Northern	South Eastern	Southern	Western
Sites	Royal Jubilee Maternity Hospital Mater Hospital	Antrim Area Hospital Causeway Hospital	Ulster Hospital Lagan Valley Hospital Downe Hospital	Craigavon Area Hospital Daisy Hill Hospital	South West Acute Hospital Altnagelvin Hospital Omagh Hospital
Birth Location Options	AMLU FMLU (closed)	Consultant Led Unit Maternity Hub (no intrapartum care available)	AMLU FMLU (closed) FMLU (closed)	AMLU AMLU	AMLU AMLU Maternity Hub (no intrapartum care available)
Community Midwifery	X	X	X	X	X
Consultant Led Antenatal Clinic	X	X	X	X	X
Midwifery Led Antenatal Clinic	X	X	X		X
Fetal medicine Clinic	X	X	X	X	X
Day Obstetric Unit	X	X	X	X	X
Day Assessment Unit	X	X	X	X	X
Emergency Assessment and Admissions Unit	X	X	X	X	X
Maternity Assessment Unit	X				
Fetal Assessment Clinic for growth			X		
Early Pregnancy Assessment Service	X	X	X	X	X
Bereavement Specialist Care	X	X	X	X	X
Neonatal Services Level 1 -3	1-3	1-3	1-3	1-3	1-3

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Appendix 11: Positive service developments from Northern Ireland

In pregnancy

- Appendix 11a: Antenatal clinic dedicated to women of East Timorese origin
- Appendix 11b: Diabetes in Pregnancy - Developing a Gestational Diabetes pathway using the 'Big Room' concept
- Appendix 11c: Specialist Midwifery Service for Women with Social Complexities – A Perinatal Pathway
- Appendix 11d: Continuity Of Midwifery Care Model (NI)

In labour and birth

- Appendix 11e: Birth at Home Team (B@H)
- Appendix 11f: Practising on the edge: Midwives and Challenging Birth Choices
- Appendix 11g: Bereavement Care - Introduction of the role of a Bereavement Midwife
- Appendix 11h: Providing a Home from Home service in an Alongside Midwifery-led Unit

Postnatal

- Appendix 11i: UNICEF UK Baby Friendly Initiative (BFI) - Impact of achieving BFI Gold Award Accreditation

Education and Training

- Appendix 11j: Queen's University Belfast (QUB) - Service User involvement in Curriculum Development
- Appendix 11k: Supporting newly qualified midwives – the Clinical Skills Midwife role

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In pregnancy:

Appendix 11a: Antenatal clinic dedicated to women of East Timor ethnic origin		
<p>Themes: <i>Enabling and supporting midwifery care and services for women, babies and families. Partnership working with women and families.</i></p> <p>Aim/objectives: <i>To address inequity in access to ANC services by creating a dedicated ANC clinic for women of East Timorese origin (2015).</i></p>		
Context	Impact	Lessons learned and recommendations
<p>Women of East Timorese origin are an ethnic minority in Northern Ireland who are at greater risk of adverse outcomes in pregnancy and postnatally, due to physical health and sociocultural and economic factors.</p> <p>Run in partnership with Dungannon and Coalisland Sure Start, the clinic is run every week by two designated midwives and a named female interpreter. 750 women have attended to date. 80% of the current caseload self-refer with families referring their own relatives and friends. Relationship-building is based on mutual respect, trust and understanding, ensuring woman-centred, individualised, holistic care.</p>	<p>Rates of women who do not attend maternity appointments has reduced by 75%.</p> <p>Local audit has demonstrated improved clinic attendance, vaccination uptake and perinatal outcomes such as reduced PPH and admission to ICU. Women are now booked by 12 weeks gestation and placed on the appropriate care pathway. This year 100% of pregnant East Timorese women received oral glucose tolerance test (OGTTs) on time, reducing the complexities associated with undiagnosed diabetes.</p> <p>Social deprivation is extreme among this community but has been improved in a range of ways, including accessing housing and benefits; signposting to local charities, aid organisations and food banks; registering with and accessing General Practitioner care; accessing education in English and Information Technology; public health information around diet, exercise, and vaccination. Disclosure of domestic abuse has also increased, as East Timorese women build trusting relationships with their midwives.</p> <p>Community engagement has increased significantly, and feedback is all positive. Self-referral to the ETAC has increased due to subsequent pregnancy and word-of-mouth. Care Opinion is being set up in the Tetum language.</p>	<p>Lessons learned</p> <p>Respect and listening to the specific needs of families of East Timor origin are of utmost importance, one size does not fit all.</p> <p>Continuity of care and multidisciplinary working are key.</p> <p>Having a clear objective, and good communication with management, as well as additional services for wrap around support has led to the success and growth of the clinic.</p> <p>Ongoing research will allow the health requirements of this community to be better understood and met effectively, as well as enabling the structure and outcomes of this dedicated care model to be shared with maternity care colleagues across the UK and Ireland.</p> <p>Recommendation</p> <p>Public health and maternity care education designed to address the social and cultural needs of women of East Timorese ethnic origin is essential in improving perinatal and public health behaviours and outcomes for the East Timorese community.</p>

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Appendix 11b: Diabetes in pregnancy - using the 'Big Room' concept to develop a gestational diabetes pathway		
Themes: Multidisciplinary team working and education at all levels of the system. Ensuring evidence-based care and standards.		
Aims/objectives: Establish a multidisciplinary clinic to improve the care of women with gestational diabetes.		
Context	Impact	Lessons learned and recommendations
<p>A multidisciplinary team, including with obstetric, diabetes, and midwifery input, and users of the service, was established in 2018 to continuously evaluate and improve the care of women with gestational diabetes. The work included the introduction of app-based blood glucose monitors, video clinics, and video and telephone appointments.</p> <p>The work drew on the 'Big Room' concept, an approach that allows key stakeholders to be co-located in one room to have productive sessions; this provided a platform for everyone involved in providing this service to meet weekly. The work was facilitated by Flow Coaching methodology, a model of replicable training in team coaching and technical improvement skills.</p>	<p>The service has resulted in less hospital clinic visits, shorter waiting times for women at the joint clinic, fewer individual diabetes and obstetric appointments, and a reduction in blood glucose monitoring during the intrapartum period from hourly to two hourly.</p> <p>The work has improved the overall experience and made time and cost savings for women.</p> <p>Winner of the British Midwifery Journal (BMJ) award for innovation in quality improvement 2020.</p>	<p>Lessons learned</p> <p>Often multiple Plan Do Study Act (PDSA) cycles are required before getting it right.</p> <p>Collecting the correct data on an ongoing basis is hugely important - evidence is required to ensure changes are safe and correct and to show where improvements have been made.</p> <p>Be prepared to review and change in response to data and feedback.</p> <p>Service user involvement is essential to hear their concerns and experiences and inform the shape of the service.</p> <p>Involving staff at all levels is hugely important.</p> <p>Recommendation</p> <p>Keep developing the multidisciplinary clinic by continuing to look at new topics and introducing new staff and women to the group regularly.</p>

