ENDOVASCULAR THROMBECTOMY FOR STROKE IN ELDERLY PATIENTS: A COMPREHENSIVE MULTICENTER ANALYSIS – INSIGHTS FROM THE STAR COLLABORATION

Introduction Acute ischemic strokes (AIS) due to large vessel occlusion (LVO) occur more frequently in elderly patients, resulting in more severe symptoms and worse outcomes after treatment. The purpose of this study is to evaluate the age-dependent outcomes of Endovascular Thrombectomy (ET) in the real world, using a large dataset from the Stroke Thrombectomy and Aneurysm Registry (STAR).

Methods All patients undergoing endovascular thrombectomy for AIS at 12 comprehensive stroke centers between January 2013 and December 2018 were included. Data were retrospectively collected by reviewing patient charts and procedure notes. The primary endpoint was the modified Rankin Score (mRS) at 90-days after the procedure, which was dichotomized into good outcome (mRS 0–2) or poor outcome (mRS 3–6).

Results Out of the 3850 patients that underwent mechanical thrombectomy, 2,827 patients (mean age 69±14, 49% female) had 90-day follow-up and were included in this study. When adjusting for confounding variables using multivariate logistic regressions, increased age was found to be an independent predictor of poor outcome (OR=1.4, p<0.001) and mortality (OR=1.5, p<0.001). An age increment of 10 years was associated with 23% higher odds of symptomatic hemorrhage, and 50% higher odds of mRS 5–6. Predictors of good outcome in elderly population (≥80 years) included higher ASPECT score (Suppl 1): A1–A172 A73