

## Infant Feeding - Full Clinical Guideline

Reference No.: Mat/09:19/B5

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### **1. Introduction**

University Hospitals of Derby and Burton NHS Foundation Trust (UHDB NHS FT) is committed to providing the highest standard of care to support expectant and new mothers and their partners to feed their baby and build strong and loving parent- infant relationships. This is in recognition of the profound importance of early relationships to future health and well-being and the significant contribution that breastfeeding makes to good physical and emotional health outcomes for children and mothers. The importance of breast milk for an infant's survival and health suggests a mothers' own breast milk is therefore always the first choice to feed to her baby.

UHDB is also committed to working together across disciplines and organisations to improve mothers'/parents experiences of care. Ensuring that all care is mother and family centred, non-judgemental and those mothers' decisions are supported and respected. All mothers have the right to make a fully informed choice as to how they feed and care for their babies. The provision of clear and impartial information to all mothers at an appropriate time and in an appropriate format is therefore essential.

## **2. Aim and Purpose**

This guideline is informed by the UNICEF Baby Friendly Initiative (BFI) Standards (2014), the National Health Service (NHS) 2019 Long Term Plan (LTP) and the National Institute for Health and Clinical Excellence (NICE) antenatal (CG62) and postnatal clinical guidance (CG37), postnatal quality standards (QS37) and maternal and child nutrition guidance (PH11).

The purpose of the guideline is to ensure that all staff at UHDB NHS FT understands their role and responsibilities in supporting expectant and new mothers and their partners to feed and care for their baby in ways which support health and well-being (Appendix A- Roles & responsibilities)

The aim of the guideline is to ensure that the care provided upholds and builds on the current BFI standards and supports UHDB NHS FT embed high quality care for the long term; improving outcomes for children for children and families. Specifically UHDB NHS FT intend to deliver

- An increase in breastfeeding rates at birth, at day 5 postnatal and at discharge from maternity services.
- An increase in babies in the neonatal units receiving colostrum and breast milk
- Amongst mothers who choose to formula feed, an increase in those doing so as safely as possible, in line with nationally agreed guidance
- Collaborative working across disciplines and organisations (including voluntary organisations) to improve and enhance our patients experiences of care
- A reduction in the number of readmissions for preventable feeding problems within the first 28-days of life
- Any other locally agreed outcome indicators.

All staff are expected to comply with this guidance with any deviations justified and recorded in both the mother's and baby's notes. This should be done in the context of professional judgement and codes of conduct (Nursing and Midwifery Council (NMC), 2015).

To meet the aims of this guidance UHDB NHS FT will ensure that

- On commencement of their employment all staff are familiarised with their key roles and responsibilities as outlined in this policy
- All staff will receive training to enable them to implement guidance as appropriate to their role. New staff will receive this training within six-months of commencement of their employments (Appendix B - mandatory infant feeding training)
- The International Code of Marketing Breast Milk Substitutes (World health Organisation (WHO), 1981) is implemented throughout UHDB NHS FT (Appendix C - International Code)
- Parents' experiences of care will be listened to through regular audit including but not limited to an annual infant feeding audit and parents' experience surveys (e.g. Care Quality Commission survey of women's experiences of maternity services, Family

and Friends audit). This is an essential aspect of high quality care service provision (Department of Health, 2013).

### 3. **Definitions**

The Department of Health recommends that babies are breastfed exclusively for the first 6 months (26 weeks) of life after which breastfeeding should continue beyond the first year along with appropriate types and amounts of solid foods.

- Unless otherwise stated, this guideline applies to healthy term babies.
- Where expressed colostrum (EC) and/or expressed breast milk (EBM) is mentioned, it refers to mothers own.

### 4. **Abbreviations**

APEL	-	
BFI	-	Baby Friendly Initiative
BG	-	Blood Glucose
BW	-	Birth Weight
CW	-	Current Weight
EBM	-	Expressed Breast Milk
EC	-	Expressed Colostrum
HCA	-	Health Care Assistant
HTB	-	Healthy Term Baby
IF	-	Infant Feeding
MSW	-	Midwifery Support Worker
MW	-	Midwife
NHS FT	-	National Health Service Foundation Trust
NN	-	Neonatal Nurse
NNU	-	Neonatal Unit
PHR	-	patient Health Records
SACN	-	Scientific Advisory Committee on Nutrition
SIDS	-	Sudden Infant Death Syndrome
UHDB	-	University Hospitals Derby & Burton
UNICEF	-	
WL	-	Weight Loss

### 5. **Main Body of Guidelines – Care Standards**

#### 5.1 **Pregnancy**

By 36-weeks' gestation all pregnant women will have the opportunity to discuss infant feeding and caring for their baby with a health professional (or other suitably trained designated person). The discussion can take place as part of:

- Routine antenatal care
- Antenatal education class(es) – health professional or voluntary support group led
- As part of peer support programmes.

The conversation, however, must not question a pregnant woman about her choice of feeding method, which can limit further discussion and does not allow for a change of mind.

The discussion needs to include:

- The value of connecting with their growing baby in utero
- The value of skin to skin contact

- The importance of responding to baby's needs for comfort, closeness and feeding after birth and the role that keeping baby close has supporting this.

The discussion about infant feeding must include:

- An exploration of what parents already know about breastfeeding
- The value of breastfeeding as protection, comfort and food
- Getting breastfeeding off to a good start.

Important note: Relevant and factual information from First Steps Nutrition about formula milk/feeding may be given on an individual basis only. No routine group instruction on or demonstration of formula milk preparations can be given in the antenatal period.

Antenatal discussions must be documented, on a minimum of three occasions in the antenatal patient held records (PHR).

**5.1.1** Expressing colostrum during the antenatal period can provide an additional postnatal supply of colostrum to compliment or replace a new born baby's feeds. Pregnant women may therefore be encouraged to express their colostrum/breastmilk from 36 to 37 weeks gestation onwards. Antenatal hand expression is especially relevant when

- A pregnant women has pre-existing or gestational diabetes
- The infant is diagnosed with a cleft lip and/or palate

**5.1.2** Formula milk preparations are not routinely provided by UHDB NHS FT therefore mothers who intend to formula feed their new born baby must be informed that they are required to supply their own ready-to-feed **first** formula milk preparation (six-packs) (Appendix D – feeding your baby at UHDB).

## **5.2 Birth**

- All mothers will be offered the opportunity to have uninterrupted skin contact with their baby at least until after the first feed and/or for as long as they want (preferably  $\geq$ one-hour). Skin contact facilitates the instinctive behaviour of breastfeeding (baby) and nurturing given an opportunity to emerge. Staff should not interrupt skin contact to carry out routine procedures
- All mothers will be encouraged and clinically supported to offer the first breastfeed in skin contact. The aim is not to rush baby to the breast but to be sensitive to baby's instinctive process and readiness to self-attach.
- Mothers who choose to formula feed will be encouraged to offer the first and subsequent feeds in skin contact
- Mothers who are unable (or do not wish) to have skin contact immediately after birth will be encouraged to do so as soon as they are able or wish to.
- All mothers should be encouraged to hold their baby in skin contact during transfer to the postnatal ward
- Ongoing skin contact may also be used at any time to
  - Boost hormonal responses
  - Reduce stress/cortisol levels by calming and comforting a distressed mother and/or baby
  - Support thermoregulation and blood glucose control

- Regulate heart and respiration rates
- Improve lactation
- Encourage breastfeeding
- Colonise baby with familial microbes

NB: If a first feed has not been achieved within four hours of birth consider an active modified responsive feeding intervention (Appendix E - healthy term baby who is reluctant to feed)

**Safety Considerations** - Vigilance as to the baby's well-being is a fundamental part of postnatal care in the first few hours after birth. For this reason, normal observations of the baby's temperature, breathing, colour and tone should continue throughout the period of skin contact, in the same way as would occur if the baby were in a cot. Observations should also be made of the mother, with prompt removal of the baby if the health of either gives rise to concern.

It is important to ensure that the baby cannot fall on to the floor or become trapped in bedding or by the mother's body. Particular care should be taken with the position of the baby, ensuring the head is supported so the infant's airway does not become obstructed.

Many mothers can continue to hold their baby in skin-to-skin contact during perineal suturing. However, adequate pain relief is required, as a mother who is in pain is unlikely to be able to hold her baby comfortably or safely. Mothers should be discouraged from holding their baby when receiving analgesia which causes drowsiness or alters their state of awareness (e.g. Entonox).

