

RESPONSE



Reply to: “Accuracy of CSF Lactate for Neurologic Outcome in Survivors of Cardiac Arrest”

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We thank Dr. Justin H. Granstein and colleagues for their interest in our article and appreciate their comments on electroencephalography (EEG) for monitoring elevation in lactate levels due to seizures.

The seizures were obscured by the use of a neuromuscular blocker. Therefore, we applied Bispectral Index (BIS monitor; Covidien) monitoring to determine whether the patient was experiencing seizures [1]. However, elevated lactate levels, whether elevated because of the seizures or anaerobic metabolism, are associated with poor prognosis [2]. Elevated lactate levels due to seizures normalize within a few hours [3].

As mentioned in the Discussion section [4], the key point in this study is that lactate can be used as an energy fuel in groups with good neurologic outcome. Therefore, we presented the arterio-cerebrospinal fluid difference in the lactate.

We suggest that EEG is a very significant modality for predicting the neurologic prognosis of survivors of cardiac arrest. Recently, we applied amplitude-integrated EEG to survivors of cardiac arrest. As you mentioned, we expect that if biomarkers and EEG are applied together, the patient's prognosis can be predicted more accurately.

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