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This edition of *Trauma Surgery & Acute Care Open* contains an article by Mitra *et al*, which describes a 5-year, retrospective, registry-based cohort study of transfusion practices in an Australian trauma center.¹ The aim of the study was to evaluate the association of two ‘modifiable risk factors’—the time to blood component transfusion, and the volume of blood components transfused—with hospital mortality.

The authors hypothesized that a short time to blood component transfusion, and lower volumes of blood components during acute resuscitation, would be associated with lower mortality. They found that the time to initiating blood transfusion was indeed short, and not associated with mortality. This is a sign of a well-functioning trauma center, and the authors should be congratulated on running an effective trauma service that is able to quickly deliver blood products when needed.

The authors also found that, after adjusting for injury and shock severity, the volume of blood components transfused was associated with hospital mortality. This makes intuitive sense. For every unit of blood component transfused, the adjusted odds of death increased by 8%. Their key message is that ‘reducing the need for blood component transfusion should be the target for future interventions’.

This finding, despite the adjustment, and the resulting conclusion, need to be interpreted with caution. Transfusion volume, as the authors point out, is a marker for injury severity and mortality. Patients who bleed more have higher mortality—and require more transfusions. Minimizing the need for transfusion, through rapid control of hemorrhage (the *sine qua non* of trauma surgery) and correction of coagulopathy, is a valid goal. However, transfusion per se, especially when it is needed, may not be harmful,² and advocating for a ‘restrictive transfusion strategy’ (a term that is typically used to describe the approach to addressing anemia in hemodynamically stable patients, often in the critical care setting^{3,4}) in the context of the acute resuscitation of bleeding trauma patients risks sending the wrong message.

The past two decades have seen several large, prospective, multicenter randomized clinical trials that have improved outcomes, and shaped our practice.^{5,6} An important lesson from these studies has been that transfusing blood early (as was done in this study), avoiding the use of crystalloids, and balanced resuscitation saves lives.⁷ The conclusion by Mitra *et al* that ‘these findings suggest

investigation into strategies to achieve earlier control of hemorrhage’, to reduce the need for transfusion—rather than limiting transfusion per se—is the correct one.

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