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LETTER TO THE EDITOR

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Epidural hematoma, a positive or negative prognostic factor? Letter to the Editor in response to Khaki et al.

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Dear Editor,

With interest, we read the article by Khaki et al. [1]. To identify the most suitable predictive computed tomographic (CT) scoring system for traumatic brain injuries (TBI) patients, they reported that the Stockholm [2] and the Helsinki [3] systems yielded the closest relationship with the actual outcomes.

To our best knowledge, a typical epidural hematoma (EDP) prognosis is good if it is discovered quickly and managed. Therefore the presence of EDH is considered a positive prognostic sign in the Rotterdam [4], Stockholm [2], and the Helsinki [3] CT scoring systems.

Khaki et al. stated that "in the Rotterdam scoring system, the presence of EDH was considered a negative sign and increased the risk of poor outcome" [1], surprisingly. While we know that the absence of EDH is a negative prognostic indicator in the Rotterdam scoring system [4].

It is recommended to revise the analysis and reinterpret the results to ensure the accuracy of the study.

Authors' response

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Dear Editor,

We kindly thank Dr Jalloh and Dr Sharif-Alhoseini for their observations on our article "Selection of CT variables and prognostic models for outcome prediction in patients with traumatic brain injury" published in Scandinavian Journal of Trauma, Resuscitation and Emergency Medicine in July 2021.

The Rotterdam scoring system is made up of different variables that each one, depending on the result, can add a point to the final score which ranges between 1 and 6, where 1 is the lowest risk and 6 is the highest risk of mortality in 6 months post traumatic brain injuries (TBI). In the Rotterdam scoring system, the presence of EDH yields no points whereas the absence of EDH yields one point, thus increasing the risk of mortality when absent.

In the article, we stated that the presence of EDH in the Rotterdam scoring system was considered a negative sign, and thus increased the risk of poor outcome in patients with TBI.

Our interpretation was incorrect since the presence of EDH is not considered an increased risk of mortality. However, the Rotterdam scoring system does not show a decrease in mortality when EDH is present such as in Stockholm and Helsinki CT scoring systems, meaning that there is no impact on outcome, but instead, inversely yields a worse outcome when EDH is absent. Whether one still can interpret EDH as a positive prognostic factor in the Rotterdam CT scoring system is a matter of discussion, because its presence does not make a difference to the risk of mortality.

Our error is clear, we cannot state that EDH is a negative prognostic sign in the Rotterdam CT scoring system. However, the analyses have been reviewed and the calculations were performed correctly; hence, the results were not affected by this error.

We hereby ask the editor to correct the manuscript accordingly.

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MJL wrote the manuscript. MS reviewed the manuscript. All authors read and approved the final manuscript.

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Declarations

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Not applicable.

Consent for publication
Not applicable.

Competing interests
The authors declare that they have no competing interests.

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