Background: Two stage exchange (2SE) has been the gold standard treatment strategy for chronic PJI, with success rates ranging from 42% to 76%. Longer time to reimplantation was associated with better outcome.

Methods: Retrospective cohort study. Data source: Hospital for Special Surgery (HSS) Infection Database.

Inclusion:
- 2009-2014
- Hip and knee PJI treated with 2SE
- Cases met MSIS criteria for PJI

Primary outcome: Prosthesis retention 2 years after reimplantation.

Results:
- 300 patients undergoing 2-stage exchange
- 141 hips and 159 knees
- Mean age 66 years; 42% were female

Spacer Exchange

<table>
<thead>
<tr>
<th></th>
<th>Failed</th>
<th>Success</th>
</tr>
</thead>
<tbody>
<tr>
<td>No</td>
<td>24</td>
<td>97</td>
</tr>
<tr>
<td>Yes</td>
<td>6</td>
<td>14</td>
</tr>
<tr>
<td>Total</td>
<td>30</td>
<td>111</td>
</tr>
</tbody>
</table>

(Results: Hip Spacers)

Spacer Exchange: Failed 2.6[CI: 1.1-6.8]; p=0.04

(Results: Knee Spacers)

Conclusions:
- Patients requiring spacer exchange prior to completing two-stage exchange for the treatment of PJI have worse outcomes than their counterparts.
- Clinical implication: Because patients failing two stage exchange are likely to have worse outcomes than their counterparts, need for spacer exchange should prompt earlier consideration of limb salvage procedures (especially in TKR).

References:

Abstract

Aims

- What is the impact of spacer exchanges on the likelihood of success after reimplantation in hip and knee PJI?

Background:

- Two stage exchange (2SE) has been the gold standard treatment strategy for chronic PJI, and likely remains the most successful strategy.
- Recent studies have shown that morbidity and cost are high, and success is perhaps lower than commonly thought.
- Significant percentage of patients are never reinplanted.
-Spacer exchange is commonly performed on patients with persistent infection after spacer placement. Data on patients who require spacer exchange between explantation and reimplantation are limited.

Background:

- Two stage exchange (2SE) has been the gold standard treatment strategy for chronic PJI, with success rates ranging from 42% to 76%. Longer time to reimplantation was associated with better outcome.

Methods:

- Retrospective cohort study.
- Data source: Hospital for Special Surgery (HSS) Infection Database.

Inclusion:
- 2009-2014
- Hip and knee PJI treated with 2SE
- Cases met MSIS criteria for PJI

Primary outcome: Prosthesis retention 2 years after reimplantation.

Results:
- 300 patients undergoing 2-stage exchange
- 141 hips and 159 knees
- Mean age 66 years; 42% were female

Spacer Exchange

<table>
<thead>
<tr>
<th></th>
<th>Failed</th>
<th>Success</th>
</tr>
</thead>
<tbody>
<tr>
<td>No</td>
<td>24</td>
<td>97</td>
</tr>
<tr>
<td>Yes</td>
<td>6</td>
<td>14</td>
</tr>
<tr>
<td>Total</td>
<td>30</td>
<td>111</td>
</tr>
</tbody>
</table>

(Results: Hip Spacers)

Spacer Exchange: Failed 2.6[CI: 1.1-6.8]; p=0.04

(Results: Knee Spacers)

Conclusions:
- Patients requiring spacer exchange prior to completing two-stage exchange for the treatment of PJI have worse outcomes than their counterparts.
- Clinical implication: Because patients failing two stage exchange are likely to have worse outcomes than their counterparts, need for spacer exchange should prompt earlier consideration of limb salvage procedures (especially in TKR).

References: