

# The shoulder. NRC disorders

Stefano Bianchi *and* Carlo Martinoli

Fondation des Grangettes, Genève, CH  
[stefanobianchi@bluewin.ch](mailto:stefanobianchi@bluewin.ch)

Università di Genova, Genova, I  
[martinoli@zeus.newnetworks.it](mailto:martinoli@zeus.newnetworks.it)

Is there a place for MSUS in the assessment of the non rotator cuff lesions of the shoulder ?

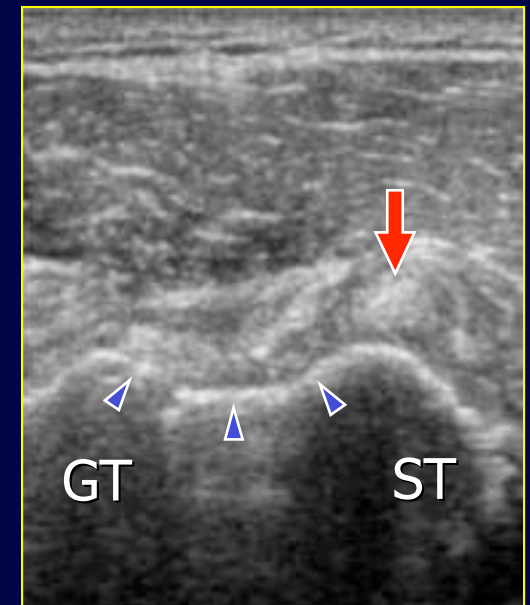
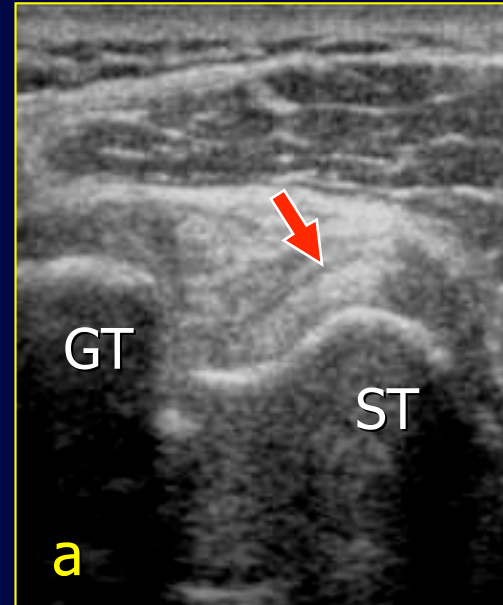
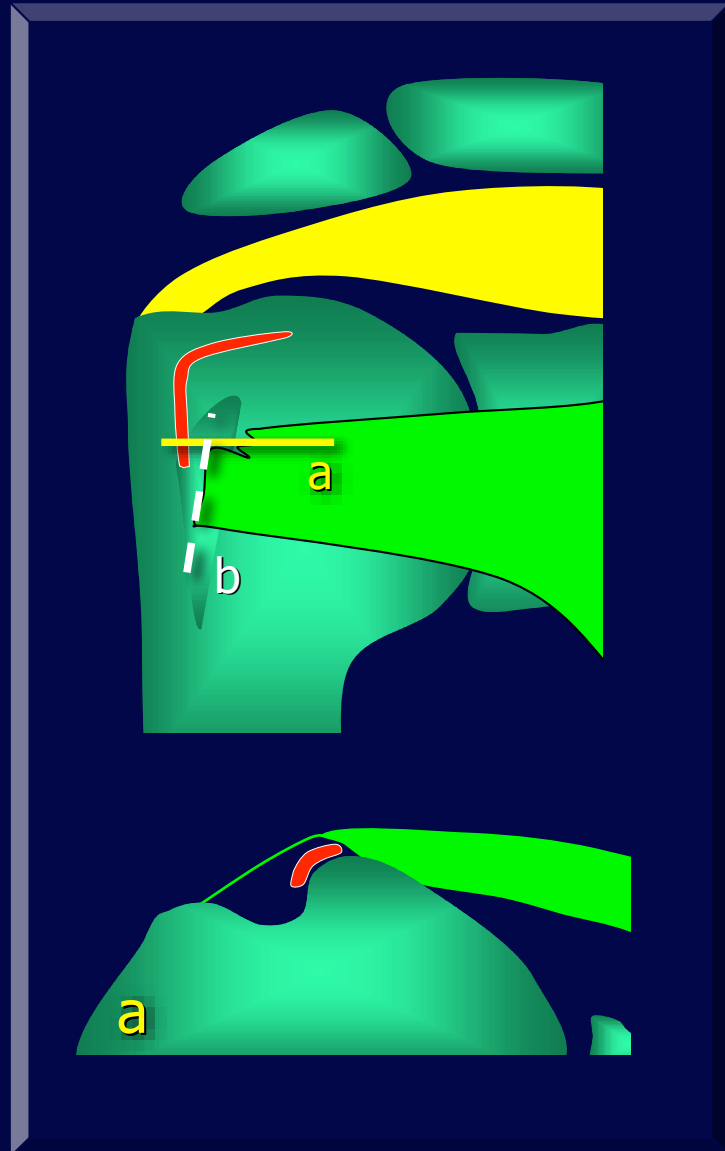
LHBT