When a mother has received drugs during labour which have made her drowsy she should not be left alone with baby in skin contact. In this situation the birth partner could keep an eye on the mother and baby dyad but staff must ensure they are properly informed about their responsibility

Where mothers choose to give a first feed of formula milk in skin contact, particular care should be taken to ensure the baby is kept warm

### 5.3 Maternal / Infant Separation

Infants should not be routinely separated from their mothers (including overnight) irrespective of feeding method. Separation of mother and baby will only occur when clinical/health reasons prevent care from being provided in the postnatal areas.

Mothers, who are separated for any reason from their baby, for example when baby is cared for on the neonatal unit, will then receive appropriate help and support to initiate and continue lactation (Appendix F – maintaining lactation) by being:

- Enabled to express colostrum as soon as possible after birth; ideally within 2 hours. The administration of buccal colostrum is a practice used to provide the benefits of colostrum to all infants who cannot access oral breast feeds.
- Supported to continue to express their breast milk as effectively as possible
- Taught how to express by both hand and breast pump. This includes how to clean and assemble breast pump equipment and how to safely store EC/EBM.
- Encouraged to express their breast milk at least 8-10 times in 24 hours including at least once during the night (12 midnight and 6 am).

- To ensure mothers are expressing breast milk effectively a formal review of expressing will be carried *at least four times in the first 2 weeks* following birth (appendix F - expression form).

Any break in frequent expressing can seriously compromise mothers' potential to maximise breast milk production. It is therefore, **the joint responsibility of midwifery and neonatal unit staff** to ensure that mothers who are separated from their baby receive appropriate information and ongoing physical and psychological support

In addition staff should appreciate the positive impact that love and nurture will have on the baby's physical and emotional development not only in the here and now but throughout their life. A positive parent/baby relationship is recognised as being crucial to the wellbeing and development of babies. Parents will therefore be:

- encouraged to be with their baby for as long as, and as often as, they wish
- actively supported to comfort and respond to their baby's needs by communicating with and touching their baby as appropriate to their condition
- supported to have frequent and prolonged skin-to-skin contact/kangaroo care when the baby's condition allows.

#### 5.4 Support for Breastfeeding

- Mothers will have the opportunity to discuss breastfeeding in the first few hours after birth or when transitioning to breastfeeding at any time; as appropriate to their own needs and those of their baby. This discussion will include information on **responsive feeding, feeding cues** and the use of **skin contact** to encourage instinctive new-born behaviours
- Mothers will be enabled to achieve effective breast feeding according to their needs including appropriate support with
  - Positioning and attachment
  - Hand expression
  - Understanding and/recognising signs of effective feeding
  - Understanding normal infant feeding behaviour.

This will continue until the mother and baby are feeding confidently.

- To determine effective feeding is taking place and if further feeding support is required the routine assessment of feeding will be carried out as part of the normal postnatal routines.

The focus of each assessment should be on supportive care to reduce anxiety and unnecessary supplements of formula milk. A plan of care to address any feeding issues will be developed if necessary.

In addition a **formal feeding assessment** will be carried out using the appropriate feeding assessment tools provided in the postnatal PHR's on a minimum of three occasions (suggested before discharge from inpatient services, primary community visit and day 5 postnatal visits) or using an alternative BFI/Trust authorised assessment form (appendix . Documentation of all feeding assessments is a mandatory requirement.

Weighing babies is component of an appropriate feeding assessment. Baby should be weighed at birth (classified as Day 0) and day 5. However a baby maybe reweighed at any time if there are concerns for its well-being. The normal range of weight loss in new born babies is 3% to 7% therefore a weight loss of >8% may be an indication of ineffective feeding (Appendix H - weight loss).

- Before discharge from inpatient maternity care all mothers will be given information both verbally and in writing about recognising effective feeding and where to call for additional help if they have any concerns.
- To facilitate on-going access to breastfeeding support UHDB will work in collaboration with other services and ensure all breastfeeding mothers are informed about local social support services. This support includes employed and voluntary breastfeeding counsellors, local support groups, national breastfeeding helplines and internet resources. The mother can then exercise her personal preference when seeking infant feeding support.
- For those mothers who require additional support for more complex breastfeeding challenges may be referred to specialist services. Specialist services include (not exhaustive) UHDB specialist midwife for infant feeding/infant feeding team; Samuel Johnson community maternity hospital; Primary Care Breastfeeding Support Services and Midlands Partnership NHS Foundation Trust Health Visitor Hub.

Mothers will be informed of this pathway/referral. (Appendix I – referral pathway).

- Responsive feeding should be encouraged for all babies unless clinically unwell with no restrictions on the frequency and duration of feeding.
- Mothers who formula feed will have a discussion about the importance of responsive formula feeding.

#### Responsive feeding

The term responsive feeding is used to describe a feeding relationship which is sensitive, reciprocal, and about more than nutrition. Staff should ensure that mothers have the opportunity to discuss this aspect of feeding and reassure mothers that:

- breastfeeding can be used to feed, comfort and calm babies
- breastfeeds can be long or short,
- breastfed babies cannot be overfed or 'spoiled' by too much feeding. It is therefore acceptable to wake a baby for feeding if breast become overfull including overnight
- breastfeeding will not, in and of itself, tire mothers any more than caring for a new baby without breastfeeding.

Find out more in UNICEF UK's responsive feeding info sheet:

<http://unicef.uk/responsivefeeding>.

### 5.5 Exclusive Breastfeeding

- Mother who breastfeed will be provided with information about why exclusive breastfeeding leads to the best outcomes for their baby and why it is particularly important during the establishment of breastfeeding (exceptions to exclusive breastfeeding are drops/syrups of additional vitamins/minerals and/or medicines (Scientific Advisory Committee on Nutrition (SACN), 2016)).
- When exclusive breastfeeding is not possible the value of continuing partial breastfeeding will be emphasised and mothers will be supported to maximise the amount of breast milk their baby receives. Before introducing formula milk preparations to breastfed babies encourage mother to express breast milk

- Mothers who give other feeds in conjunction with breastfeeding will be enabled to do so as safely as possible and with a proactive approach that minimises the disruption to breastfeeding and helps support the mother's lactation. This will include appropriate information and a discussion regarding the potential impact of introducing a teat when a baby is learning to breastfeed. Mothers should be encouraged to express their breast milk and alternative methods of feeding e.g. syringe or cup should be discussed.
- A full record will be made of all supplements given, including to the rationale for supplementation and discussion held with parents. When clinically indicated, for the short-term, UHDB will provide ready-to-feed formula milk. Mothers do not need instruction on how to reconstitute formula milk preparation unless they intend to extend their use.
- Supplementation rates will be audited continuously by all staff using the relevant audit tool. Continuous audits of formula milk supplementation are intended to identify and then decrease inappropriate supplementation, specifically formula milk given for non-clinical reasons and without fully informed maternal choice.

## 5.6 Modified Feeding Regime

There are a number of clinical indications for a short-term modified feeding regime in the early days after birth, for example,

- Preterm or small for gestational age babies
- Those who are excessively sleepy or slow to feed after birth
- Babies at increased risk of or showing clinical signs consistent with hypoglycaemia
- Early or excessive jaundice
- Concern about weight gain.

To ensure safety an active modified responsive feeding intervention involving a minimum of 8-12 feeds in 24-hours should be offered. However mothers should not be given the impression that feeding their baby every 3 or 4 hours is a 'normal' pattern of new born behaviour even when their baby is no longer sleepy or at risk.

## 5.7 Formula Feeding

To maximise the well-being of formula fed babies mothers who use formula milk preparations will:

- Be enabled to use formula milk as safely as possible through a discussion and/or demonstration about how to prepare infant formula milk in line with Department of Health and Food Standard Agency guidance. UHDB maternity community health care practitioners will check and reinforce learning following the mothers discharge from in-patient services.
- be encouraged to formula feed responsively by
  - Responding to cues that their baby is hungry
  - Inviting baby to draw in the teat rather than forcing the teat into their baby's mouth
  - Pacing the feed so that their baby is not forced to feed more than they want to
  - Recognising their baby's cues that they have had enough milk and to avoid overfeeding by forcing their baby to take more milk than it wants to

- Holding their baby close during feeds and enhancing their mother-baby relationship by offering the majority of feeds themselves.
- Advised to **only** use a first (1<sup>st</sup>) or new born formula milk preparation until their baby is twelve months old.