Appendix 11c: Specialist midwifery service for women with social complexities – a perinatal pathway		
<p>Themes: <i>Multidisciplinary team working and education at all levels of the system. Enabling and supporting midwifery care and services for women, babies and families.</i></p> <p>Aims/objectives: <i>To provide coordinated support and safeguarding to vulnerable women and infants.</i></p>		
Context	Impact	Lessons learned and recommendations
<p>Most childbearing women who die as a result of pregnancy are from the most socially deprived areas and early intervention is needed (Saving Mother’s Lives Report 2020). Northern Ireland has high rates of domestic violence, and we are aware of the toxic trio of domestic violence, substance use and mental health.</p> <p>A specialist midwife in Social Complexities has been in post in the Northern Health and Social Care Trust since January 2023, in line with NICE guidance (2010), to provide support and safeguarding to vulnerable women and infants.</p> <p>The role includes coordinating midwifery care, clinical expertise, collaborating with multiagency professionals, educating service users, staff and families, and quality improvement initiatives. The Social Complexities midwife works collaboratively with colleagues including the Consultant Midwife, the Perinatal Mental Health Midwifery Coordinator, and the Advanced Nurse Practitioner in Addictions. Clinics are provided in a hub nearest to women with drop-in sessions available to encourage engagement.</p>	<p>Women have reported they feel better supported and that it is easier to tell their story to one person than having to repeat their trauma to multiple professionals or disclose challenges.</p> <p>Midwifery staff have reported the role helps to access specialist support for vulnerable women as this specialist role is able to make onward referrals to non-statutory agencies.</p>	<p>Lessons learned</p> <p>It is important to have a collaborative approach, sharing of information, compassionate leadership, and not to work in silos. Regular complex case review enables all the professionals involved to contribute to enhancing the care for vulnerable women. Trauma informed and recovery focused care for vulnerable women and their families, and a robust assessment of needs, is important.</p> <p>Reassure women that midwives’ role is to support not scrutinise.</p> <p>Recommendations</p> <p>Have one specialist midwife to coordinate care to ensure care is streamlined and communication between multidisciplinary team is effective.</p> <p>Ensure women can access as many health care professionals at one appointment as needed, to avoid women becoming over overwhelmed with appointments and disengaging with services.</p>

Appendix 11c: Specialist midwifery service for women with social complexities – a perinatal pathway		
<p>Themes: <i>Multidisciplinary team working and education at all levels of the system. Enabling and supporting midwifery care and services for women, babies and families.</i></p> <p>Aims/objectives: <i>To provide coordinated support and safeguarding to vulnerable women and infants.</i></p>		
Context	Impact	Lessons learned and recommendations
<p>Home visits and extended support in the postnatal period support improve recovery. Women who access this specialized service are prioritized for admission to the regional addiction unit and for contraception and sexual health appointments in their local community.</p> <p>Quality improvement initiatives are in progress and plans are in place to support continuity of midwifery care midwives, and to develop a pathway to support women who have survived or are currently experiencing trafficking.</p>		<p>Women with social complexity should be looked after under the continuity of care model with additional support provided by a specialist midwife.</p> <p>All those working with vulnerable women must have completed trauma-informed training and training on the impact of adverse childhood events. Women should be asked at every contact with a midwife about their mental wellbeing, their alcohol or substance use and selective enquiry for domestic violence.</p>

Appendix 11d: Continuity of Midwifery of Carer (NI)		
<p>Themes: <i>Partnership working with women and families. Ensuring evidence-based care and standards.</i></p> <p>Aims/objectives: <i>To enable the Continuity of Midwifery Care (CoMC) to be available for all eligible pregnant women (2023).</i></p>		
Context	Impact	Lessons learned and recommendations
<p>‘Continuity of Midwifery Carer’ (CoMC) describes a model of care that provides a woman with care from the same midwife or team of midwives during the pregnancy, birth and the early parenting period with referral to obstetric or other care as needed (Sandall et al 2016). This involves care co-ordination and provision and relationship building. Working in this way facilitates safer, more effective personalised care that improves women’s outcomes, experience and perceptions of quality of care and also supports planning and continuous assessment of individual additional needs.</p> <p>The ambition for Northern Ireland is that the CoMC model will be available to all eligible pregnant women in the region, with roll out prioritised to those most likely to experience poorer outcomes.</p> <p>Implementation of this innovative model started in 2023; it is being phased in and will become the standard model of maternity care across Northern Ireland.</p>	<p>Evaluation is in process. We plan to track four specific defined measures: CoMC Provision, clinical outcomes and interventions, service user experience and satisfaction, staff satisfaction.</p> <p>Local Update (as of the 31st of December 2023)</p> <p>CoMC (NI) Teams Activity</p> <ul style="list-style-type: none"> 508 women throughout the region being cared for in the CoMC (NI) model of care: approximately 3% of mothers booking into maternity services, based on NIMATS figures for 2023. 310 mothers who have given birth under the care of a CoMC (NI) team. 	<p>Lessons learned</p> <ul style="list-style-type: none"> system-level issues have an impact on implementation and need support from the wider maternity services; these have included significant workforce issues, the Covid-19 pandemic, winter pressures on staffing, terms and conditions for midwives’ work. electronic systems and current processes do not support this flexible type of working. need for team building, training, and expectation management. implementation cannot be standardised regionally due to challenges and issues at local level.

Appendix 11d: Continuity of Midwifery of Carer (NI)		
<p>Themes: <i>Partnership working with women and families. Ensuring evidence-based care and standards.</i></p> <p>Aims/objectives: <i>To enable the Continuity of Midwifery Care (CoMC) to be available for all eligible pregnant women (2023).</i></p>		
Context	Impact	Lessons learned and recommendations
<p>The regional CoMC (NI) model of care is intended to benefit users of maternity services across Northern Ireland and contribute to improved population health by:</p> <ul style="list-style-type: none"> providing safe, effective, and compassionate midwifery care. ensuring a consistent approach through the implementation of one regional CoMC (NI) model which is in line with national guidance and regulatory requirements. supporting the implementation of Nursing and Midwifery Council (NMC) standards of proficiency for midwives. ensuring midwives and managers have the knowledge, skills, and confidence to provide the regional CoMC (NI) model of care across all settings. improving value for money of the service. - improving midwives' job satisfaction and professional pride. 	<p>CoMC (NI) Provision</p> <ul style="list-style-type: none"> 91% of mothers having their CoMC (NI) named midwife provide their full antenatal care. 78% of mothers having their CoMC (NI) named midwife or Team member be in attendance and facilitate their birth. 95% of mothers having their CoMC (NI) named midwife provide their postnatal care. <p>Outcomes</p> <ul style="list-style-type: none"> 58% of women on a CoMC (NI) pathway experienced a spontaneous vaginal birth. 11% of women on a CoMC (NI) pathway experienced an assisted vaginal birth. 66% of women on a CoMC (NI) pathway were breastfeeding their baby on discharge to the Health Visitor. 	<p>Recommendations</p> <ul style="list-style-type: none"> Effective implementation of CoMC requires: project support/admin support to CoMC Lead Midwives. recruitment of additional midwifery, maternity support worker or administration staff. training on project management/ implementation science would have for the CoMC Lead Midwives. support for monitoring the impact of the implementation of this model is important.

