Enhanced feedback interventions to promote evidence-based blood transfusion guidance and reduce unnecessary use of blood components: the AFFINITIE research programme including two cluster factorial RCTs

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Plain English summary

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Plain English summary

B lood transfusion is a common treatment. Blood is also a costly and scarce resource. Yet many transfusions are given to stable and non-bleeding patients despite evidence from clinical studies suggesting that this gives no clear benefit. Unnecessary transfusions expose patients to risks such as wrong transfusion or infection.

Audit and feedback seeks to improve clinical care by comparing practice against explicit standards. It is widely used across the NHS and internationally. Ideally, differences between actual and recommended practice drive service improvements. Audit and feedback generally works, but more studies are needed that compare different ways of giving feedback.

We developed and tested different ways to strengthen feedback to reduce unnecessary blood transfusions. We worked with the National Clinical Audit of Blood Transfusions. First, we explored opportunities for strengthening feedback. We developed two approaches: 'enhanced content' (focused on the content and format of the feedback reports) and 'enhanced support' (focused on planning what to do in response to feedback). Second, we invited all UK NHS hospitals to take part in two consecutive randomised trials; one trial concerned transfusions for major surgery and the other concerned transfusions for haematological cancers (135 hospitals took part in each). We randomly allocated hospitals to one or both of enhanced content and enhanced support. We examined patient records to assess their effects on outcomes. We found that neither enhancement improved patient care more than usual feedback, and both enhancements were slightly more costly. Third, we explored reasons for this lack of effect. Staff welcomed the enhancements but struggled to fit them into routine improvement activities. They also questioned the credibility of the transfusion audit standards. Fourth, we shared our research findings with people involved in a wide range of national audits and discussed ways to improve their impact.

Our enhanced approaches to feedback did not work. However, we have shown how to embed ambitious and rigorous research into national audit programmes.

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