



Public Health
England

Screening Quality Assurance visit report

NHS Antenatal and Newborn Screening
Programmes University Hospitals Bristol
NHS Foundation Trust

17 January 2017

Public Health England leads the NHS Screening Programmes

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Public Health England exists to protect and improve the nation's health and wellbeing, and reduce health inequalities. We do this through world-class science, knowledge and intelligence, advocacy, partnerships and the delivery of specialist public health services. We are an executive agency of the Department of Health, and are a distinct delivery organisation with operational autonomy to advise and support government, local authorities and the NHS in a professionally independent manner.

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About PHE Screening

Screening identifies apparently healthy people who may be at increased risk of a disease or condition, enabling earlier treatment or better informed decisions. National population screening programmes are implemented in the NHS on the advice of the UK National Screening Committee (UK NSC), which makes independent, evidence-based recommendations to ministers in the four UK countries. The Screening Quality Assurance Service ensures programmes are safe and effective by checking that national standards are met. PHE leads the NHS Screening Programmes and hosts the UK NSC secretariat.

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Executive summary

Antenatal and newborn screening quality assurance (QA) covers the identification of eligible women and babies and the relevant tests undertaken by each screening programme. It includes acknowledgement of the referral to treatment or diagnostic services as appropriate (for individuals/families with screen-positive results), or the completion of the screening pathway.

The findings in this report relate to the QA visit of the antenatal and newborn screening service at University Hospitals Bristol NHS Foundation Trust held on 17 January 2017.

Purpose and approach to quality assurance (QA)

QA aims to maintain national standards and promote continuous improvement in antenatal and newborn screening. This is to ensure that all eligible people have access to a consistent high quality service wherever they live.

QA visits are carried out by the PHE screening quality assurance service (SQAS).

The evidence for this report comes from the following sources:

- routine monitoring data collected by the NHS screening programmes
- data and reports from external organisations
- evidence submitted by the provider(s), commissioner and external organisations
- information shared with the south regional SQAS as part of the visit process

Description of local screening service

The antenatal and newborn screening service at University Hospitals Bristol NHS Foundation Trust (UHB) delivers screening to an eligible population of approximately 350,000 people from central and south Bristol, north Somerset and south Gloucestershire. The local population is characterised as 63.9% white British, 9.7% other white, 6.0% black and 4.9% Asian, mixed race 2.3% with 13.2% ethnicity unknown (annual report April 2015 to March 2016).

The programme is commissioned by the local NHS England Public Health Commissioning Team (South West) on behalf of Bristol Clinical Commissioning Group (CCG). Some specialist screening services are commissioned by NHS England Specialised Commissioning team.

Delivery of the service provided at UHB includes:

- maternity services at the acute site
- sickle cell and thalassaemia screening laboratory
- infectious diseases in pregnancy screening laboratory
- ultrasound service for the first trimester Down's, Edwards' and Patau's syndrome screening and the 18+0 to 20+6 week fetal anomaly scan
- tertiary referral centre for fetal medicine including prenatal diagnostic procedures
- tertiary referral centre and level 3 neonatal intensive care unit

There are identified leads within the provider organisations to co-ordinate and oversee the screening programmes.

Findings

Immediate concerns

The QA visit team identified no immediate concerns.

High priority

The QA visit team identified four high priority findings as summarised below:

- there is inconsistency in reporting of screening incidents as per PHE Managing Incidents in the NHS Screening Programmes, October 2015. Not all stakeholders are utilising the guidance
- there is no timely tracking of the fetal anomaly screening programme against the booked cohort
- there is no oversight and tracking of the screen positive referral pathway for NIPE to ensure that babies enter treatment services
- the avoidable repeat rate for newborn bloodspot screening exceeds the national acceptable rate of 2%. Between July and September 2016, the avoidable repeat rate was 8.7%. UHB has been consistently high over the last four quarters that were reviewed for the QA visit

Shared learning

The QA visit team identified several areas of practice for sharing, including:

- the trust wide Equality and Diversity Report (August 2016) showed evidence that the trust has assessed the needs of the local population. Additional provision of specialist staff and clinics have been provided to meet the needs of the socially and ethnically diverse population of Bristol

- the sonography department has implemented a proforma to document the results of audit and ongoing training needs for all the sonographers involved in screening
- there is good interaction and cohesive working between the IT department and the screening team to ensure the accuracy of the cohort data
- the administrative function of the IT software within the ultrasound department allows for the robust follow up of women who do not attend their scan appointments
- there is a function within the sickle cell and thalassaemia laboratory information management system (LIMs) to collect information such as gestation of the pregnancy, expected date of delivery and the details of the father of the baby. This enables the laboratory to link the records of the pregnant woman to the father of the baby
- the management of screen positive SCT results and the sharing of information between the local coordinator, the clinical genetics department, and the newborn bloodspot laboratory ensures seamless care for women whose unborn babies may be at risk of a haemoglobinopathy disease