NB: Staff must not recommend particular brands of formula milk preparations to parents. Staff should use First Steps Nutrition (<https://www.firststepsnutrition.org/>) for accurate, up to date, evidence based information on formula milk preparations (Appendix J – formula milk feeding)

## 5.8 Support parents to have a close loving relationship with their baby

Parents are vital to ensuring the best possible short and long-term outcomes for babies and should be considered as the primary care givers or partners in care. Parents will therefore:

- Have unrestricted access to their baby unless individual restrictions are justified in the baby's best interest
- Be encouraged to have skin to skin contact throughout the postnatal period
- Supported to understand their new born baby's needs (including encouraging frequent touch and sensitive verbal/visual communication, keeping baby close, responsive feeding and safe sleep practices.
- Have full information on their baby's condition and treatment to enable informed decision-making.

5.8.1 Parents will be given information about on-going local parenting support that is available. UHDB NHS FT supports co-operation between health care professionals and voluntary support groups.

5.8.2 Recommendations for health care professionals on discussing where a baby sleeps and bed-sharing with parents.

Current research evidence overwhelming supports:

- Avoiding simplistic messages and neither blanket prohibitions nor blanket permissions in relation to where a baby sleeps.
- Following key messages promoted by the department health and the lullaby trust (<https://www.lullabytrust.org.uk/safer-sleep-advice/>) whose advice is based on strong scientific evidence and should be followed for all sleep periods, not just at night.

All parents will be informed that:

- The safest place for their baby to sleep is in a cot by their bed
- Sleeping with their baby on a sofa puts baby at greatest risk
- Their baby must not share a bed with anyone who is a smoker, has consumed alcohol or has taken drugs (legal or illegal) that make them sleepy

The incidence of SIDS (also referred to as Cot Death) is higher in the following groups

- Parents of low socio-economic groups
- Parents who currently abuse alcohol and drugs
- Young mothers with more than one child
- Premature infants and those of low birth weight

Parents within these groups will need more face to face discussion to ensure that these key messages are explored and understood. They may need some practical help, possibly from other agencies, to enable them to put them into practice.

### 5.9 Ankyloglossia (Tongue Tie)

Anatomical studies (2019) have found that the lingual frenulum is made of fascia (fibrous and elastic fibres) and that this fascia creates the whole floor of the mouth. When the tongue lifts this fascia lifts the floor of the mouth like a skirt. Infant studies suggest a kind of see-saw balance of the frenulum between stability and mobility.

Ankyloglossia, also known as Tongue-Tie is essentially is a congenital anomaly where a baby has too much stability and not enough mobility.

Many tongue-ties are asymptomatic and cause no problems. However in some cases a tight lingual frenulum that restricts the mobility of the tongue can affect the sucking mechanism required for effective milk transfer.

A frenulotomy is the medical term for tongue-tie separation.

Referrals for a frenulotomy must not be offered until a reasonable assessment of the impact of the tongue tie on feeding has been made. An assessment cannot be done by just taking a look it requires:

- A detailed feeding history
- An observation of how baby is feeding
- An assessment of the function of the tongue (how baby uses it's tongue by placing a finger in the baby's mouth and assessing elevation, lateralisation and extension, suck and appearance)

## 6 Monitoring Implementation of Standards

UHDB NHS FT requires that compliance with this policy is audited at least annually using the UNICEF UK Baby Friendly Initiative audit tool. The specialist midwife-infant feeding has been appropriately trained to use the audit tool and will therefore be responsible for facilitating the audit

A combination of regular audit conducted by questionnaires, face to face and telephone interviews of pregnant women and new mothers, clinical supervision of staff and the examination of appropriate records will inform all concerned with progress of implementing BFI's standards

	≥Frequency	≥Numbers
Maternity Staff	6 monthly	20-30 for >3000 births
Neonatal staff		
Maternity breastfeeding mothers	6 monthly	20-30 for >3000 births
Maternity bottle feeding mothers		
Mothers of babies resident on the neonatal unit		
Supplementation Audit	Continuous	N/A

Record keeping – Antenatal and Postnatal patient held records	Continuous	N/A
Environment for example: International Code for the marketing of breast milk substitutes. Bounty Bags	Six monthly	All areas

The specialist midwife-infant feeding is responsible for organising all monitoring of the implementation of BFI standards.

Audit results will be reported to the head of midwifery and matrons and senior midwives, neonatal and paediatric nurses within the women’s and children’s business unit. An action plan to tackle non-compliance will be developed and implemented by the specialist midwife – infant feeding, senior matrons and senior sisters within the business unit.

## 6.1 Monitoring Outcomes

Outcomes will be monitored by:

- I. Monthly collation of breastfeeding initiation rates and breastfeeding rates on day 5 and day 10 postnatal respectively
- II. Readmissions for feeding problems within the first 28-days reported via the DATIX system with reporting to maternity governance
- III. Multidisciplinary compliance for mandatory training as indicated by the quarterly training compliance matrix.
- IV. Audit parent’s experience surveys for example friend and family reports and the Care Quality Commissions/Picker Institute surveys.

Outcomes data will be reported to:

- Women’s and Children’s Directorate business unit
- Baby Friendly Implementation Strategy group

Accountability for ensuring that areas requiring improvement are addressed requires collaboration between the specialist midwife – infant feeding, head of midwifery and matrons and senior midwives, neonatal and paediatric nurses within the women’s and children’s business unit.

## 7. References

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## Key Roles and Responsibilities

All staff involved in the care of mothers and babies are expected to promote and protect breastfeeding and support the feeding method of choice for the mother by giving clear and impartial information to all parents at an appropriate time. Instruction on how to access this policy and how to adhere to the 'international code for the marketing of breast milk substitutes' will be given as soon as their employment begins.

Staff are expected to take part in appropriate learning and practice activities to maintain and develop their competence and skills (NMC 2102). Staff have a responsibility to attend mandatory training as identified in the Maternity Services Training Needs Analysis.

It is the midwife's responsibility to liaise with an appropriate paediatrician/general practitioner should concerns arise about the baby's health.

Specialist Midwife – Infant Feeding will lead the implementation of the Baby Friendly Initiative by promoting, developing and improving the infant feeding service for women and their families accessing services at UHDB FT NHS. The post holder is responsible for providing infant feeding education for the multidisciplinary team and coordinating the development of effective and improved services to support the initiation and duration of breastfeeding in accordance with the public health agenda.

Practice Development Midwives are responsible for supporting the specialist midwife – infant feeding with training, auditing and evaluating infant feeding training programmes.

Senior Midwifery and Nursing Teams have a responsibility to ensure that there are systems in place to safeguard BFI standards and the international code for the marketing of breast milk substitutes are implemented within the service.

BFI Guardian is a high level member of staff, who is willing to take on the responsibility of promoting, protecting and supporting the Baby Friendly standards.

The Guardian will ensure endorsement of breastfeeding and UNICEF at board level which will include compliance with the International Code of Marketing of Breastmilk Substitutes and collaborative working with the Baby Friendly Implementation staff.

Any issues or concerns will be escalated to the BFI implementation strategy group. The strategic group takes responsibility for ensuring that adherence to the Baby Friendly Standards is embedded in practice throughout the Trust. This may include developing action plans, working groups or other suitable strategies.

Director of Midwifery, Head of Midwifery, Lead Paediatric and Neonatal Nurses are responsible for leading on the strategic elements of the BFI standards.

Lead Obstetrician, Lead Neonatologist and Lead Paediatrician will ensure all medical staff are aware of the policy and their individual roles and responsibilities including mandatory training requirements

