

## Clinical Image

# From Tendon to Bone: MR Features of Intraosseous Migration of Intratendinous Calcifications

**Tlaite O\*, Mohamed L and Jamal ELF**

Radiology Department, Mohammed V Military Instruction Hospital, Mohammed V University, Morocco

\***Corresponding author:** Oubaddi Tlaite, Radiology Department, Mohammed V Military Instruction Hospital, Mohammed V University, Morocco

**Email:** tlaite.oubaddi@gmail.com

**Received:** March 11, 2025

**Accepted:** March 28, 2025

**Published:** April 01, 2025

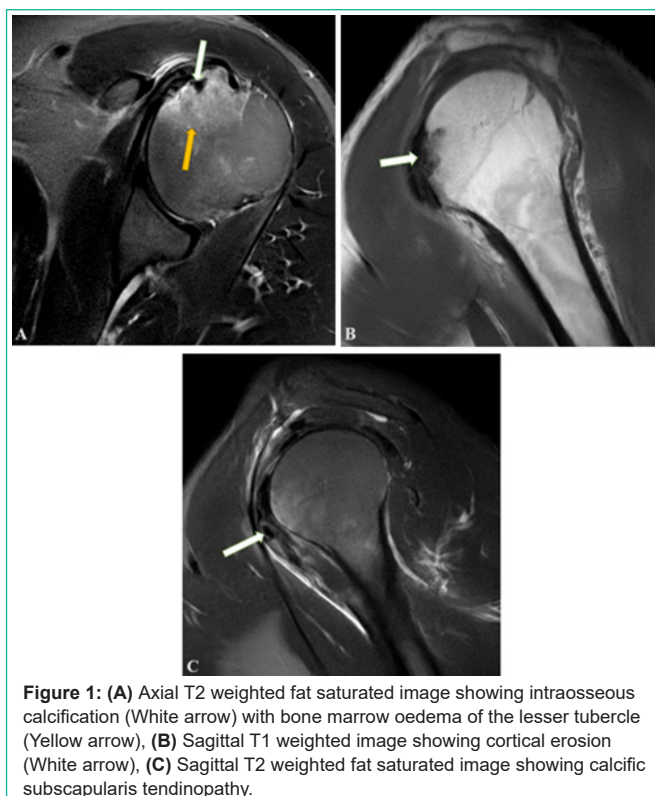
## Clinical Image

Calcific tendinitis of the rotator cuff is a frequent cause of shoulder pain caused by the accumulation of hydroxyapatite crystals in the pre-insertional areas of the tendons. In rare instances, these calcifications may migrate to adjacent sites, including bone, resulting in notable bone marrow involvement. MRI is highly sensitive in the acute phase for detecting bone edema surrounding migrated intraosseous calcification and can also visualize adjacent soft tissue edema and bone erosion.

A 52-year-old man with no prior history of trauma or shoulder surgery, presented with acute severe pain in the left shoulder, associated with complete functional impairment. The patient underwent an MRI scan of the left shoulder, which revealed intraosseous calcification of the lesser tubercle (Figure 1A, White arrow) and bone marrow edema of the humeral head (Figure 1A, Yellow arrow), along with cortical erosion (Figure 1B, white arrow) and calcific tendinopathy of the subscapularis tendon (Figure 1C). Conservative treatment was initiated, including immobilization and nonsteroidal anti-inflammatory drugs, resulting in favorable outcomes.

## References

1. Marinetti A, et al. Intraosseous migration of tendinous calcifications: two case reports. *Skeletal Radiology*. 2018; 47: 131-136.



**Figure 1:** (A) Axial T2 weighted fat saturated image showing intraosseous calcification (White arrow) with bone marrow oedema of the lesser tubercle (Yellow arrow), (B) Sagittal T1 weighted image showing cortical erosion (White arrow), (C) Sagittal T2 weighted fat saturated image showing calcific subscapularis tendinopathy.