INVITED COMMENTARY

The Choice of Sclerosant Is Clearly Important in the Treatment of C1 Disease, but Technique and Management of Patient Expectations Remain Keys to Success

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In this issue, Bertanha and colleagues[1] report findings from a 115 participant randomised trial comparing 75% hypertonic glucose alone with 70% hypertonic glucose and 0.2% polidocanol in the treatment of telangiectasia. They observed superior elimination of telangiectasia in the group treated with the combined sclerosant compared with hypertonic glucose alone using photograph analysis software. The management of C1 disease of cosmetic concern is particularly challenging as patient expectations are often high and high quality prospective studies guiding management are scarce. The most important aspect of microsclerotherapy for telangiectasia is generally thought to be the technique. However, this study clearly demonstrates that the choice of sclerosant is also important for achieving the best outcomes.

Telangiectasia (also known as spider veins) are small (<1 mm) veins that are a common cause of cosmetic displeasure. Along with reticular veins (1–3 mm), they are included in the C1 grade of the CEAP classification.[2] While treatments for C1 disease may not be covered in many healthcare systems, patients frequently seek private treatment and sclerotherapy is the primary treatment modality.[3] In this trial, the researchers should be commended for using a triple blinded methodology (physician, patient, and assessor) and objective evaluation of treatment success using photograph analysis. The main limitations of the study are short follow up and that many other commonly used sclerosants were not evaluated. Indeed, the superior sclerosant in this study (0.2% polidocanol + 70% hypertonic glucose) is not used widely outside Brazil. The situation is complex, as commonly used sclerosants such as sodium tetradecyl sulphate and polidocanol are available in different concentrations and may be injected as liquid or foam, meaning that many sclerosant permutations are possible.

Despite this, we should digest the clear message that not all sclerosants are the same and physicians should scrutinise the available evidence when selecting a sclerosant from those available in their setting. It is important, however, not to overlook the importance of accurate clinical evaluation and meticulous technique when performing microsclerotherapy for patients with C1 disease. Procedures in this study were performed by a single, skilled physician with considerable experience. In reality, most variation in outcomes is probably attributable to differences in physician skill. Even the best sclerosant will not compensate for poor case selection and suboptimal technique. Interestingly, a significant proportion of patients developed matting (>30%) or hyperpigmentation (50%) after intervention. This is an important reminder that even in experienced hands, these interventions are not without risk and careful management of patient expectations, with well documented informed consent are imperative. Multiple treatment sessions may be required to treat telangiectasia and cosmetic appearance may worsen before an improvement is seen.

Well designed prospective randomised trials are welcome and will help advance care in this area. More trials are needed to evaluate other commonly used sclerosants. However, choice of sclerosant represents only one of many factors affecting outcome. Those performing interventions for C1 disease should attach as much importance to case selection, patient expectation management, procedural environment, injection technique, and compression strategy to achieve optimal results and patient satisfaction.

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