



Information for clinicians

Patient Blood Management checklist

Improve patient outcomes with early identification and treatment of anaemia, pre-optimisation, intraoperative blood loss management and employment of transfusion triggers and thresholds.

Key messages

Robust Patient Blood Management (PBM) processes ensure:

- Transfusion practice is evidence-based, not based on historical or cultural practice
- Blood components are given only when the benefit to the patient outweighs the risk
- The most appropriate component is available for the patient when required and appropriate blood components are available for emergencies
- Patients receive information about safe and appropriate transfusion, are involved in the decision-making process and made aware of risks, benefits and available alternatives
- Transfusion-related risks are reduced, including human error and adverse events
- Patient outcomes improve e.g. morbidity, mortality, recovery rates and hospital length of stay

Considerations

Is your patient fit for surgery?

- Assessment and pre-optimisation of anaemia
- Check Full Blood Count when patient booked for surgery
- If Hb <130g/L check haematinics (as per local pre-operative anaemia management plan)
- Consider intravenous iron therapy if < 8 weeks to surgery

Can you reduce intra-operative blood loss?

- Give tranexamic acid for surgery where potential blood loss > 500mL
- Monitor haemostasis using near patient testing (e.g. ROTEM, TEG)
- Measure all blood loss to help guide effective decision-making
- Use alternatives to blood for replacement therapy wherever appropriate
- Use interventions such as permissive hypotension determined by patient and procedure
- Use cell salvage where appropriate/available

Can you avoid/reduce medical transfusion requirements?

- Treat iron deficiency +/- anaemia early and investigate underlying cause
- Implement restrictive transfusion triggers and a single unit strategy for non-bleeding adults
- Regularly review requirements for transfusion-dependent patients
- Involve patients in the decision to transfuse, obtaining consent and discussing alternatives

Communication

- Build robust communication links between clinical services, senior management, hospital transfusion teams (HTT) and NHSBT to optimise PBM outcomes
- Consider the potential for blood loss prior to any procedure and agree management plan. Where blood will be required despite the prudent measures outlined above, confirm that hospital blood bank can meet demand prior to commencing
- It is recommended that this is specifically addressed in all World Health Organisation (WHO) checklist, pre-operative briefings

Resources

NBTC Blood Components Indications app

<https://nhsbtdeb.blob.core.windows.net/umbraco-assets-corp/14619/blood-components-appppt.pdf>

NHS Blood and Transplant PBM website

<https://hospital.blood.co.uk/patient-services/patient-blood-management/>

Joint United Kingdom (UK) Blood Transfusion and Tissue Transplantation Services Professional Advisory Committee

<https://www.transfusionguidelines.org/>

Serious Hazards of Transfusion (SHOT) UK haemovigilance scheme

<https://www.shotuk.org>

Contact us

We would welcome your feedback and comments on this leaflet. You can contact us:

By post to:

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Or by phone: **01865 381010**

This leaflet was prepared by NHS Blood and Transplant in collaboration with the National Blood Transfusion Committee. Further supplies can be obtained by accessing <https://hospital.nhsbtleaflets.co.uk>

Individual copies of this leaflet can be obtained by calling 01865 381010.

NHS Blood and Transplant

NHS Blood and Transplant is a joint England and Wales Special Health Authority. We provide the blood donation service for England and the organ donation service for the UK. We also provide donated tissues, stem cells and cord blood. We are an essential part of the NHS, saving and improving lives through public donation. NHS Blood and Transplant enables around 5,000 organ transplants a year in the UK and collects around 1.4 million units of blood each year to meet the needs of patients across England.

For more information, visit nhsbt.nhs.uk

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