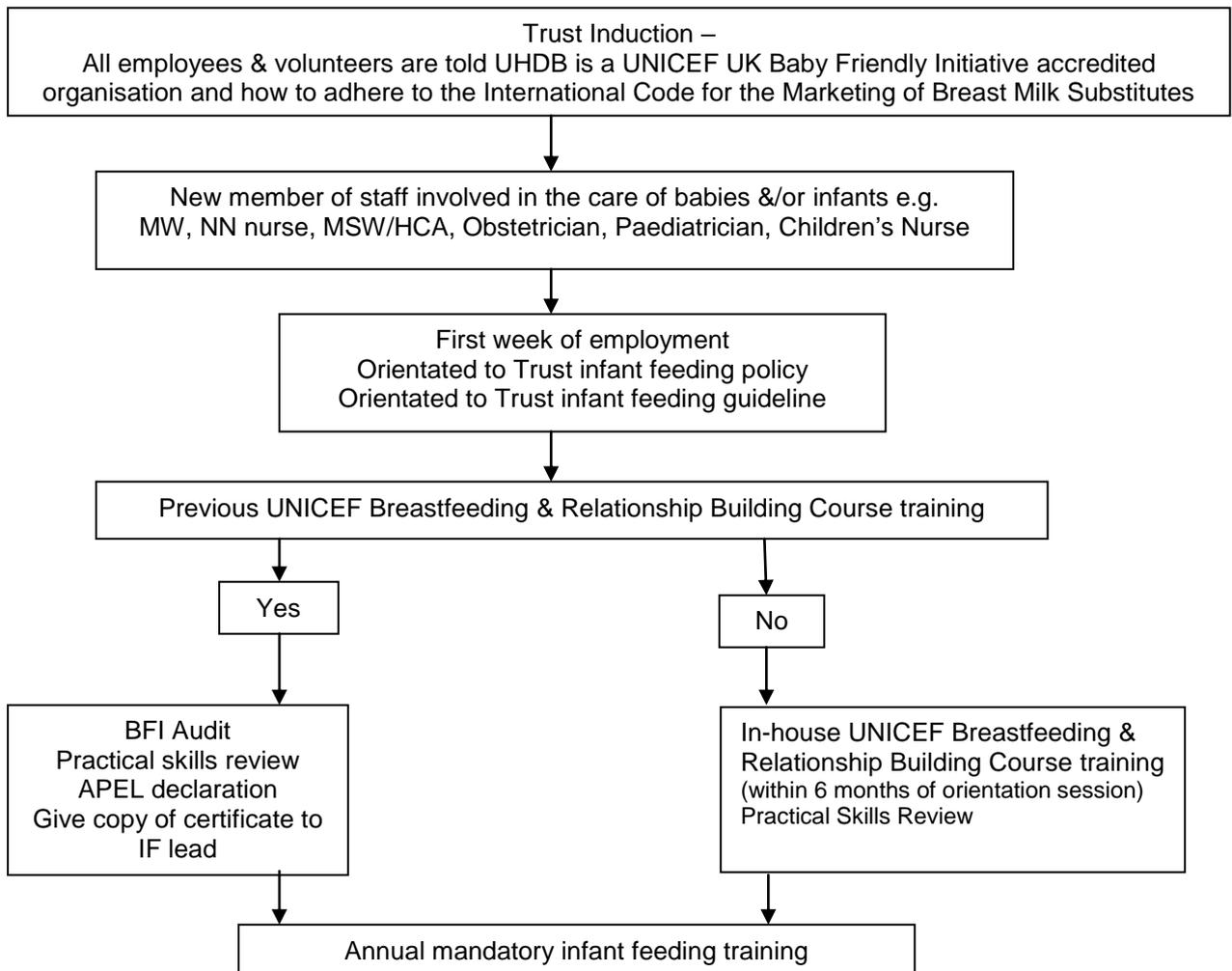
**Training**

The training programme will enable staff to implement the BFI standards according to their role and the service provided.

BFI standards are to:

- Support pregnant women to recognise the importance of breastfeeding and early relationships for the health and wellbeing of their baby
- Support all mothers and babies to initiate a close relationship and feeding soon after birth
- Enable mothers to get breastfeeding off to a good start
- Support mothers to make informed decisions regarding the introduction of food or fluids other than breastmilk
- Support parents to have a close and loving relationship with their baby
- Work with the International Code of Marketing of Breastmilk Substitutes
- Ensure mothers who make an informed decision to use formula milk do so safely within department of health guidance.

Process:



Mandatory BFI training to a level appropriate to professional groups

Code	Professional Group	Update period	Training Provider
BF1	Ward clerks, receptionists, domestic staff, ward hostess, housekeepers, play coordinators	Once Only	Specialist Midwife – Infant Feeding or Line Manager
BF2 On line e-learning	Paediatric Medical Staff	Once Only	Supervising Consultant
BF3 Induction -within one week of starting employment/student placement	Midwives, Maternity support Workers, Neonatal Nurses and Support Workers, Paediatric Nursing Staff, Health Care Assistants, Nursery Nurses, Staff Nurses working in neonatal units or paediatric services, student midwives and nurses	Once Only	Specialist Midwife – Infant Feeding or Line Manager
BF3	Midwives, Maternity support Workers, Neonatal Nurses and Support Workers, Paediatric Nursing Staff, Health Care Assistants, Nursery Nurses, Staff Nurses working in neonatal units or paediatric services	Once only	Specialist Midwife – Infant Feeding
BF3U	Midwives, Maternity support Workers, Neonatal Nurses and Support Workers, Paediatric Nursing Staff, Health Care Assistants, Nursery Nurses, Staff Nurses working in neonatal units or paediatric services	Yearly	Specialist Midwife – Infant Feeding

**International Code of Marketing Breast Milk Substitutes**

The International Code of Marketing of Breastmilk Substitutes (the Code) is an international health policy framework to regulate the marketing of breastmilk substitutes in order to protect breastfeeding. It was published by the World Health Organisation in 1981, and is an internationally agreed voluntary code of practice.

UHDB NHS Foundation Trust must guarantee

- No breast milk substitutes, feeding bottles, teats or dummies will be advertised
- Images of bottles and teats will only be used to re-enforce technical information
- Information (including displays of logos, leaflets, posters, stationary, DVD's websites, teaching aids, gestation/age calculators) of manufactures from the above products, even if free from company branding, will be prohibited
- Contact with representatives from manufacturers of breast milk substitutes will be via the Specialist Midwife – Infant Feeding. For non-standard milk formula that requires prescription contact will be regulated by an identified member of the dietetic team or a senior member of the neonatal/paediatric team. No literature provided by any infant formula manufacturers will be permitted.
- Sale of any breast milk substitutes by health care staff and on health care premises will be prohibited
- All Trust employees will not distribute literature, receive gifts, lunches or attend training provided by or sponsored by manufacturers of breast milk substitutes.
- All information about formula milk preparations and/or formula companies is obtained via First Steps Nutrition (<https://www.firststepsnutrition.org/>)

## Feeding your Baby at UHDB



### **Feeding your baby whilst in Hospital**

University Hospitals of Derby and Burton NHS Foundation Trust is committed to providing the highest standard of care to support expectant and new mothers and their partners to feed their baby and build strong and loving parent-infant relationship.

Breastfeeding is the healthiest choice of feeding for both you and your baby. We will therefore, encourage and support you to become confident in how to breastfeed.

You do not need to bring anything in addition for feeding your baby –  
Your breast milk is all your baby needs.

If you, however decide to use formula preparations you also need to feed confidently and safely. We will therefore discuss with you how to safely offer a formula feed.

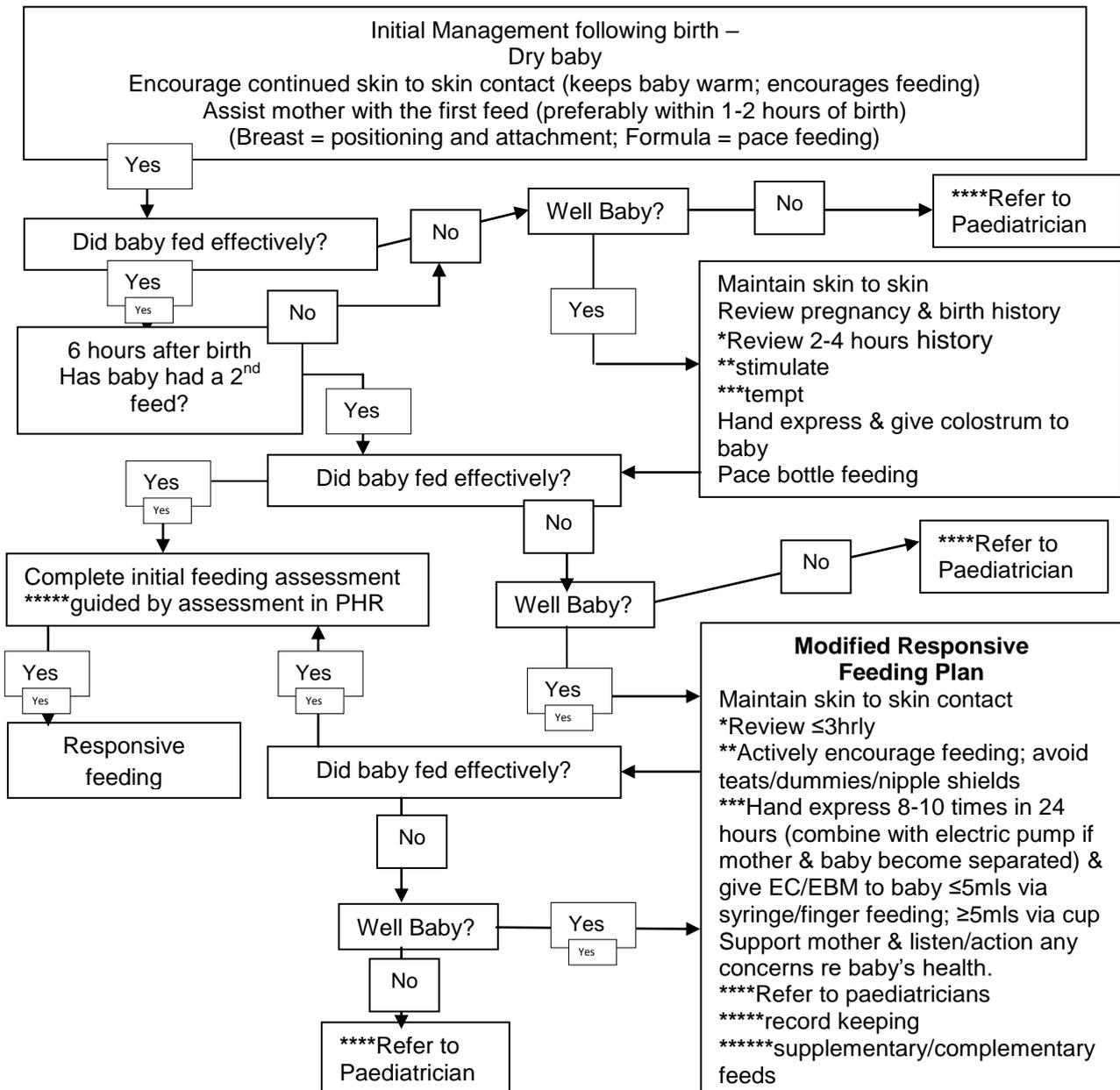
You will need to bring **Ready-to-Feed Formula Milk Starter Packs** into hospital with you. Starter packs contain pre-prepared bottles with teats. The formula you choose must be 'first' or 'new-born' and you will need enough bottles to be able to feed baby at least 6-10 feeds within a 24hour period. Please speak to your Community Midwife if you have any queries.