Labour and birth:

Appendix 11e: Birth at Home Team (B@H team)		
<p>Themes: <i>Partnership working with women and families. Enabling and supporting midwifery care and services for women, babies and families.</i></p> <p>Aims/objectives: <i>To establish a Birth at Home (B@H) team to support women in their choice of birthplace with compassionate, evidence-based, safe care.</i></p>		
Context	Impact	Lessons learned and recommendations
<p>In 2020, requests for homebirths were noted to be increasing. COVID-19 escalated the increase in requests as a result of restrictions around care and visitors within the hospital environment. There was also an increasing number of requests for birth at home from women with additional care needs.</p> <p>The Birth at Home (B@H) team was established in the Southern Health and Social Care trust to provide strong leadership for the service and to support women in their choice of birthplace with compassionate, evidence-based, safe care, to protect the woman’s birthing journey.</p>	<p>Feedback from families about their care has been sought throughout.</p> <p>Change in staff attitudes to women’s birth options is apparent when supported by a B@H team.</p> <p>Midwives have been able to experience joy from supporting women through their birth journey, with continuity and compassionate care, and the positive impacts on women and their families.</p> <p>Women who have previously free birthed are choosing to have care with the team.</p> <p>Women with additional care needs report increased satisfaction when supported by the B@H midwives at obstetric appointments.</p>	<p>Lessons learned</p> <p>A B@H midwife needs a specialised skillset, with expertise and leadership.</p> <p>Positive and supportive conversations, shared decision-making, and woman-centred care are essential to improve quantitative and qualitative maternal and newborn outcomes.</p> <p>Recommendations</p> <p>Dedicated, protected B@H Teams are needed in each HSC Trust, in addition to the CoMC teams.</p>

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Appendix 11f: Practising on the edge: midwives and challenging birth choices		
<p>Themes: <i>Multidisciplinary team working and education at all levels of the system. Partnership working with women and families.</i></p> <p>Aims/objectives: <i>To develop a multidisciplinary team approach to supporting women with challenging birth choices (2022).</i></p>		
Context	Impact	Lessons learned and recommendations
<p>During a one-month period in July 2022 the Belfast Health and Social Care Trust, Community Midwifery service received three challenging home birth requests from women with additional care needs specifically:</p> <ul style="list-style-type: none"> • Gestational Diabetes Mellitus (GDM) • Dichorionic Diamniotic (DCDA) twins • previous caesarean section. <p>A multidisciplinary team (MDT) approach was adopted to devise an individualised care plan for each woman, there was also additional training and education for midwives to prepare and support them, in providing care to the women.</p>	<p>Midwives felt challenged and fearful whilst supporting the women to make informed decisions.</p> <p>Strong, participative, supportive midwifery leadership was demonstrated for the team.</p> <p>Safe personalised care and support plans were developed for each mother with robust risk assessment, planning and preparation by the entire multidisciplinary team.</p>	<p>Lessons learned</p> <p>Informed decision making is based on each woman being supported to understand the care requested, the management and the support options available to them as well as the potential associated risks, benefits, and consequences of those options.</p> <p>Recommendations</p> <p>Women who request outside-of-guidance home births require:</p> <ul style="list-style-type: none"> • non-judgmental senior obstetric and midwifery engagement • communication with all agencies who may potentially become involved eg NIAS, Doulas <p>Evidence based information and local outcomes should be shared with women to inform decision making.</p> <p>Additional training for midwives is needed in regard to the woman’s risk profile and complications that may occur.</p> <p>Learning should be shared: this work resulted in a regional framework for care outside of guidance (PHA 2023)</p>

Appendix 11g: Bereavement Care - introduction of the role of Bereavement Midwife

Theme: *Enabling and supporting midwifery care and services for women, babies and families. Partnership working with women and families.*

Aims, objectives: *To create posts for Bereavement Support Midwives to improve the care of families experiencing bereavement.*

Context	Impact	Lessons learned and recommendations
<p>Northern Ireland (NI) has the highest neonatal mortality rate (2.37 per 1,000 live births) in the UK, with a resultant impact on women, partners, and families. The recommendations of a number of reports (Draper <i>et al.</i>, 2019, 2020, 2021) highlighted the importance of HSC Trusts ensuring that all parents are offered high-quality, individualised bereavement care after the loss of their baby. To meet this requirement Bereavement Support Midwives posts were created.</p> <p>Parents are referred to the Bereavement support midwife following a loss at any gestation or neonatal death. The midwives liaise with doctors, midwives, and mortuary staff, including with Alder Hey Foundation Trust (Liverpool) who provide the perinatal and paediatric pathology services for NI. They follow up with a listening service for as long as the parents wish, and if requested refer them for additional emotional support and specialist mental health support.</p>	<p>In a recent Public Health Authority (PHA) review, the role of the bereavement support midwives was recognised as fundamental to providing a quality service.</p> <p>Parents expressed their satisfaction with the service they received, recognizing the input from these highly dedicated midwives. The parents reported that the midwives willingly went above and beyond the requirements of their role to support them (the parents) during an extremely difficult time.</p> <p>There was recognition from the multidisciplinary team that communication was improved and had facilitated good engagement and a positive impact on how health professionals were able to discuss post-mortems with parents.</p> <p>The education programmes are well supported and positively evaluated.</p>	<p>Lessons learned</p> <p>There was inconsistency in the level and type of information received by parents about a post-mortem particularly when the Bereavement Midwife was unavailable.</p> <p>Completion of the consent process and forms was challenging for providers of care and had a negative impact on women and families.</p> <p>Communication was a key issue; women and families felt that how staff communicated was important as well as the type and frequency of communication.</p>

Appendix 11g: Bereavement Care - introduction of the role of Bereavement Midwife

Theme: *Enabling and supporting midwifery care and services for women, babies and families. Partnership working with women and families.*

Aims, objectives: *To create posts for Bereavement Support Midwives to improve the care of families experiencing bereavement.*