Bones

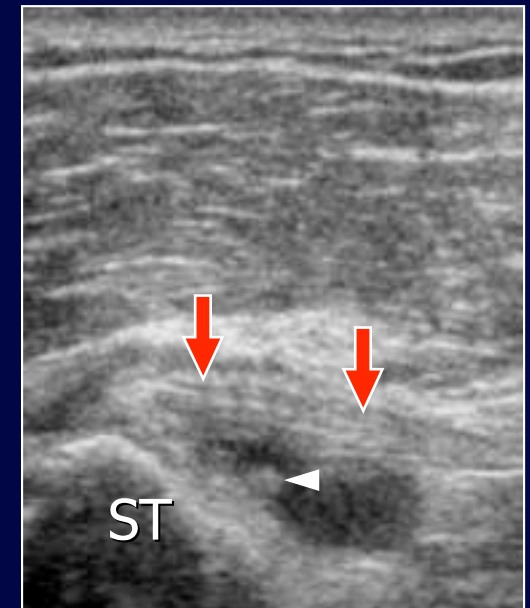
Arthritis, bursitis

Nerve lesions

# LHBT

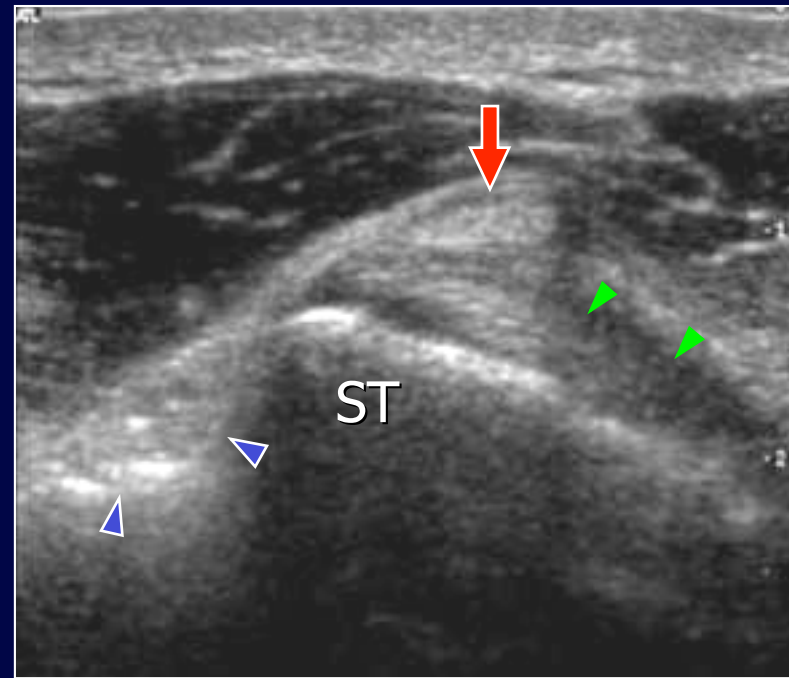
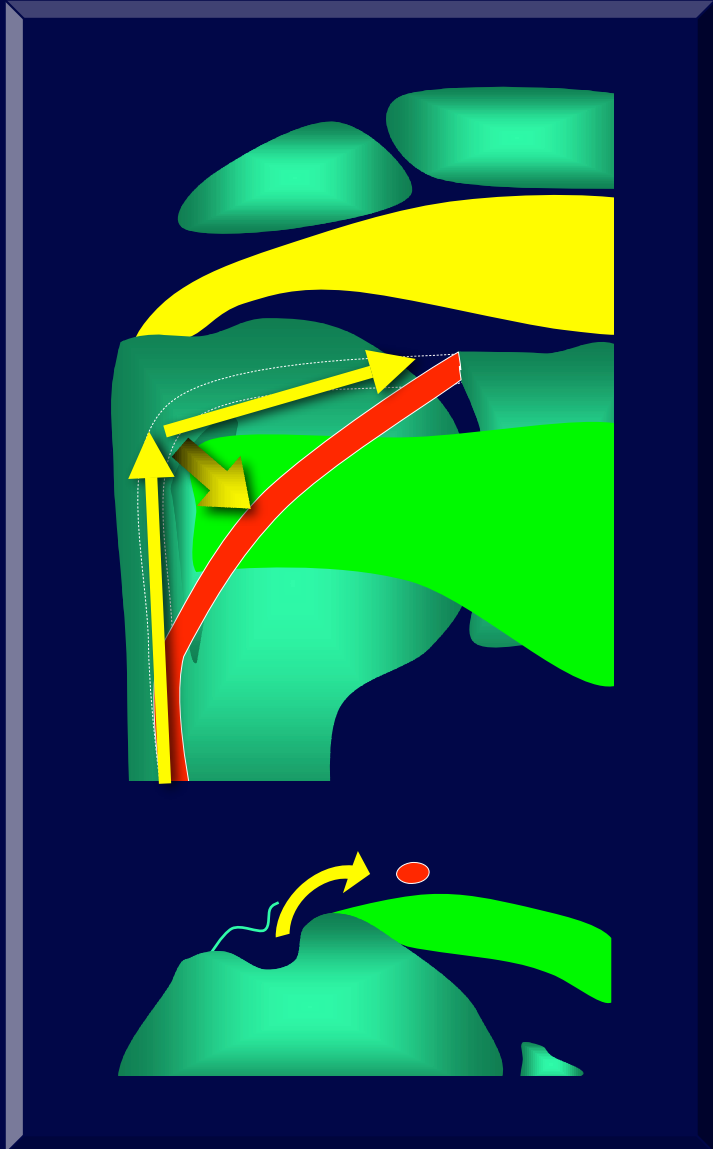


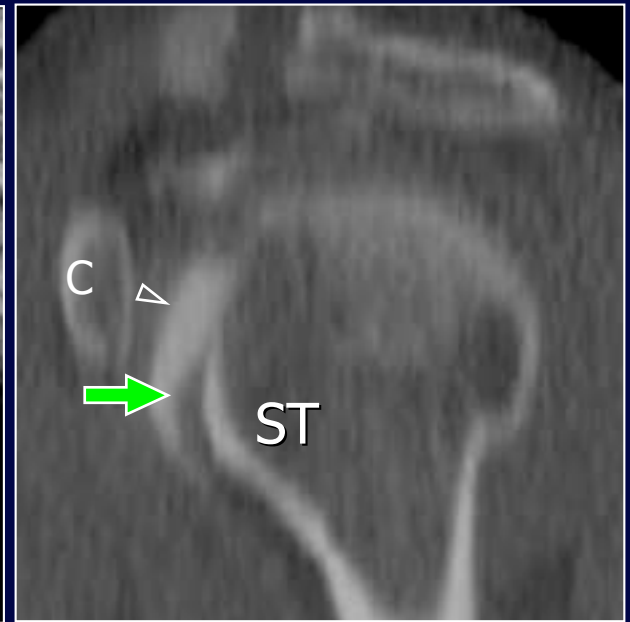
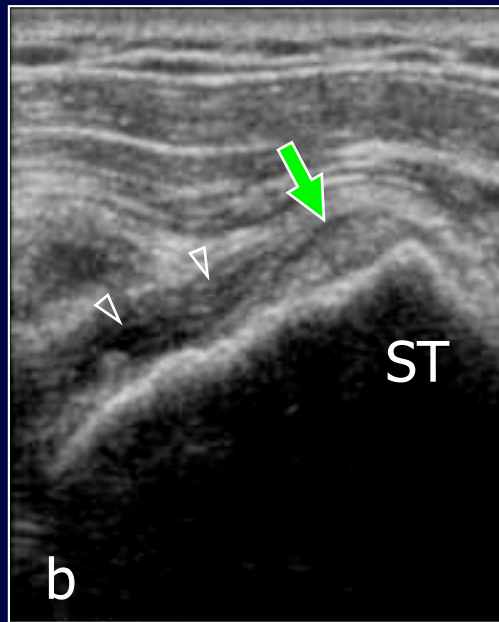
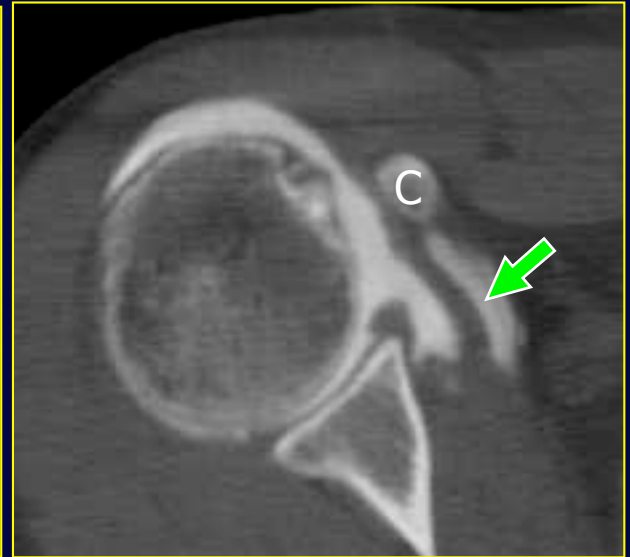
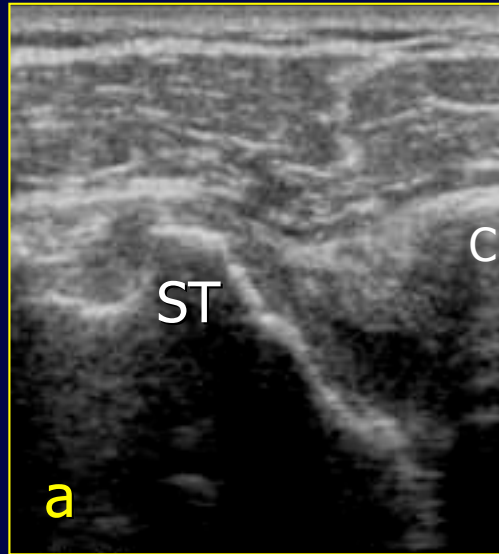
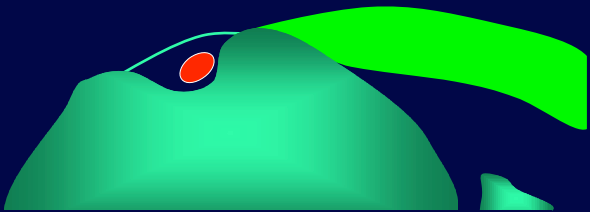
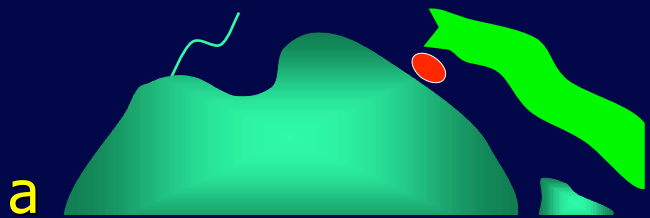
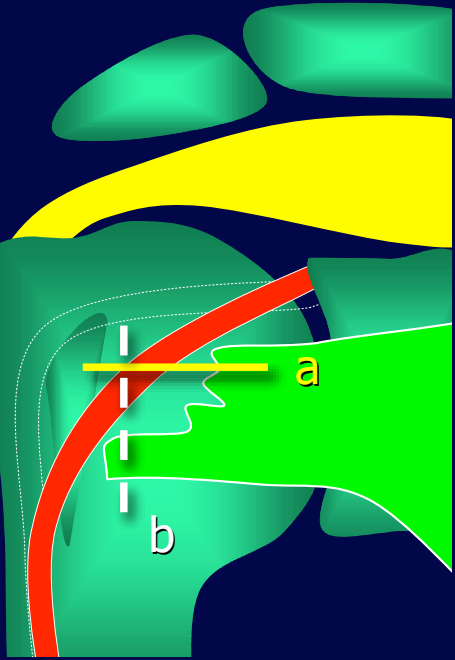
## Subluxation

