

February 12, 2018

Dear WJC Editorial Board,

Thank you for the opportunity to revise and resubmit our manuscript, entitled "*Outcomes after Asystole Events Occurring during Wearable Defibrillator-Cardioverter Use*". Below, we reply in detail to each specific comment by the reviewers. We thank everyone for their well-considered critiques and hope the manuscript is now considered appropriate for publication in WJC.

I do appreciate your time and effort in reviewing our work. If you have any other questions or concerns, please do not hesitate to contact me.

Sincerely,

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**Reviewer #1 comments:**

Asystole represents, without a doubt, the most difficult condition to treat within the causes of cardiac arrest; moreover, it constitutes a real challenge during the application of out-of-hospital CPR protocols. The innovative application of the device "Wearable Defibrillator-Cardioverter" allows to manage this serious risk on a specific group and well selected patients, as it is presented in the following work. The results obtained in the different types of asystole are truly encouraging and reflect an optimal management of the heart disease in question. It seems to me a very good job and it is worth encouraging the authors to continue their valuable research with a view to further improving the very good survival rates presented here.

**Response:**

We thank the reviewer for the kind comments and are greatly appreciative of their time and efforts reviewing the manuscript.

**Reviewer #2 comments:**

The aim of the paper of Liang and coll. is very intriguing, but some points should be clarified by the authors.

**Reviewer Comment #1:**

The comparison between the group of patients with and without asystole events could be useful in order to better characterise patients. Among history of arrhythmias, in a relevant percentage of patients, also bradycardia and AV block were present. Why WDC was used in these patients?

**Response:**

We thank the reviewer for this important comment. In looking at the 31 pts with a history of bradycardia or AV block, it appears that 16 (52%) also had a history of VT/SCA, and for some reason were unable to receive an ICD. Given the retrospective nature of this registry study, we unfortunately do not have access to notes regarding why the remaining patients did not previously undergo pacemaker implantation. This limitation is mentioned in the limitations section

**Reviewer Comment #2:** Was the prevalence the history of bradyarrhythmias different in patients with WDC who did and did not experience asystole episodes?

**Response:**

To answer this question would require a detailed medical review of all 50,000+ remaining patients and unfortunately, this would not be possible since this is not something that ZOLL regularly captures in their registry. As such, we were only able to perform detailed review of the 257 patients in the study cohort.