

ADMISSION TO NEONATAL UNIT (NNU)

- There should be good clinical reasons for admission to NNU
- Avoid unnecessary separation of mother and baby as it affects maternal bonding

CRITERIA FOR ADMISSION FROM LABOUR WARD OR POSTNATAL WARD

Discuss need for admission with senior medical staff

- Clinical condition requiring constant monitoring, ≤ 34 wk or birth weight < 1800 g (follow local guidelines for gestation and birth weight limits)
- Respiratory distress or cyanosis
- Apnoeic or cyanotic attacks
- Grade 1, 2 or 3 hypoxic ischaemic encephalopathy (HIE)
- Jaundice needing intensive phototherapy or exchange transfusion
- Major congenital abnormality likely to threaten immediate survival
- Seizures
- Inability to tolerate enteral feeds with vomiting and/or abdominal distension and/or hypoglycaemia (blood glucose < 2.6 mmol/L)
- Suspicion of sepsis
- Small for gestational age (birth weight $< 2^{\text{nd}}$ centile) and hypoglycaemic or unable to tolerate feeds
- Mother admitted to ITU

Observe on the postnatal wards

- Well baby birth weight > 1800 g or gestation > 34 weeks
- Babies < 34 weeks gestation or < 1800 g birth weight who have been observed on NICU and do not have problems with feeding, hypoglycaemia or hypothermia
- Rhesus disease not likely to require exchange transfusion
- Infants of diabetic mothers not requiring IV glucose
- Babies whose mothers have hyperthyroidism
- Babies who required Naloxone for reversal of maternal opiates
- Babies with non-life threatening congenital abnormalities
- Asymptomatic / mildly symptomatic infants with a history of maternal drug misuse

Procedure

- Deal with any immediate life-threatening clinical problems (e.g. airway, breathing circulation and seizures)
- Show baby to parents and explain reason for admission to NNU
- Inform NNU nursing staff that you wish to admit a baby, reason for admission and clinical condition of baby
- Inform middle-grade medical staff/consultant
- Ensure baby name labels present
- Document relevant history and examination
- Complete problem sheets and investigation charts (~~follow local guidelines~~ **as per guidelines for gestation**)
- Measure and plot birth weight, head circumference and length on growth chart
- Measure admitting temperature
- If preterm < 32 weeks or unwell, check blood glucose
- Measure blood pressure using non-invasive cuff
- Institute appropriate monitoring and treatment in conjunction with nursing and senior medical colleagues

Investigations

Choice depends on initial assessment and suspected clinical problem

Baby <28 weeks/1000 g weight

- FBC
- Blood culture
- Blood glucose
- Blood gases
- Blood group and Coombs' test
- Clotting screen for infants <27 weeks' gestation

Unwell babies

- FBC
- Blood culture
- Blood glucose
- Blood gases
- If suspicion of sepsis: lumbar puncture and urine from suprapubic aspirate (SPA) or catheter sample and chest x-ray, particularly if respiratory symptoms

IMMEDIATE MANAGEMENT

- Evaluation of infant, including full clinical examination
- Define appropriate management plan and procedures and perform as efficiently as possible to ensure baby is not disturbed unnecessarily
- Aim for examination and procedures to be completed within 1 hr of admission
- If no contraindications, unless already administered, give Vitamin K – See **Vitamin K** guideline
- If antibiotics appropriate, ensure prompt administration
- Senior clinician to update parents as soon as possible but certainly within 24 hr and document discussion in notes

Respiratory support

- If required, takes priority over other procedures
- include incubator oxygen, continuous positive airway pressure (CPAP) or ventilatory support

Intravenous access

- If required, IV cannulation and/or umbilical venous catheterisation (UVC) – See appropriate guideline in **Practical procedures**

MONITORING

Use minimal handling

- Cardio-respiratory monitoring through skin electrodes
- Pulse oximetry. Try to maintain saturation 92–95% (follow local guidelines)
- Transcutaneous probe for T_cPO_2/T_cPCO_2 , if available
- Temperature
- Blood glucose
- If ventilated, umbilical arterial catheterisation/peripheral arterial line for monitoring arterial blood pressure and arterial blood gas – See appropriate guideline in **Practical procedures**