

## Avoidable Repeat Rate for July 2021 for Newborn Blood Spot Screening - Manchester Laboratory

The avoidable repeat rate for samples received during July 2021 is displayed by Trust in Figure 1 and by current hospital (for in-patients) in Figure 2. The raw data is provided in Tables 2 and 3. The avoidable repeat rate is calculated by dividing the total number of avoidable repeats by the number of babies tested (i.e. first samples).

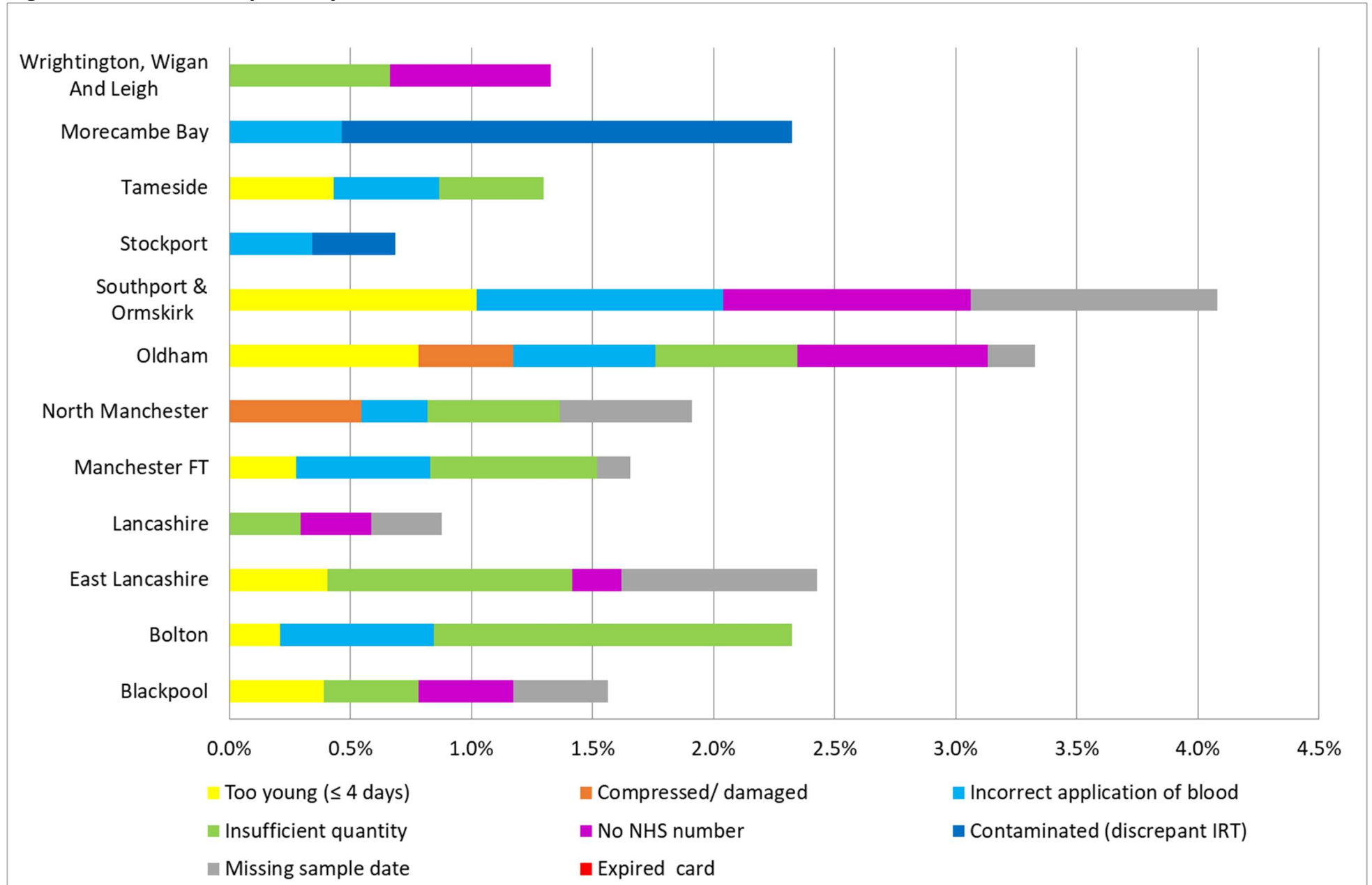
2 samples (out of first samples and repeats) received in July had no Trust code (0.04%).