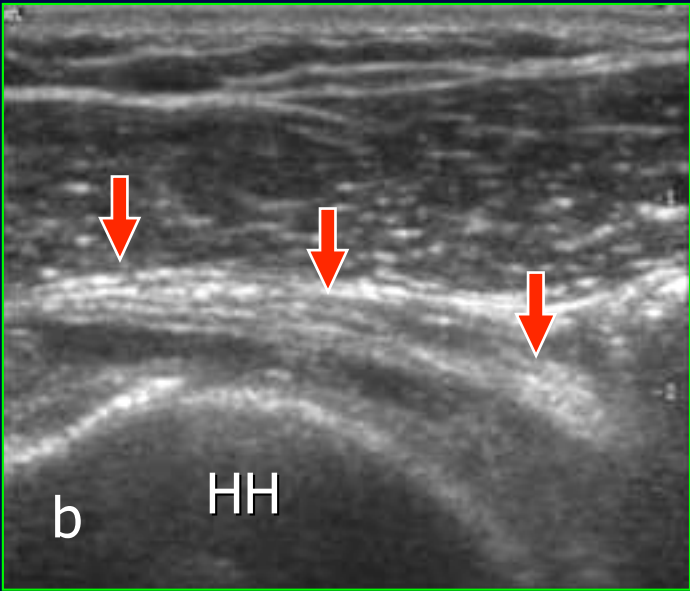
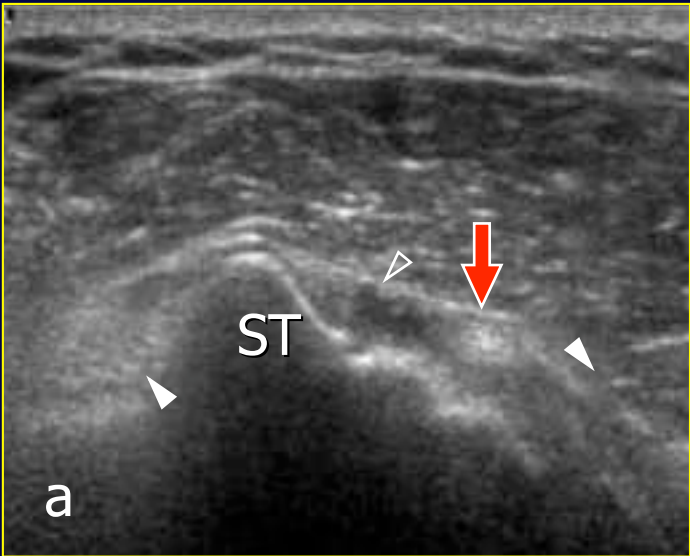
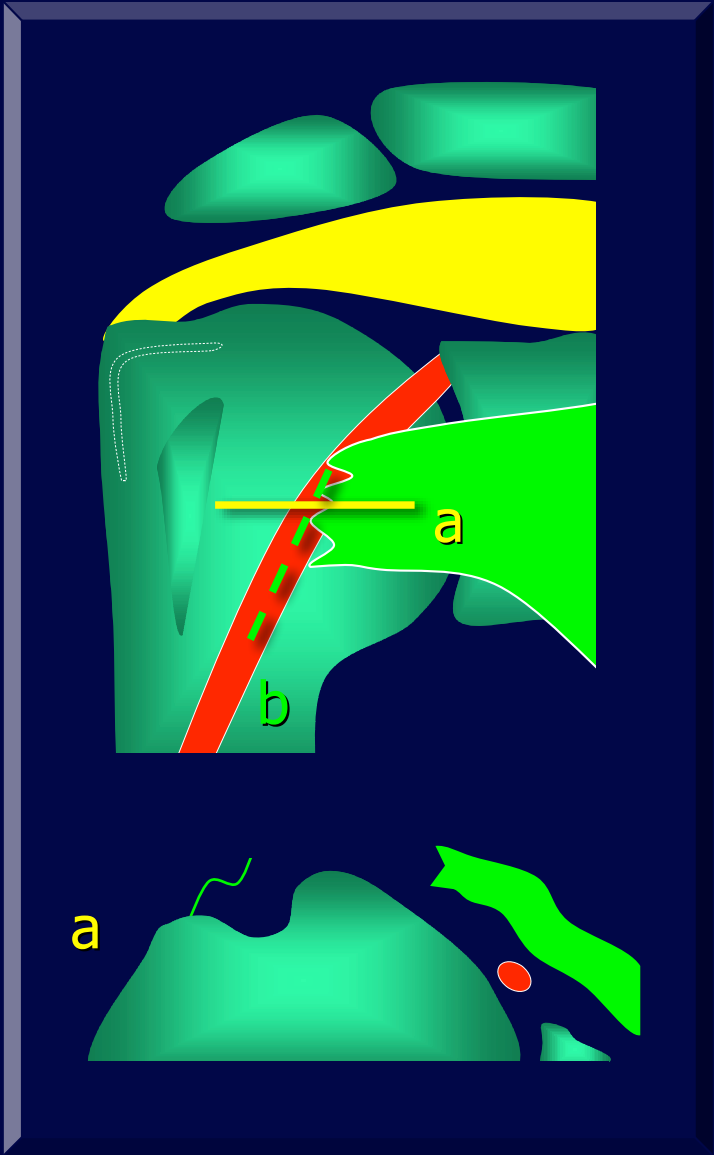


