prespecified primary endpoint is the comparison of “NACCE” or net adverse cardiac and cerebrovascular events (death, myocardial infarction, cerebrovascular accident, and major bleeding) at 12 months after implantation. After performing propensity scoring to adjust for differences in baseline characteristics, the noninferiority of the 3-month DAPT arm to the 12-month DAPT arm will be assessed with respect to the incidence of NACCE.

Results: There were 2,105 patients enrolled in the 3-month DAPT arm and 1,345 patients included on the 12-month DAPT arm. Baseline characteristics of both groups were: men, 75.4% and 74.3%; mean age, 68.7 and 67.6 years; diabetes, 32.6% and 35.9%; acute coronary syndrome, 40.7% and 36.3%; number of lesions, 1,453 and 1,738; target vessel lesions LMCA (0.3% and 0.8%), LAD (51.3% and 43.4%), LCX (18.4% and 18.4%), and RCA (30.0% and 38.2%); de novo lesions, 99.3% and 97.5%; reference vessel diameter, 2.71 mm and 2.58 mm; pre-minimum lumen diameter, 0.81 mm and 0.75 mm; pre-% diameter stenosis, 70.0% and 71.0%; lesion length, 15.7 mm and 16.8 mm; and total stent length, 21.4 mm and 24.4 mm.

Conclusions: Baseline characteristics of both arms were similar. The present study will provide insight into the optimal duration of DAPT after E-ZES implantation. Per-protocol analysis results will be presented at TCT in 2013.

TCT-144

Randomized Comparison Study Assessing the Impact of Cilostazol on Heart Rate and Arrhythmias by 24-hour Ambulatory Holter Electrocardiographic Monitoring after Drug-Eluting Stent Implantation in Coronary Artery Disease

Boon-June Kwon1, Sang-Hyun Ihn2, Hee-Yoo Kim3, Su-Hyun Lee4, Ki-Koo Seong5, Ho-Joong Youn6

1Division of Cardiology, The Catholic University of Korea, Bucheon, Korea, Republic of, 2Division of Cardiology, The Catholic University of Korea, Seoul, Korea, Republic of, 3Division of Cardiology, Republic of, 4The Catholic University of Korea, Seoul St. Mary's Hospital, Seoul, Korea, Republic of, 5Division of Cardiology, The Catholic University of Korea, Bucheon, Korea, Republic of

Background: Cilostazol may have a positive chronotropic or pro-arrhythmic effect, despite its beneficial effects on vasodilation and antiplatelet aggregation. However, it is unknown whether adjunctive cilostazol can contribute to tachycardia or arrhythmias after drug-eluting stents (DES) implantation. The aim of this study was to determine the impacts of adjunctive cilostazol on 24-hour heart rate and arrhythmias in patients undergoing DES implantation.

Methods: This randomized, multicenter, prospective trial compared triple antiplatelet therapy (aspirin, clopidogrel, and cilostazol, TAT, n = 113) and dual antiplatelet therapy (aspirin and clopidogrel, DAT, n = 114) at baseline and 6-month in patients receiving DES. The primary end points were 24-hour heart rate (24-HR), 24-HR ≥ 70 bpm, and 24-HR increase ≥ 5 bpm at 6-month follow-up using 24-hour Holter electrocardiographic monitoring. Secondary end points were counts or presence of premature ventricular complex (PVC), nonsustained ventricular tachycardia, sustained ventricular tachycardia, premature atrial complex, and supraventricular tachycardia at 6-month.

Results: The two groups had similar baseline characteristics. At 6-month follow-up, the 24-HR (75.4 ± 11.7 bpm vs. 69.3 ± 10.0, p < 0.001), presence of 24-HR ≥ 70 bpm (71.4% vs. 47.1%, p < 0.001), and presence of 24-HR increase ≥ 5 bpm (44.8% vs. 24.5%, p = 0.002) were significantly higher in the TAT versus DAT group. Multivariate analysis showed that the use of cilostazol (OR: 3.10, 95% CI: 1.08 to 9.60) and baseline 24-HR < 70 bpm (OR: 4.60, 95% CI: 1.16-13.63) were strong predictors of 24-HR increase ≥ 5 bpm at follow-up. In addition, 24-hour total counts of PVCs (472 ± 1497 beats vs. 86 ± 209 beats, p = 0.016) was significantly higher in the TAT versus DAT group among the secondary end points.

