## A high-dose 24-hour tranexamic acid infusion for the treatment of significant gastrointestinal bleeding: HALT-IT RCT

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## **Plain English summary**

HALT-IT RCT

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# **Plain English summary**

A cute gastrointestinal bleeding (bleeding from the gut) is a common emergency and an important cause of death and illness worldwide. In the UK, more than 65,000 people each year are admitted to hospital because of acute gastrointestinal bleeding; approximately 10% of them die within 30 days. Gastrointestinal bleeding is also common in low- and middle-income countries. The care of patients with gastrointestinal bleeding has improved in recent decades, but death rates remain high. Gastrointestinal bleeding is often caused by stomach ulcers, but also by liver damage owing to alcohol or hepatitis C infection. An effective and affordable treatment for gastrointestinal bleeding could save many lives and may reduce the need for blood transfusions, which is important because blood is a scarce resource in some health-care settings.

Tranexamic acid, also known as TXA, is a cheap drug that reduces bleeding in other conditions. It helps blood to clot, thereby decreasing bleeding. A trial in bleeding accident victims found that tranexamic acid reduced the chances of bleeding to death, without any increase in side effects. We wanted to find out if tranexamic acid safely improves outcomes in patients with gastrointestinal bleeding, particularly to prevent deaths.

To investigate this, the HALT-IT (Haemorrhage ALleviation with Tranexamic acid – Intestinal system) trial studied 12,009 patients with significant gastrointestinal bleeding in 164 hospitals across 15 countries. Half of the patients received tranexamic acid and the other half received a dummy drug, called a placebo. The treatments were assigned randomly and given in addition to all other treatments needed. Neither the patient nor the doctor knew which treatment a patient received.

The trial showed that tranexamic acid did not reduce deaths from gastrointestinal bleeding. Instead, tranexamic acid was linked to an increased risk of complications, including unwanted blood clots (such as deep-vein thrombosis) and seizures. The economic analysis indicated that giving tranexamic acid to patients with gastrointestinal bleeding does not represent value for money for the NHS.

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