b

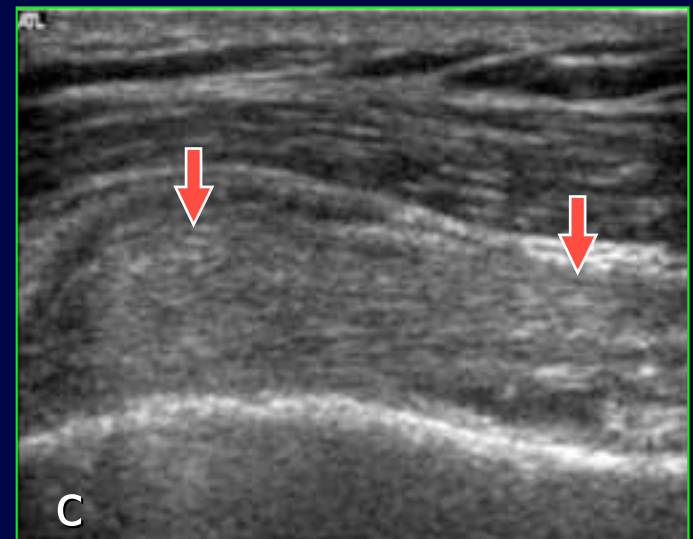
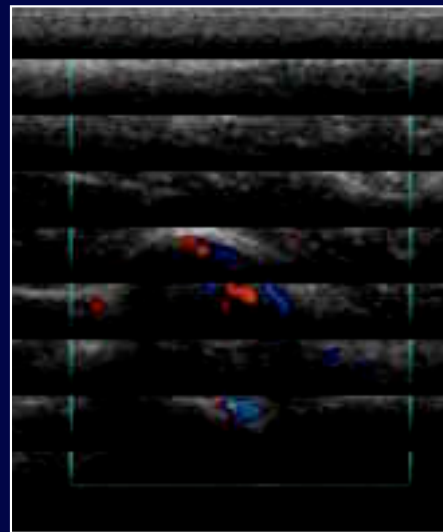
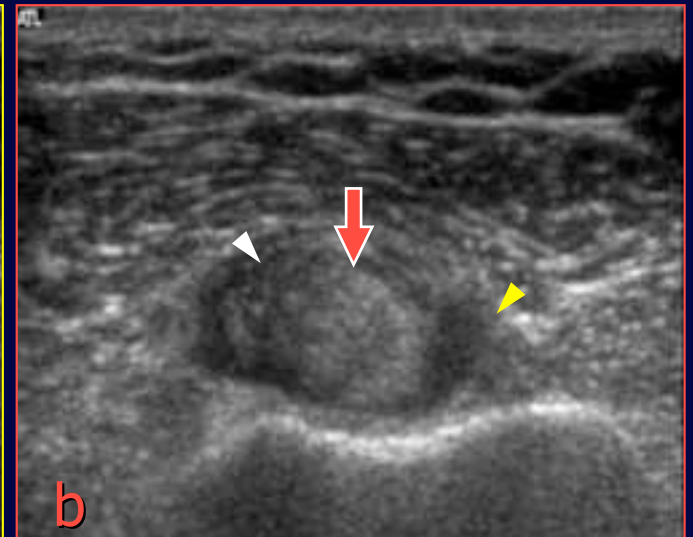
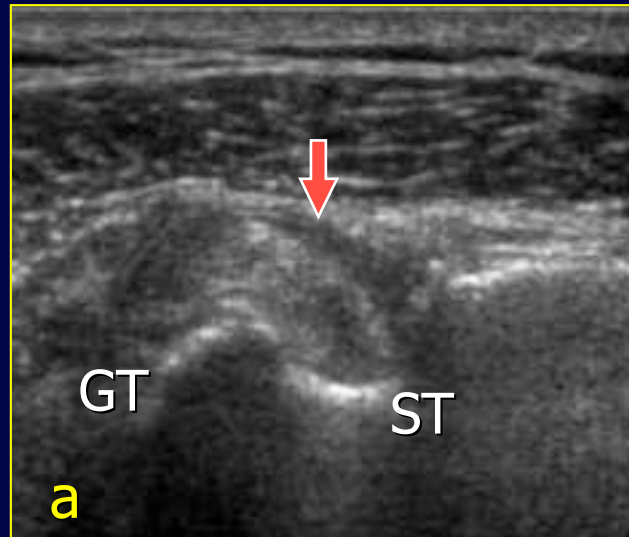
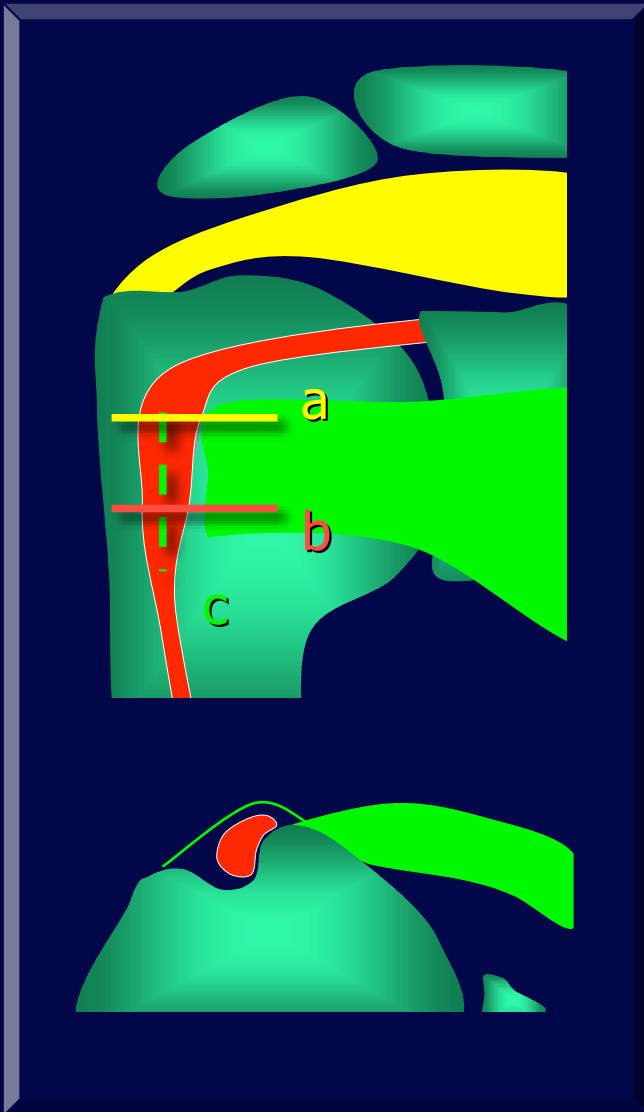
# Dislocation



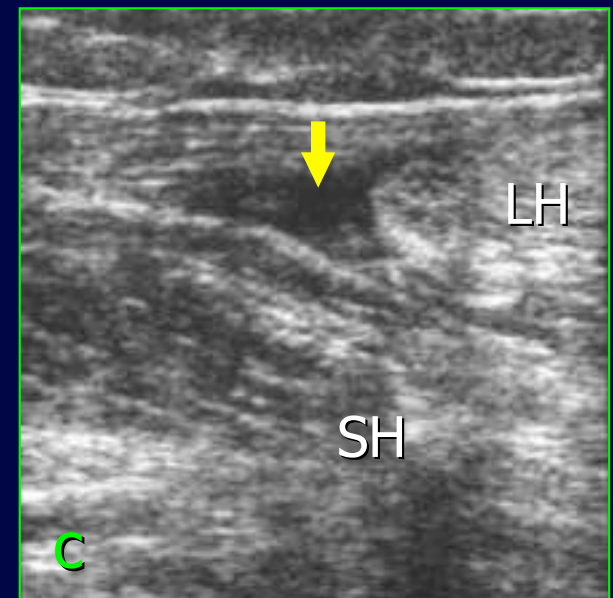
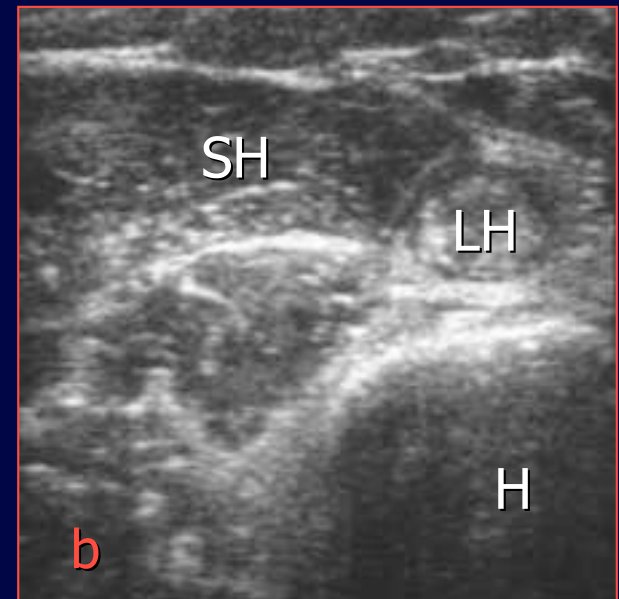
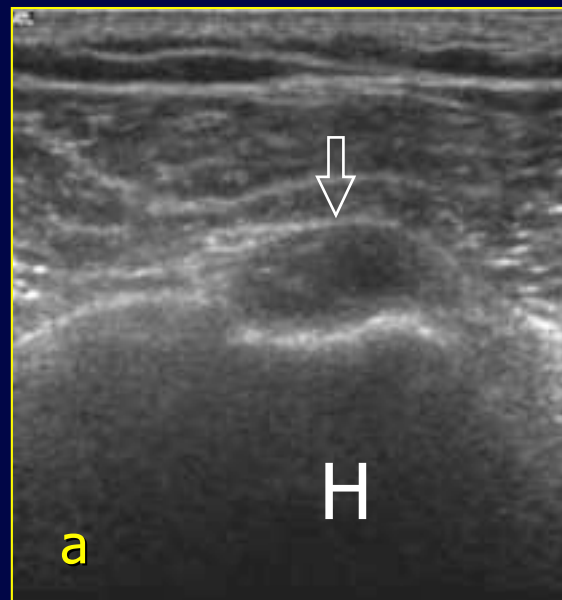
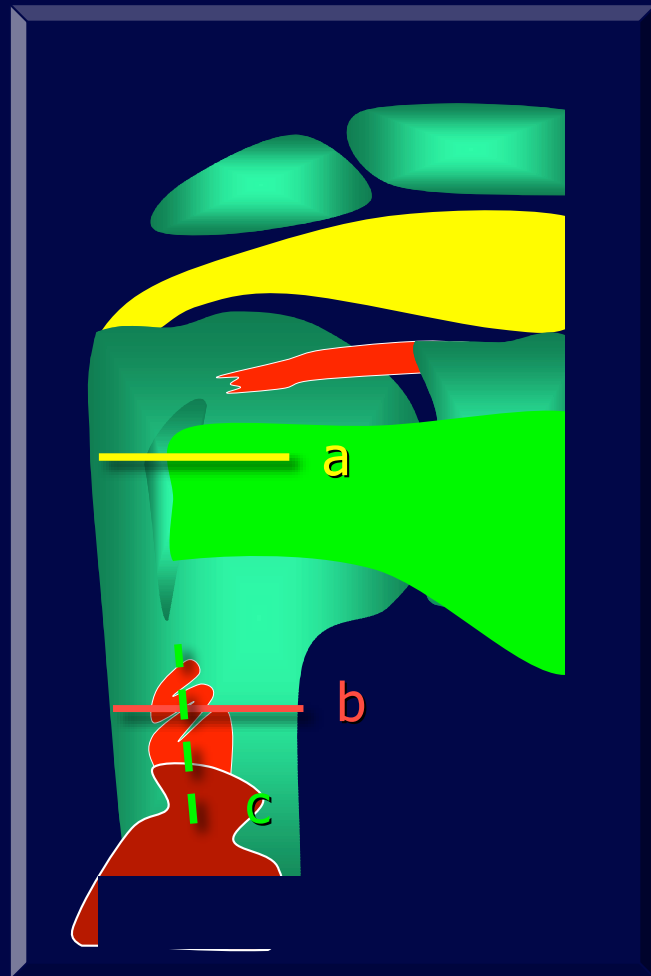