Conclusions: Cilostazol in addition to DAT appears to result in an increase in 24-HR and total counts of PVCs after DES implantation. Some caution should be exercised for the use of cilostazol in patients with tachycardia or a large number of PVCs when planning DES implantation.

TCT-145

Do Baseline Hemoglobin And Hematocrit Influence The On-Treatment Platelet Reactivity To Clopidogrel Measured By The VerifyNow P2Y12 Assay?

Ietakuma Pendaly1, Israel Barbach1, Kenneth Kent2, Hiroomi Kitabata3, Joshua P. Loh4, Marco A. Magalhaes5, Sa’ar Minha6, Alfazir Omar5, Hideaki Ota6, Joshua P. Loh3, Marco A. Magalhaes4, Sa’ar Minha4, Alfazir Omar5, Hideaki Ota6, Si Hyun Rhew2, Doo Sun Sim2

1Division of Cardiology, The Catholic University of Korea, Bucheon, Korea, Republic of, 2Division of Cardiology, The Catholic University of Korea, Seoul, Korea, Republic of, 3The Catholic University of Korea, Seoul St. Mary’s Hospital, Seoul, Korea, Republic of

Background: The drug loading to pre-PCI time was similar between prasugrel and TAP (drug loading to pre-PCI time was 108.2 ± 60.51 vs. 238.1 ± 73.40, p = 18.51 vs. 16.8 ± 17.91, p < 0.001 respectively). No differences in in-hospital bleeding complications between two groups were observed.

Conclusions: Our study demonstrates that prasugrel could produce a significantly greater peri-procedural IPA as compared to TAP (LD aspirin 300 mg, cilostazol 600 mg, and clopidogrel 10 mg). Primary end points of the study were the platelet reactivity unit (PRU) or % inhibition by the VerifyNow P2Y12 assay at pre-PCI and at pre-discharge.

Results: The drug loading to pre-PCI time was similar between prasugrel and TAP groups (25.4 ± 10.42 minutes vs. 25.5 ± 10.56 minutes, p = 0.957). PRU at pre-PCI was significantly lower in prasugrel than in TAP (269.1 ± 71.69 vs. 306.5 ± 48.67, p = 0.012). The lower PRU and greater % inhibition also observed in prasugrel than in TAP at pre-discharge (108.2 ± 60.51 vs. 238.1 ± 73.40, p = 18.51 vs. 16.8 ± 17.91, p < 0.001 respectively). No differences in in-hospital bleeding complications between two groups were observed.

TCT-146

Comparison Of Peri-Procedural Platelet Inhibition With Prasugrel Versus Adjuvant Cilostazol To Dual Anti-platelet Therapy In Patients With ST Segment Elevation Myocardial Infarction

Keun-Ho Park1, Youngkum Ahn2, Young Joon Hong3, Myung Ho Jeong4, Young Wook Jeong5, Hae Chang Jeong6, Sung Soo Kim7, Jin Han Kim7, Si Hyun Rhew2, Doo San Sim1

1Chonnam National University Hospital, Gwangju, Korea, Republic of, 2Heart Research Center, Chonnam National University Hospital, Gwangju, Korea, Republic of

Background: It has been well known that the inhibition of platelet aggregation (IPA) by anti-platelet agents was important to reduce the thrombo-embolic events in patients with ST segment elevation myocardial infarction (STEMI). However, the peri-procedural IPA by anti-platelet agents was not well known.

Methods: We compared the peri-procedural IPA between prasugrel and adjuvant cilostazol to dual anti-platelet therapy (Triple anti-platelet therapy; TAP) in patients with STEMI undergoing primary percutaneous coronary intervention (PCI). We prospectively randomized 70 consecutive clopidogrel-naive patients with STEMI planned PCI to either prasugrel [loading dose (LD) 60 mg; 37 patients] or TAP (LD aspirin 300 mg, cilostazol 600 mg, and clopidogrel 10 mg; 33 patients). Primary end points of the study were the platelet reactivity unit (PRU) or % inhibition by the VerifyNow P2Y12 assay at pre-PCI and pre-discharge.

Results: The on-treatment platelet reactivity to clopidogrel measured by VerifyNow P2Y12 PRU is significantly influenced by patient’s baseline H&H, while the platelet reactivity measured by LTA and VASP does not seem to be impacted.