Context	Impact	Lessons learned and recommendations
<p>They participate in reviews of care including the Perinatal Mortality Review Tool (PMRT) review process highlighting issues and concerns on behalf of the parents.</p> <p>They also work in partnership with Stillbirth and Neonatal Death Society (SANDS) to develop education programmes in bereavement care for staff.</p>	<p>There has been significant progress in establishing a forum for bereavement support midwives to share best practices and learning.</p> <p>The Midwifery Bereavement Support Service at South Eastern Health and Social Care Trust received the 2023 RCM award for Outstanding Contribution to Midwifery Services Pregnancy and Loss.</p>	<p>Recommendations</p> <p>Review and updating is required for:</p> <ul style="list-style-type: none"> • the Bereavement Care Pathway, with explicit inclusion of women with pregnancy loss from 12-20 weeks. • the consent process and documentation. • the scope and sustainability of Bereavement Support Midwife role. • Continued support for parents and follow-up after discharge from the hospital is needed. <p>Multidisciplinary education and training for health professionals providing bereavement care should be implemented in partnership with stakeholders from the voluntary sector.</p>

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Appendix 11h: Providing a Home from Home service in an Alongside Midwifery-led Unit.		
<p>Theme: <i>Partnership working with women and families. Ensuring evidence-based care and standards. Enabling and supporting midwifery care and services. Interdisciplinary team working and education.</i></p> <p>Aims/objectives: To provide the option for midwifery-led care in labour and birth, with multidisciplinary team support by providing a Home from Home service in an alongside midwifery-led unit.</p>		
Context	Impact	Lessons learned and recommendations
<p>The unit has provided midwifery care to women and families since 2007 and has remained open during this time despite the closure of similar units due to staffing pressures and the pandemic. The midwifery team in the HFH unit provides respectful, evidence-based skilled care that supports women during physiological labour, birth, and the transition to parenthood. Active Birth Workshops help prepare women and birth partners to be active participants in their own births.</p> <p>HFH provides a personalised service for women with complex pregnancies who choose to birth in the unit. The consultant midwife, with MDT consultant collaboration, co-produces an individualised birth plan with the woman.</p> <p>Interdisciplinary working is promoted by a daily huddle and datix pause, MDT weekly teaching, monthly mortality morbidity review, audit, incident review meetings, guideline development, and an intrapartum forum. The workstreams are aligned to the HSC Trust Maternity Improvement Plan.</p>	<p>The midwives' knowledge and experience of physiological birth and alternate coping mechanisms for labour and birth have resulted in a reduction in the need for pharmacological analgesia, fewer interventions, and a more positive birthing experience for those who choose the service. This service has proven extremely popular and has been positively evaluated by women who appreciated the relaxed atmosphere, the opportunity to view the birthing rooms, and to try out the equipment available. Women also value not being separated from their partner after the birth, with the unit facilitating the opportunity for their partners to stay overnight to provide continuous support.</p>	<p>Lessons learned</p> <p>Working with all partners who provide maternity care strengthens the service and improves outcomes and safety for women and families.</p> <p>Live datix review should be conducted to determine immediate learning to prevent recurrence. Care levels and equipment should be of the same standard in all place of birth settings throughout the HSC Trust.</p> <p>No woman or baby should be adversely affected due to their choice of place of birth.</p>

Appendix 11h: Providing a Home from Home service in an Alongside Midwifery-led Unit.		
<p>Theme: Partnership working with women and families. Ensuring evidence-based care and standards. Enabling and supporting midwifery care and services. Interdisciplinary team working and education.</p> <p>Aims/objectives: To provide the option for midwifery-led care in labour and birth, with multidisciplinary team support by providing a Home from Home service in an alongside midwifery-led unit.</p>		
Context	Impact	Lessons learned and recommendations
<p>The Midwives in HFH provide a positive working environment they role model and mentor students and trained staff in physiological labour, birth and water birth from throughout Europe including the Republic of Ireland. The HFH also offers alternate placements for medical and midwifery students and ambulance staff. Community midwives attend the unit to share their knowledge, disseminate learning from the community setting and refresh their skills.</p>	<p>The unit had the highest birth rate in an alongside midwifery led unit in the island of Ireland, and the greatest number of water births with over 5500 water births since opening. SEHSCT maternity service has now seen two generations of women use water for labour and birth.</p>	<p>Recommendations:</p> <p>Midwifery leads should consider:</p> <ul style="list-style-type: none"> • Compliance with the standard ‘All women to have documentation of an evidenced based place of birth discussion in their records’ should be audited. • Return to monitoring all outcomes in HFH. • Support should be provided for all staff.

Postnatal:

