Extremely Low Prevalence of Takotsubo Cardiomyopathy and Transient Cardiac Dysfunction in Stroke Patients With T-wave Abnormalities

Stone et al studied an important association about the presence of cerebral T waves in 800 patients with ischemic stroke.[1] They demonstrated that about 17 (2.1%) patients presenting with stroke exhibited cerebral T waves and of those, only 3 patients (18%) with T-wave abnormality have transient systolic dysfunction on echocardiography. Thus overall, only 0.0037% (3 of 800) patients developed Takotsubo cardiomyopathy (TC) in the study group of patients with stroke.[1]

Patients with TC often exhibit a dynamic spectrum and evolution of electrocardiographic (ECG) changes.[2,3] The electrocardiographic evolution in TC patients is almost very similar to the ECG staging in pericarditis/perimyocarditis.[3,4] Patients with ST elevation in Stage 1, followed by ST-normalization in Stage-2, T-wave inversions in Stage-3 and often complete normalization of T waves or very rarely persistence of T inversions in Stage 4. Stage-2 and Stage-3 changes may often overlap and sometimes all Stage changes (including Stage 3) may not be present in all patients.[3,4]

The left ventricular dysfunction in some patients with TC may be short lasting and may already show either improvement or even normalization by the time of Stage 3 ECG changes. We believe that this may be one of the reasons for the extremely low noted prevalence of wall motion abnormalities in the present study as study focused only on patients with Stage 3 ECG changes. Other plausible explanation may be that many stroke patients may have diabetes mellitus (DM) which is an underlying risk factor for stroke but on the other hand, DM serves as a potential protective factor for the development of TC due to autonomic dysfunction and blunting of catecholamine response in such patients.[5,6]

We would appreciate authors' observation on DM incidence in their study and potentially reporting a separate study including all the potential stage ECG changes of TC which would another valuable contribution to the literature.

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Economic Outcomes and Geographic Trending in Patients With Limiting Angina Pectoris

The analysis of the economic and clinical outcomes associated with the use of an available drug (ranolazine) in patients with stable angina pectoris is a welcome addition to a literature too often focused on industry-driven drug studies designed to demonstrate benefit in narrow-based outcomes that will ultimately support expanded but unstudied use.[1] The present study suggests that marginal cost differentials are associated with perhaps fewer percutaneous coronary intervention (PCI), fewer admissions for atrial fibrillation, heart failure, or all causes.

Within the whole cohort, the ranolazine group was notable for both twice as much use of platelet inhibitors (P2Y12 antagonists), and one third of calcium channel blockers when compared with the conventional group. It occurs to me that this suggests a greater number of prior PCIs in the ranolazine group. Is this the case? Both differences were erased in matched weighted groups, presumably as were difference in the number of previous procedures.

Many studies have demonstrated regional variations in outcomes that may have impacted overall results.[2–4] It would be useful to understand whether geographic availability of facilities (angioplasty and surgical revascularization) impacted the results of ranolazine use. It would also be helpful to ascertain whether there was a geographic variation within the Veteran's Administration (VA) system of current smoking, and the effect of such smoking on these results that might lead to precisely aimed efforts to reduce cardiovascular events.

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