

Global Summit on **NEPHROLOGY, UROLOGY AND KIDNEY TRANSPLANTATION**

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The use of stent-graft revascularisation for cephalic arch arteriovenous fistula stenoses**Alexandra O Stathis***Prince of Wales Hospital, Sydney NSW Australia*

Background: Patency threatening stenosis of the cephalic arch vein junction is a common problem in brachiocephalic arteriovenous fistula for hemodialysis. Endovascular solutions may be associated with early patency failure. Stent grafts may offer a patency benefit over conventional solutions and protect from intraoperative complications.

Methods: A prospective, multicentre analysis of consecutive patients with cephalic arch vein stenoses and dysfunctional hemodialysis access who received treatment with a stent graft (Viabahn, W.L. Gore, Flagstaff, US) was conducted over 2.5 years. Outcome was assessed intraoperatively, then at 1, 3 and 6 months, using duplex ultrasound and clinical parameters.

Results: 15 patients (mean age 66 years; range 37 to 94) had stent grafts successfully deployed. Of the 12 patients available for follow up at 6 months, primary patency was observed in 9 patients (75% primary patency) with 100% assisted primary patency. Beyond 6 months, restenosis developed in 3 patients requiring angioplasty with a drug eluting balloon or extension of the stent. No AVFs were lost or abandoned due to recurrent failure during the follow up period. Kaplan Meier Estimates demonstrated 6 and 12 month patency rates of 78.6% at 50.5% respectively.

Conclusion: The Viabahn stent graft is a safe treatment option in cephalic vein arch stenosis with acceptable short-term efficacy. Further investigations comparing Viabahn to alternative treatment options are required to clearly define its role in the treatment of this difficult clinical syndrome.

Biography

Dr Alexandra Stathis graduated from Notre Dame University Australia in 2015. Since that time, Dr Stathis has had a varied experience across metropolitan and rural Australia. Dr Stathis is currently the Transplant Registrar at Prince of Wales Hospital in Sydney, where she enjoys caring for renal transplant and haemodialysis patients.

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