Royal Hospital for Women (RHW)
BUSINESS RULE
COVER SHEET

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SUMMARY	To initiate early diagnosis and management of the unwell neonate outside of Newborn Care Centre
Key Words	Observations, Blood Glucose, Temperature, Heart Rate, Respirations, Neonate, CERS, REACH, Assessment

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Neonatal Observations Outside Newborn Care Centre

RHW CLIN097

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This Clinical Business Rule (CBR) is developed to guide safe clinical practice at the Royal Hospital for Women (RHW). Individual patient circumstances may mean that practice diverges from this Clinical Business Rule. Using this document outside RHW or its reproduction in whole or part, is subject to acknowledgement that it is the property of RHW and is valid and applicable for use at the time of publication. RHW is not responsible for consequences that may develop from the use of this document outside RHW.

Within this document we will use the term woman, this is not to exclude those who give birth and do not identify as female. It is crucial to use the preferred language and terminology as described and guided by each individual person when providing care.

1 BACKGROUND

To initiate early diagnosis and management of the unwell neonate outside Newborn Care Centre.

2 RESPONSIBILITIES

2.1 Staff

2.1.1 Medical – to diagnose and manage unwell neonate's outside of Newborn Care Centre. To prescribe treatment as indicated. To respond to any Clinical Emergency Response System (CERS) related activity for the neonate.

2.1.2 Nursing/ Midwifery – to identify and manage unwell neonate's outside of Newborn Care Centre. To perform observations on the neonate as indicated. To initiate CERS call for an unwell neonate falling outside of Standard Neonatal Obersvation Chart (SNOC) parameters. To administer prescribed treatment. To support and educate the parent/ carer/ family members.

3 PROCEDURE

3.1 Equipment

- Thermometer
- Stethoscope
- Hand-held glucometer
- Pulse Oximeter

3.2 Clinical Practice

- Assess temperature, heart rate (HR) and respiration rate (RR) at time of initial examination of the neonate in the birth environment.
- Assess temperature, HR and RR on admission to postnatal ward.

- Complete oxygen saturation (SpO2) screening between 4-24 hours of age. Refer to Pulse Oximetry Screening of Newborns CBR.
- Activate a CERS call if observations fall within the neonatal CERS criteria as per SNOC
  - Refer to Recognition and Management of Neonate who is Clinically Deteriorating outside of Newborn Care Centre CBR
- Review and assess neonate at any time if parents or staff are concerned about their wellbeing.
  - Parents/ carers/ family members can activate a 'REACH' call for a clinical review at any time during their admission
- Cease further observations if the neonate has no known risk factors, unless there are signs of deterioration.
- Continue observations for neonates with risk factors as listed below
- Refer to 'Observation of the Neonate' flowchart (Appendix A) attached to bedside notes in postnatal ward to reinforce policy.

3.2.2 Neonate with Risk Factors

- Risk factors can include but are not limited to:
  - Meconium stained liquor
  - Maternal fever in labour ≥ 38^0C
  - Maternal prolonged rupture of membranes > 18hrs
  - Low Apgar score (<5 at 1 minute and/or <7 at 5 minutes)
  - Maternal known group B streptococcus (GBS) carrier and received either no intrapartum antibiotics, or <4 hours intravenous (IV) antibiotics prior to birth
  - Mother had a previous neonate with GBS sepsis

• Repeat observations every 4 hours for 24–48 hours if within normal range as per SNOC.
• Alert Neonatal team if observations are outside the normal range as per SNOC.
• Cease observations after 24 hours if within normal range as per SNOC.
  - Exception; neonates under GBS observations are to continue until 48 hours, and then cease if within normal range as per SNOC
  - At least 24 hours observations in hospital, consider discharge and continue observations 24-48 hours at home if the family has Midwifery in the Home (MiTH) follow-up

3.2.3 Neonate at Risk of Hypoglycaemia

- Risk factors include but are not limited to:
  - Neonate of diabetic mother (gestational and pre-gestational)
  - Small for gestational age < 2.5kgs
  - Large for gestational age > 4.5kgs

• Perform blood glucose level (BGL), temperature, HR and RR at two hours of age.
• Assess temperature, HR and RR on admission to postnatal ward.
• Repeat observations every 3 hours for 24 hours.
• Perform BGL every 3 hours for 24 hours, prior to neonatal feed.
• Refer to Hypoglycaemia in a Neonate - Monitoring and Management of at Risk Neonate CBR if BGL is outside normal range as per SNOC.
• Cease observations after 24 hours if within normal range and after consultation with neonatal team.