**Healthy Term Baby (HTB) who is Reluctant to Feed**

- Hypoglycaemia is unlikely to be problematic in healthy, term, well-grown babies. These babies are low risk and routine blood glucose (BG) monitoring is unnecessary.
- There is no evidence that long intervals between feeds in the first 24-hours will adversely affect healthy term new-born's. Some babies will feed <4times within the first 24 hours. At least 3-4 feeds are expected during this period increasing to a minimum of 8-12 times thereafter in any 24-hour period.
- Ensure there are no anatomical reasons preventing feeding e.g. cleft palate
- Encourage HTB to breastfeed in the first 1 to 2 hours after birth, preferably on delivery suite through continued skin to skin contact.
- Keep baby close to the mother; where possible in skin to skin contact to maintain baby's normal temperature
- Encourage responsive feeding from birth and assist the mother to initiate breastfeeding
- Assess a full breastfeed, offering support and reassurance where necessary
- Express breast milk and syringe/cup feed colostrum/breast milk frequently
- Ensure formula fed babies receive their first feed whilst in skin to skin contact
- Discuss responsive feeding with formula feeding mothers
- Observe wet and dirty nappies
- Record and update feeding plan in PHR

Supplementation/complementary – colostrum should be given to the infant first with other fluids only given if colostrum is not sufficient to satisfy clinical needs. Formula Milk Supplementation Audit forms **must** be completed when a breastfed baby is given formula milk preparations.

## Flow Chart - Healthy Term Baby who is Reluctant to Feed



**\*Review** – colour, tone, respiratory well-being, alertness/level of consciousness, risk of sepsis & consistency of wet & dirty nappies  
Temperature: if <36.6°C - >36 °C then skin to skin with hat on <36 °C paediatrician review  
Blood Glucose (BG) – symptomatic only  
**\*\*Stimulate** baby with skin to skin (biological nurturing), bathing, and massage & avoid teats/dummies/supplementation unless clinically indicated  
**\*\*\*Tempt** to feed – skin to skin, expressed EC/EBM, identify feeding cues

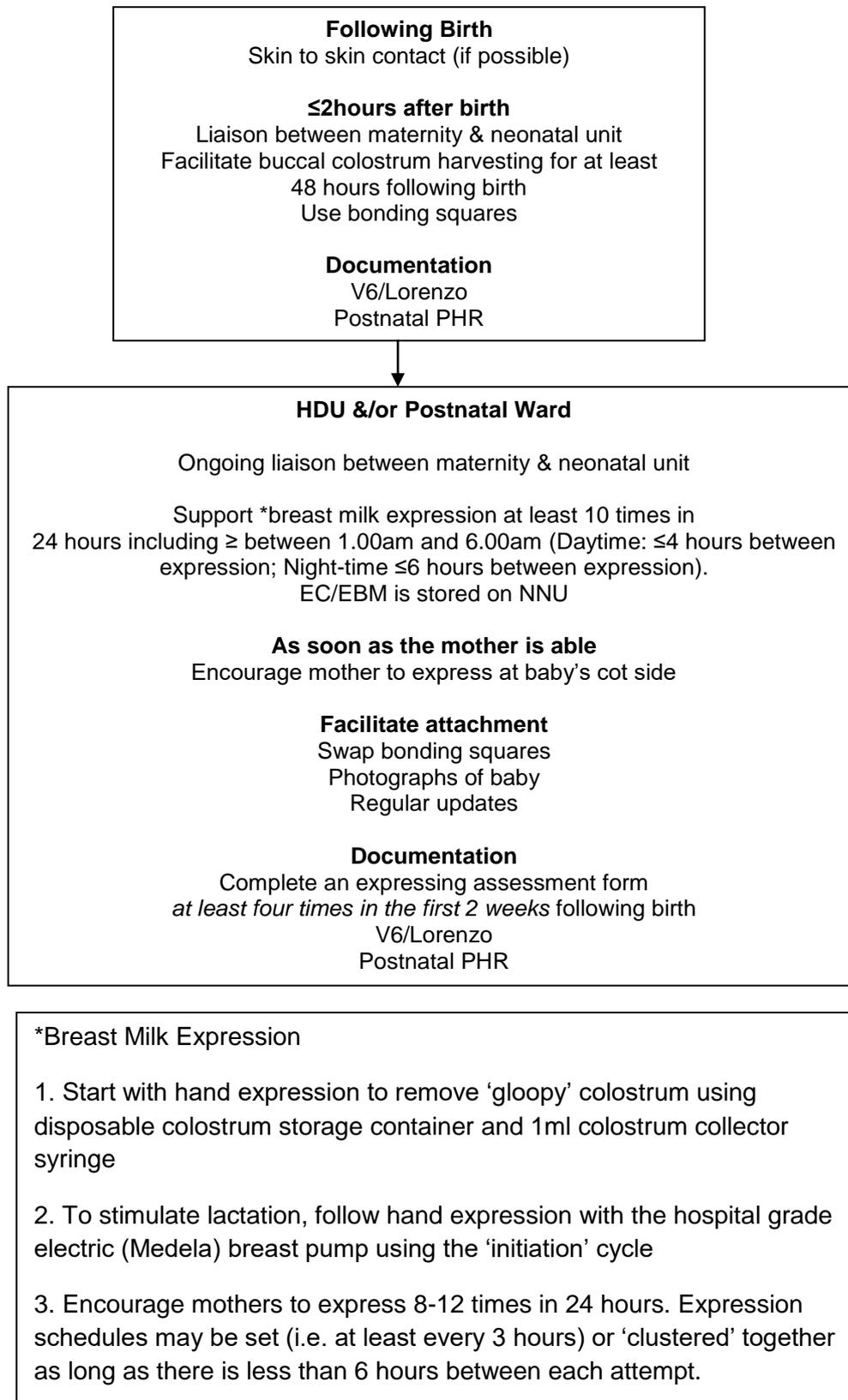
**\*\*\*\*Refer to Paediatrician** - If at any time baby appears unwell &/or observations are a concern and refer to relevant guidelines.

**\*\*\*\*\*Record Keeping** - V6/Lorenzo; Postnatal PHR Feeding assessments

**\*\*\*\*\***When an informed decision is made to proceed with a **supplementary/complementary** feed the amount given must be according to the quality of any breastfeed, the age of the baby & the clinical picture  
e.g. 1<sup>st</sup> 24 hours – 5-10mls  
2<sup>nd</sup> 24 hours – 10-15mls  
3<sup>rd</sup> 24 hours – 15-20mls  
Complete a yellow supplementation audit form

### Initiating and Continuing Lactation when Mothers and Baby are Separated

Mothers who are unable to feed their babies require support and information on how to express their breast milk safely and effectively in order to maintain their baby's well-being.



