

Date: 10/01/2019

FREEDOM OF INFORMATION REQUEST 014526 - Group B Strep guideline

My understanding is that the guideline on group B Strep has recently been updated/is currently being updated. If the guideline has been finalised, please would you send me a copy?

If it is still being updated, could you please advise when it is due to be published?

Please see below

## **THE DUDLEY GROUP NHS FOUNDATION TRUST GROUP B STREPTOCOCCAL DISEASE GUIDELINE**

### **1. GUIDELINE SUMMARY**

Group B streptococcus (*GBS*) is recognised as the most frequent cause of severe early-onset (at less than 7 days of age) infection in newborn infants.

Intrapartum Antibiotics Prophylaxis (IAP) is known to significantly reduce the risk of Early onset GBS disease in the Neonates

### **2. GUIDELINE DETAIL**

#### **3. PREVIOUS PREGNANCY**

- ☑ Offer IAP to all women with previous baby affected by GBS disease
- ☑ Offer the choice of IAP or Vaginal swab at or after 35/40 (32/40 in twins) to all women with GBS detected in previous pregnancy
  - o If the swab is negative IAP are not indicated

#### **4. CURRENT PREGNANCY**

- ☑ If GBS is detected on vaginal swab (including early pregnancy)
  - o The midwife from Antenatal Clinic (ANC) or Triage will notify the woman of the result by letter with the information leaflet enclosed.
  - o The result should be documented in the Clinic Held Summary Sheet.
  - o IAP should be offered when labour is established
- ☑ If GBS is detected on Urine culture
  - o If growth >105 cfu/ml, the woman should be offered oral antibiotics for treatment of UTI
  - o The midwife from Antenatal Clinic (ANC) or Triage will notify the woman of the result by letter with the information leaflet enclosed.
  - o The result should be documented in the Clinic Held Summary Sheet.
  - o IAP should be offered when labour is established

#### **5. PRELABOUR RUPTURE OF MEMBRANES (PROM) AT TERM**

- ☑ Immediate induction of labour should be offered to all women with *positive* GBS status or previous baby affected by EOGBS disease
- ☑ IAP should be commenced as soon as possible (even before labour is established, or if the woman is having a planned Caesarean Section)
- ☑ Women with *negative* GBS status should be offered IOL at 24 hours in line with the 'Prelabour rupture of membranes with preterm and term pregnancies guideline'.

## 6. PRETERM PRELABOUR RUPTURE OF MEMBRANES (PPROM)

- ☑ All women who had PPROM should be offered IAP when labour is established or induced regardless of their GBS status
- ☑ In GBS positive women who have PPROM, it might be beneficial to expedite the birth (induction of caesarean section) after 34 weeks.
- ☑ Timing of birth should be decided between the woman and the consultant in charge of her care

## 7. PRETERM LABOUR

- ☑ Offer all women in preterm labour IAP regardless of their GBS status or rupture of membranes
- ☑ IAP is not indicated for women having planned CS with intact membranes regardless of gestation or GBS status

## 8. PLACE OF BIRTH

- ☑ Women who are otherwise low risk can be offered birth on the MLU
- ☑ IAP should still be offered when labour is established
- ☑ If a GBS positive woman presents with PROM (Pre labour rupture of membranes) to the MLU she should be offered immediate IOL (see paragraph 3 of this guideline) and transferred care to the consultant unit
- ☑ Women who are planning home birth should be counselled regarding the benefit of IAP and advised to give birth in the hospital MLU

## 9. INTRAPARTUM CARE

- ☑ GBS carrier status is not an indication for CTG in labour
- ☑ IV antibiotics should be administered as soon as possible when labour is established or if the woman was induced for PROM/PPROM
- ☑ Water birth is not contraindicated for women who are GBS positive. However, the woman should be counselled about the need for IAP administration outside the pool.
- ☑ The cannula should be removed, before the woman goes into the birthing pool and a new one inserted for the next dose if required

## 10. INTRAPARTUM ANTIBIOTICS PROPHYLAXIS

There is evidence that Benzylpenicillin levels in cord blood exceed the minimum inhibitory concentration for GBS as early as 1 hour after maternal administration  
Early administration of IAP significantly reduces the risk of EOGBS disease in the neonates

### INDICATIONS

- ☑ GBS positive in this pregnancy
- ☑ Previous baby affected by EOGBS disease
- ☑ GBS positive in previous pregnancy if no negative vaginal swab at or after 35 weeks (32 for twins)
- ☑ Preterm labour
- ☑ PPROM

### CHOICE OF ANTIBIOTICS

- ☑ Benzylpenicillin is the first line for IAP. 3g loading dose followed by 1.5g every 4 hours until the birth of the baby
- ☑ For women who have non-anaphylactic reaction to Penicillin, Ceftriaxone 1g (once every 24 hour)
- ☑ For women who have severe reaction to Penicillin: Vancomycin 1g every 12 hours till the birth of the baby. *Levels should be taken one hour before the third dose.*
- ☑ If **any woman** develops pyrexia in labour (Temp >37.5 °C on two occasions 30 minutes apart or one Temp >38 °C) or suspected chorioamnionitis, Broad spectrum antibiotics should be administered as per the trust guidelines (Ceftriaxone and Metronidazole)

## 11. NEONATAL CARE

Please see neonatal guideline (**Treatment of Infection (Neonatal) Guidelines**)