# Tendinopathy

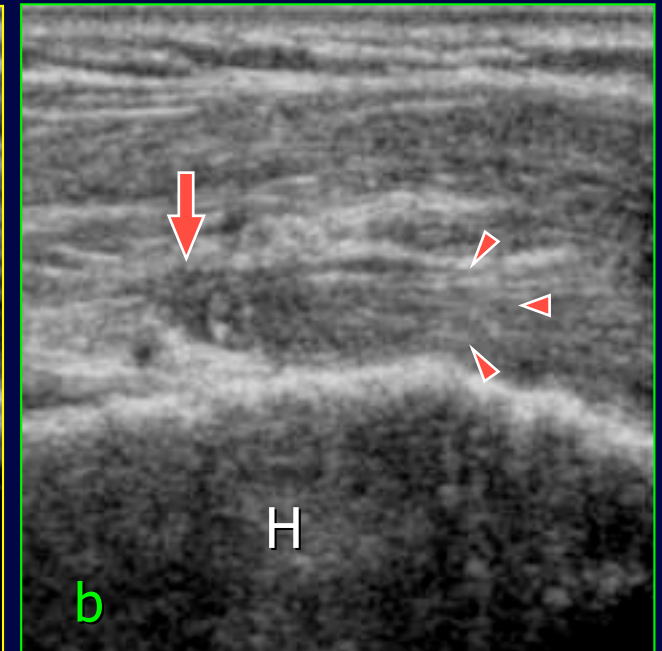
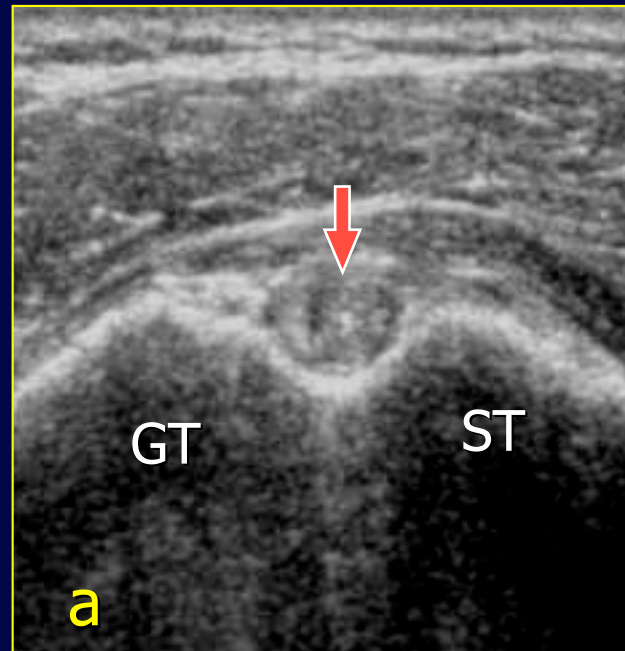
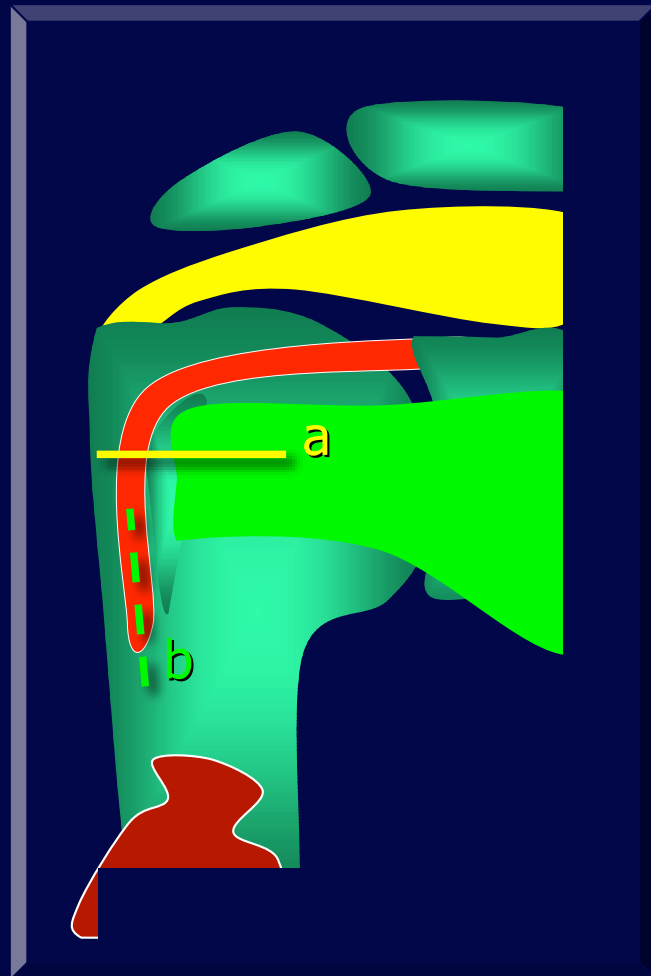


