



Case Report

# Paralabial Cyst and Microinstability: A Case Report

Vincenzo Morea<sup>1\*</sup>, M. I. Borruto<sup>2</sup>, Guido Zattoni<sup>1</sup>, Flavio Terragnoli<sup>1</sup>, Francesco Benazzo<sup>1</sup>

<sup>1</sup>Fondazione Poliambulanza, Brescia, Italy

<sup>2</sup>Università Cattolica del Sacro Cuore, Roma, Italy

**\*Corresponding author:** Vincenzo Morea, Fondazione Poliambulanza, Brescia, Italy

**Citation:** Morea V, Borruto MI, Zattoni G, Terragnoli F, Benazzo F (2022) Paralabial Cyst and Microinstability: A Case Report. Ann Case Report 7: 934. DOI: 10.29011/2574-7754.100934

**Received Date:** 1 September 2022; **Accepted Date:** 5 September 2022; **Published Date:** 7 September 2022

## Abstract

Gleno-humeral joint instability has been traditionally divided in two categories: TUBS (traumatic unidirectional Bankart lesion, responds to surgery) and AMBRII (atraumatic, multidirectional, bilateral, responds to rehabilitation, inferior capsular shift, and interval closure). In patients with TUBS, the common imaging finding are Bankart lesion, Hill-Sachs lesion; in AMBRI, there is no evident structural lesions. This classification is still noteworthy, however micro instabilities, common in overhead athletes or patients who return to sport after a period of standstill, cannot be classified strictly as one of these categories. For this reason, classifications have been uploaded with further two groups regarding instabilities: AIOS (acquired instability in overstressed shoulder, surgery) and AMSI (Atraumatic minor shoulder instability) [1].

**Keywords:** Paralabial cyst; Infiltrative therapy

## Introduction

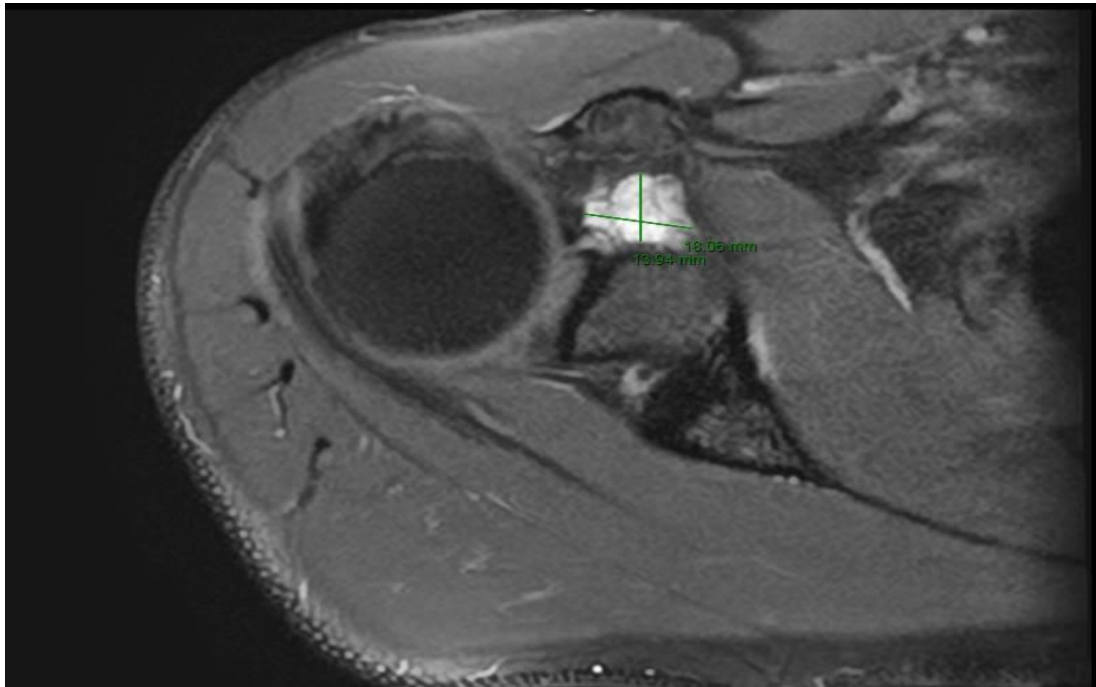
In literature there are few cases reported of AMSI, only patients complaining shoulder pain after a standstill period. One of the most frequent causes of AIOS is posterior-superior impingement (PSI).