3.2.4 Neonate at Risk of Subgaleal Haemorrhage following Assisted Vaginal Birth

• Assess temperature, HR, RR, colour and scalp observations at 1, 2, 4, 6, 8 and 12 hours of age, as per SNOC.
• Refer to Observation of the Neonate following Instrumental Delivery- SESLHDPR/414 for additional information.

3.2.5 Neonate at Risk of Withdrawing from Opioids/Non-opioids

• Commence Neonatal Abstinence Score (NAS) at 2 hours of age.
• Complete the NAS every 4 hours, 30-60 minutes after a feed.
• Refer to Neonatal Withdrawal and Intoxication Syndrome - Management CBR.

3.2.6 Neonate at Risk of Withdrawing from Selective Serotonin Reuptake Inhibitor (SSRI) Antidepressants

• Commence NAS at 2 hours of age.
• Complete the NAS every 4 hours, 30-60 minutes after a feed.
• Refer to Antidepressants in Pregnancy - Neonatal Observations and Interventions LOP

3.2.7 Neonate who is Readmitted from Home, whose Mother is at of Risk of Sepsis

• Assess temperature, HR and RR on admission and every 4 hours for a minimum of 48 hours, or until discharge home.
• Ensure neonatal team review soon after readmission and alert neonatal team if observations are outside the normal range as per SNOC.

3.3 Documentation

- Standard Neonatal Observation Chart
- Neonatal Abstinence Score chart
- Neonatal Care Plan
- eMR
- eRIC

3.4 Education Notes

- Initiating skin to skin contact and first breastfeed as soon as possible after birth reduces neonatal hypothermia and hypoglycaemia.
- Neonates with early-onset GBS disease generally present with respiratory distress, apnoea, or other signs of sepsis within the first 24–48 hours of life. The most common clinical syndromes of early-onset disease are sepsis and pneumonia; less frequently, early-onset infections can lead to meningitis.

3.5 Abbreviations

CERS	Clinical Emergency Response System	SNOC	Standard Neonatal Observation Chart
HR	Heart Rate	RR	Respiration Rate

SpO_2	Oxygen Saturation	REACH	Recognise, Engage, Act, Call, Help
GBS	Group B Streptococcus	IV	Intravenous
MiTH	Midwifery in the Home	BGL	Blood Glucose Level
NAS	Neonatal Abstinence Score	SSRI	Selective Serotonin Reuptake Inhibitor

3.6 Related Policies/procedures

- RHW LOP- Antidepressants in Pregnancy – Neonatal Observations and Interventions
- RHW LOP- Neonatal Withdrawal and Intoxication Syndrome - Management
- RHW LOP- Recognition and Management of Neonate who is Clinically Deteriorating Outside of Newborn Care Centre
- RHW LOP- Hypoglycaemia in a neonate – monitoring and management of at risk neonate
- RHW LOP- Pulse Oximetry Screening of Neonates
- RHW CBR- Group B Streptococcus (GBS) Sepsis – Monitoring and Management of a Neonate
- RHW CBR- REACH Recognise, Engage, Act, Call, Help is on the way
- NSW Health Policy Directive Recognition and management of patients who are deteriorating PD2020_018
- Australian Commission on Safety and Quality in Health Care - Sepsis Clinical Care Standard Sepsis Clinical Care Standard 2022 (safetyandquality.gov.au)
- CEC- Standard Neonatal Observation Chart Standard Neonatal Observation Chart
- SESLHD- Observation of the Neonate following Instrumental Delivery- SESLHDPR/414
- SESLHD - Management of the Deteriorating NEONATAL inpatient- SESLHDPR/340

3.7 References

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4 ABORIGINAL HEALTH IMPACT STATEMENT DOCUMENTATION

- Considerations for culturally safe and appropriate care provision have been made in the development of this Business Rule and will be accounted for in its implementation.
- When clinical risks are identified for an Aboriginal and/or Torres Strait Islander woman or family, they may require additional supports. This may include Aboriginal health professionals such as Aboriginal liaison officers, health workers or other culturally specific services

5 CULTURAL SUPPORT

- For a Culturally and Linguistically Diverse CALD woman, notify the nominated cross-cultural health worker during Monday to Friday business hours
- If the woman is from a non-English speaking background, call the interpreter service: NSW Ministry of Health Policy Directive PD2017_044-Interpreters Standard Procedures for Working with Health Care Interpreters.

