



POCUS in Out-of-Hospital Cardiac Arrest

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Abbreviations:

EMS: Emergency Medical Services
POCUS: point-of-care ultrasound

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To the Editor:

We have read with great interest the recent article “Point-of-Care Ultrasound Use by EMS Providers in Out-of-Hospital Cardiac Arrest” by Kreiser, et al.¹ This article is invaluable as it evaluates the prehospital point-of-care ultrasound (POCUS) practice, which is rarely used world-wide in Emergency Medical Services (EMS), and the ability of paramedics to use ultrasound.¹ As the authors stated, since healthy information cannot be obtained with pulse control, real-time evaluation with ultrasonography will both accelerate the diagnosis process and reduce the number of wrong applications.

First of all, we would like to state that the methodology of the study was very well-established. Thanks to the detailed creation of the Prehospital Echocardiogram in Cardiac Arrest (PECA) protocol, it will lead to future randomized studies.

There are some points about the study that we would like to discuss. The first of these concerns the groups that were not included in the study. We could not clearly understand the reason for exclusion of patients with electrocution and witnessed drowning.

Survival to admission rates were 21.1%, while survival to discharge rates were 2.6%. Survival to discharge rates are lower than previous studies.^{2,3} Of course, this may vary according to patient characteristics. However, this situation arouses curiosity since no information is given about patient characteristics. Although it is stated that the evaluation takes less than 10 seconds, we think that the information on how many seconds the evaluation is made on mean or median should be given. It could also give an idea about the success of the intervention if it was compared with the standard care group in addition to the POCUS group evaluated in the study.

In addition, we think that paramedics will be successful in applying prehospital ultrasound to the correct place of cardiac compressions.⁴ Although not mentioned in the study, there is no doubt that EMS personnel will increase survival with appropriate compressions.

We think that this study is very valuable in terms of demonstrating the skills of the prehospital staff. We are sure that POCUS applications will become more wide-spread in the future. We thank the authors for writing this important article.

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