



Sarah Green has completed this personal reflection on **02/12/2021**

Paper: Summer 2021 CPD Questions

Personal Reflection:

Description of learning - the authors of paper 1 looked at AV fistula surveillance using 3D ultrasound when compared to standard diagnostic ultrasound and a subsequent fistulogram. The authors concluded that 3D ultrasound requires less skill and is quicker at detecting AVF complications than conventional ultrasound, whilst still remaining just as accurate as conventional ultrasound.

Evaluation - Very interesting research which could have positive implications for the vascular laboratory that performs AV fistula surveillance on a day to day basis - there are RSI issues relating to the ultrasound scanning of AV fistula's due to their complex nature, and length of time for sonographers spent in awkward positions. HOWEVER - in reality, vascular laboratories would need a lot more convincing to invest in a 3D technology for the ultrasound machine. This research has been performed in collaboration with a private company who can afford to invest in this technology, unlike to poorly funded NHS vascular lab.

Conclusion - 3D ultrasound is an additional ultrasound package to watch out for for sure (one with many additional benefits, not just in the realm of AV fistula scanning, but also carotid disease and PVD), but in reality how is this really going to find itself into a poorly funded ultrasound laboratory anytime soon?

Description of the learning - the authors of paper 2 looked at the outcomes of AAA's in the 80 and 90 year old patients. The authors concluded that the risk of late rupture in small AAA's is very small (especially when the AAA <40mm), thus conservative management of these patients is sensible, and the discontinuation of surveillance in the smallest AAA seems safe.

Evaluation - I agree that often the 80 and 90 year old patients often do have other health issues that would potentially make a AAA repair extremely risky. I also agree that often the small AAA's are unlikely to grow/even reach significance in their lifetime. BUT - AAA's CAN grow, there are the odd patients that do become significant very quickly (a patient I saw the other day went from 4.3 to 5.6 in 12 months). Also, some 80 or 90 year olds are an exception to the rule - they appear very young for their age (my father in law is 93 and regularly goes on hiking holidays, walks 8 miles a day, doesn't have any other significant health problems). If we did stop the surveillance on 80 and 90 year olds on the basis that their AAA is small, what would happen to the unfortunate outliers? I think that the surveillance should be dependent on keeping the patient in mind - would they benefit on surgery should their AAA ever become significant? I regularly see very frail mid 80 and 90 year olds on a 3 month AAA surveillance, with very significant AAA's (>60mm), but who continue to have surveillance - the consultant has deemed them inappropriate for surgery, but they continue to come for scans. Often, the patient themselves tells me that they would prefer it is they did not have ultrasound surveillance anymore because for them the scan is pointless. Surely it is these patients who should not have to remain on a AAA surveillance.

Action Plan - I will continue to monitor the NICE guidelines for AAA surveillance to ensure that our ultrasound department remains compliant with surveillance guidance. I will also discuss

with our vascular consultants on why they keep the very frail patients on AAA surveillance when they are not suitable for any kind of repair - do we needlessly have patients on a regular surveillance who no longer need it?