### RISK FACTORS FOR INFECTION

- ☒ Mother given parenteral antibiotics for confirmed or suspected invasive bacterial infection (such as septicaemia) at any time during labour, or in the 24 hr periods before and after the birth (this does not refer to intrapartum antibiotic prophylaxis) **RED FLAG**
- ☒ Suspected or confirmed infection in a co-twin **RED FLAG**
- ☒ Invasive group B streptococcal infection in a previous baby
- ☒ Maternal group B streptococcal colonisation, bacteriuria or infection in the current pregnancy
- ☒ Preterm birth (<37 weeks) following spontaneous labour
- ☒ Suspected or confirmed rupture of membranes for >18 hours in preterm baby
- ☒ Intrapartum fever >38°C, or confirmed or suspected chorioamnionitis

#### **CLINICAL INDICATORS SUGGESTIVE OF INFECTION**

- ☒ Need for mechanical ventilation in a term baby **RED FLAG**
- ☒ Respiratory distress commencing >4 hr after birth **RED FLAG**
- ☒ Signs of shock **RED FLAG**
- ☒ Seizures **RED FLAG**
- ☒ Need for mechanical ventilation in a preterm baby
- ☒ Hypoxia (e.g. central cyanosis or reduced oxygen level)
- ☒ Signs of respiratory distress
- ☒ Apnoea
- ☒ Persistent Pulmonary Hypertension (PPHN)
- ☒ Need for cardio-pulmonary resuscitation
- ☒ Altered heart rate (bradycardia or tachycardia)
- ☒ Signs of neonatal encephalopathy
- ☒ Altered behaviour or responsiveness
- ☒ Altered muscle tone
- ☒ Feeding difficulties (e.g. feed refusal)
- ☒ Feed intolerance (e.g. abdominal distension, vomiting, excessive gastric aspirates)
- ☒ Temperature <36°C or >38°C, not explained by environmental factors
- ☒ Unexplained excessive bleeding, thrombocytopenia or abnormal coagulation (INR >2)
- ☒ Oliguria persisting aged >24 hr
- ☒ Hypo/hyperglycaemia
- ☒ Metabolic acidosis (BE ≥10)
- ☒ Jaundice within 24 hours
- ☒ Local signs of infection

#### **ACTIONS**

- ☒ **Term** babies who are clinically well at birth and whose mothers have **received** IAP for prevention of EOGBS disease more than 4 hours before delivery do not require special observation.
- ☒ **Term** babies who are clinically well at birth and whose mothers did **not receive** IAP for prevention of EOGBS disease more than 4 hours before delivery should be evaluated at birth for clinical indicators of neonatal infection and have their vital signs (NEWS chart observations) checked at 0, 1 and 2 hours, and then 2 hourly until 12 hours
- ☒ **Any red flags or no red flags but ≥2 risk factors or ≥2 clinical indicators** perform investigations, including blood cultures, and start antibiotics
- ☒ No red flag or clinical indicators but **1 risk factor**, or no red flag or risk factors but **1 clinical indicator** consider withholding antibiotics Monitor baby for clinical indicators of possible infection, including vital signs monitor for at least 12 hr from birth (at 1 hr, 2 hr and then 2-hrly for 10 hr)
- ☒ If further clinical concerns, perform investigations including blood cultures and start antibiotics
- ☒ Whenever decision made to give antibiotics, start as soon as possible and **always within 1 hr** of decision

## Determine the need for antibiotic treatment in the baby – reference neonatal guidelines

Identify risk factors and clinical indicators of early-onset neonatal infection (as above).

If there are any risk factors for early-onset neonatal infection or if there are clinical indicators of possible early onset neonatal infection, perform a careful clinical assessment without delay.

Review the maternal and neonatal history and carry out a physical examination of the baby including an assessment of the vital signs.

Use the following framework to direct antibiotic management decisions

- Any red flag, or
- Two or more risk factors or clinical indicators that are NOT red flags .

Perform investigations and start antibiotic treatment.

- No red flags, and
- No clinical indicators

**BUT**

- One risk factor that is not a red flag

No further concerns arise during the period of observation.

Using clinical judgment, consider:

- whether it is safe to withhold antibiotics, and
- whether it is necessary to monitor the baby's vital signs and clinical condition – if monitoring is required continue it for at least 12 hours (at 0, 1 and 2 hours and then 2-hourly for 10 hours).

- No red flags, and

- No risk factors
- One clinical indicator that is not a red flag

- No risk factors, and indicators, and
- No laboratory evidence of possible infection

Do not routinely give antibiotic treatment. Continue routine postnatal care (see [Postnatal care](#), NICE clinical guideline 37).

Clinical concerns arise during the period of observation

Consider performing investigations and starting antibiotic treatment.

**In babies being monitored for possible infection if:**

No concerns arise during observation.

Reassure the family and, if the baby is to be discharged, give advice to the parents and carers.

**12. DEFINITIONS/ABBREVIATIONS (IF APPLICABLE)**

GBS	Group B Streptococcus
EOGBS	Early Onset GBS
IAP	Intrapartum Antibiotics Prophylaxis
PROM	Prelabour Rupture of membranes (Ruptured membranes with no signs of labour)
PPROM	Preterm Prelabour Rupture of membranes
CS	Caesarean Section

**13. TRAINING/SUPPORT (IF APPLICABLE)**

Midwives, Obstetricians and Neonatal team should familiarise themselves with these guidelines

**14. REFERENCES (IF APPLICABLE)**

Prevention of Early-onset Neonatal GBS disease RCOG/RCPCH joint guidelines September 2017

Neonatal Network guidelines 2017-2019