Appendix 11i: Impact of achieving UNICEF UK Baby Friendly (BFI) Gold Award Accreditation.																																																											
Theme: Ensuring evidence-based care and standards.																																																											
Aims/objectives: To become accredited as a UNICEF Gold Award partner of the Baby Friendly Initiative (BFI).																																																											
Context	Impact	Lessons learned and recommendations																																																									
Embarking on the journey for UNICEF UK Baby Friendly (BFI) Gold Award accreditation was a natural progression for the Northern Health and Social Care Trust, building upon their commitment to excellence since their initial BFI accreditation in 2003. The evidence-based BFI standards served as a valuable roadmap for enhancing care and fostering positive and transformative experiences for families.	The impact of implementing BFI standards extends from the early moments of bonding and breastfeeding to long-term health and relationship benefits for infants.	Lessons learned Achieving the sustainability standards has been a transformative experience. One crucial lesson is the paramount importance of management involvement throughout the process. Engaged leadership fosters a culture of commitment to sustainability standards and ensures that the principles are embedded in every aspect of care.																																																									
	Robust monitoring includes infant feeding status at initiation, discharge from hospital, 10 days, 6-8 weeks, 3-4 months, 6 months and 1 year. Table below contains the figures of mothers giving any breastmilk.																																																										
	<table border="1"> <thead> <tr> <th rowspan="2">Age/ stage collected</th> <th colspan="5">Year</th> </tr> <tr> <th>2018 Gold award</th> <th>2019</th> <th>2020</th> <th>2021</th> <th>2022</th> </tr> </thead> <tbody> <tr> <td>Initiation</td> <td>60%</td> <td>62%</td> <td>63%</td> <td>61.2%</td> <td>62%</td> </tr> <tr> <td>D/C from hospital Breastfeeding</td> <td>47%</td> <td>50%</td> <td>50%</td> <td>49.6%</td> <td>50%</td> </tr> <tr> <td>Primary visit</td> <td>40.6%</td> <td>41.5%</td> <td>41.5%</td> <td>42.4%</td> <td>42.7%</td> </tr> <tr> <td>6 weeks</td> <td>31.9%</td> <td>32.9%</td> <td>27%</td> <td>34.5%</td> <td>34.9%</td> </tr> <tr> <td>3 months</td> <td>-</td> <td>-</td> <td>29.5%</td> <td>29.8%</td> <td>29.1%</td> </tr> <tr> <td>6 months</td> <td>-</td> <td>-</td> <td>24.1%</td> <td>24.6%</td> <td>18.8(P)</td> </tr> <tr> <td>1 year</td> <td>13.6%</td> <td>13.6%</td> <td>17.4%</td> <td>16.7%</td> <td>-</td> </tr> </tbody> </table>	Age/ stage collected	Year					2018 Gold award	2019	2020	2021	2022	Initiation	60%	62%	63%	61.2%	62%	D/C from hospital Breastfeeding	47%	50%	50%	49.6%	50%	Primary visit	40.6%	41.5%	41.5%	42.4%	42.7%	6 weeks	31.9%	32.9%	27%	34.5%	34.9%	3 months	-	-	29.5%	29.8%	29.1%	6 months	-	-	24.1%	24.6%	18.8(P)	1 year	13.6%	13.6%	17.4%	16.7%	-	The significance of staff training cannot be overstated. Continuous education empowers healthcare professionals with the knowledge and skills required to uphold the highest standards.				
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Appendix 11i: Impact of achieving UNICEF UK Baby Friendly (BFI) Gold Award Accreditation.		
Theme: Ensuring evidence-based care and standards.		
Aims/objectives: To become accredited as a UNICEF Gold Award partner of the Baby Friendly Initiative (BFI).		
Context	Impact	Lessons learned and recommendations
<p>Following a positive reaccreditation outcome in 2017, the Trust recognized the readiness for the next step, to achieve sustainability. The decision to pursue the Gold Award was motivated by a belief that the BFI standards were firmly embedded in the Trust. The Gold Award aims to embed and sustain the standards, safeguarding the significant achievements in Baby Friendly accreditation and instilling sustainable leadership, foster a positive culture, and ensure ongoing monitoring and progression.</p>	<p>New pathways and referral processes have been implemented to support women experiencing complex challenges with breastfeeding.</p> <p>Quotes from services users on their experiences:</p> <p><i>“I was contacted instantly, and a home visit arranged. This was great- especially the phone call initially as I was anxious, worried and overwhelmed. It really put me at ease and quickly helped me feel I was being listened to and supported.”</i></p> <p><i>“I felt really supported in continuing to breastfeed. Specialist was excellent and went above and beyond to support me and validate my choices with other health care professionals I had been in contact with.”</i></p> <p><i>“Without this support I would not have continued breastfeeding my daughter due to the challenges we faced particularly slow weight gain.”</i></p>	<p>Recommendations</p> <p>Establish a dedicated Infant Feeding Team as a key strategy, facilitating streamlined communication and expertise within the institution.</p> <p>Transition to online training and classes for parents (a lesson learned from the COVID pandemic) for accessible and flexible learning, reinforcing the adaptability and resilience of services committed to Baby-Friendly Achieving Sustainability Standards.</p>

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Education and Training:

Appendix 11j: Developing a new curriculum for pre-registration midwifery education		
<p>Themes: Partnership working with women and families. Shared focus, values, philosophy, vision.</p> <p>Aims/objectives: To develop a pre-registration curriculum through a co-production process involving maternity service users.</p>		
Context	Impact	Lessons learned and recommendations
<p>The Patient and Carer Education Partnership (PCEP) (PCEP weblink) was established in 2013 in the School of Nursing & Midwifery, Queen’s University Belfast (QUB). The purpose of the forum is to enhance the contribution of service users and carers to all aspects of nursing and midwifery education. Through the work of the PCEP, maternity service users were involved in the design and development of pre-registration midwifery curricula. This included membership of Curriculum Development Committees and specialist curriculum subject groups such as Infant Feeding and Perinatal Mental Health.</p> <p>Service users are therefore key partners from the initial design and phased development of the curriculum, into full implementation and evaluation.</p>	<p>Maternity service users are involved in programme delivery; women with specific stories or experiences contribute to teaching and learning (e.g., continuity of midwifery care). This includes participating in student assessment and scenario-based simulated learning.</p> <p>Maternity service users and advocacy groups work alongside clinical partners to evaluate the programme performance and identify opportunities for enhancement.</p> <p>The School received a commendation for service user involvement from the NMC following midwifery curriculum approval.</p> <p>Growth of forum and its sub-committees means that maternity care service users are included in all school events e.g. Graduation, Midwifery Society and celebration events.</p>	<p>Lessons learned</p> <ul style="list-style-type: none"> • A formal structure for service user involvement is essential, with appropriate representation • Flexibility and forward planning are needed to enable maternity service users to engage with students effectively. • Maternity service users should be remunerated for time and travel to include meetings and contributions to educational programmes. • Support needed for service users to fulfil their role includes a university email address, a workstation in the nursing and midwifery building, dedicated administrative support, library access and support, and most importantly, educational design and delivery support. New maternity PCEP members are paired with a midwifery team staff member.

Appendix 11j: Developing a new curriculum for pre-registration midwifery education		
<p>Themes: <i>Partnership working with women and families. Shared focus, values, philosophy, vision.</i></p> <p>Aims/objectives: <i>To develop a pre-registration curriculum through a co-production process involving maternity service users.</i></p>		
Context	Impact	Lessons learned and recommendations
<p>Two of the Midwifery PCEP members have now been appointed as Honorary Lecturers in Midwifery Education (2023) and play a vital role in representing women’s experiences at significant points in the students’ curriculum.</p>	<p>Increased collaboration with other service user university committees e.g. Bournemouth University</p> <p>Future work will focus on how maternity service user contributions will evolve membership of PCEP as ‘<i>expert by experience</i>’ to a broader role.</p>	<ul style="list-style-type: none"> The midwifery lecture provides ongoing support in terms of a scaffolded approach to teaching across the curricula (representing women’s experiences beyond that of their own). As a means of supporting our service users’ psychological safety (PS), the lecturer responsible for the module provides further support in terms of opportunities for co-teaching and briefing/debriefing when the PCEP member facilitates learning. The support system within the wider PCEP forum provides further PS. In addition, the PCEP Conference is an opportunity to showcase. <p>Recommendations A systematic evaluation of PCEP-based learning as part of the programme evaluation is now required.</p>

Appendix 11k: Clinical Skills Midwife to support Newly Qualified Midwives

Themes: *Support to Newly Qualified Midwives (NQMs). Preceptorship. Mentorship.*

Aims, objectives: *Creation of Clinical Skills Midwife role to support newly qualified midwives.*

