

Abstract No. **57**

Category: **Valvular Heart Disease**

Title: **Trans-catheter aortic vs Rapid deployment valve implantation in high risk patients in Bogotá, Colombia**

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Abstract:

Background: Trans-catheter aortic valve implantation (TAVI) and rapid deployment valve (RDV) implantation are surgical alternatives for aortic valve stenosis (AS). The aim of this study is to compare the clinical and echocardiographic outcomes between these two surgical techniques at Clinica Universitaria Colombia (CUC) in Bogotá.

Methods: From June 2012 to April 2019, 41 patients underwent TAVI (49.3%) and 42 patients RDV surgery (50.6%) at CUC. The preoperative and operative data of the patients was collected during hospitalization. The patients were followed up with TT ECHO before hospital discharge, and at 3, 6 and 12 months after surgery. A quality of life survey was done by phone during the follow-up. A bivariate analysis was made to compare the two procedures and a Kaplan- Meier model was used for survival analysis.

Results: The operative (TAVI 1/41 vs RDV 1/42) and overall mortality (TAVI 5/41 vs RDV 6/42) was similar between the two groups ($p=0,98$ and $p=0,79$) although the median EuroSCORE (TAVI 10,5 vs RDV 5) was significantly higher for TAVI ($p=0,00016$). The postoperative left ventricular ejection fraction (LVEF) was similar between the groups ($p=0,76$). Both the medium and peak trans-prosthetic gradient were higher for TAVI ($p=0,00038$ and $p=0,00078$) but the incidence of paravalvular leak (PVL) was similar for the two procedures during the echo follow up (TAVI= 12/41, RDV= 7/42 $p=0,18$). The quality of health perception was significantly higher in the RDV group ($p=0,002$).

Conclusions: RDV was associated with better prosthesis performance and better quality of health perception. The mortality and the incidence of PVL was the same in both groups although Euroscore was higher for TAVI group