**LONG TERM COMPARISON OF PLATINUM CHROMIUM-BASED EVEROLIMUS-ELUTING STENT VERSUS COBALT CHROMIUM-BASED ZOTAROLIMUS-ELUTING STENT: 3-YEAR OUTCOMES FROM THE HOST-ASSURE RANDOMIZED CLINICAL TRIAL**

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**Objective:** This study sought to compare the long-term outcome of platinum chromium-based everolimus-eluting stents (PtCr-EES) versus cobalt chromium-based zotarolimus-eluting stents (CoCr-ZES) in all-comers receiving percutaneous coronary intervention.

**Method:** 3,755 patients receiving PCI were randomized 2:1 to PtCr-EES or CoCr-ZES, and 96.0% of patients completed 3-year clinical follow up. The primary outcome was target lesion failure (TLF) at 3-year post-PCI, defined as the composite of cardiac death, target vessel-related myocardial infarction (MI), and clinically-driven target lesion revascularization (TLR).

**Results:** At 3 years, TLF occurred in 5.3% and 5.4% of the population in the PtCr-EES and CoCr-ZES groups, respectively (HR 0.978, 95% CI 0.730-1.310, p=0.919). There were no significant differences in the individual components of TLF (cardiac death, 2.8% vs. 2.4%, p=0.493; target vessel-related MI, 1.0% vs. 0.7%, p= 0.451; clinically-driven TLR, 2.2% vs. 2.7%, p=0.314). Routine angiographic follow-up was performed in 38.9% of the total patients. In a landmark analysis of the subgroup that received angiographic follow-up, the TLF rate of CoCr-ZES was significantly higher than PtCr-EES during the angiography follow-up period (p=0.011), mainly due to higher repeat revascularization rate. There were 3 cases of very late definite thrombosis in PtCr-EES, but not in CoCr-ZES. Overall definite and probable stent thrombosis rates were very low in both groups (0.5% vs. 0.6%, p=0.677).

**Conclusion:**PtCr-EES and CoCr-ZES showed comparable and excellent long-term outcomes in both efficacy and safety after PCI in an all-comer population. The rate of repeat revascularization in CoCr-ZES was slightly higher than in PtCr-EES when routine angiography follow-up was performed.