## Case Report

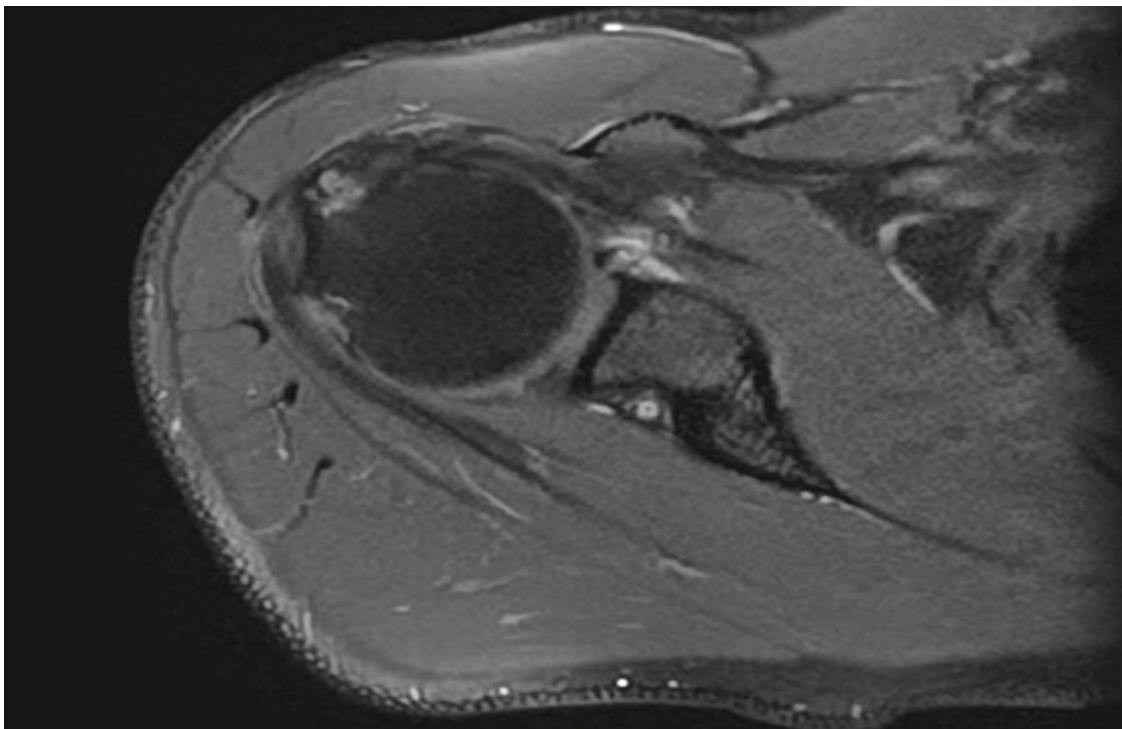
A 42-year-old male, manual worker comes to our clinic complaining chronic dominant shoulder pain. Nor history of fractures, neither dislocation. His pain did not improve nor after

infiltrative therapy, neither after physical therapies. At clinical examinations, no deformities are reported, and ROM overlap the contralateral side. No neurological deficits or muscular atrophy is found. Neer, Howkins and Jobe test are positives [2].

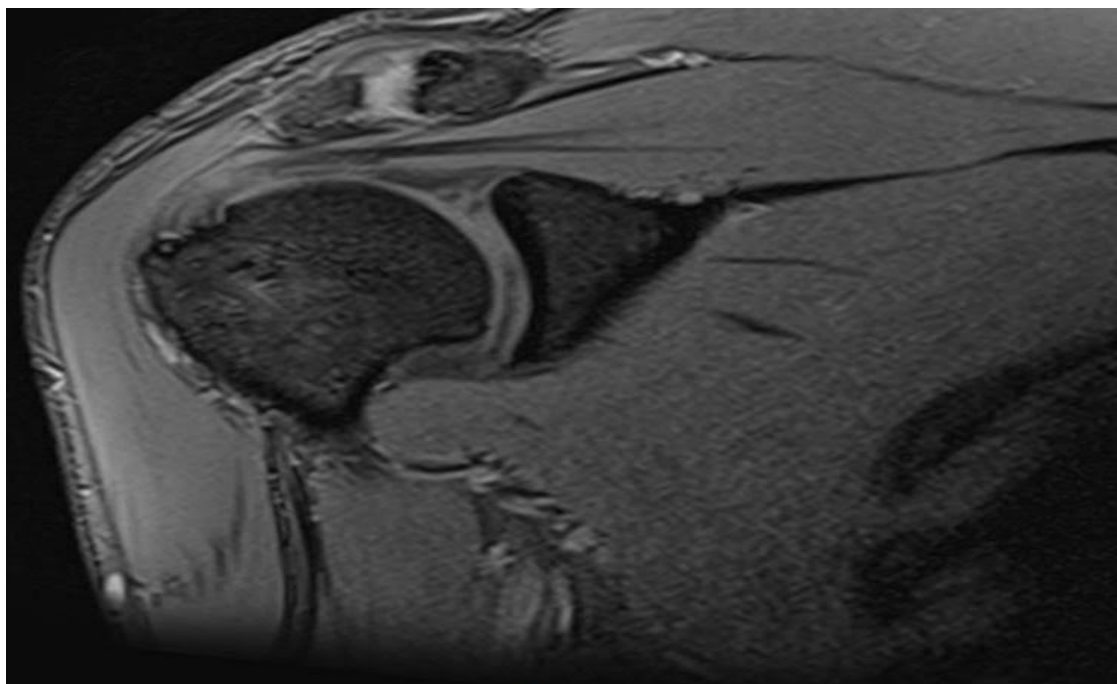
There is no sign of shoulder instability. Shoulder pain occur when the arm is in abduction and retropulsion, related to the repetitive overhead microtraumas. MRI shows blurred T2 hyperintense-signal area relatable to bone oedema in the posteroinferior side of the humeral head, which also appears to be disrupted (Figure 2), anterior paralabial cysts (Figure1) and supraspinous, disrupted (Figure 3). MRI shows an AIOS pattern of micro instability due to repetitive traumas in overhead workers.



