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northern neonatal network

Facilitating Delivery Room Cuddles for babies who are receiving Neonatal Care

A FRAMEWORK FOR PRACTICE



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The working group wish to thank Vicky Goldsborough for allowing us to use the photograph of the cuddle she had in the delivery room with her baby, and Sarah Farrow for giving us the opportunity to share her words about what this means to her as a parent.

Executive Summary

1. This framework was developed as an action point, following the review of a serious incident (SI) which occurred within the region.
2. This document has been produced by a multi-disciplinary working group within the Northern Neonatal Network, in collaboration with parent representatives.
3. It has been produced in light of evolving practices facilitating first cuddles in the delivery room even where the baby is in receipt of high dependency (HD) or intensive care (IC). In this situation, there must be agreement between the obstetric and neonatal teams that the safety of both mother and baby can be maintained.
4. Management of baby in delivery suite should enhance the baby friendly approach and all efforts should be made to promote close and loving relationships and parental well-being.
5. There are specific circumstances under which the facilitation of delivery room cuddles is not recommended;
 - Where the baby has an umbilical catheter insitu
 - If there is a 'difficult airway' or airway malformation precluding safe management
 - Any condition that needs immediate attention
 - Where there is ongoing respiratory distress despite the presence of respiratory support*
 - Concern for maternal condition/mother under GA/parental decline

***If a baby requires respiratory support in the delivery room, it is important to consider the type of respiratory support whilst offering cuddles to parents. If the infant is receiving CPAP/PEEP, please ensure that CPAP is delivered via an appropriate interface. During cuddles, mask CPAP/PEEP may be associated with significant leak and hence ineffective CPAP delivery.**

6. Facilitation of the delivery room cuddle should reflect the wishes of the family who should be fully informed about the plan, risks and benefits.
7. When delivery room cuddles are facilitated, appropriate safety measures should be taken.
8. The process should be informed, supported by consultation and implemented in partnership with the obstetric and neonatal professionals present.

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I think for me, the thing was I freaked out when I got pregnant this time, because I didn't want a repeat of last time. I didn't get to hold my baby for eight days after he was born and that was not an option for me this time – I don't want him taken away – and so I got really passionate about it at that point, and that's been my driver and why I've got involved. I mean, I didn't even know it was a thing until I've heard Paul Clarke speak, I just assumed 'oh, they always have to take the baby away'...and then when I found out there was another option, I was like, well...why, why was that not offered to me? Why can't everyone have that?

So, speaking to the obstetricians, they were like...'well we'll always let the baby, you know, stay with you if it's safe to do so...' and I was like, you know 'it was safe to do so last time, from what I understand. But. It didn't happen...'

So again, why I wanted to get involved in trying to push that a little bit.

Sarah Farrow, Parent

Introduction

When an infant requires neonatal care in the delivery room, this can bring both anxiety and trauma to what should have been an eagerly anticipated moment for new parents. Neonatal teams who are responsible for the provision of such care are faced with the challenge of stabilising the infant within a suitably warm environment and providing parents with the opportunity to see, touch or hold their baby before they are transferred to the NICU for ongoing treatment.

The concept of 'delivery room cuddles' is one which has gathered momentum in recent years ^{1,2,3}. Many neonatal teams recognise that through facilitating cuddles prior to the baby's transfer, there is an opportunity to embrace the experience for both parents and babies that only the moment of birth brings. However, whilst the benefits of delivery room cuddles are well documented, it must be acknowledged that this is an intervention which must be carefully considered, planned and executed. Studies have supported this as a safe and feasible concept ^{1,2,3}.

Remit

The purpose of this framework is to assist decision making prior to and/or at the time of birth, relating to the facilitation of cuddles in the delivery room. It is specifically in relation to babies who are in receipt of neonatal care that is considered to be high dependency or intensive and is being overseen by the neonatal team. Therefore, this relates to both preterm and term infants.

The Framework for Practice is aimed primarily at professionals but will be freely available via the Northern Neonatal Network website. We have included guidance designed to assist health professionals in communicating with parents about the issues and information contained within this document. We hope that the Framework will be incorporated into local guidelines, to ensure consistency of practice within units and acknowledgement of the importance of individualised care for families.

Definitions

Within the document, **parents** refers to the birthing person and their partner.

Cuddle refers to the act of holding the baby close. In view of the fact that these infants are high risk, we have not advocated skin to skin contact as thermoregulation is a key aspect of stabilisation.

