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Commentary: “When I was your age...”

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In this issue of the *Journal*, Liu and colleagues¹ compare the outcomes of mycotic aneurysms managed by endovascular or open techniques. They argue that open surgical repair, particularly in those with surrounding phlegmon or abscess that is smaller than 2 cm, is associated overall with improved outcomes.

The patients in this series had primary aortic infections, and most were in stable enough condition to undergo a month or more of antibiotic treatment before intervention. Of note, the endovascular candidates were deemed to be “older, more fragile, near ruptured.” Open surgical repair consisted of extra-anatomic bypass and wide débridement in the setting of extensive infection and in situ bypass when there was no evidence of extensive surrounding involvement. Given the complexity of these cases and the selection bias toward endovascular repair in sicker patients, the outcomes in both groups are impressive.

The advantage of open surgery that Liu and colleagues¹ stress is the chance to eradicate infection. The importance of serial débridement, vacuum-assisted wound closure, and long-term suppressive antibiotics are described, although the potential benefits of homografts are not discussed. A significant number of patients who received endografts went on to open surgery, emphasizing the potential role of endografts as a bridge to definitive treatment.

It is generally accepted that managing an infected aorta with an endograft is a palliative approach. There is a sense (perhaps biased) that as younger surgeons gain more experience with catheter-based techniques and have less experience with open repairs, endovascular repair offers an easy

Homograft reconstruction after resection of mycotic infrarenal aneurysm.

CENTRAL MESSAGE

In the setting of aortic infection, open surgery offers the optimal chance to eradicate the infection. Endovascular repair can provide a palliative approach.

way out on a Friday night, but that this only delays the inevitable. As Liu and colleagues¹ demonstrate, this may be a perfectly valid approach in fragile patients. As in other cases of infection, however, direct surgical débridement and drainage seems to have better outcomes. Endograft repair could be used to prevent rupture and then be followed up by débridement, wrapping of the endograft in omentum or other tissue, and even interval open repair. In the rare cases with which we have been involved, our bias is to use homograft for open repair if performing in situ or extra-anatomic bypass in the setting of widespread infection, to perform wide débridement, have a low threshold for reoperation and washout, to use antibiotic beads or other adjuncts, and to use autologous tissue to fill any cavities left behind.

Although this series involved primary mycotic aneurysms, the principles apply to all infected aneurysms. Wide surgical débridement will be required if there is a hope for definitive cure. Open surgical approaches can achieve excellent results. Endovascular approaches can be used as palliation or a bridge to definitive treatment.

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