6 NATIONAL STANDARDS

- Standard 1 Clinical Governance
- Standard 2 Partnering with Consumers
- Standard 3 Preventing and Controlling Infections
- Standard 5 Comprehensive Care
- Standard 6 Communicating for Safety
- Standard 8 Recognising and Responding to Acute Deterioration

7 REVISION AND APPROVAL HISTORY

Date	Revision No.	Author and Approval
21/5/08	1	Neonatal Clinical Committee
June 2008	1	Obstetrics Clinical Guidelines Group
5/6/08	1	Approved Patient Care Committee
		Previously titled *Neonatal Observations Guideline*
31.1.17	2	Reviewed and Endorsed Maternity Services LOPs
16.2.17	2	Approved Quality & Patient Care Committee
14.8.18	3	Reviewed and Endorsed Maternity Services LOPs
August 2019	4	PACE changed to CERS
19.09.2024	5	R Jackson (NE Neonatal Services), C Byron (CME Postnatal Ward), S Tapawan (CMO Neonatal Services)
21.10.2024	6	RHW BRGC

Appendix A OBSERVATION OF THE NEONATE

WHEN
- ✓ At initial examination of neonate
- ✓ On admission to postnatal ward
- ✓ Neonatal O2 sats 4-24 hrs of age
- ✓ Continue observations only if **risk factors exist**
- ✓ Document Standard Neonatal Observation Chart (SNOC)
- ✓ **If outside normal range alert paediatric team**

→ NORMAL RANGE
(As per SNOC)
Temperature: 36.5-37.5ºC
RR: 30-60/min
HR: 110-160bpm

RISK OF SEPSIS AND RESPIRATORY DISTRESS
- ➢ Meconium stained liquor
- ➢ Prolonged ruptured membranes (>18hrs)
- ➢ Maternal fever in labour
- ➢ Low Apgar's (<5 at 1min or <7 at 5min)

→
- ➢ 4 hourly temp, HR, RR for 24 hours
- ➢ Review by midwife after 24hrs and cease if normal

RISK OF GBS SEPSIS
- ▪ GBS pos mother, no intrapartum IV antibiotics or < 4hrs IV antibiotics prior to birth
- ▪ Unknown or neg GBS mother with additional risk factors e.g. <37/40, ROM >18 hrs, fever

→ 4 hourly temp, HR, RR for **48 hour**
At least 24 hrs in hospital, consider 24-48 hrs at home, if MiTH follow-up

RISK OF GBS SEPSIS
- ▪ Mother had a previous neonate with GBS sepsis

→
- ▪ 4 hourly temp, HR, RR for **48 hours**
- ▪ If observations abnormal => paediatric team review, FBC, cultures and IV antibiotics

RISK OF HYPOGLYCAEMIA
- Low birth weight (< 2500gm)
- High birth weight (> 4500gm)
- Mother with diabetes (gestational and pregestational)

→
- 3 hourly temp, HR, and RR
- 3 hourly pre-feed BGL
- Review by paediatric team after
- 24 hrs and cease if normal

RISK OF SUBGALEAL HAEMORRHAGE
- ○ Assisted Vaginal Birth

→
- ○ At 1, 2, 4,6, 8 and 12 hours of age
- ○ Assess temp, HR, RR and scalp observations as per SNOC
- ○ Review by midwife after 12 hours and cease if normal

RISK OF WITHDRAWAL
- Neonate at risk of withdrawal from maternal opioids

→
- 4 hourly NAS scoring 30-60 mins after neonatal feed

RISK OF WITHDRAWAL
- Neonate at risk of withdrawal from SSRI's

→
- 4 hourly NAS scoring 30-60 mins after neonatal feed

RISK OF SEPSIS
- ❖ Neonate readmitted from home whose mother is at risk of sepsis

→
- ❖ 4hourly temp, RR, HR, ≥ 48 hours or until discharge
- ❖ Paediatric team review on admission