How To Make EVAR More Cost Effective And Profitable For Hospitals In Today’s Health Care Environment

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Conflict of Interest

- Cook, Inc: trial research support
- Trivascular: trial research support
- W.L. Gore: trial research support, fellow educational support

Hospital cost of endovascular versus open repair of abdominal aortic aneurysms: A multicenter study


- Endograft costs were 52% of total hospital cost
- “At current device pricing [$~10,000 in 1999] mean blended Medicare reimbursement does not cover the cost of endovascular AAA repair.”

Hospital Cost and Reimbursement

- “EVAR is currently associated with significant negative operating margins among Medicare beneficiaries.”
- “These data indicate that EVAR must undergo dramatic care delivery redesign for this practice to remain sustainable.”

Anatomic Severity and EVAR Cost

- More challenging anatomy correlated with increased EVAR cost
- Patients with a Anatomic Severity Grade (ASG) of >15 had a $9100 mean increase in cost
- Suggests that anatomic complexity should be considered in reimbursement for EVAR


Rasheed et al (Univ Rochester), SVS podium presentation June 2015

The financial implications of endovascular aneurysm repair in the cost containment era

Dartmouth paper

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**Current List Price, Aortic Endografts**

<table>
<thead>
<tr>
<th></th>
<th>BODY</th>
<th>Limbs</th>
<th>Component use (Base)</th>
<th>Cost (Base)</th>
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</thead>
<tbody>
<tr>
<td>Excluder</td>
<td>$10,500</td>
<td>$4300</td>
<td>2</td>
<td>$14,800</td>
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<tr>
<td>Endurant II</td>
<td>$9,975</td>
<td>$4,650-6,495</td>
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<td>$14,625-16,967</td>
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<td>Zenith</td>
<td>$8,458</td>
<td>$3,085</td>
<td>3</td>
<td>$14,628</td>
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</table>

*Data supplied by WL Gore, Medtronic and Cook*

**Hospital Reimbursement**

AAA Repair
- Fixed amount to hospital (DRG)
  - regardless of method of treatment
    - (EVAR or open)
  - No adjustment for length of stay
  - No “carve out” reimbursement for the endograft

**Medicare Hospital Reimbursement**

AAA Repair (Open AND EVAR)

*New Codes as of Oct 1, 2015:*
- MS-DRG 268* (replaced 237)
- MS-DRG 269 (replaced 238)

*Aortic and Heart Assist Procedures except pulsation balloon*

**NEW**

<table>
<thead>
<tr>
<th></th>
<th>New Code 268 / 269</th>
<th>Old Code 237/238</th>
<th>% increase</th>
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</thead>
<tbody>
<tr>
<td>With major co-morbidities or complications</td>
<td>$34,027* (268)</td>
<td>$27,418 (237)</td>
<td>24%</td>
</tr>
<tr>
<td>Without major co-morbidities or complications</td>
<td>$21,151* (269)</td>
<td>$18,465 (238)</td>
<td>14.5%</td>
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</table>

*Medicare national average*
Potential Strategies to improve Hospital economics for EVAR

- Increase Hospital Reimbursement
  - Optimal code co-morbidities and complications, so a higher % of cases can qualify for the higher reimbursing 268 DRG (60% better)
  - Petition CMS to consider anatomic severity in reimbursing EVAR

- Reduce Endograft Costs
  - Hospital Initiatives
    - Negotiate cost with vendor
    - Reduce cost per component
  - Provider Initiatives
    - Preferentially use the lowest cost device (as suggested by Dartmouth group)
    - Don’t plan on using an extra limb with a “2-piece” device when a 3-piece system would work (if your hospital pays “per component” and not “per case”)