**Figure 1:** Paralabial cyst in T2-w MRI.



**Figure 2:** T2-w MRI bone edema.



**Figure 3:** T2-w MRI, Disomogeneous area in T2-W MRI.

Arthroscopy was performed in lateral position. Through posterior and lateral arthroscopic access, a complete rupture of supraspinatus and fibrillar connective degeneration in near bone insertion sutured using anchors. Across anterior-superior, a degenerative tear of medial glenohumeral ligament was sutured using a soft anchor.

After a 3-months follow-up pain improved until a full recovery, with no residual signs of impingement or stiffness.

## Discussion

The presence of paralabial cyst remains a controversial topic, however it is associated with instability and rim repair leads to resolution of the instability.

Savoie FH, et al. shown that microtrauma in abduction and external rotation can lead to the detachment of the medial glenohumeral ligament [3]. Jobe CM reported that a recurrent abduction and external rotation movement leads to the weakening of the anterior-inferior translation of the humeral head [2]. Burkhart SS, et al. showed that abduction and external rotation might stress the bicipital anchor to the posterior glenoid labrum [4].

Internal impingement might progressively worsen due to the repetitive stretching of the anterior structures [5,6]. This theory of anterior micro instability aggravating internal impingement lent credence initially to treating this problem using anterior

reconstruction, although the results of this treatment for throwing athletes or overhead manual workers were unpredictable.

The base mechanism is still a debated argument; however, AIOS symptoms overlap SLAP isolated lesions.

Conservative treatment is an option in shoulders with minor structural abnormalities and limited pain. Surgery indicated in cases with rotator cuff lesions and glenoid labrum lesions, such as in the patient we reported [7-9].

Clinical examination, history and imaging can lead to AIOS diagnosis, but in most cases, diagnostic arthroscopy is gold standard, especially in overhead manual workers. Repairing multiple lesions improve pain even in presence of initial stiffness.

## References

1. Castagna A, Nordenson U, Garofalo R, Karlsson J (2007) Minor shoulder instability. *Arthroscopy*. 23: 211-215.
2. Jobe CM (1995) Posterior superior glenoid impingement: expanded spectrum. *Arthroscopy*. 11: 530-536.
3. Savoie FH 3rd, Papendik L, Field LD, Jobe C (2001) Straight anterior instability: Lesions of the middle glenohumeral ligament. *Arthroscopy*. 17: 229-235.
4. Burkhart SS, Morgan CD, Kibler WB (2003) The disabled throwing shoulder: spectrum of pathology Part I: pathoanatomy and biomechanics. *Arthroscopy*. 19: 404-420.

5. Ferrick MR, Marzo JM (1997) Ganglion cyst of the shoulder associated with a glenoid labral tear and symptomatic glenohumeral instability. A case report. *Am J Sports Med.* 25: 717-719.
6. Francavilla G, Sutera R, Iovane A, Candela F, Sanfilippo A, et al. (2010) Role of MR arthrography in shoulder micro-instability: personal experience. *Medicina dello Sport.* 63: 547-56.
7. Lee SY, Lee JK (2002) Horizontal component of partial-thickness tears of rotator cuff: imaging characteristics and comparison of ABER view with oblique coronal view at MR arthrography initial results. *Radiology.* 224: 470-476.
8. Ouellette H, Kassarian A, Tétreault P, Palmer W (2005) Imaging of the overhead throwing athlete. *Semin Musculoskelet Radiol.* 9: 316-333.
9. Schrøder CP, Lundgreen K, Kvakestad R (2018) Paralabral cysts of the shoulder treated with isolated labral repair: effect on pain and radiologic findings. *J Shoulder Elbow Surg.* 27: 1283-1289.