

Cardiothorac Surg. December 20, 2011 [Epub ahead of print].

5. Astudillo LM, Santana O, Urbandt PA, Benjo AM, Elkayam LU, Nascimento FO, et al. Clinical predictors of prosthesis-patient mismatch after aortic valve replacement for aortic stenosis. *Clinics (Sao Paulo)*. 2012;67:55-60.

doi:10.1016/j.jtcvs.2012.03.017

PREVIOUS USE OF ASCENDING-DESCENDING POSTERIOR PERICARDIAL BYPASS WITH VALVE-SPARING AORTIC ROOT REPLACEMENT To the Editor:

We recently read the interesting case report by Anderson and colleagues¹ discussing the surgical treatment of a patient with a coarctation of the aorta and aortic root aneurysm. They successfully performed a valve-sparing root replacement, along with an ascending-descending posterior pericardial bypass. We commend Anderson and colleagues¹ on their excellent result.

We agree that ascending-descending posterior pericardial bypass should be considered in adult patients with coarctation of the aorta and concomitant cardiac pathology requiring surgical attention through a median sternotomy.^{2,3} The combination of valve-sparing root replacement and ascending-descending posterior pericardial bypass was first reported in 2008, when we used this surgical approach in the successful treatment of a 20-year-old man with an aortic root aneurysm and severe coarctation of the aorta.⁴ Since that time, we have performed this operation on 2 more patients, and we find it to be a reproducible solution to a potentially difficult problem. We are disappointed that Anderson and colleagues¹ failed to acknowledge our original contribution 4 years ago.

Harold M. Burkhardt, MD^a

Heidi M. Connolly, MD^b

^aDivision of Cardiovascular Surgery

^bDivision of Cardiovascular Diseases

Mayo Clinic

Rochester, Minn

References

1. Anderson ND, Williams JB, Harrison JK, Hughes GC. Ascending-descending aortic bypass with valve-sparing root replacement for coarctation with aortic root aneurysm. *J Thorac Cardiovasc Surg.* 2012;143:514-5.
2. McKellar SH, Schaff HV, Dearani JA, Daly RC, Mullany CJ, Orszulak TA, et al. Intermediate-term results of ascending-descending posterior pericardial bypass of complex aortic coarctation. *J Thorac Cardiovasc Surg.* 2007;133:1504-9.
3. Burkhardt HM, Dearani JA, Connolly HM, Schaff HV. Ascending-descending posterior pericardial bypass of complex coarctation of the aorta. *Semin Thorac Cardiovasc Surg Pediatr Card Surg Annu.* 2011;14:116-9.
4. Alegria JR, Burkhardt HM, Connolly HM. Coarctation of the aorta presenting as systemic hypertension in a young adult. *Nat Clin Pract Cardiovasc Med.* 2008;5:484-8.

doi:10.1016/j.jtcvs.2012.02.017

Reply to the Editor:

We read with interest the letter by Burkhardt and Connolly from Mayo Clinic regarding our recent article describing ascending-descending aortic bypass with concomitant valve-sparing root replacement.¹ In 2007, the Mayo group published the largest series of aortic bypass operations in the literature (n = 50) and elegantly described the general technique of posterior pericardial aortic bypass that we used in our case.² This seminal 2007 article was appropriately referenced in our report. A follow-up review article from Burkhardt and colleagues in 2011 reiterated the aortic bypass technique as well as the outcomes of the original 50 patients described in 2007.³ Of note, neither the 2007 nor 2011 articles described the performance of any concomitant aortic root operations. Burkhardt and Connolly now claim to have first reported an aortic bypass with valve-sparing root replacement operation in 2008 and are disappointed that we did not acknowledge this contribution in our report. Unfortunately, the case report from 2008 that describes this operation fails to make use of appropriate aortic nomenclature.⁴ The phrase “valve-sparing” does not appear anywhere within the article, and the

abstract states only that the ascending aorta was replaced and makes no reference to an aortic root operation. Thus the 2008 case report was not identified by routine searches of the indexed medical literature for valve-sparing operations. The abstract incorrectly described ascending aortic replacement as opposed to aortic root replacement, and the authors of the 2011 review article from Mayo failed to update their case series and did not describe the performance of any additional concomitant root procedures. We regret that we were unable to identify the 2008 case report and are happy to acknowledge the Mayo group’s claim to primacy in performing aortic bypass with valve-sparing root replacement operation at this time. Nonetheless, we recommend appropriate use of aortic nomenclature and careful review of surgical manuscripts by a surgeon to avoid confusion in the future.

Since the time of our previous report, we have combined ascending-descending aortic bypass with conventional button Bentall root replacement and proximal arch (hemiarch) replacement, as well as supracoronary ascending aortic and hemiarch replacement. Both cases were patients with the bicuspid aortic valve syndrome,⁵ including proximal aneurysmal pathology extending to the level of the proximal arch. We take this opportunity to claim primacy for the performance of concomitant arch replacement with ascending-descending bypass, because this is not mentioned in any of the previous Mayo reports or elsewhere in the literature.

Nicholas D. Andersen, MD

G. Chad Hughes, MD

Division of Thoracic and

Cardiovascular Surgery

Duke University Medical Center

Durham, NC

References

1. Andersen ND, Williams JB, Harrison JK, Hughes GC. Ascending-descending aortic bypass with valve-sparing root replacement for coarctation