Facilitating Delivery Room Cuddles for infants who are receiving Neonatal Care

This framework has been developed by a multi-disciplinary working group within the Northern Neonatal Network following a review of a Serious Incident which occurred within the region.

1. Suggested process for a safe delivery room cuddle

This guidance has been developed in relation to the facilitation of delivery room cuddles for babies who are receiving ongoing neonatal care.

In this situation there must be agreement between the obstetric and neonatal teams that the safety of both mother and baby can be maintained.

The process is divided into four phases;

1. Antenatal/pre-birth phase
2. Birth & Stabilisation
3. Assessing Suitability for a delivery room cuddle
4. The cuddle

1a. Antenatal/pre-birth phase

Antenatal preparation will depend on the gestation and anticipated clinical condition of the baby. However, the same basic principles apply for all babies and centre on planning and preparation of the environment, equipment and team (including the family).

Where possible antenatal discussion with the family should take place including the discussion of potential delivery room cuddles. As part of this framework we have developed a Patient Information Leaflet that could be used as part of this discussion (appendix 1)

All teams involved in the care of both the mother and baby should work together to ensure that equipment can be moved around the delivery room to facilitate delivery room cuddles. This should ideally be discussed and planned during a pre-delivery 'huddle'. This would include the assignation of roles and preparation of the equipment and environment.

1b. Birth and stabilisation

The anticipation and/or expectation of a delivery room cuddle should not alter the standard stabilisation process of a baby using the Newborn Life Support algorithm. Only once a baby has been appropriately assessed and stabilised can the suitability for a delivery room cuddle be established.

1c. Assessing suitability for a delivery room cuddle

This step is crucial to ensuring the safety of babies. The baby should be assessed as being stable with objective parameters which should include confirmation of a secure airway (either maintained spontaneously or secured with an endotracheal tube), acceptable oxygen saturations, heart rate and temperature. The team should collaboratively agree that suitability criteria are met.

There are certain conditions whereby a delivery room cuddle is contraindicated.

CONTRAINDICATIONS TO DELIVERY ROOM CUDDLES
The presence of an umbilical catheter
Any baby who has a 'difficult airway' or airway malformation
The presence of any condition which requires immediate intervention not available in the delivery room
Where there is ongoing respiratory distress despite the presence of respiratory support*
Concern for maternal condition/mother under General Anaesthetic/Parents decline

***If a baby requires respiratory support in the delivery room, it is important to consider the type of respiratory support whilst offering cuddles to parents. If the infant is receiving CPAP/PEEP, please ensure that CPAP is delivered via an appropriate interface. During cuddles, mask CPAP/PEEP may be associated with significant leak and hence ineffective CPAP delivery.**

The final decision with regards to clinical stability remains with the supervising clinician. There may also be maternal conditions which mean that a delivery room cuddle is not appropriate. Neonatal teams should be guided by the obstetric and midwifery teams with regards to this. Where a mother is unable to have a delivery room cuddle, a delivery room cuddle with a birthing partner may be appropriate if agreed with the parents.

1d. Cuddle time

During the cuddle is very important that there is clear communication between the team with a nominated team lead who will maintain situational awareness and a nominated team member to ensure airway support is maintained throughout.

In order to prioritise safety during the cuddle, specific elements must be considered in relation to the personnel present and the infant's respiratory support, thermoregulatory management and physiological monitoring. These are discussed in the safety section of this framework.

During the cuddle time encourage the family to take photographs and videos. Try to reassure the family. The duration of a cuddle will depend on the clinical situation.

2. Safety Aspects during Delivery Room Cuddles

During delivery room cuddles, this framework sets out specific recommendations in relation to:

Personnel
Respiratory Support
Physiological Monitoring
Thermal Care

2a. Personnel

- Delivery room cuddles for a preterm baby or one requiring ongoing intervention such as respiratory support, should be monitored by an experienced clinician.
- An experienced clinician will include a member of the maternity or paediatric/neonatal teams who is a Newborn Life Support provider.
- We would not expect an anaesthetic team to oversee delivery room cuddles unless this is formally agreed with the anaesthetic team as part of local standard operating procedures.
- The clinician monitoring the delivery room cuddles should not have any other tasks to do at that time. They should focus solely on overseeing the delivery room cuddles to ensure that safety is maintained throughout.
- If there is a clinical concern about the mother or baby at any time, delivery room cuddles may need to be stopped. A senior clinician should make this decision.