A list of trust codes is provided in Table 1.

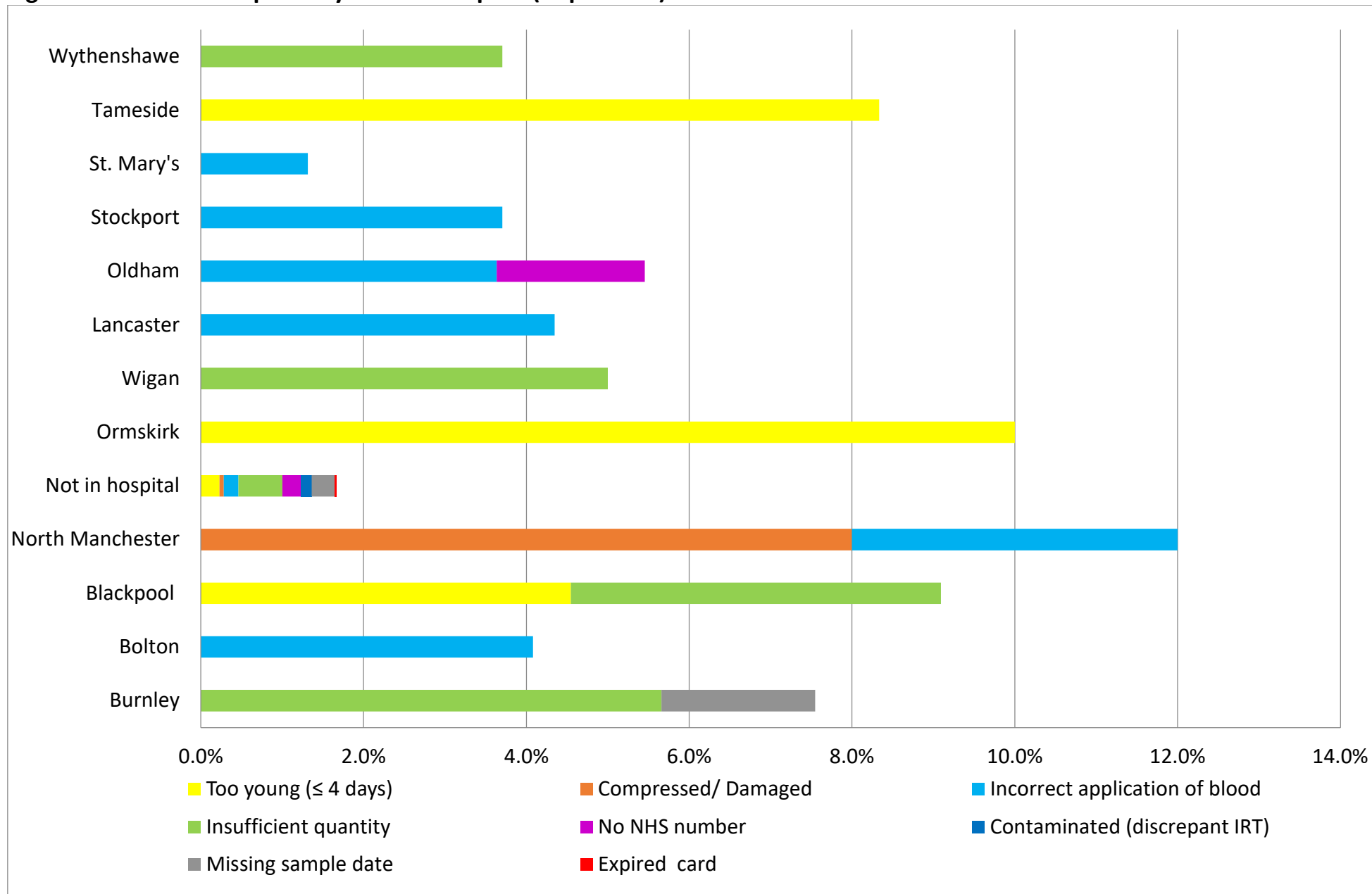
**Table 1**

<b>Code</b>	<b>Trust Name</b>
RXL	BLACKPOOL TEACHING HOSPITALS NHS FOUNDATION TRUST
RMC	BOLTON NHS FOUNDATION TRUST
RXR	EAST LANCASHIRE HOSPITALS NHS TRUST
RXN	LANCASHIRE TEACHING HOSPITALS NHS FOUNDATION TRUST
RW3	MANCHESTER UNIVERSITY NHS FOUNDATION TRUST – ST. MARY'S & RMCH
RM2	MANCHESTER UNIVERSITY NHS FOUNDATION TRUST – WYTHENSHAW
NM-ROA	MANCHESTER UNIVERSITY NHS FOUNDATION TRUST – NORTH MANCHESTER
OL-RW6	PENNINE ACUTE HOSPITALS NHS TRUST – OLDHAM
RVY	SOUTHPORT AND ORMSKIRK HOSPITAL NHS TRUST
RWJ	STOCKPORT NHS FOUNDATION TRUST
RMP	TAMESIDE HOSPITAL NHS FOUNDATION TRUST
RTX	UNIVERSITY HOSPITALS OF MORECAMBE BAY NHS FOUNDATION TRUST
RRF	WRIGHTINGTON, WIGAN AND LEIGH NHS FOUNDATION TRUST

**Figure 1 - Avoidable repeats by Trust**



**Figure 2 - Avoidable repeats by current hospital (in-patients)**



There were no avoidable repeats for Furness, Blackburn, RMCH and Preston.

**Table 2 – Avoidable repeats by Trust for July 2021**

Row Labels	Number of first samples received/ babies tested	Too soon after transfusion (<72 hours)*	Too young for reliable screening (≤ 4 days)	Bloodspot card damaged in transit	Bloodspot compressed /damaged	Expired bloodspot card	Incorrect application of