

The Vascular Society spring meeting was held in Nottingham as part of the Circulation Foundation's (CF) vascular disease awareness, hosted by Bruce Braithwaite, and ran in parallel with a Tissue Viability symposium at the East Midlands Conference Centre.

The twin themes of the day were critical limb ischaemia (CLI) and major lower extremity amputation (LEA). Gerry Stansby outlined the difficulties in attempting to estimate the extent of the problem of CLI for which there is no ICD code and where there is lack of consistency in definitions, and limitations in follow-up from limited life/ limb expectancy. He emphasised the importance of using absolute pressures (<70 or <50 mm Hg) rather than ABPI in these patients. For diabetic limbs toe pressures (< 30mm Hg) are recommended but not commonly used. HES data of >5000 LEA per year suggests the population of CLI to be three to four times this number.

Diabetes is an increasing component of CLI legs and is best managed in a multidisciplinary team. Cliff Shearman emphasised that diabetes, already present in 40% of PAD patients, is set to become the commonest condition we treat for PVD. A risk factor in its own right, diabetes also amplifies all the major PAD risk factors. This theme of diabetes and its risk of LEA was highlighted by most speakers and illustrated with some startling facts as follows: life time LEA risk >15%; 15-24 fold likelihood of LEA, 50% of all LEA and, world wide, a limb is removed every 30 seconds for diabetic vascular disease.

The majority of LEA is avoidable because over 80% are preceded by foot ulceration. The opportunity therefore existed for intervention to improve these outcomes. However, more than half of patients undergoing amputation for CLI had not undergone any form of revascularisation procedure in the preceding 3 years. Mike Wyatt emphasised that pushing surgical boundaries for revascularisation of CLI had the potential to reduce the chance of LEA from 95% to 25%. He advocated an aggressive revascularisation strategy (with vein grafts including composite arm veins and splice vein grafts and with bypasses to pedal level) in motivated patients who were expected to live for 5 years.

The Southampton multidisciplinary foot protection team have, using a protocol driven approach, reduced levels of primary amputation by 60%. Such multidisciplinary teams do not require any additional personnel and could be organised to run as parallel, but independent clinics, enabling immediate specialist opinion. Significant improvements in quality of life, reduced LEA rates, and costs, reduced by shorter bed occupancy (average length of stay after LEA 30 days), can be achieved.

However, the drive to commission services in primary rather than secondary care and failure to recognise multiple professional input in a single clinic visit could jeopardise this model of care. Professor William Jeffcoate added that amputation rates also reflected the effectiveness of management of the patient's entire diabetic history and not just the specialist end-stage care that occurs in hospital. He highlighted the 'putting feet first' initiative by Diabetes UK ([www.diabetesuk.org](http://www.diabetesuk.org)) and its likely impact on commissioning of specialist services for management and prevention of diabetic foot disease in hospitals. This document emphasised the importance of urgent assessment of diabetic foot ulceration.

Ivor Byren reminded us of the importance of applying 'simple' interventions (early debridement, effective wound care, good diabetic control, judicious use of antibiotics) and Frank Webb added how

early local foot surgery, often under nerve blocks in a treatment room setting could be used to avoid LEA.

The meeting was told that for LEA there was a lack of good information and the wide regional variations in mortality. The NVD recording of LEA falls well short of those for AAA and CEA, making this group of patients difficult to audit. Andy Weale demonstrated that there was also a clear need to improve the BK/AK ratio and to eliminate the regional variability that exists. As vascular surgeons we have been poor at capturing major LEA on the NVD (2095 per year compared to 5000 –HES data), and with only 30% having a complete dataset. Analysis of this limited NVD data demonstrates an overall mortality of 6.5% for BK and 12.8% for AK. Patients undergoing major amputation therefore represent the sickest vascular patients. LEA will be the focus of an upcoming Vascular Society quality improvement framework that aims to reduce the perioperative mortality after major amputation surgery to 5% by 2015. All surgeons should be submitting complete data on LEA to the NVD.

Mrs Denise O’Connell reminded us of the importance of a patient-led LEA counselling service, for which there is, at best patchy national availability, in dealing with the psychological and emotional consequences of LEA. She emphasised preoperative counselling and gradual introduction of amputation as a particularly important role that could not always be achieved on busy acute wards.

Bruce Braithwaite held a live question and answer session with three patients who had undergone differing levels of LEA. Because of opiate analgesia the patients who had undergone urgent LEA had little recall of any peri-operative details. The validity of the consent process under these conditions was open to challenge. Jonathan Beard suggested increasing the use of epidurals in patients to allow a more lucid and valid consent process.

Other meeting highlights included a debate on “VAC treatment is expensive and not evidence based”. Good presentations from Rob Hinchliffe (for) and Shane McSweeney (against) did not appear to change delegates from their pre-debate positions, with the majority disagreeing with the motion. The debate title’s use of “vac” rather than “negative pressure therapy” was challenged in discussion.

In the final talk of the day Mark Midwinter gave us an insight into battlefield amputations in Afghanistan, where because 85% of mortalities are due to haemorrhage, circulation (c) assumes pre-eminence (c-ABC) in the usual ABC algorithm for resuscitation

The meeting finished with the CF chairman Andrew May announcing this year’s CF grants including a the presentation of a new research grant by Professor Shervanthi Homer- Vanniasinkam, and a drinks reception prior to delegates departing home.