Reviewer's report

Title: The Scandinavian Multicenter Hemodynamic Evaluation of the SJM Regent Aortic Valve

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Reviewer: Leidulf Segadal

Reviewer's report:

The present manuscript presents data from 112 patients operated with the SJM regent valve through 2 years in 7 centers followed up after one year. In only 61 DSE a full stress protocol were achieved. Why?

The purpose of the study is relevant and the methods adequate.

The results are good and well presented and discussed.

On average only 8 patients were included at each center through two years. What were inclusion and exclusion criterias?

The material may be one of the largest evaluated by DSE. However very few of the smallest (and most interesting ) sizes are evaluated. How do the results of these small valves compare two other materials for instance Akira Sezai, Ann Thorac Surg 2010;89 (not cited) where a substantial number of valves in the sizes 17 -21 are investigated?

Minor revisions:

In the chapter Echocardiographic recordings the suffixes should be made consistent (lvot, ao)

In table 2 the left column is of little interest because of the heterogenous population (mixture of aortic regurgitation and stenosis). Particularely, the preoperative performance index seems meaningless.

Level of interest: An article of importance in its field

Quality of written English: Acceptable

Statistical review: No, the manuscript does not need to be seen by a statistician.

Declaration of competing interests:

I declare that I have no competing interests.