

## AB033. 153. Want not, waste not: excessive preoperative crossmatch requests for vascular peripheral bypass surgery

Megan Power Foley<sup>1</sup>, Imelda Keane<sup>2</sup>, Michael Fay<sup>3</sup>, Ciaran McDonnell<sup>1</sup>, Martin O'Donohoe<sup>1</sup>, Edward Mulkern<sup>1</sup>

<sup>1</sup>Department of Surgery, <sup>2</sup>Blood Transfusion Laboratory, <sup>3</sup>Department of Haematology, Mater Misericordiae University Hospital, Dublin, Ireland

**Background:** Blood products are essential for safe surgery, however, the over-ordering of blood for elective procedures wastes hospital resources. A Maximum Surgical Blood Ordering Schedule (MSBOS) guides preoperative orders, improving efficiency and reducing costs. As surgical techniques change, so can the need for intraoperative transfusion. Regular MSBOS audit is needed to ensure transfusion guidelines reflect surgical practice.

**Methods:** Retrospective audit of preoperative blood orders and intraoperative usage in peripheral bypass surgery. Data was collected from theatre logbooks and transfusion laboratory records. Standard was the Mater Misericordiae

University Hospital (MMUH) MSBOS: 2 units for femoral-distal bypass (FDB) and type & screen for femoral-popliteal bypass (FPB).

Results: Over 10 months, 13 patients had FDB and 21 had FPB (n=34). All had preoperative blood testing; 7 patients (20%) received intraoperative blood, 5 during an FBD and 2 during an FPB. A total of 49 units were available in theatre, and 82% were returned unused. The total crossmatch-transfusion ratio (CTR) was 5.444:1. MSBOS compliance was 92% for FDB, with a CTR of 4.16:1; 12 of 13 patients had units available, and 76% were returned unused. MSBOS compliance was 52% for FPB, with a CTR of 8:1; 10 of 21 patients had units available, and 87.5% were returned unused.

Conclusions: MSBOS compliance and overall transfusion requirements were higher for FDB, a more extensive surgery, compared to FPB. The data suggests current MSBOS guidelines for FPB reflect intraoperative transfusion requirements, and that preoperative requests are excessive. For FDB, it should be considered that current MSBOS recommendations may exceed intraoperative requirements.

Keywords: Blood transfusion; vascular surgery; audit

doi: 10.21037/map.2019.AB033

Cite this abstract as: Power Foley M, Keane I, Fay M, McDonnell C, O'Donohoe M, Mulkern E. Want not, waste not: excessive preoperative crossmatch requests for vascular peripheral bypass surgery. Mesentery Peritoneum 2019;3:AB033.