Putting NICE guidance into practice

Resource impact report:
GreenLight XPS for treating benign prostatic hyperplasia (MTG29)

Published: June 2016
Summary

The case for adopting GreenLight XPS for treating benign prostatic hyperplasia is supported in non-high-risk patients. Please see the guidance for details.

We estimate that around 13,600 people with benign prostatic hyperplasia are eligible to have GreenLight XPS. Uptake of GreenLight XPS will be steady from year 2 onwards with around 6,800 people having the procedure each year.

Savings range from £1.3 million when 36% of procedures with GreenLight XPS are done as day cases, to as much as £3.2 million when 70% are done as day cases.

Based on 53% of GreenLight XPS procedures being done as day cases, the guidance is estimated to save the NHS around £2.3 million per year (or £4,200 per 100,000 people).

Table 1 Estimated annual costs saving after implementing the guidance

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<tbody>
<tr>
<td>People having GreenLight XPS each year</td>
<td>3,400</td>
<td>6,800</td>
<td>6,800</td>
<td>6,800</td>
<td>6,800</td>
</tr>
<tr>
<td>Cost savings with GreenLight XPS for commissioners (£000s)</td>
<td>75</td>
<td>151</td>
<td>151</td>
<td>151</td>
<td>151</td>
</tr>
<tr>
<td>Cost savings with GreenLight XPS for providers (£000s)</td>
<td>1,060</td>
<td>2,119</td>
<td>2,119</td>
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<tr>
<td>Total cost savings (£000s)</td>
<td>1,135</td>
<td>2,270</td>
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This report is supported by a resource impact template which may be used to calculate the resource impact of implementing the guidance by amending the variables.

This technology is commissioned by clinical commissioning groups. Providers are NHS hospital trusts.

Resource impact report: GreenLight XPS for benign prostatic hyperplasia (BPH) (June 2016)
1 Introduction

1.1 This report looks at the resource impact of implementing the NICE guidance on **GreenLight XPS for benign prostatic hyperplasia (BPH)** in England.

1.2 The guidance states that:

- The case for adopting GreenLight XPS for treating benign prostatic hyperplasia is supported in non-high-risk patients. GreenLight XPS is at least as effective in these patients as transurethral resection of the prostate (TURP), but can more often be done as a day-case procedure, following appropriate service redesign.

- Cost modelling indicates that in non-high-risk patients, cost savings with GreenLight XPS compared with TURP are determined by the proportion of procedures done as day cases. Assuming a day-case procedure rate of 36%, and that the GreenLight XPS console is provided at no cost to the hospital (based on a contracted commitment to fibre usage), the estimated cost saving is £60 per patient. NICE’s resource impact report estimates that the annual cost saving for the NHS in England is around £2.3 million. In a plausible scenario of 70% of treatments being done as day cases the cost saving may be up to £3.2 million.

1.3 This report is supported by a resource impact template. The template aims to help organisations in England, Wales and Northern Ireland plan for the financial implications of implementing the NICE guidance by amending the variables.

1.4 This technology is commissioned by clinical commissioning groups. Providers are NHS Hospital trusts.

Resource impact report: GreenLight XPS for benign prostatic hyperplasia (BPH) (June 2016)
2  Background and epidemiology of benign prostatic hyperplasia

2.1  GreenLight XPS represents another treatment option for benign prostatic hyperplasia (BPH) alongside monopolar and bipolar transurethral resection of the prostate (TURP).

2.2  For those people who have TURP for BPH 96% will have it as elective inpatients. Compared with TURP, GreenLight XPS is associated with fewer adverse events and allows people to return home on the same day as the treatment.

2.3  Table 2 shows the number of people with BPH in England who may be eligible for GreenLight XPS.
Table 2 People eligible for GreenLight XPS in England

<table>
<thead>
<tr>
<th>Population</th>
<th>Proportion</th>
<th>Number of people</th>
</tr>
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<tbody>
<tr>
<td>Total population</td>
<td></td>
<td>53,865,817</td>
</tr>
<tr>
<td>Men aged 50 and above</td>
<td>16.63%</td>
<td>8,958,307</td>
</tr>
<tr>
<td>Prevalence of benign prostatic hyperplasia</td>
<td>40.00%</td>
<td>3,583,323</td>
</tr>
<tr>
<td>People with benign prostatic hyperplasia eligible for invasive procedures</td>
<td>0.64%</td>
<td>23,000</td>
</tr>
<tr>
<td>People for whom GreenLight XPS is appropriate</td>
<td>59.13%</td>
<td>13,600</td>
</tr>
<tr>
<td>People estimated to have GreenLight XPS each year from year 2</td>
<td>50.00%</td>
<td>6,800</td>
</tr>
<tr>
<td>People having GreenLight XPS as elective inpatients</td>
<td>47.00%</td>
<td>3,196</td>
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<tr>
<td>People having GreenLight XPS as a day-case procedure</td>
<td>53.00%</td>
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2.4 We estimate that approximately 13,600 people will be eligible for GreenLight XPS each year.