## Breast Milk Expression Assessment Form

### Expressing assessment form

If any responses in the right hand column are ticked refer to specialist practitioner. Any additional concerns should be followed up as needed. Please date and sign when you have completed the assessments.

<i>Mother's name:</i>	<i>Baby's name:</i>	<i>Date of assessment:</i>				<i>Birth weight:</i>				
	<i>Date of birth:</i>					<i>Gestation:</i>				
<b>What to observe/ask about</b>	<b>Answer indicating effective expressing</b>	✓	✓	✓	✓	<b>Answer suggestive of a problem</b>	✓	✓	✓	✓
Frequency of expression	At least 8 times in 24 hours including once during the night.					Fewer than 8 times. Leaving out the night expression.				
Timings of expressions	Timings work around her lifestyle with no gaps of longer than 4 hours (daytime) and 6 hours (night time)					Frequent long gaps between expressions. Difficulty 'fitting in' 8 expressions in 24 hours.				
Stimulating milk ejection	Uses breast massage, relaxation, skin contact and/or being close to baby. Photos or items of baby clothing to help stimulate oxytocin.					Difficulty eliciting a milk ejection reflex. Stressed and anxious.				
*Hand expression	*Confident with technique. Appropriate leaflet/DVD provided.					*Poor technique observed. Mother not confident.				
Using a breast pump	Access to electric pump. Effective technique including suction settings, correct breast shield fit. Switching breasts (or double pumping) to ensure good breast drainage. Uses massage and/or breast compression to increase flow.					Concern about technique. Suction setting too high/low, restricting expression length, breast shield too small/large.				
Breast condition	Mother reports breast fullness prior to expression which softens following expression. No red areas or nipple trauma.					Breasts hard and painful to touch. Evidence of friction or trauma to nipple.				
Milk flow	Good milk flow. Breasts feel soft after expression.					Milk flow delayed and slow. Breasts remain full after expression.				
Mill volumes	Gradual increases in 24 hr volume at each assessment.					Milk volumes slow to increase or are decreasing at each assessment.				

\*Hand expression may not need to be reviewed every time\*



**Formal Feeding Assessments**

**Breastfeeding assessment tool: Neonatal**

How you and your nurse/midwife can recognise that your baby is feeding well							*please see reverse of form for guidance on top-ups post-breastfeed
What to look for/ask about	✓	✓	✓	✓	✓	✓	
<b>Your baby:</b> Is not interested, when offered breast, sleepy (*A) Is showing feeding cues but not attaching (*B)							<b>Wet nappies:</b> Day 1-2 = 1-2 or more in 24 hours Day 3-4 = 3-4 or more in 24 hours, heavier Day 6 plus = 6 or more in 24 hours, heavy
Attaches at the breast but quickly falls asleep (*C) Attaches for short bursts with long pauses (*D) Attaches well with long rhythmical sucking and swallowing for a short feed (requiring stimulation) (*E) Attaches well for a sustained period with long rhythmical sucking and swallowing (*F)							
Normal skin colour and tone Gaining weight appropriately							<b>Stools/dirty nappies:</b> Day 1-2 = 1 or more in 24 hours, meconium Day 3-4 = 2 (preferably more) in 24 hours changing stools By day 10-14 babies should pass frequent soft, runny stools everyday; 2 dirty nappies in 24 hours being the minimum you would expect.  Exclusively breastfed babies should not have a day when they do not pass stool within the first 4-6 weeks. If they do then a full breastfeed should be observed to check for effective feeding. However, it is recognised that very preterm babies who transition to breastfeeding later may have developed their individual stooling pattern before beginning to breastfeed, and therefore this may be used as a guide to what is normal for each baby.
<b>Your baby's nappies:</b> At least 5-6 heavy, wet nappies in 24 hours At least 2 dirty nappies in 24hrs, at least £2 coin size, yellow and runny							
<b>Your breasts:</b> Breasts and nipples are comfortable Nipples are the same shape at the end of the feed as at the start							<b>Feed frequency:</b> Babies who are born preterm/sick may not be able to feed responsively in the way a term baby does. It is important that they have 8-10 feeds in 24 hours and they may need to be wakened if they don't show feeding cues after 3 hours. During this time it is important that you protect your milk supply by continuing to express.
Referred for additional breastfeeding support Date							
Midwife/nurse initials							Being responsive to your baby's need to breastfeed for food, drink, comfort and security will ensure you have a good milk supply and a secure, happy baby.
Midwife/nurse: If any responses not ticked: watch a full breastfeed, develop a care plan including revisiting positioning and attachment and/or refer for additional support. Consider specialist support if needed.							

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**Breastfeeding assessment form**

If any responses in the right hand column are ticked: watch a full breastfeed, develop an action plan including revisiting positioning and attachment and/or refer to specialist practitioner. Any additional concerns should be followed up as needed.

Baby's name: Baby's age: Date of birth:	Birth weight: Gestation: Current weight:	Assessment carried out by: Date:
<b>What to observe/ask about</b>	<b>Answer indicating effective feeding</b>	<b>Answer suggestive of a problem</b>
Urine output	At least 5-6 heavy wet nappies in 24 hours*	Fewer than 5-6 wet nappies in 24 hours, or nappies that do not feel heavy*
Appearance and frequency of stools	2 or more in 24 hours; normal appearance (i.e. at least £2 coin size, yellow, soft/runny)*	Fewer than 2 in 24 hours or abnormal appearance*
Baby's colour, alertness and tone	Normal skin colour; alert; good tone	Jaundiced worsening or not improving; baby lethargic, not waking to feed; poor tone
Weight (following initial post-birth loss)	If re-weighed not lost more than 10% of birth weight – see Weight Guidelines	Weight loss greater than 10%
Number of feeds in last 24 hours	At least 8 feeds in a 24 hour period*	Fewer than 8 feeds in last 24 hours*
Baby's behaviour during feeds	Generally calm and relaxed	Baby comes on and off the breast frequently during the feed, or refuses to breastfeed
Sucking pattern during feed	Initial rapid sucks changing to slower sucks with pauses and soft swallowing*	No change in sucking pattern, or noisy feeding (e.g. clicking)*
Length of feed	Baby feeds for 5 - 30 minutes at most feeds	Baby consistently feeds for less than 5 minutes or longer than 40 minutes
End of the feed	Baby lets go spontaneously, or does so when breast is gently lifted	Baby does not release the breast spontaneously, mother removes baby
Offer of second breast?	Second breast offered. Baby feeds from second breast or not, according to appetite	Mother restricts baby to one breast per feed, or insists on two breasts per feed
Baby's behaviour after feeds	Baby content after most feeds	Baby unsettled after feeding
Shape of either nipple at end of feed	Same shape as when feed began, or slightly elongated	Missshapen or pinched at the end of feeds
Mother's report on her breasts and nipples	Breasts and nipples comfortable	Nipples sore or damaged, engorgement or mastitis
Use of dummy / nipple shields / formula?	None used	Yes (state which) Ask why: Difficulty with attachment? Baby not growing? Baby unsettled?

\*This assessment tool was developed for use on or around day 5. If the tool is used at other times:

Wet nappies: Day 1-2 = 1-2 or more Day 3-4 = 3 or more, heavier Day 7+ = 6 or more, heavy	Stools: Day 1-2 = 1 or more, meconium Day 3-4 = 2 or more changing stools	Feed frequency: Day 1 at least 3-4 feeds Sucking pattern: Swallows may be less audible until milk comes in day 3-4
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UNICEF UK Baby Friendly Initiative 2010. Adapted from checklists used in the Oxford Radcliffe NHS Trust and East Lancashire Hospitals NHS Trust

## **Monitoring Infant Growth and Development**

The World Health Organization growth standards (2006) are the best reference for growth in the first 2 years as they reflect the growth of healthy breastfed babies.

The general guidelines for weight and growth measurements are:

- a baby loses 5-10% of birth weight in the first week and regains this by 2 weeks (Bertini et al, 2015; Noell-Weiss et al, 2011)
- minimum weight gain 20g per day up to 2-weeks of age and then 20-30g per day
- birth weight is doubled by 4 months and tripled by 13 months in boys and 15 months in girls (WHO, 2006)

It is normal for babies lose weight after they are born, no matter what or how they are fed. Weight loss in new-borns is expressed as a percentage of the birthweight. A maximum weight-loss of 7-10% in the first week is considered normal.

Exclusively breastfed babies are perfectly adapted to survive on the small volumes of colostrum they receive in the first few days. After this, their mothers begin to make large volumes of breastmilk which then provides all the fluids, energy and nutrients they need (Bertini et al, 2015).

