**Safe supplies: A picture for policy**

Joint working of NHS Blood and Transplant and Public Health England

**Blood donations UK, 2015**

The risk that testing would NOT detect a HBV, HCV or HIV infection is less than one in a million

<table>
<thead>
<tr>
<th>Infection</th>
<th>Estimated time</th>
<th>Last proven infections in the UK</th>
</tr>
</thead>
<tbody>
<tr>
<td>Hepatitis B</td>
<td>8 months</td>
<td>2012</td>
</tr>
<tr>
<td>Hepatitis C</td>
<td>19 years</td>
<td>1997</td>
</tr>
<tr>
<td>HIV</td>
<td>2-3 years</td>
<td>2002</td>
</tr>
</tbody>
</table>

Infections per 100,000 donations continue to decrease in the UK

- **42 million**
  - Age 17-66 years in the UK
- **2.1 million**
  - Blood and platelet donations
- **200 infections detected**
  - Mostly chronic hepatitis B and syphilis

- **64** Hepatitis B
- **64** Syphilis
- **50** Hepatitis C
- **13** HIV
- **9** HTLV

Infections more common in new donors and male donors

- 1 in 55,000 donations from repeat donors
- 1 in 1,000 donations from new donors
- 1 in 7,000 donations from males

Most positive donors had complied with the donor selection rules

Not known, incomplete information

Compliant

Non-compliant

9% 15% 76%

PHE publications gateway number: 2016xxx
Recent infections detected every 14 days

Mostly syphilis and HIV acquired through sex

**Bacterial screening UK 2015**

**Platelets screened (% apheresis platelets)**

- **16,000** (64%)
- **6,000** (69%)
- **7,000** (44%)
- **291,000** (62%)

**0.02 to 0.03%**

Apheresis platelets confirmed positive for bacteria

**0.07 to 0.12%**

Pooled platelets confirmed positive for bacteria

Bacterial screening prevented transfusion of potentially harmful bacteria including *Serratia marcescens, Streptococcus bovis, Streptococcus agalactiae* and *E.coli* and allowed early referral of donors where significant bacteria were isolated eg *S.bovis*

**Additional testing NHSBT**

<table>
<thead>
<tr>
<th>Instead of travel deferrals</th>
<th>Tested</th>
<th>POSITIVE</th>
</tr>
</thead>
<tbody>
<tr>
<td>67,000</td>
<td></td>
<td>0/1460</td>
</tr>
<tr>
<td>4%</td>
<td></td>
<td>490/27,090</td>
</tr>
</tbody>
</table>

Donations gained through additional testing

Data source: Data supplied to the NHSBT/PHE Epidemiology Unit by NHSBT, WBS, NIBTS & SNBTS.