# Acute tear

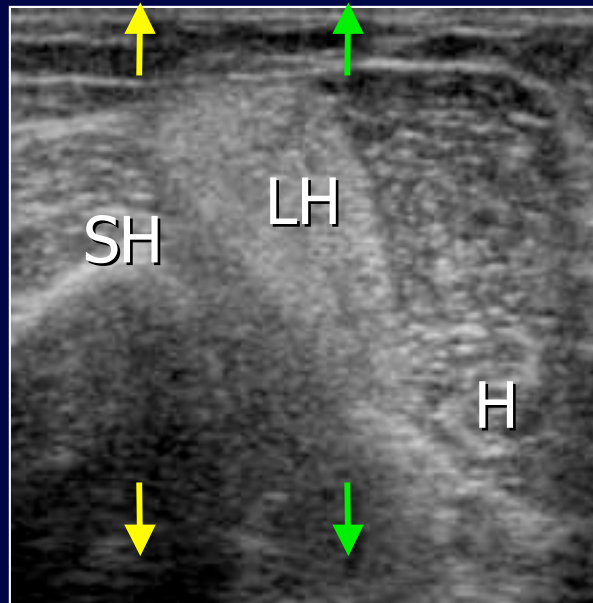




# Miotendineous tear



# Chronic tear



“Black and white”  
sign

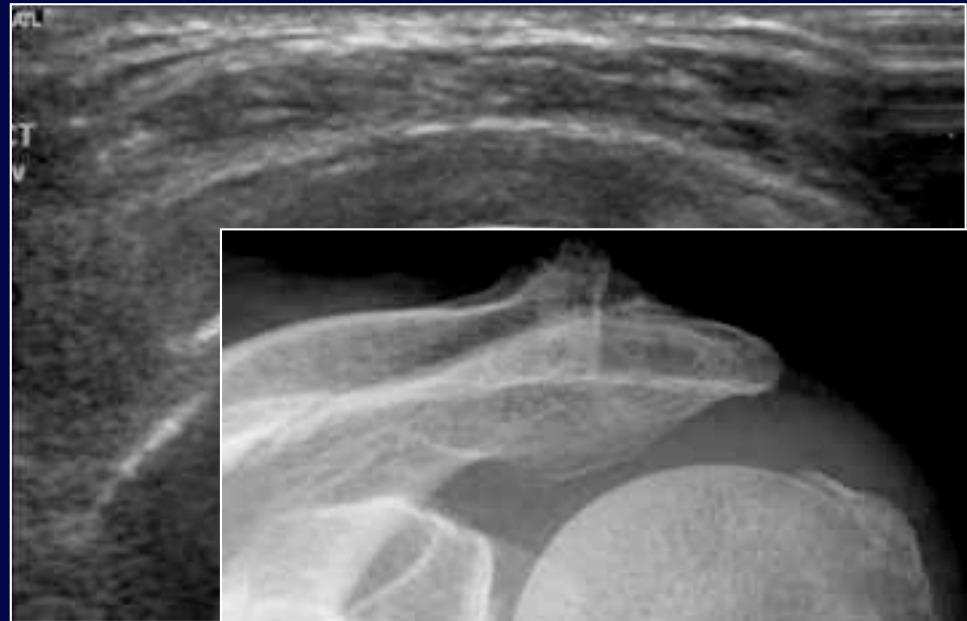
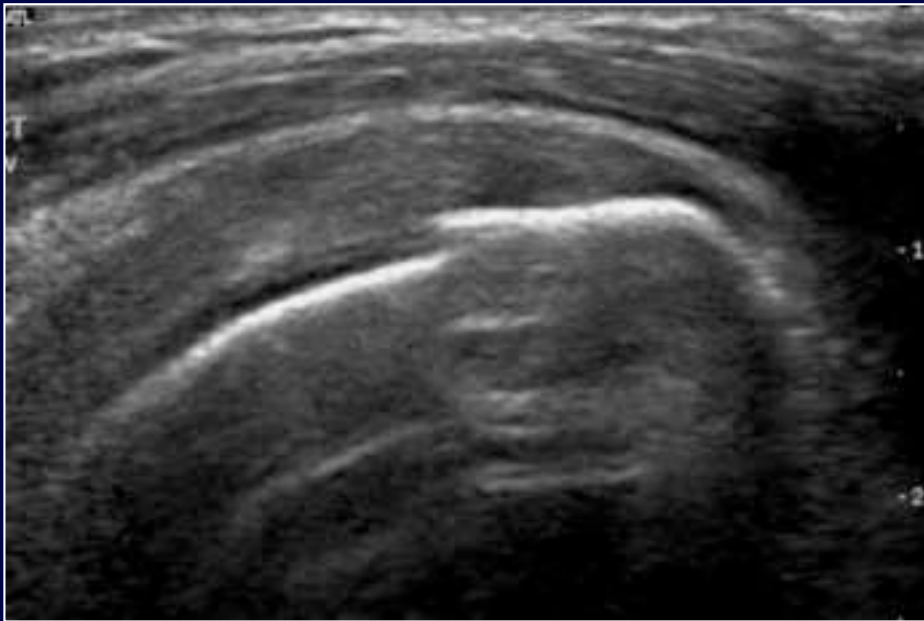


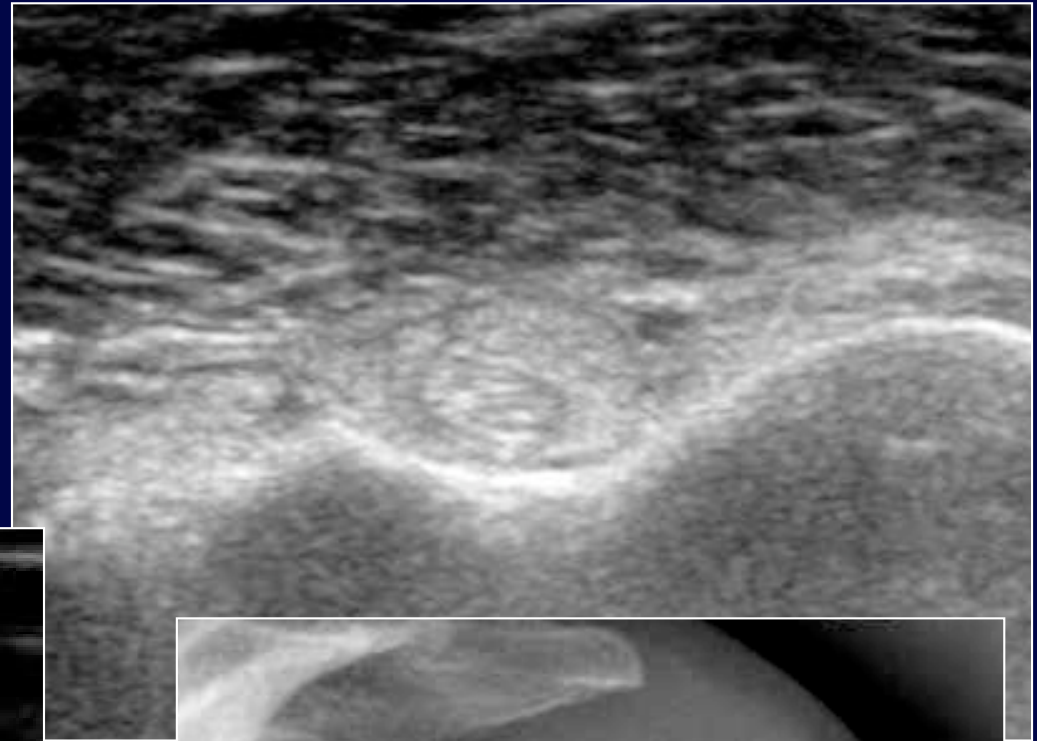
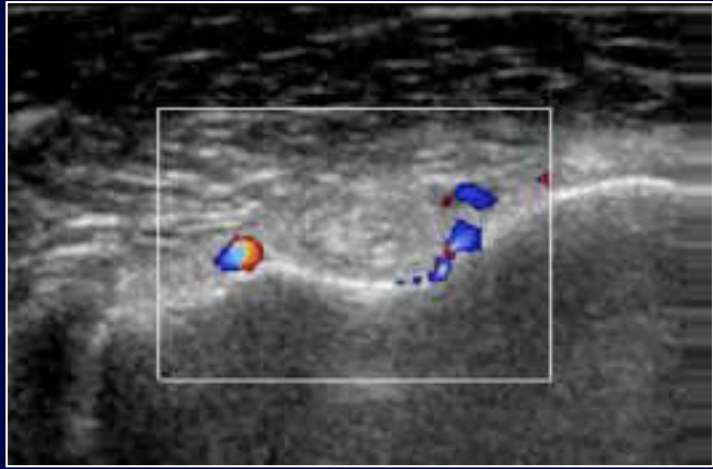
To friends at home and abroad, Greetings for a Happy Christmas and a Good New Year