Table of consolidated recommendations

Governance and leadership

No.	Recommendation	Timescale	Priority *	Evidence required
1.1	Ensure that all stakeholders within the screening pathways at University Hospitals Bristol NHS Foundation Trust (UHB) are identifying, reporting and managing incidents and serious incidents as per the PHE guidance	3 months	High	Ratified trust wide incident management policy which reflects the PHE Managing Safety Incidents in NHS Screening Programmes guidance (October 2015)
1.2	Revise the terms of reference for the quarterly newborn blood spot Operational Management meeting to ensure that the remit and roles and responsibilities within the group are defined	6 months	Standard	Revised terms of reference for the quarterly newborn blood spot Operational Management meeting led by the commissioners
1.3	Review the terms of reference for the Antenatal Screening Governance meeting to describe how risks and governance issues are escalated to the trust board	6 months	Standard	Revised terms of reference for this meeting
1.4	Formalise the Ultrasound Service meeting and establish terms of reference	6 months	Standard	Formal meeting agenda, minutes and terms of reference for this meeting
1.5	Revise the sickle cell and thalassemia (SCT) screening laboratory standard operating procedure for processing of antenatal blood samples	6 months	Standard	Revised standard operating procedure
1.6	Revise all screening guidelines, pathways and standard operating procedures to ensure that local practice is in line with current national guidance	6 months	Standard	Revised guidelines and standard operating procedures which have been benchmarked against NHS screening programme service specifications and standards

No.	Recommendation	Timescale	Priority *	Evidence required
1.7	Complete an annual vertical audit for a SCT antenatal sample picked at random	6 months	Standard	Inclusion within yearly laboratory audit schedule Completed vertical audit and action plan
1.8	Formalise the audit process within the screening pathways	12 months	Standard	Documented evidence including written audit reports and arising action plans
1.9	Undertake a client satisfaction survey specific to antenatal and newborn screening pathways	12 months	Standard	Completion of user satisfaction survey and feedback at screening group meetings
1.10	Pathology services annual user survey questionnaire to be updated to include screening specific element and targeting all stakeholders within the screening pathway	12 months	Standard	Completion of user satisfaction survey and feedback at laboratory meetings

Infrastructure

No.	Recommendation	Timescale	Priority *	Evidence required
2.1	Ensure roles and responsibility are defined for newborn infant physical examination (NIPE) screening management and reporting tool (SMART), to ensure that all babies eligible for screening are offered, and complete screening within 72 hours of age	6 months	Standard	Roles and responsibility for NIPE SMART defined within trust policy Key performance data submitted for quarter 3 2016 – 2017
2.2	Identify and support training needs for users of NIPE SMART	6 months	Standard	Induction resource for all new users Engage with national programme for support
2.3	Ensure completion of e-learning modules for newborn examiners	6 months	Standard	Training log demonstrating compliance

Identification of cohort – antenatal

No.	Recommendation	Timescale	Priority *	Evidence required
3.1	Reduce duplication and improve efficiency in cross-border bookings and transfers into the trust	6 months	Standard	Agreed working practice document for neighbouring trusts

Identification of cohort – newborn

No.	Recommendation	Timescale	Priority *	Evidence required
4.1	Investigate and discontinue the use of temporary NHS numbers issued to babies transferring to the Bristol Children's Hospital	6 months	Standard	Standard operating procedure for the identification of NHS numbers for babies transferring to Bristol Children's Hospital

Invitation, access and uptake

No.	Recommendation	Timescale	Priority *	Evidence required
5.1	Track the fetal anomaly screening cohort in a timely way to ensure all those booked are offered and complete screening	3 months	High	Ratified policy to reflect tracking of the programme Tracker
5.2	Revise the process to ensure that responsibility lies with the maternity service to communicate to women the results of all screening tests if screening is performed before a miscarriage or termination of pregnancy	6 months	Standard	System implemented Ratified trust screening policies describing pathway

No.	Recommendation	Timescale	Priority *	Evidence required
5.3	Revise the timescales for re-offer of infectious disease screening for women who decline at booking	6 months	Standard	Ratified trust policy reflecting timescales as defined by infectious diseases in pregnancy standards (2016)

Sickle cell and thalassaemia screening

No.	Recommendation	Timescale	Priority *	Evidence required
6.1	Amend report codes to request 'father of the baby' screening rather than 'partner' screening	6 months	Standard	Amended report format

Infectious diseases in pregnancy screening

No.	Recommendation	Timescale	Priority *	Evidence required
7.1	Review the referral pathway for hepatitis B positive women who require a specialist hepatology appointment within 6 weeks	6 months	Standard	Improvement in women being offered and seen in hepatology by 6 weeks (KPI ID2)

Fetal anomaly screening

No.	Recommendation	Timescale	Priority *	Evidence required

Newborn and infant physical examination

No.	Recommendation	Timescale	Priority *	Evidence required
9.1	Timely tracking of the NIPE screen positive cohort to ensure each baby enters treatment services	3 months	High	Ratified policy to reflect tracking of screen positive cohort

Newborn blood spot screening

No.	Recommendation	Timescale	Priority *	Evidence required
10.1	Reduce the newborn bloodspot screening (NBS) avoidable repeat rate to an acceptable level of less than 2%	3 months	High	Improvement plan for reducing the avoidable repeat rate (NB2) Report progress at the Laboratory Operational Management meeting
10.2	Reduce the delays in newborn bloodspot screening (NBS) samples reaching the laboratory to ensure compliance with Standard 5	6 months	Standard	Completed action plan to address delays Improvement in NHS screening programme standards for newborn bloodspot screening – Standard 5
10.3	Ensure that barcoded labels are used for newborn bloodspot screening (NBS) samples as per Standard 3	6 months	Standard	Action plan to improve usage and improvement in NHS screening programme standards for newborn bloodspot screening – Standard 3

I = Immediate.

H= High.

S = Standard.

Next steps

The screening service providers are responsible for developing an action plan to ensure completion of recommendations contained within this report.

SQAS will work with commissioners to monitor activity and progress in response to the recommendations made for a period of 12 months. Following the issuing of the final report to allow time for at least one response to all recommendations to be made.