Context	Impact	Lessons learned and recommendations
<p>In July 2022, the Clinical Skills Midwife (CSM) role was created to improve midwife recruitment and retention rates within the Southern Health and Social Care Trust.</p> <p>The CSM has introduced:</p> <ul style="list-style-type: none"> • A 3-day Induction Programme for NQMs and staff new to the SHSCT, which includes a tour of the unit, introduction to senior staff and Specialist Midwives, key training, and a focus on wellbeing. • A new “Starter Pack” providing key information about the SHSCT, and outlining the competencies required for completion over an 18-month period to allow progression from Band 5 to Band 6. • Additional learning and support for particular clinical skills identified by the NQM and their line manager, provided by the CSM working alongside each NQM in the clinical areas. • Rotation to additional areas such as the Antenatal Clinic, and soon the Birth at Home and Continuity of Midwifery Care (CoMC) Teams, to provide wider experience of diverse clinical areas and expertise. • Increased pastoral support, both one-to-one and peer support, facilitated via the new Band 5 Forum which meets every two months. 	<p>Between 2019 and 2021, the Trust recruited just 58% of the annually required number of midwives, but by the end of 2023 all the outstanding vacancies from previous years had been filled and the annual recruitment requirements achieved.. Furthermore, over the past year, midwives from other HSC Trusts, the UK and the Republic of Ireland have applied for posts within the SHSCT. Feedback from most of these external applicants highlighted the CSM support as a key factor in their decision.</p> <p>Between 2019 and 2021, the retention rate for NQMs at one year post registration was 74%; since the commencement of the CSM, this retention rate has risen to 97.5%.</p>	<p>Lessons learned</p> <p>The CSM role gives focus to NQMs, and they must be protected, with no additional responsibilities added to ensure that the CSM can dedicate adequate time to staff individually.</p> <p>Recommendation</p> <p>Every HSC Trust should have a midwife/ midwives whose role is specifically to provide practical and pastoral support to NQMs and staff new to the HSC Trust as this has been shown to improve staff recruitment and retention rates as well as morale.</p>

Appendix 12: Positive service developments from England, Scotland, Wales, and Spain

- Appendix 12a: England: North East & Yorkshire (NE&Y) - Midwifery Unit Self-Assessment (MUSA) Project
- Appendix 12b: Scotland: Community Midwifery Unit integration into Maternity Services provision in Grampian Region
- Appendix 12c: Wales: Emergency Skills and Drills – a community perspective in the county of Powys
- Appendix 12d: Spain, Valencia: Exploration of organisational readiness of the maternity services before implementation of the first Midwifery Unit in the region

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Appendix 12a: England - North East & Yorkshire (NE&Y) - Midwifery Unit Self-Assessment (MUSA) Project

Themes: *Ensuring evidence-based care and standards. Enabling and supporting midwifery care and services for women, babies and families.*

Aims/objectives: *To reduce operational variability and practice between Midwifery Units (MUs) in the region by implementing the MUSA framework.*

Context	Impact	Lessons learned and recommendations
<p>The MUSA-framework is a self-improvement step-by-step guide based on the international Midwifery Unit Standards and accredited by NICE (NICE CG 190). The Self-Assessment Tool offers a traffic light system to check the organisation and performance of a midwifery unit against the international standards. The MUSA team worked to embed the MU standards across the region’s MUs between January to August 2023.</p> <p>Building upon a recommendation in the Ockenden Report, the project was intended to provide an assurance of the functioning of the region’s MUs and identify areas for improvement.</p> <p>The project team consisted of the Chief Midwife for NE&Y, a consultant midwife, clinical fellow, research fellow, service user, admin assistant and the Chief Executive Officer (CEO) of the international Midwifery Unit Network.</p>	<p>Using the MUSA tool, units were able to benchmark their service against the MU Standards, and plan and implement improvements.</p> <p>This work resulted in creation of a regional community of practice to share ideas, and to teach and discuss best practice principles.</p>	<p>Lessons learned</p> <p>Co-production of developments and stakeholder engagement is crucial to embed sustainable continuous quality improvement systems.</p> <p>Maternity services should consider embedding the use of the MUSA framework at regional level to create virtuous quality improvement cycles and a culture of continuous practice development.</p> <p>Recommendations</p> <p>It is recommended that the MUSA tool is used annually to demonstrate continuous improvement and identify areas for improvement.</p>

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Appendix 12b: Scotland: Maternity Service Provision in Community Midwifery Units (CMUs)		
<p>Themes: <i>Multidisciplinary team working and education at all levels of the system. Ensuring evidence-based care and standards. Enabling and supporting midwifery care and services for women, babies and families.</i></p> <p>Aims/objectives: <i>To demonstrate good practice in CMUs across NHS Grampian.</i></p>		
Context	Impact	Lessons learned and recommendations
<p>NHS Grampian in north-east Scotland is one of 14 Health Boards and provides care for families in both urban and rural areas. Maternity services include two community maternity units (CMUs), one alongside midwifery unit, one district general hospital, and one tertiary referral unit. There have been around 5000 births annually in recent years.</p> <p>The two community maternity units (CMUs) take a ‘hub’ approach to supporting the provision of maternity care which includes 24-hour midwifery led intrapartum care for low-risk women, antenatal day assessment and triage, antenatal and postnatal care in the CMUs and at home, antenatal education classes, ultrasound scanning, and clinics conducted by consultant obstetricians. The midwifery teams also provide on call cover for the CMUs and homebirths. Antenatal care is also provided in General Practitioner (GP) clinics.</p> <p>Maternity services undertake a virtual multidisciplinary ‘huddle’ twice a day, seven days a week. This occurs once in the morning and once in the afternoon involving all clinical areas, including the CMUs. Attendance at these meetings includes midwives, obstetricians, theatre staff, neonatologists and/or a neonatal nurse in attendance. The ‘huddle’ provides situational awareness and multi-disciplinary team (MDT) planning. The huddle reviews current activity across all areas of maternity services and discusses any service provision challenges, high-risk women, staffing challenges or areas of escalation/requiring support.</p>	<p>Since 2020, around 200-220 births have taken place annually in the two units. Around 30% of women are transferred in labour, with neonatal transfers around 3.5%.</p> <p>The Health Board covers areas of high and low deprivation. Both CMUs support areas of socio-economic deprivation, substance use and mental health within their caseloads. Providing care closer to home gives greater accessibility to midwives and obstetricians for these women and improves the attendance.</p>	<p>Lessons learned</p> <p>There is considerable value in a ‘hub’ model of care where women can access a range of services locally available to them.</p> <p>We learned that it is important to have a proportion of experienced and core staff within each team, so we support NQMs to work within our CMUs and ensure there is a level of rotation of new midwives. This allows for exposure and development of the midwifery workforce in providing care within the CMUs and supports succession planning of the workforce.</p> <p>Recommendation</p> <p>Multidisciplinary (MDT) working and strong relationships are recommended as they enable enhanced communication, care planning and joint decision making. The link consultant obstetrician is a part of the CMU team and is vital to this process.</p>