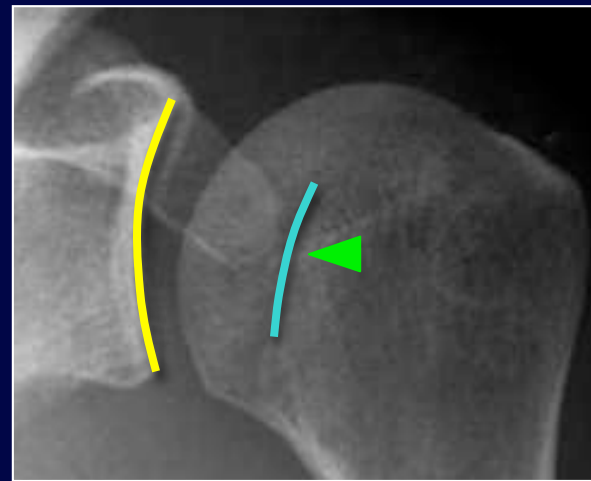
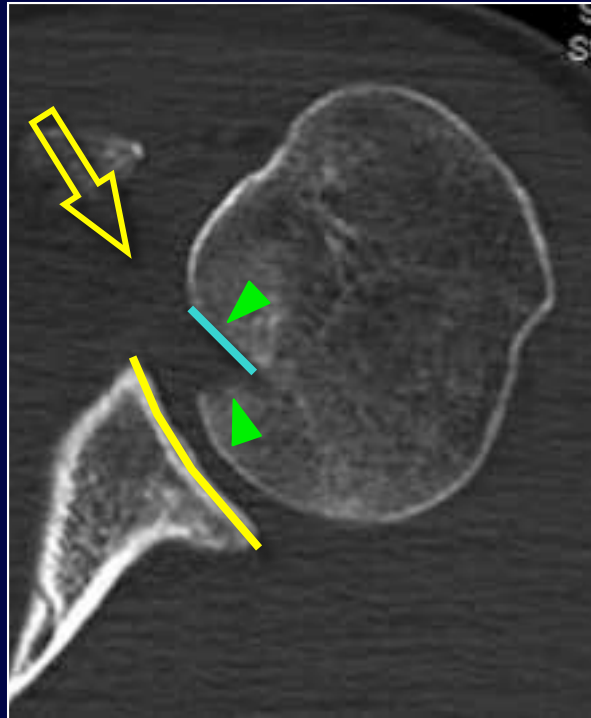
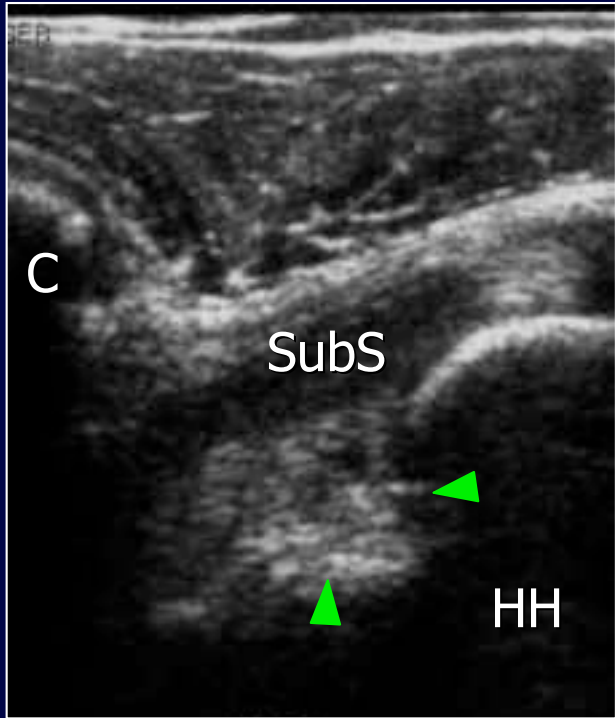
# Bones

## Fractures Tuberosities





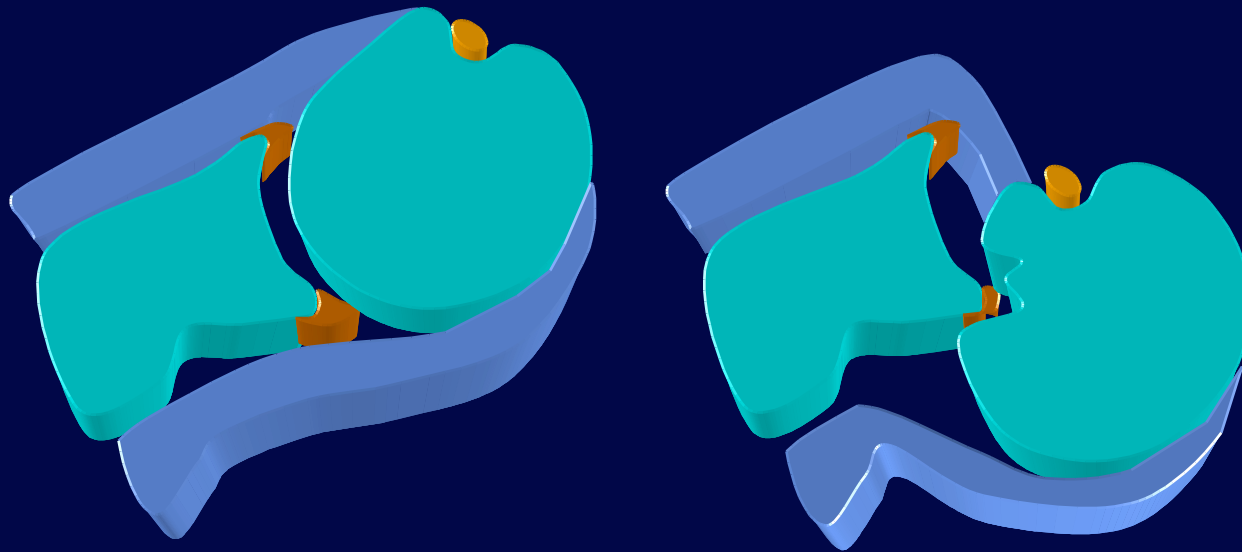




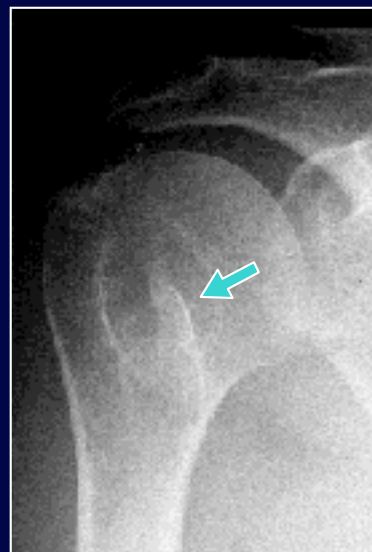
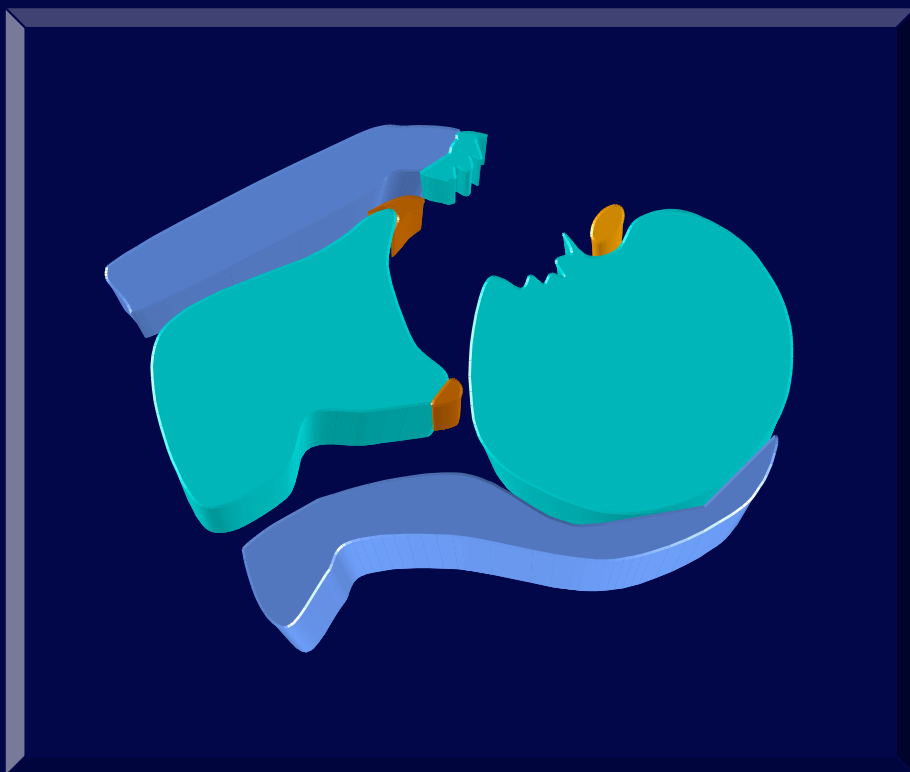
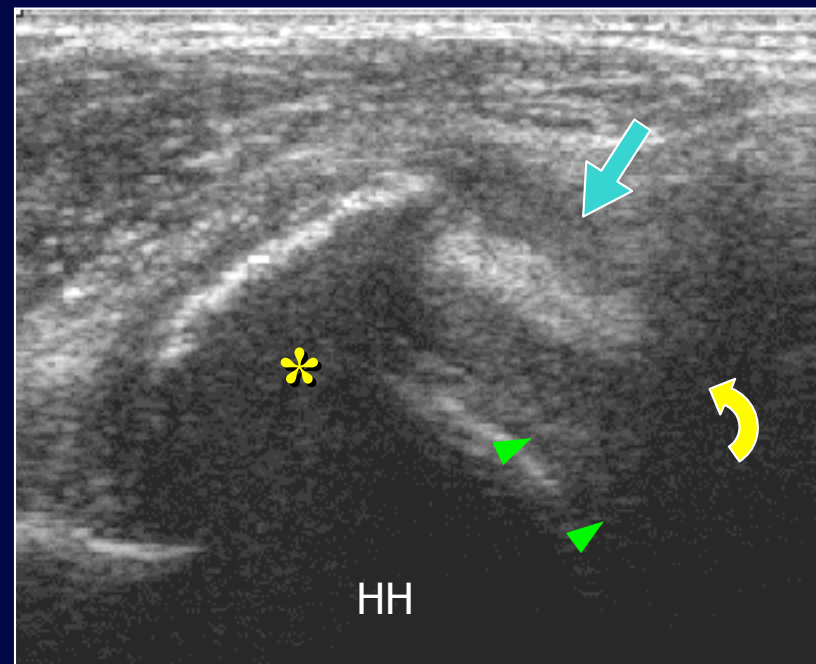
“ You see what you’re looking for ”