blood on card	Insufficient quantity	>14 days in transit	No NHS number	Contaminated (discrepant IRT)	Missing sample date	DOB missing	Number of Avoidable Repeat Requests	Avoidable Repeat Requests Rate
Blackpool Teaching Hospitals NHS FT	256	0	1	0	0	0	0	1	0	1	0	1	0	4	1.6%
Bolton NHS FT	473	2	1	0	0	0	3	7	0	0	0	0	0	11	2.3%
East Lancashire Hospitals NHS Trust	494	1	2	0	0	0	0	5	0	1	0	4	0	12	2.4%
Lancashire Teaching Hospitals NHS FT	341	0	0	0	0	0	0	1	0	1	0	1	0	3	0.9%
Manchester University NHS FT - SMH, RMCH & WH	724	3	2	0	0	0	4	5	0	0	0	1	0	12	1.7%
North Manchester (MFT)	366	0	0	0	2	0	1	2	0	0	0	2	0	7	1.9%
Not Stated	2	0	0	0	0	0	0	0	0	0	0	1	0	1	50.0%
Health Visitor	32	0	0	0	0	1	0	0	0	0	0	0	0	1	3.1%
Oldham (Pennine Acute Hospitals NHS Trust)	511	0	4	0	2	0	3	3	0	4	0	1	0	17	3.3%
Southport & Ormskirk Hospital NHS Trust	98	0	1	0	0	0	1	0	0	1	0	1	0	4	4.1%
Stockport NHS FT	292	0	0	0	0	0	1	0	0	0	1	0	0	2	0.7%
Tameside And Glossop Integrated Care NHS FT	231	0	1	0	0	0	1	1	0	0	0	0	0	3	1.3%
University Hospitals of Morecambe Bay NHS FT	215	1	0	0	0	0	1	0	0	0	4	0	0	5	2.3%
Wrightington, Wigan and Leigh NHS FT	301	0	0	0	0	0	0	2	0	2	0	0	0	4	1.3%
<b>Grand Total</b>	<b>4336</b>	<b>7</b>	<b>12</b>	<b>0</b>	<b>4</b>	<b>1</b>	<b>15</b>	<b>27</b>	<b>0</b>	<b>10</b>	<b>5</b>	<b>12</b>	<b>0</b>	<b>86</b>	<b>2.0%</b>