2b. Respiratory support

- Sufficient gas supply must be available when a baby receiving respiratory support has delivery room cuddles. Gas cylinders should be checked before delivery room cuddles are implemented.
- Ensure that all cables such as electrical leads, gas piping and T-piece circuits are long enough to provide ongoing respiratory support at all times during delivery room cuddles. If they are not long enough, delivery room cuddles should not be implemented if the baby is receiving respiratory support.
- Any respiratory intervention that is ongoing on the resuscitaire (including oxygen, non-invasive respiratory support, or mechanical ventilation through an endotracheal tube) should be continued at all times during the delivery room cuddles process.
- If a baby require respiratory support in the delivery room, this must be delivered through an appropriate interface such as via CPAP driver or endotracheal tube, and not through 'holding' a mask while manually maintaining an airway.
- A clinician providing supervision during the cuddles must be experienced in neonatal airway management.
- If a baby has an endotracheal tube (ET) in place, the position of the ET at the lips should be checked immediately before and after delivery room cuddles to ensure that it has not moved during the process.

2c. Physiological monitoring

- Any baby receiving respiratory intervention should have continuous oxygen saturation and heart rate monitoring during delivery room cuddles.
- If a baby has an ET in place, we recommend that an end-tidal carbon dioxide detector is placed between the ET and the T-piece circuit to provide visual monitoring of gas exchange during delivery room cuddles.

2d Thermoregulatory measures

- A hat should be provided for all babies who have delivery room cuddles. This should be put on before the baby received delivery room cuddles.
- Local guidelines should be followed regarding the use of plastic wraps/bags for preterm or growth restricted infants. These should be applied on the resuscitaire (whilst the baby is under a radiant heater) and before a baby receives delivery room cuddles.
- A preterm or growth-restricted baby's temperature should be checked before the baby receives delivery room cuddles. If the temperature is lower than 36.5°C, an additional thermoregulatory intervention should be considered to elevate the baby's temperature before they receive delivery room cuddles.
- For preterm or growth-restricted babies, an exothermic mattress ('trans warmer') could be used in conjunction with the plastic wrap during the delivery room cuddles. The baby's temperature should be monitored prior to the cuddle, and once completed.
- The baby's temperature should be checked again in the delivery room after delivery room cuddles and before transfer to the neonatal unit. If the temperature is <36.5°C, interventions should be put in place to elevate the temperature.

Suggested Process of a Delivery Room Cuddle

Antenatal

- **Perinatal optimisation:** antenatal steroids, magnesium sulphate
- Anticipate potential delivery complications or contra-indications to cuddle
- **Prepare equipment**
- **Prepare team:** assign roles, talk through process of stabilisation & cuddle, discuss with family
- **Prepare environment:** ambient temperature $> 26^{\circ}\text{C}$, minimise drafts

Birth & stabilisation

- Optimal cord clamping
- Ensure thermoregulation (hat, bag, radiant heater)
- **Stabilise as per NLS**
- Establish definitive respiratory support (intubate & ventilate, nasal CPAP)
- Administer surfactant as indicated
- Establish pulse oximetry, check temperature, site OGT/NGT

Assess suitability

- ✓ Saturations $> 90\%$ & potential to increase oxygen & ventilatory pressures
- ✓ Stable heart rate
- ✓ Temperature $\geq 36.7^{\circ}\text{C}$. Consider radiant heat/bag/heated mattress
- ✓ Stable non-invasive interface or secure ETT
- ✓ Continuous confirmation of tube position if intubated
- **Contraindications**
- **X Presence of an umbilical catheter**
- **X Difficult airway or airway malformation**
- **X Condition needing imminent intervention**
- **X Concern for maternal condition /General Anaesthetic/parents decline**

Cuddle time

- Ensure adequate power & gases
- Move baby as close as possible to parent before transfer from resuscitaire/incubator
- Good communication
 - team leader to supervise
 - nominated airway team member
- Place baby on parents chest-maintain thermoregulation
- Continue optimal respiratory support
- Continuous monitoring throughout
- Act on concerns promptly
- Encourage photographs & videos

Parent Information Leaflet

The working group has developed an information leaflet which could be given to parents during the antenatal discussion:

<https://www.nor-net.org.uk/files/pdf/drc-pil-1-1.pdf>

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