

Dialysis

Vascular Access

10. Prevention of early thrombosis

CARI Guidelines

- a. Patients undergoing vascular access surgery should be free of infection and other inflammatory states. All patients should be adequately hydrated before and during the operative procedure. (level C evidence).
- b. Access should not be created immediately prior to, or immediately after, other major surgery or other procedures which may lead to hypotension (level C evidence).
- c. Long term anti-platelet agents may diminish the risk of access thrombosis, but the preferred agent, dose, duration and benefit are undefined (level B evidence).

What is the evidence?

Antiplatelet Trialists Collaboration. Collaborative overview of randomised trials of antiplatelet therapy. II: Maintenance of vascular graft or arterial patency by antiplatelet therapy. *BMJ* 1994; 308: 159-168.

Meta-analysis of all trials of any anti-platelet agent and access outcome suggested a favourable benefit of anti-platelet agents, but without reaching statistical significance due to small numbers.

What do the other guidelines say?

DOQI: No guidelines available

BRA: No guidelines available

CSN: No guidelines available

Implementation and Audit

Early (<30 days) failure rates of access should be <10%

Suggestions for Future Research

RCT of antiplatelet agents in preventing early and late access thrombosis

Prospective evaluation of predictors of access thrombosis (homocysteine, Lp(a), CRP, haemoglobin)

RCT of Hcy reduction in preventing access thrombosis