\*Not included in calculation of avoidable repeats

**Table 3 – Avoidable repeats by current hospital (in-patients) for July 2021**

Current Hospital	Number of first samples received/ babies tested	Too soon after transfusion (<72 hours)*	Too young (≤ 4 days)	Damaged in transit	Compressed/ Damaged	Expired card	Incorrect application of blood	Insufficient quantity	>14 days in transit	No NHS number	Contaminated (discrepant IRT)	Missing sample date	DOB Missing	Number of Avoidable Repeat Requests	Avoidable Repeat Requests Rate
Burnley General Hospital	53	1	0	0	0	0	0	3	0	0	0	1	0	4	7.5%
Royal Bolton Hospital	49	2	0	0	0	0	2	0	0	0	0	0	0	2	4.1%
Blackpool Victoria Hospital	22	0	1	0	0	0	0	1	0	0	0	0	0	2	9.1%
Furness General Hospital	7	0	0	0	0	0	0	0	0	0	0	0	0	0	0.0%
North Manchester General Hospital	25	0	0	0	2	0	1	0	0	0	0	0	0	3	12.0%
Not in hospital	3893	0	9	0	2	1	7	21	0	9	5	11	0	65	1.7%
Ormskirk & District General	10	0	1	0	0	0	0	0	0	0	0	0	0	1	10.0%
Royal Albert Edward Infirmary	20	0	0	0	0	0	0	1	0	0	0	0	0	1	5.0%
Royal Blackburn Hospital	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0.0%
Royal Lancaster Infirmary	23	1	0	0	0	0	1	0	0	0	0	0	0	1	4.3%
Royal Manchester Childrens Hospital	2	1	0	0	0	0	0	0	0	0	0	0	0	0	0.0%
Royal Oldham Hospital	55	0	0	0	0	0	2	0	0	1	0	0	0	3	5.5%
Royal Preston Hospital	34	0	0	0	0	0	0	0	0	0	0	0	0	0	0.0%
Stepping Hill Hospital	27	0	0	0	0	0	1	0	0	0	0	0	0	1	3.7%
St Mary's Hospital, Manchester	76	2	0	0	0	0	1	0	0	0	0	0	0	1	1.3%
Tameside General Hospital	12	0	1	0	0	0	0	0	0	0	0	0	0	1	8.3%
Wythenshawe Hospital	27	0	0	0	0	0	0	1	0	0	0	0	0	1	3.7%
Grand Total	4336	7	12	0	4	1	15	27	0	10	5	12	0	86	2.0%

\*Not included in calculation of avoidable repeats

Tips to help avoid rejection of samples:

- Collect sample on day 5 (date of birth is day 0)
- Check the expiry date on the card
- Wash the baby's heel with water to reduce the risk of a contaminated IRT result
- Ensure that blood spots are the size of the guide circles on the card
- Allow the blood to drop onto the card rather than touching the filter paper to the baby's heel
- Some brands of lancet device are more effective than others
- Extra blood spots, in addition to the 4 indicated by the guide circles, can be collected elsewhere on the card
- Repeat the test at the same visit if the spots are too small or have not soaked through to the back of the card
- Make sure there is a valid NHS number on the card

### **Conclusion**

The avoidable repeat rate for July was 2.0% which is lower than June's rate of 2.1%. The most common reason for rejection was insufficient blood, followed by incorrect application of blood (multi-spotting). Seven Maternity Units met the standard including 2 meeting the achievable threshold (Lancashire and Stockport).