2.5 From year 2 after implementation, we estimate 6,800 people will have GreenLight XPS procedures each year (based on 50% uptake).

3 Assumptions made

3.1 The resource impact template makes the following assumptions:

- A day-case rate of 53%. The external assessment centre estimated a day-case rate of 36%, but evidence and expert opinion suggests that this may increase to 70%.
More people will have day-case procedures with GreenLight XPS system than with TURP. It is assumed that only 4% of people have day-case TURP.

There will only be 6 months of uptake in 2016/17 because of the timing of the guidance.

When GreenLight XPS is fully implemented, 50% of eligible people will have the procedure. The remaining 50% will have TURP.

The GreenLight XPS console is provided at no cost to the hospital (based on a contracted commitment to fibre usage). An average cost of £550 per fibre has been used.

4 Resource impact

4.1 The annual saving associated with implementing the guidance for the population of England is £2.3 million, as shown in table 3. Savings from year 2 are equivalent to £4,200 per 100,000 people.

Table 3 Resource impact of implementing the guidance for the population of England using NICE assumptions

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Resource impact report: GreenLight XPS for benign prostatic hyperplasia (BPH) (June 2016)
4.2 According to the 2016/17 national tariff for TURP (LB25B and LB25C), day-case treatment with TURP costs £204 more than the comparable elective inpatient charge.

4.3 The company has advised that the cost of fibres depends on how many fibres the provider commits to purchase on an annual basis. An annual commitment to purchase fibres above a minimum number secures placement of a GreenLight XPS console at no extra cost. The average cost per fibre is around £550.

5 Savings and benefits

5.1 This guidance is cost saving for the NHS. The level of savings depends on how many GreenLight XPS procedures are done as day cases and the cost of the GreenLight XPS fibres.

5.2 We anticipate that more people will have day-case procedures with GreenLight XPS than with TURP. This will reduce the number of bed days needed by people with BPH, allowing providers to better utilise beds. The reduction in bed days is a non-cash releasing saving. The additional day cases generate increased income for providers due to the day case uplift for these procedures.

5.3 Using GreenLight XPS is also expected to reduce the number of adverse events associated with treatment. These savings will offset the additional cost to commissioners of day-case procedures, as well as being better for patients.

6 Other considerations

6.1 The guidance is based on the GreenLight XPS console being provided at no extra cost, which is only the case when providers commit to purchasing a minimum number of fibres. The template and this report are based on the same assumptions.
If providers choose to purchase the GreenLight XPS console separately, fibres are available at a reduced cost.

7 Sensitivity analysis

7.1 The model used in the template is sensitive to changes in the day-case rate. The cost saving if 36% of procedures are done as day cases is around £1.3 million. At 53%, savings are around £2.3 million. At 70%, savings increase to £3.2 million.

7.2 The model is also sensitive to changes in the cost of GreenLight XPS fibres.

8 Implications for commissioners

8.1 The national tariff for day-case TURP is higher than the elective inpatient rate by £204. However, this additional cost should be offset by a reduction in treatment costs for adverse events when using GreenLight XPS.

8.2 GreenLight XPS falls within the programme budgeting category 17A – Genital tract problems.
About this resource impact report

This resource impact report accompanies the NICE medical technology guidance on GreenLight XPS for benign prostatic hyperplasia (BPH) and should be read in conjunction with it. See terms and conditions on the NICE website.

This report is written in the following context

This report represents the view of NICE, which was arrived at after careful consideration of the available data and through consulting healthcare professionals. The report is an implementation tool and focuses on the recommendations that were considered to have a significant impact on national resource use.

Assumptions used in the report are based on assessment of the national average. Local practice may be different from this, and the impact should be estimated locally.

Implementation of the guidance is the responsibility of local commissioners and providers. Commissioners and providers are reminded that it is their responsibility to implement the guidance, in their local context, in light of their duties to have due regard to the need to eliminate unlawful discrimination, advance equality of opportunity and foster good relations. Nothing in this costing tool should be interpreted in a way that would be inconsistent with compliance with those duties.

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