Regardless of the percentage of weight loss, what's most important is for health care providers to determine what the overall clinical picture of the breastfeeding mother and baby is. For example, there is a significant difference between a 3-day old baby who has lost 10% of its birthweight and who is sleepy and not latching well and a 3-day old baby who has lost 10% and is feeding frequently and well (Grossman et al, 2012).

High amounts of IV fluids (e.g. with induction of labour or an epidural) given to the mother in labour/birth has also been associated with excessive weight loss in healthy, term, exclusively-breastfed, new born (Eltonsy et al, 2017; Watson et al, 2012).

Reliable signs of adequate milk intake in a healthy baby:

- Weight gain after the initial weight loss soon after birth and some growth in length and head circumference.
- Good skin colour and muscle tone (baby 'fits' into its skin).
- Baby is alert and active when awake and meeting their developmental milestones.
- Stool transition to from black meconium to yellow with a loose and seedy texture by day five. An increase in pale coloured urine production appropriate to the age of the baby.
- At least 8-12 feeds in 24 hours (including some feeds at night ) of varying times with periods of obvious gulping of milk, rapid sucking and a rise and fall in baby's throat as swallowing occurs.

## Managing excessive weight loss –

Use a Trust recommended assessment form to evaluate infant feeding. Abnormal findings trigger further actions:

Breastfeeding assessment tool: Neonatal							
How you and your nurse/midwife can recognise that your baby is feeding well				*please see reverse of form for guidance on top-ups post-breastfeed			
What to look for/ask about							
<b>Your baby:</b>	✓	✓	✓	✓	✓	✓	✓
Is not interested, when offered breast, sleepy (*A)							
Is showing feeding cues but not attaching (*B)							
Attaches at the breast but quickly falls asleep (*C)							
Attaches for short bursts with long pauses (*D)							
Attaches well with long rhythmical sucking and swallowing for a short feed (requiring stimulation) (*E)							
Attaches well for a sustained period with long rhythmical sucking and swallowing (*F)							
Normal skin colour and tone							
Gaining weight appropriately							
<b>Your baby's nappies:</b>							
At least 5-6 heavy, wet nappies in 24 hours							
At least 2 dirty nappies in 24hrs, at least £2 coin size, yellow and runny							
<b>Your breasts:</b>							
Breasts and nipples are comfortable							
Nipples are the same shape at the end of the feed as at the start							
Referred for additional breastfeeding support							
Date							
Midwife/nurse initials							
Midwife/nurse: If any responses not ticked: watch a full breastfeed, develop a care plan including revisiting positioning and attachment and/or refer for additional support. Consider specialist support if needed.							

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Plan	Weight Loss	Management details
1.	8%-10%	<ul style="list-style-type: none"> <li>❖ Recheck weights &amp; percentage calculations</li> <li>❖ Observe a full breastfeed – ensure effective positioning and attachment</li> <li>❖ Carry out a full feeding assessment (see assessment form)</li> <li>❖ Skin contact to encourage breastfeeding</li> <li>❖ Observe for change in frequency/amount of urine and stools</li> <li>❖ Arrange feeding support visit(s)</li> <li>❖ Reweigh in 48 hours. If weight increasing (aim 20g a day up to 2 weeks of age), continue to monitor closely and provide support.</li> </ul> <p><b>If no or minimal weight increase, move to management plan 2.</b></p>
2.	10.1%-12.4%	<p><i>Follow Management Plan 1, plus;</i></p> <ul style="list-style-type: none"> <li>❖ Provide ongoing feeding support (visit)</li> <li>❖ Engage with additional support e.g. community feeding teams or SJH</li> <li>❖ Use breast compression</li> <li>❖ For sleepy babies, consider 'switch nursing'</li> <li>❖ Express breastmilk after each feed and offer to baby by cup</li> <li>❖ Consider referral to GP if infection or other illness suspected</li> <li>❖ Weigh again in 24-48 hours.</li> </ul> <p><b>If no or minimal weight increase, move to management plan 3.</b></p>
3.	12.4%-14.9%	<ul style="list-style-type: none"> <li>❖ Refer to Children's ward for review by paediatrician to exclude underlying illness</li> </ul> <p><i>Follow Management Plan 2, plus;</i></p> <ul style="list-style-type: none"> <li>❖ Frequent breastfeeds and expressing, using hospital-grade breast pump</li> <li>❖ Carry out investigations to determine ongoing care.</li> <li>❖ If breastfeeding is ineffective &amp;/or insufficient EBM consider formula milk preparations via cup or NGT (preferred to bottle). Pace feeding must be used with all bottle feeds</li> <li>❖ Increase lactation through continued expressing (consider power pumping)</li> <li>❖ Reduce formula offered as breastmilk supply increase.</li> <li>❖ Weigh again in 24 hours. Continue to monitor weight twice weekly until clear trend towards birth weight demonstrated</li> </ul>
4	≥15%	<ul style="list-style-type: none"> <li>❖ Weight loss ≥15% is significant and will require readmission.</li> </ul>

To be used in conjunction with the assessment of maternal lactation, attachment and signs of effective milk transfer

Score	Definition	Action
A	Offered the breast, not showing feeding cues, sleepy	Full top up
B	Some interest in feeding (licking and mouth opening/head turning) but does not attach	Full top up
C	Attaches onto the breast but comes on and off or falls asleep	Full top up
D	Attaches only for a short burst of sucking, uncoordinated with breathing and swallowing and/or frequent long pauses	Half top up if the mother is available for next feed. The baby may wake early
E	Attaches well, long, slow, rhythmical sucking and swallowing – sustained for a short time with breasts not softened throughout	Half top up if mother is not available for next feed. If mother is available for next feed do not top up, and assess effectiveness of next feed.
F	Attaches well, long, slow, rhythmical sucking and swallowing – sustained for a longer time with breasts feeling soft following feed	No top up

Managing excessive weight loss continued:

- Infant weight loss is a late indicator of ineffective feeding
- A Datix must be completed for readmissions to the Children’s ward <28 days postnatal
- In the first few days after birth urates are normal bladder discharges. However persistent urates may indicate insufficient milk intake.
- Hypernatraemic dehydration is a rare but potentially fatal condition associated with feeding problems. Baby may present with reduced stools and urine output, prolonged or worsening jaundice, lethargy and significant weight loss >12.5%

Calculating weight loss:

Birth Weight – Current Weight = Weight Loss

$\frac{\text{Weight Loss}}{\text{Birth Weight}} \times 100 = \% \text{ weight loss}$

For example:

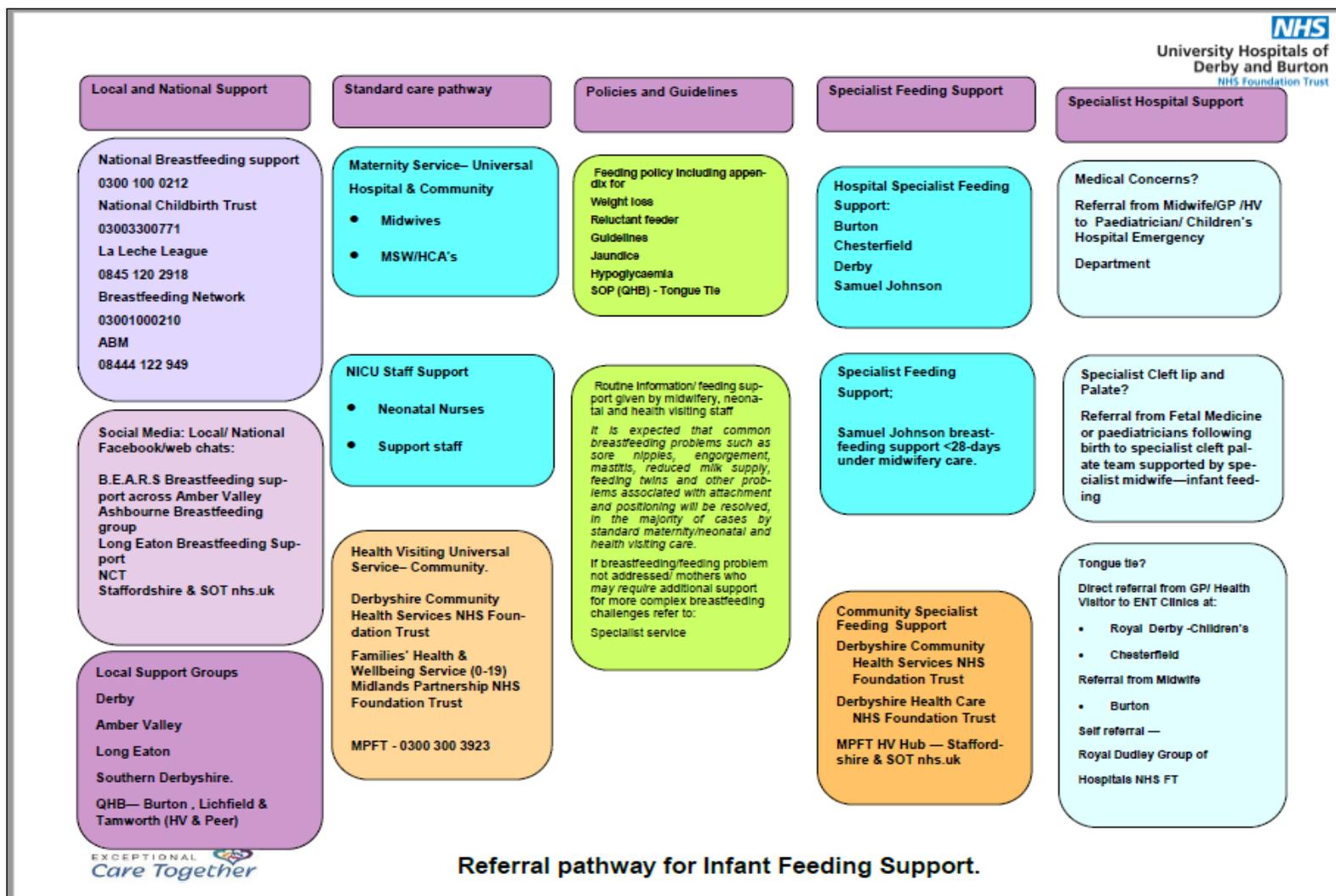
3430 (BW) – 3120 (CW) = 310 (WL)

