significantly improved and was sustained over the 2 year (P < 0.05) followup. Temporary paraesthesia was found in 11% which completely resolved. No major complications occurred.

**Conclusion:** Early and mid-term results of EVLA for SSV incompetence demonstrated this treatment to be safe and effective. Clinical recurrence due to recanalisation may occur despite adequate magnitude of energy delivery; neoreflux in previously competent veins may contribute to this process.

**0857: RETROSPECTIVE REVIEW OF PATIENTS TREATED WITH ENDOVASCULAR TECHNIQUES AT A SINGLE CENTRE**

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**Aim:** Mid-aortic syndrome (MAS) is a cause of severe hypertension in children. It is essential to make an early diagnosis. We undertook a retrospective study to assess the benefit of endovascular techniques in the treatment of MAS and the importance of a multi-disciplinary team (MDT) approach.

**Methods:** A retrospective review of 22 patients treated by radiological intervention at Great Ormond Street Hospital.

**Results:** 49 procedures (mean 2.2 procedures; range 1–5) were undertaken on 22 patients (mean age 7.6 years: 14 boys (64%) and 8 girls (36%)). Complications were seen in four cases including one death due to haemorrhage following angioplasty, 2 pseudoaneurysms and one urethral trauma. Radiological intervention followed surgery in 23% (5/22) of cases. 9% were ‘cured’ (2/22), 60% ‘improved’ with fewer medications or symptoms, 27% had no change and 4% ‘failed’.

**Conclusion:** Radiological intervention provides a viable treatment method for MAS, although it may not be definitive and is not without complications. Surgery is often used as a final intervention but can be used in conjunction with or prior to radiological techniques. An individualised and combined treatment plan for each patient by an MDT comprising radiological, surgical and medical specialties is essential to improve outcome in MAS patients.

**0873: GSV DIAMETER IS NOT APPROPRIATE FOR DETERMINING PROVISION OF TREATMENT IN SUPERFICIAL VENOUS INSUFFICIENCY**

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**Introduction:** The National Institute for Health and Clinical Excellence (NICE) uses Quality of Life (QoL) to inform decisions on health resource provision; Superficial Venous Insufficiency (SVI) has a significant negative effect on QoL. Some medical insurance companies require a minimum GSV diameter before funding intervention for SVI. The aim of this study was to assess the benefit of endovascular techniques in the treatment of MAS and the importance of a multi-disciplinary team (MDT) approach.

**Methods:** A retrospective review of 22 patients treated by radiological intervention at Great Ormond Street Hospital.

**Results:** 49 procedures (mean 2.2 procedures; range 1–5) were undertaken on 22 patients (mean age 7.6 years: 14 boys (64%) and 8 girls (36%)). Complications were seen in four cases including one death due to haemorrhage following angioplasty, 2 pseudoaneurysms and one urethral trauma. Radiological intervention followed surgery in 23% (5/22) of cases. 9% were ‘cured’ (2/22), 60% ‘improved’ with fewer medications or symptoms, 27% had no change and 4% ‘failed’.

**Conclusion:** Radiological intervention provides a viable treatment method for MAS, although it may not be definitive and is not without complications. Surgery is often used as a final intervention but can be used in conjunction with or prior to radiological techniques. An individualised and combined treatment plan for each patient by an MDT comprising radiological, surgical and medical specialties is essential to improve outcome in MAS patients.

**0867: PREDICTING IMMEDIATE AND MID-TERM DISTAL VASCULAR BYPASS SURGERY OUTCOME USING PREOPERATIVE MAGNETIC RESONANCE ANGIOGRAPHY (MRA)-DERIVED RUTHERFORD’S RUNOFF CLASSIFICATION**

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**Aims:** To validate the use of preoperative MRA-derived Rutherford’s runoff classification in predicting immediate and mid-term patency of distal vascular bypass.

**Methods:** MRA and duplex scanning were performed prospectively on patients undergoing distal bypass surgery. Patient demographics, risk factors, type of surgery, type of graft used and surgical outcome were reviewed. Modified Rutherford score was calculated for each case as a marker for runoff resistance. Distal-femoral diastolic resistance (DFDR) ratio was calculated using the ratio of end-diastolic velocity (EDV) in the distal vs. femoral arteries. Predictors of graft patency were determined using Cox proportional hazards.

**Results:** Twenty three patients underwent fem-distal bypass surgery between 2008-2011, with mean age of 71, were identified. Most patients were male (68%), had hypertension (63%) and were current or ex-smokers (90%). The patency rate for all distal bypasses on hospital discharge, 4, and 12 weeks postoperatively was 81%, 72%, and 54% respectively. Immediate graft patency correlated well with MRA-derived Rutherford’s runoff classification (p = 0.06) and DFDR ratio (p = 0.001). Mid-term patency was not significantly correlated with MRA-derived Rutherford’s runoff classification (p = 0.72).

**Conclusions:** Preoperative MRA-derived Rutherford’s runoff classification and DFDR ratio are fairly accurate and reliable predictors of immediate graft patency.

**0825: WHAT IS THE OPTIMAL BYPASS GRAFT SURVEILLANCE PROGRAMME?**

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**Aims:** To assess patterns of graft patency over time and establish whether current surveillance at 6/12, 3, 6 and 12 months is effective resource use.

**Methods:** Prospective analysis of a prospectively maintained database.

**Results:** 81 patients entered graft surveillance between 2006 and 2011. Median age was 73 and male:female ratio was 4:1. 71 underwent vein grafting and 10 composite. Overall 11% occluded within 12/12 and a further 7% at >1 year (range 15-48 months). Graft stenosis requiring intervention e.g. angioplasty, occurred in 12% (all vein) within 12/12 and another 2% stenosed after a year. Lifetime amputation rate was 11%. When analysed according to operation, 64% underwent fem-pop bypass (88% 1 year patency, 12% stenosis), 21% fem-distal bypass (88% patency, 11% stenosis), 6% pop-distal bypass (80% patency, 20% stenosis) and 5% other bypass. The majority of fem-pop associated complications (50%) were identified at 6/12, with another 19% arising after surveillance completion. There was no pattern to stenosis/occlusion