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Norfolk and Norwich University Hospitals NHS
NHS Foundation Trust

A Clinical Guideline for Referral of Neonates Identified at Risk of Exposure to Tuberculosis.

For Use in:	Maternity Services and Neonatal Intensive Care Unit (NICU),
By:	Midwives and Neonatal nurses
For:	Neonates requiring BCG vaccination following birth
Division responsible for document:	Women and Children's Services
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To be reviewed by:	Alison Evans
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Description of changes:	Reviewed and amended, WHO checklist amended and guideline updated regarding workflow regarding automatic referral
Compliance links:	DoH leaflet "TB, BCG vaccine and your baby"
If Yes - does the strategy/policy deviate from the recommendations of NICE? If so why?	No deviation

A Clinical Guideline for Referral of Neonates Identified at Risk of Exposure to Tuberculosis.

1. Definitions of Terms Used / Glossary

Detection of eligible neonates identified in the antenatal period at risk of exposure to tuberculosis and referral for administration of the BCG vaccination.

2. Quick reference

Almost all cases of Tuberculosis in the UK are acquired through respiratory route, by breathing in infected respiratory droplets from a person with infectious respiratory TB
Incidence of TB in UK [2013] 12.3/100,000.

Neonatal BCG vaccination should be given to *eligible high risk* infants **soon** after birth.
BCG vaccination should be administered strictly by the intradermal route.

It is essential that all health professionals are properly trained in all aspects of the process involved in BCG vaccination

3. Objectives

To ensure early identification of the neonate that requires BCG vaccination at birth and to facilitate appropriate and timely administration.

Provide information on the administration of BCG vaccines.

4. Rationale

To develop the knowledge base of healthcare practitioners regarding the Neonatal BCG vaccination programme.

To support healthcare practitioners involved in discussing BCG vaccination with those eligible by providing evidence based information.

To promote high uptake of BCG vaccination in those eligible by increasing the knowledge of those involved in delivering the vaccination programme.

6. Criteria for inclusion

BCG vaccination should be discussed with the parents or legal guardian for any newborn baby at increased risk of tuberculosis.

Neonates at increased risk include:

- Those born in a local authority with a notification rate greater or equal than 40 per 100,000.
- With one or more parents or grandparents born in a high incidence country as defined by NICE. The current countries (updated Oct 2019) can be found at

https://www.gov.uk/government/publications/tuberculosis-tb-by-country-rates-per-100000-people

- With a family history of tuberculosis within the last five years.

7. Criteria for exclusion

BCG should **not** be given to babies who are likely to be HIV positive. For infants born to HIV-positive mothers, BCG vaccine can only be administered after three appropriately timed postnatal PCR tests for HIV infection.

Babies living in a household where an active TB case is suspected or confirmed

Babies who are immunocompromised by virtue of disease or treatment eg any baby receiving corticosteroid or immunosuppressive treatment (inhaled steroids are not a contraindication).

Any baby suffering from a malignant condition

Current viral infections

8. Processes to be followed

https://www.gov.uk/government/publications/tuberculosis-tb-by-country-rates-per-100000-people website to be checked by Maternity Screening Team every 6 months and updated lists to be circulated to all areas of community, MLBU, Blakeney, Delivery Suite and NICU

At booking midwives to complete

- Past medical surgical history – WHO questions

At delivery

- A BCG requirement prompt will appear on E3
- Highlight in postnatal and neonatal notes “BCG required”
- For babies admitted to NICU automatic referral will still be triggered at delivery and contact will be made by BCG clinic at an appropriate gestation.

Discharging home from hospital

- Complete ‘Transfer to the Community’ section in Neonatal Record and on E3.
- Electronic referral will be sent automatically
- Ensure patient has been given national patient BCG information leaflet.

Discharge from midwifery care
Community Midwife to:

- Complete Transfer of Care page to inform the Health Visitor
- Secure transfer page summary into red book

- Discuss at joint monthly HV/CMW meetings

NCH&C

- On receipt of referral form, contact parents via phone or text message offering available appointment
- Followed up by telephone calls
- Clinics held once a week on average
- Offer appointment within 7 days of discharge but ideally by 6 week postnatal check.
- Follow up DNA's
- Audit referrals and uptake

Administration of BCG vaccination:

Specialist qualifications, training, experience and competence required in the clinical context of the BCG administration, for this reason NNUHT refer neonates eligible for vaccination to TB Nurse Specialists at NCH&C. The legal status of the medicines is prescription only medicine (POM). Neonatal dose – 0.05ml of reconstituted vaccine by intradermal injection, once only.

Failsafe Process

At the beginning of every month, the Screening Team will run queries on E3 cross checking women with an alert highlighting BCG vaccination required, against women whose babies have been referred. An email will be sent to the TB specialist nurse informing them of who has been referred and of any where there is no evidence of referral. Where no referral received, the TB specialist nurse will contact parents directly, assess risk and offer BCG vaccination where appropriate. The TB specialist nurse will check all referrals to ensure all appropriate and flag up errors for future learning. Data will be sent to NHS & I Screening and Immunisations team quarterly.

9. Information regarding follow-up management

BCG vaccine is given into the lateral aspect of the left upper arm at the level of the insertion of the deltoid muscle (just above the middle of the left upper arm).

The expected reaction to successful BCG vaccine is induration at the injection site followed by a local lesion which starts as a papule two or more weeks after vaccination. It may ulcerate and then slowly subside over several weeks or months to heal leaving a small, flat scar. It is not necessary to protect the site from becoming wet during washing. The ulcer should be encouraged to dry. Should any oozing occur, a temporary dry dressing may be used until a scab forms. Following BCG vaccination the baby should not receive any vaccinations in the same limb used for the vaccination for three months.

10. Audit standards / monitoring compliance

E3 audit for eligible population and referrals

To ensure that this document is compliant with the above standards, the following monitoring processes will be undertaken:

The audit results will be reviewed at the Clinical Governance meeting and .recommendations for further action will be made as required.

11. Summary of development and consultation process undertaken before registration and dissemination

The guideline was drafted by the authors and initially distributed for comments to medical, nursing and midwifery colleagues in division 3. Following amendments the guideline was re-drafted and presented at a guideline meeting for the department

12. References and Resources

Green Book TB chapter. Available at:https://www.gov.uk/government/collections/immunisation-against-infectious-disease-the-green-book

DoH leaflet “TB, BCG vaccine and your baby”
https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/469555/PHE_8584_TB_BCG_8_page_DL_leaflet_2015_09_web.pdf

Orderline for leaflets
https://www.orderline.dh.gov.uk/ecom_dh/public/saleproduct.jsf?catalogueCode=2900192

Monitoring Compliance / Effectiveness Table				**Appendix** *(insert letter / number)*.		
Element to be monitored	***Lead Responsible for monitoring***	***Monitoring Tool / Method of monitoring***	***Frequency of monitoring***	***Lead Responsible for developing action plan & acting on recommendations***	***Reporting arrangements***	***Sharing and disseminating lessons learned & recommended changes in practice as a result of monitoring compliance with this document***
All eligible neonates will be referred to NCH&C	Screening co-ordinator	audit	Quarterly	PDM /screening co-ordinator HOM	Risk manager	The Lead responsible for developing the action plans will disseminate lessons learned via the most appropriate committee e.g. Clinical Safety Executive Sub-Board, Non-Clinical Safety Executive Sub-Board, Workforce Executive Sub-Board, Executive Board or Trust Board.
Documentation completed on transfer Health visitor informed	PDM	audit	Quarterly	PDM /screening co-ordinator HOM	Risk manager	