$\frac{310 \text{ (WL)}}{3430 \text{ (BW)}} \times 100 = 9\%$

Weight loss should be documented in grams (g)

Appendix I

**Referral Pathway for Infant Feeding Support**



### **Formula Milk Feeding**

- The first bottle feed can be given while the mother holds her baby close in skin-to-skin and thereafter parents can be supported to recognise their baby's cues for food, love, comfort and communication. Supporting parents to hold their baby close during feeds, to look into their eyes and to make feeding an opportunity for bonding will encourage optimum development in their baby
- Bottle fed babies are very vulnerable to infection because they do not have access to the anti-infective properties in breastmilk, and because bottles and formula milk are a source of potential infection.
- Choosing an infant formula - The food that babies are given has a profound effect on their present and future health. They are using the food to grow and develop their bodies and brains at a rate faster than at any other time in their lives and they are doing this with only one type of food – milk. Exclusive breastfeeding gives a baby the best possible start; if a baby is not being exclusively breastfed, maximising the amount of breastmilk they receive is the next best option.

When a mother is 'mixed' feeding by breast and formula, or exclusively formula feeding, it is generally agreed that the most appropriate milk to use is 'first' milk, suitable from birth and sometimes called stage 1 or newborn milk. These formulas are required by law to provide sufficient macro and micro nutrients to support adequate growth, and they must all meet the same infant formula compositional standards.

- Formula feeding is associated with obesity and we know that, it is quite possible to over feed a baby who is bottle feeding. Keeping the teat in a baby's mouth and pushing it against their palate forces them to suck and swallow and is a practice so common we give it little thought. Taking a prescribed amount of formula and finishing the bottle are considered positives that will help the baby to grow. However, such practices can easily lead to overweight babies who in turn become overweight children. Given the opportunity to control the amount of food they take, healthy babies know when they are full and have very good appetite control.

The Baby Friendly standards require that parents who are formula feeding their baby be taught to notice their baby's signals that they are hungry and full and when they need to pause during a feed. This helps parents to learn to pace feeds appropriately, to avoid over feeding and to make feeding a much more pleasant experience for their baby.

UNICEF UK Responsive bottle feeding leaflet - <https://www.unicef.org.uk/babyfriendly/wp-content/uploads/sites/2/2019/04/Infant-formula-and-responsive-bottle-feeding.pdf>.

## NHS step-by-step guide to preparing a formula feed

Step 1: Fill the kettle with at least 1 litre of fresh tap water (don't use water that has been boiled before).

Step 2: Boil the water. Then leave the water to cool for no more than 30 minutes, so that it remains at a temperature of at least 70C.

Step 3: Clean and disinfect the surface you are going to use.

Step 4: It's important that you wash your hands.

Step 5: If you are using a cold-water steriliser, shake off any excess solution from the bottle and the teat, or rinse them with cooled boiled water from the kettle (not tap water).

Step 6: Stand the bottle on the cleaned, disinfected surface.

Step 7: Follow the manufacturer's instructions and pour the amount of water you need into the bottle. Double check that the water level is correct. Always put the water in the bottle first, while it is still hot, before adding the powdered formula.

Step 8: Infant formula

Loosely fill the scoop with formula powder, according to the manufacturer's instructions, and level it off using either the flat edge of a clean, dry knife or the leveller provided. Different tins of formula come with different scoops. Make sure you only use the scoop that comes with the formula.



Step 9: Holding the edge of the teat, put it on the bottle. Then screw the retaining ring onto the bottle.

Step 10: Cover the teat with the cap and shake the bottle until the powder is dissolved.

Step 11: It's important to cool the formula so it's not too hot to drink. Do this by holding the bottle (with the lid on) under cold running water.

Step 12: Test the temperature of the formula on the inside of your wrist before giving it to your baby. It should be body temperature, which means it should feel warm or cool, but not hot.

Step 13: If there is any made-up formula left after a feed, throw it away.

## Dos and don'ts of making up formula feeds

- Manufacturers' instructions vary as to how much water and powder to use, so it's important to follow them very carefully.
- Don't add extra formula powder when making up a feed. This can make your baby constipated or dehydrated. Too little powder may not give your baby enough nourishment.
- Don't add sugar or cereals to your baby's formula.
- Never warm up formula in a microwave, as it may heat the feed unevenly and burn your baby's mouth.

## Reducing the risk of infection

- Even when tins and packets of powdered infant formula are sealed, they can sometimes contain bacteria.
- Bacteria multiply very fast at room temperature. Even when a feed is kept in a fridge, bacteria can still survive and multiply, although more slowly.
- To reduce the risk of infection, it's best to make up feeds one at a time, as your baby needs them.
- Use freshly boiled drinking water from the tap to make up a feed. Don't use artificially softened water or water that has been boiled before.
- Leave the water to cool in the kettle for no more than 30 minutes. Then it will stay at a temperature of at least 70°C. Water at this temperature will kill any harmful bacteria. Remember to let the feed cool before you give it to your baby. Or you can run the bottle (with the lid on) under a cold tap.
- Don't use bottled water to make up formula feeds. Bottled water is not recommended for making up feeds, as it's not sterile and may contain too much salt (sodium) or sulphate.

## Documentation Control

<b>Reference Number:</b> <b>Mat/09:19/B5</b>	<b>Version: 6</b>		<b>Status: FINAL</b>	
Version / Amendment	Version	Date	Author	
	1	February 2000	Infant Feeding advisors	
	2	January 2006	K Payne R McLean Infant Feeding advisors	
	3	March 2010	K Payne R McLean Infant Feeding advisors	
	4	Sept 2014	K Payne Infant Feeding advisor	
	5	March 2015	K Payne Infant Feeding advisor	
	6	July 2019	K. Thompson - Infant Feeding Advisor	
<b>Intended Recipients:</b> All staff with responsibility for supporting women regarding infant feeding				
<b>Training and Dissemination:</b> Cascaded through lead midwives; Published on Intranet; NHS email circulation list; Training provided by infant feeding advisor				
<b>To be read in conjunction with:</b> Managing Hypoglycaemia in the Newborn Baby (H7) / Neonatal Jaundice (N6) Care of the Newborn (N5) / Babies Sharing their Mothers' Bed / Co-Sleeping (B7)				
Development / review of Guideline:	Katy Thompson – Infant Feeding Advisor			
Consultation with:	Maternity Guideline Group			
Approved By:	17/09/2019 Maternity Guidelines Group: Miss S Rajendran – Chair 21/10/2019 Maternity Development & Governance Committee/ACD – Miss S Raouf Director of Midwifery: Mrs. J Haslam 30/09/2019 Divisional Governance: Mr A Bali - Chair			
Implementation date:	22/04/2020			
Review Date:	September 2022			
Key Contact:	Cindy Meijer			