Appendix 12c: Wales: Powys: Emergency skills and drills – a community perspective		
<p>Themes: Multidisciplinary team working at all levels of the system. Enabling and supporting midwifery care and services for women, babies and families.</p> <p>Aims/objectives: Multidisciplinary education to increase skills and confidence in the management of obstetric emergencies in the community or midwife-led setting, including midwives and ambulance staff.</p>		
Context	Impact	Lessons learned and recommendations
<p>Powys Maternity services is a midwife-led service in mid-Wales serving a large and mainly rural geography. There is no obstetric unit within the county and obstetric care is commissioned from one of seven Health Boards or NHS Trusts that surround the county. Women who choose to birth in Powys can choose to birth their babies in one of six free standing birth centres or at home.</p> <p>Around 200-250 births take place annually in the FMU or at home, with around 9% being at home. Intrapartum transfer rate is around 24%. Around 3.5% experienced an obstetric emergency.</p> <p>Powys Teaching Health Board has been running community skills and drills training for midwives and paramedics since 2003 and since 2007 has offered the course Appropriate Skills for Appropriate Places (ASAP) to midwives and paramedics from across the UK. Since 2019 Powys have followed the Community Practical Obstetric Multiprofessional Training (PROMPT) Wales programme for internal training. The course takes place at a remote bed and breakfast location to give fidelity to a home birth setting and to encourage staff to consider factors such as mobile signals and evacuation.</p>	<p>Over 100 external delegates have attended the ASAP course with average confidence in emergencies increasing from 3.4 (out of 5) pre-course to 4.9 post course.</p> <p>Community PROMPT Wales has now been developed and implemented. The Powys team contributed to the development of the course, which is now in place across Wales.</p> <p>Attendees' evaluation of the course: <i>'I actually thought it was helpful to bring our own kits for scenarios as we are used to where everything is in them!'</i></p> <p><i>'As a student midwife returning after 18months away I found this more helpful than words. To have a full day to go through every emergency, alongside promoting the norm physiological birth was such a treat as often training is so busy and quick. I had time to ask questions, be hands on and get as much out of it as I needed. I feel much more confident heading back into my training. Thank you!'</i></p> <p><i>'I have regained my faith in midwifery and physiological birth! I love *midwife passion and this has shown me how to use my skills and knowledge to support women with their birthing choices. Thank you!'</i></p>	<p>Lessons learned</p> <p>Training with a focus on community/Freestanding Midwifery Unit (FMU) staff has been essential to ensuring that training is useful and relevant for staff to the area they work in.</p> <p>Allowing time to debrief in scenarios and share lessons from practice are valuable to support learning.</p> <p>The need to run scenarios in the birth centres and home settings has been recognized</p> <p>Recommendations</p> <p>Standardization of kit and equipment carried is needed to ensure staff have access to all relevant equipment when needed.</p> <p>Scenarios help to practice communication and to understand the role of midwives and ambulance staff in managing emergencies in the community/FMU.</p> <p>Using a real-life case study to emphasize learning has helped close the loop on learning from incidents.</p>

Appendix 12d: Spain, Valencia: Exploration of the organisational readiness of the Maternity Services of La Plana Hospital before the implementation of the first Midwifery Unit (MU) in the region		
<p>Themes: <i>Shared focus, values, philosophy, vision. Ensuring evidence-based care and standards.</i></p> <p><i>Enabling and supporting midwifery care and services for women, babies and families. Partnership working with women and families.</i></p> <p>Aims/objectives: <i>ensuring organisational readiness for the introduction of the first midwifery unit.</i></p>		
Context	Impact	Lessons learned and recommendations
<p>La Plana is the public hospital in the community of Valencia with one of the lowest rates of caesarean section - 17% in 2022 - in Spain (Generalitat Valenciana, 2023) and a perinatal mortality rate of 4.6/1000 births. It is a centre of reference for maternity care within the Spanish National Health System. The Labour Ward team has received national and international awards for their work supporting optimal intrapartum care. The team provide evidence-based care that supports physiology and respects women and their infants.</p>	<p>The MU is expected to cater for 30% of the workload of the Obstetric Unit (370 births) and as the only MU in the region, is expected to care for up to 500 births in future due to the expected increase in workload over the years.</p> <p>In 2022, the induction of labour rate was 34%; epidurals 61%; the caesarean section rate was 17% the instrumental birth rate was 12%. 8% of the births occurred in water and 16% of women use the pool for pain relief (La Plana, 2023).</p> <p>There has been a move towards a bio-psycho-social philosophy of care in collaboration with the primary care midwives.</p> <p>A continuous improvement ethos has been embraced by the Multidisciplinary Team (MDT).</p>	<p>Lessons learned</p> <p>Overall, La Plana Hospital demonstrated a high level of organisational readiness to open a MU. Transformational and consistent leadership over time was mentioned by stakeholders as crucial.</p> <p>It seems that ‘small is beautiful’. Stakeholders expressed the view that it was easier to influence the organisational culture when the team is more compact.</p> <p>It was necessary to provide evidence and data to engage the local and regional government in order to gain their support for the provision of facilities that enable women’s choices, improve health outcomes, access, and service user’s satisfaction, and that are cost-effective.</p> <p>Transformational leadership has been key in developing and achieving changes in practice and organizational culture</p>

Appendix 12d: Spain, Valencia: Exploration of the organisational readiness of the Maternity Services of La Plana Hospital before the implementation of the first Midwifery Unit (MU) in the region

Themes: *Shared focus, values, philosophy, vision. Ensuring evidence-based care and standards.*

Enabling and supporting midwifery care and services for women, babies and families. Partnership working with women and families.

Aims/objectives: *ensuring organisational readiness for the introduction of the first midwifery unit.*

Context	Impact	Lessons learned and recommendations
<p>They are supported by a Head of Midwifery who has been a driving force towards decreasing unnecessary interventions in childbirth whilst maintaining safety and ensuring women’s autonomy is respected. Nevertheless, the service leaders acknowledged that a Midwifery Unit (MU) was needed as the labour ward continued to present barriers for women in physiological labour.</p>	<p>A collaborative organisational culture and a sense of ownership by the whole team has developed, involving robust MDT involvement in the service training plans.</p> <p>Autonomy and empowerment of the midwives has developed over the years.</p> <p>There has been increased acknowledgement of women’s autonomy (though current limitations are acknowledged).</p>	<p>Continuity of Care (Coc) in primary care by the community midwives will help signposting the eligible women towards the MU.</p> <p>Importance of the local-regional-national policies focused on maternal and childcare.</p> <p>Recommendations</p> <p>It is important to focus on increasing personalised care and women’s autonomy.</p> <p>Make the most of windows of opportunity; political connections are important to gain approval for the opening of a MU.</p> <p>Engage policymakers to promote Midwifery Units as a right to choose the model of care, and to improve outcomes and safety within the public health system.</p> <p>It has been helpful to create awareness within Spanish society and healthcare professionals of MUs as effective, safe and valuable models of maternity care.</p>

