We would like to thank Tao et al. [1] for their interest in our article [2]. As the authors of the letter point out, our study clearly demonstrates that preoperative anaemia is an important risk factor for morbidity and mortality after aortic valve surgery. While cardiac surgical procedures can be safely performed in this population, anaemic patients experience perioperative complications more frequently compared with their non-anaemic counterparts. Our study highlighted some of these issues and also identified important knowledge gaps, as indicated below:

(i) Preoperative anaemia is a common finding in patients undergoing aortic valve surgery, with almost one-third of those patients being anaemic. Although there are many potential causes for anaemia in this population [3], further prospective studies are required in order to further define the aetiology of anaemia and the potential interventions to treat it.

(ii) Preoperative anaemia is an important risk factor for both morbidity and mortality after aortic valve surgery, as found in our study and others’ [4]. However, it is unclear whether preoperative anaemia can be corrected without the administration of allogenic blood products. Furthermore, it is unclear whether the improvement in preoperative haemoglobin would result in a reduction in perioperative morbidity and mortality.

(iii) In elective patients with preoperative anaemia, appropriate identification and treatment of anaemia may lead to an improved outcome. This hypothesis needs to be validated in prospective clinical trials.

In conclusion, preoperative anaemia represents a potentially important therapeutic target for optimization in the patient undergoing cardiac surgery.

REFERENCES