(CaMS), but prevalence of both is poorly defined. Multidetector computed tomography (MDCT) allows fine quantification of calcifications and is a reliable tool in rheumatic mitral stenosis, but its contribution in CaMS remains unknown. Our objective was to estimate prevalence of MAC and CaMS in patients referred for TAVI using MDCT, and determine morphological factors leading from MAC to CaMS.

Methods and results A cohort of 346 consecutive patients referred for TAVI evaluation was screened by MDCT for MAC. One hundred and seventy-four patients were positive for MAC. Among these patients, 165 had mitral valve area (MVA) assessable by MDCT planimetry (mean age 84 years). Analysis by segment revealed calcifications on: A1 30.9%, A2 29.1%, A3 42.4%, P1 56.4%, P2 78.8%, P3 69.7%. Mean age of MVA was significant but moderate (r=0.433). On multivariate analysis, MVA was independently linked to mitral calcification volume, aortic annular area and specific patterns of mitral leaflet calcification underlying the role of A2 (AUC 0.81). Interobserver reproducibility of MVA was high (ICC 0.935).

Conclusions MDCT allows detailed assessment of MAC in TAVI populations, demonstrating high prevalence, and quantification of CaMS in the long term.

The independent predictors of mitral restenosis after a successful PMC are the guaranty for the maintain of good result in the long term.

The author hereby declares no conflict of interest