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Appendix 13: Examples of implementation action planning

Recommendation (R)	Operational considerations	Action Planning, monitoring & evaluation (NB: this is an example and not exhaustive)	Evidence base and additional information	Responsibility and accountability considerations * Lead Role
System-wide strategic developments				
<p>R4 The whole maternity and newborn system should ensure the meaningful involvement of women, families, communities, and staff in design, planning, provision, monitoring and review of care, services, and education and training.</p> <p>Service user representatives should be present and enabled to participate at all Board discussions about maternal and newborn services.</p>	<p>Processes should be developed at regional level to ensure the genuine involvement of women, communities, and interdisciplinary staff at regional and HSC Trust levels. Development and implementation should be led by the regional Maternal and Newborn Partnership (R7) and implemented consistently across HSC Trusts. Implementation should be monitored.</p>	<p>Phase 1</p> <p>Action Plan to include:</p> <ul style="list-style-type: none"> • M&NSSOG to review current feedback and involvement of women and families, mapped to KCs and Recommendations. • Based on findings of review; update of current feedback mechanisms and incorporation of new innovations to gain meaningful feedback in partnership with women, families, and staff across the whole maternity journey. • Feedback to include variety of formats to ensure all women and families' voices are heard: eg development of online surveys, periodic face to face audit of the woman's journey etc. • Staff training to support and enable women and families meaningful involvement eg development of process and understanding of how women are recruited and remunerated for their time, audit training for staff working in the clinical areas, learning and guidance for staff on how to reach all women and families across the service 	<p>Relates to QMNC concept 1, 3c and 7.</p>	<ul style="list-style-type: none"> • Department of Health/Maternity and Neonatal Services Safety Oversight Group • HSC Trust Boards and Executive • Strategic Planning and Performance Group • Public Health Agency • Regulation and Quality Improvement Authority • Advocacy and community groups • Royal Colleges • All professional groups, at all levels of seniority • Education providers • Universities • Researchers

Recommendation (R)	Operational considerations	Action Planning, monitoring & evaluation (NB: this is an example and not exhaustive)	Evidence base and additional information	Responsibility and accountability considerations * Lead Role
System-wide strategic developments				
<p>Participation and engagement of women, families and communities should be funded, and service users and advocates should where appropriate receive remuneration for their time, in line with best practice procedures in other UK countries.</p>	<p>Processes should ensure equitable engagement, with diversity of inclusion of women, families and communities, and with service users taking lead roles as appropriate.</p> <p>Staff responsibilities should be backfilled when staff are involved in this work.</p> <p>Support and training will be needed for service user representatives to participate effectively in this work (R30)</p>	<p>Monitoring:</p> <ul style="list-style-type: none"> Review of current data to undertake a gap analysis based on these KCs and recommendations. Development of required data set to monitor outcomes for KC1, 2, 4 & 6 and R2. <p>This could include;</p> <ul style="list-style-type: none"> Number of staff trained to carry out audit. XX% of women and families will have been audited by XX date. Audit results of women and families collated, analysed and reported to M&NSSOG and advocacy and community groups. <p>Evaluation:</p> <ul style="list-style-type: none"> Findings from feedback including any surveys and audit are collated and reported to the Regional Maternal and Neonatal Network and HSC Trust and Executive Board; under an agenda item to discuss findings, ensure women’s and families’ voices have been heard and acted upon. Plans for new/revised action will then be developed. 		

Recommendation (R)	Operational considerations	Action Planning, monitoring & evaluation (NB: this is an example and not exhaustive)	Evidence base and additional information	Responsibility and accountability considerations * Lead Role
<p>Safe, quality care and services</p>				
<p>R18 Consistent evidence-based regional information should be provided to all woman and families about options for care and services in pregnancy, labour and birth, and following birth.</p> <ul style="list-style-type: none"> aligned with regional standards, policies and guidelines for staff. in appropriate language and format; face to face, written, and digital. informed by current best evidence. taking into account their individual clinical, psychological, social and cultural circumstances. 	<p>Information should be included on how and who to contact to access hospital and community services, and advocacy and support services. The revised information for women that accompanies the revised GAIN guideline for admission to midwife-led units in Northern Ireland (R1) will provide a basis for information on out-of-hospital options.</p>	<p>Phase 1 Action Plan to include:</p> <ul style="list-style-type: none"> M&NSSOG to review regional information provided and available to women and families, mapped to KCs and recommendations. Based on findings of review, in partnership with women and staff across the whole maternity journey plan: <ul style="list-style-type: none"> using best available evidence, update and development of information adapted to incorporate appropriate KCs and recommendations. transition period and incorporation of new innovations, including digital hand held notes to all maternity systems. a training programme for staff to enable effective, kind and sensitive support for women and families through change, ensuring all staff are knowledgeable and confident in sharing information with women so that they can make informed choices. consultation with women and families on how the transition would work best for them, eg focus groups. gap analysis of how to meet women's and families' needs in relation to access to information, when they live in challenging circumstances or/and where digital information is not available or preferred. 	<p>Relates to QMNC concept 2, 3a, 3b and 4b and Health systems concept 2.</p>	<ul style="list-style-type: none"> Department of Health/Maternity and Neonatal Services Safety Oversight Group HSC Trust Boards and Executive Public Health Agency Advocacy and community groups Universities Researchers

Recommendation (R)	Operational considerations	Action Planning, monitoring & evaluation (NB: this is an example and not exhaustive)	Evidence base and additional information	Responsibility and accountability considerations * Lead Role
Safe, quality care and services	<p>Information for women in the Pregnancy Book and the Maternity Hand Held Record (MHHR) should be reviewed and updated to ensure they are consistent with NICE guidance (NG235) and with each other, and that they are easily accessible to all women. Preparation for the implementation of encompass programme and the planned withdrawal of the MHHR must include development of accessible information for women.</p> <p>The possibility of implementing the Healthier Together platform in NI should be considered [285]</p>	<p>Monitoring:</p> <ul style="list-style-type: none"> Review of current data to undertake a gap analysis based on these KC's and recommendations. Development of required data set to monitor outcomes for KC1 & KC2 and R18. <p>This could include;</p> <ul style="list-style-type: none"> Number of staff trained to implement the new digital system. XX% of women and families will have been audited on access and useability of information by XX. Audit results of women and families collated, analysed and reported to M&NSSOG and advocacy and community groups. <p>Evaluation:</p> <ul style="list-style-type: none"> Findings from feedback including any focus groups and audit are collated and reported to the Regional Maternal and Neonatal Network and HSC Trust and Executive Board under an agenda item to discuss findings, ensure women's and families voices have been heard and acted upon; <ul style="list-style-type: none"> plans for new/revised action will then be developed. 		





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Enabling Safe Quality Midwifery Services and Care in Northern Ireland

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