Treatment Outcomes for Rotator Cuff Calcific Tendonitis: A Local Audit

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INTRODUCTION:

Calcific tendonitis represents the calcification and degeneration surrounding the shoulder rotator cuff tendinous insertions, leading to shoulder pain with decreased range of motion. Diagnosis can be made radiographically with orthogonal radiographs of the shoulder demonstrating calcium deposits overlying the rotator cuff insertions. Treatment options range from non-steroidal anti-inflammatory analgesia, physiotherapy, corticosteroid injections, ultrasound-guided needle lavage and arthroscopic decompression. The current literature denotes the lack of evidence to determine the significant differences between non-surgical treatments before leading up to arthroscopic decompression. Therefore, we aim to explore the clinical effectiveness of these options within our local unit.

MATERIALS & METHODS:

The study was undertaken from 2011 to 2018 and involved a cohort of 57 patients with rotator cuff calcific tendonitis. Retrospective data on treatment received by each patient was stratified based on clinical outcomes and effectiveness. Local hospital practice with treatment options ranging from ultrasound-guided barbotage (UGB), steroid injections and arthroscopic excision were assessed against compliance with current U.K. guidelines suggesting extracorporeal shockwave therapy.

RESULTS:

A total of 57 patients were included in this study with none lost due to insufficient data. The mean age of patients was 53 years, consisting of 20 males and 37 females. 11 patients had received UGB treatment where 10/11 had shown no improvement. 31 patients received steroid injections with 27/31 showing no improvement. Patients with no clinical improvement and those who received arthroscopic decompression at presentation had a total of 44 patients. Of those, 7/44 had shown no improvement.

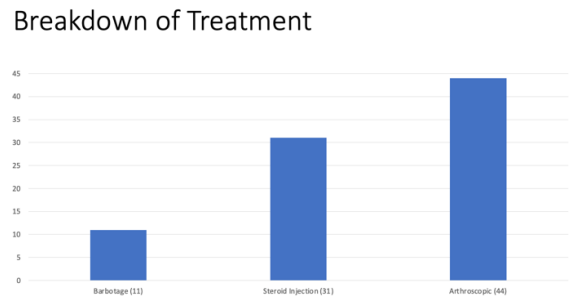

Figure 1: Number of patients receiving treatment for rotator cuff calcific tendonitis

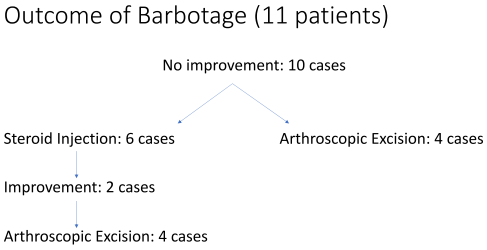

Figure 2: Clinical outcomes for ultrasound-guided barbotage

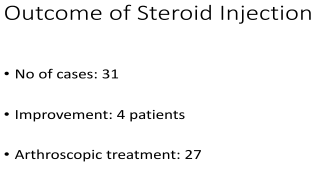

Figure 3: Clinical outcomes for steroid injections

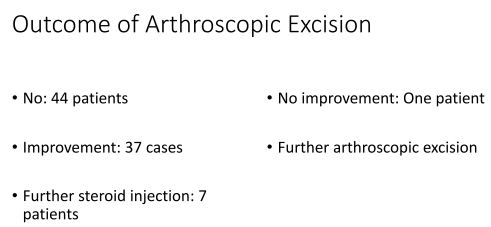

Figure 4: Clinical outcomes for arthroscopic decompression

CONCLUSION:

Ultrasound guided barbotage and steroid injections alone are not as effective to be utilized as stand alone treatments for rotator cuff calcific tendonitis. However, they could be used in combination as suggested in the wider literature. Despite this, our study has demonstrated the majority of patients would still require arthroscopic decompression.

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