Aims of the Registry

The BSR has been collecting data on spinal surgery in the United Kingdom since 2012. Submitting data to the registry was mandated by specialist commissioning since 2016 and has been subject to a Best Practice Tariff since April 2019.

The aims of the registry are to improve patient care and the understanding of spinal surgery through the collection of clinical data.

In the last year more specific aims have been set:

1. To quality assure surgery at unit and surgeon level.
2. To perform clinical research
3. To assess device performance

Registry Usage Data

Total number of Users: 2,165 (36% increase from 2018)
Total Number of Patients (including those without pathways): 218491 (33% increase from 2018)
1654 Delegates actively* adding data into the BSR.
773 Pathway Owners actively* adding data into the BSR.

*Active defined as users that have logged into the BSR in the past 2 years.
Increasing Pathway Owners per Year

<table>
<thead>
<tr>
<th>Pathway Count</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Spinal (Lumbar Degenerative) Pathway</td>
<td>151670</td>
</tr>
<tr>
<td>Spinal (Cervicothoracic Degenerative)</td>
<td>34434</td>
</tr>
<tr>
<td>Spinal (Deformity) Pathway</td>
<td>19015</td>
</tr>
<tr>
<td>Spinal (Trauma) Pathway</td>
<td>5333</td>
</tr>
<tr>
<td>Spinal (Tumour) Pathway</td>
<td>3189</td>
</tr>
<tr>
<td>Spinal (Intradural) Pathway</td>
<td>1486</td>
</tr>
<tr>
<td>Spinal (Infection) Pathway</td>
<td>844</td>
</tr>
</tbody>
</table>
Increase in Patients per Year on Lumbar Degenerative Pathway

Increase in Patients per Year on Cervicothoracic Degenerative Pathway
Overall 78% of patients on the BSR consent to data collection.
Clinical Analysis

To date the BSR includes 51,149 Primary Lumbar Decompressions recorded, which include 25,800 Discectomies. The total complication rate for these Decompressions, including intra and post-op complications was 6.7%.

These statistics demonstrate that 23% of patients on the BSR are 70+ years of age, whilst under 20’s make up 7% of the registry.

Clinical Research

Research projects competed this year include:

- Clinical outcomes of primary surgery for cervical spondylotic myelopathy. Observational cohort series of 560 patients with pre and post-op MDI at 1 year Accepted for Britspine. In submission for publication

- Surgery for Degenerative lumbar spondylolisthesis – does procedure type/fusion confer a clinical benefit Observational cohort series. 1 year ODI and EQ5D compared between 730 patients undergoing either decompression and decompression alone. In submission currently

- Clinical Outcomes of Sacro-Iliac Joint Fusion Presented at BSS/UKSSB online meeting.
Best Practice Tariff

The BPT commenced in April 2019. The target for 2019-20 was that 50% of spinal surgery activity needed to be added. Data submitted to the BSR is compared with centrally collected NHSE Secondary Usage Service data (SUS). Data is analysed on a quarterly basis.

The current reports for 2019 are available at the following link:

https://improvement.nhs.uk/resources/spinal-surgery-bpt-reports/

In both Quarter 1 and Quarter 2 2019/20, 112 sites submitted to BSR, with 62 sites achieving a case ascertainment rate above 50%. 177 sites submitted to SUS, with 35% achieving more than 50%.

The total number of sites in England submitting data and achieving the 50% case ascertainment rate remained unchanged between Q1 and Q2. However, while the figures are unchanged between Q1 and Q2, the sites who actually submitted do vary between quarters and achievement rates. This includes the following:

- 111 sites showed improvement in their case ascertainment rate
  - 11 of which achieved the target rate for the first time.
  - 66 sites' achievement rate dropped from their Q1 rate, although 23 of these sites still achieved the 50% target rate.
- However, there were 14 sites who achieved the target rate in Q1 but failed to do so in Q2, 10 of these failing by under 6%.

It was initially intended that the BPT would be increased on a yearly basis with an aim for 80% of operative procedures and pre-operative PROMS being required from April 2020. The Coronavirus pandemic has meant that some resources have been diverted and it has therefore been decided to postpone the increased target until April 2021.

Device Surveillance and the Medicines and Device Regulation (MDR)

The BSR met with the Association of British Healthcare Technology Industries (ABHI) twice in the last year. The new MDR was due to commence in May 2020 and mandated that manufacturers of spinal implants had mechanisms in place to track their performance and safety. After an initial consultation the BSR and BASS executive drew up a surveillance schedule according to device type. The full schedule is in the appendix below.

A secondary meeting was held in January when the members of the ABHI agreed in principle to periodic data sharing on a commercial basis.

An initial fee per manufacturer of £15,000 per annum was agreed. This pricing will be reviewed on an annual basis. The coronavirus pandemic has meant that the MDR will not be introduced until May 2021. Further teleconferences
were held with the ABHI in May and September where it was agreed that we will proceed with drawing up of contracts and a data sharing agreement (DSA) as soon as possible so as to hopefully have the process running prior to May 2021.