# Posterior dislocation    McLaughlin lesion

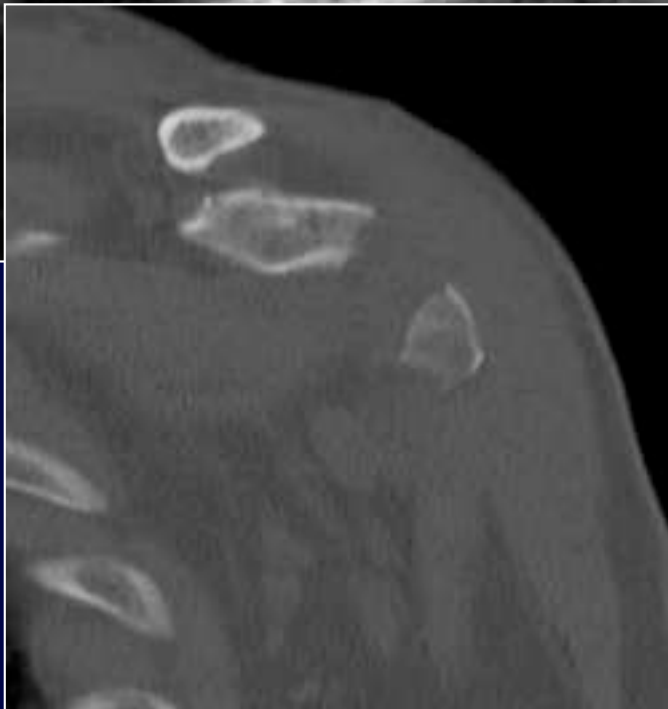
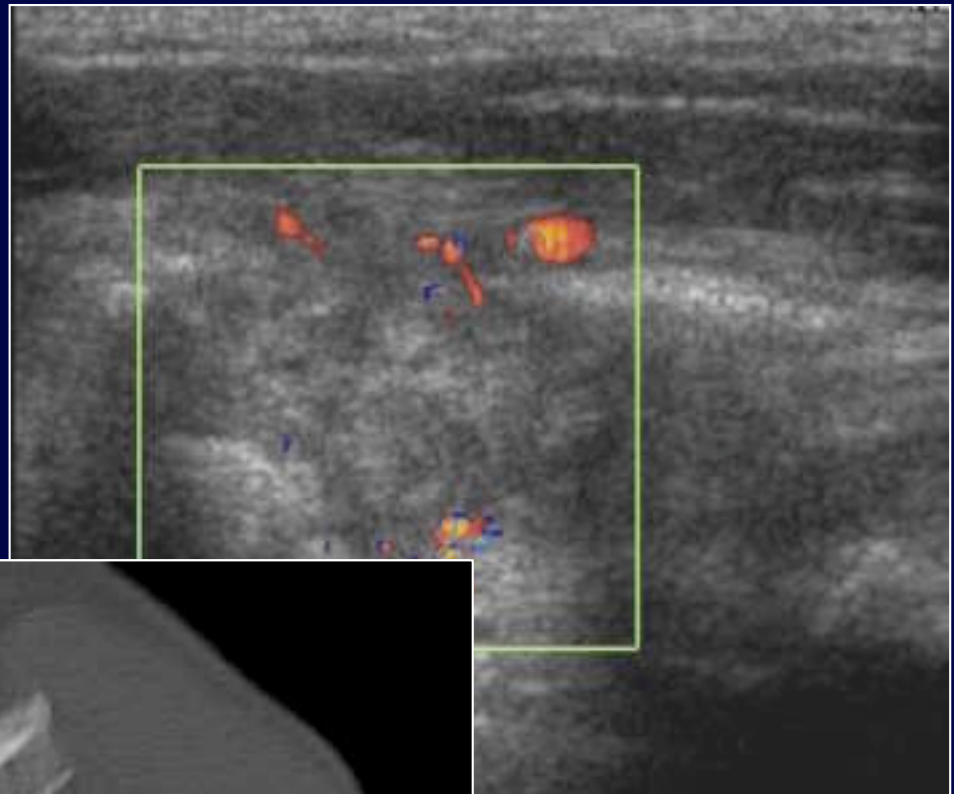
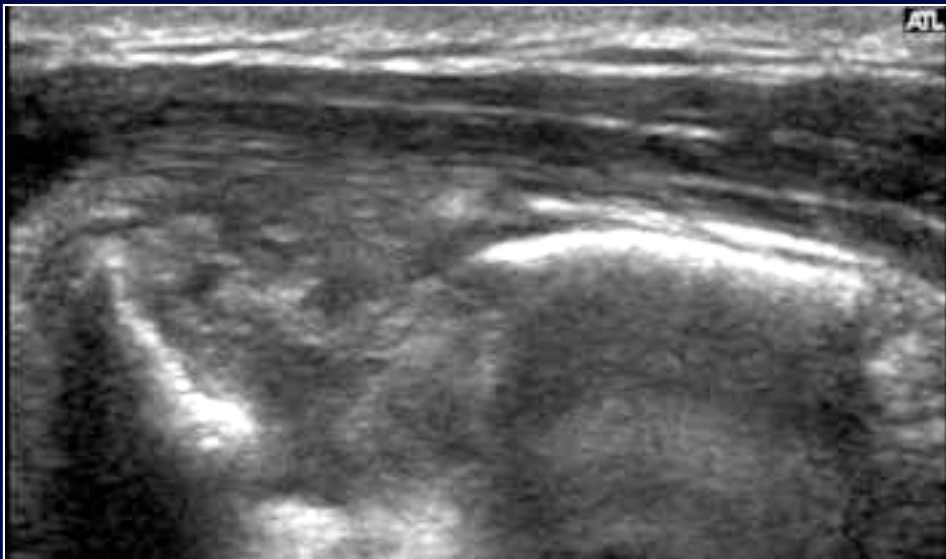
- Impact of the anteromedial aspect of the HH on the glenoid rim

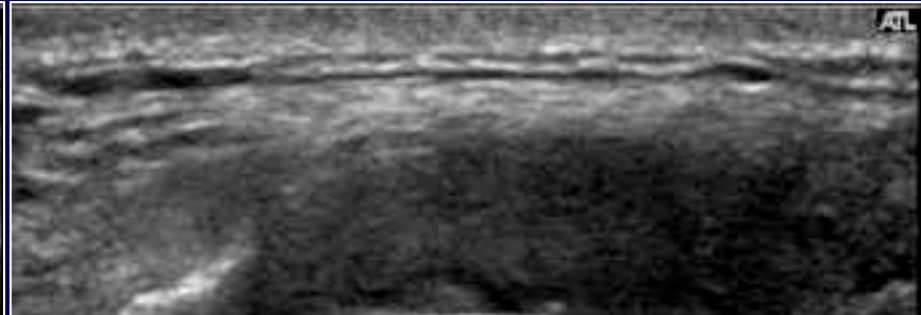
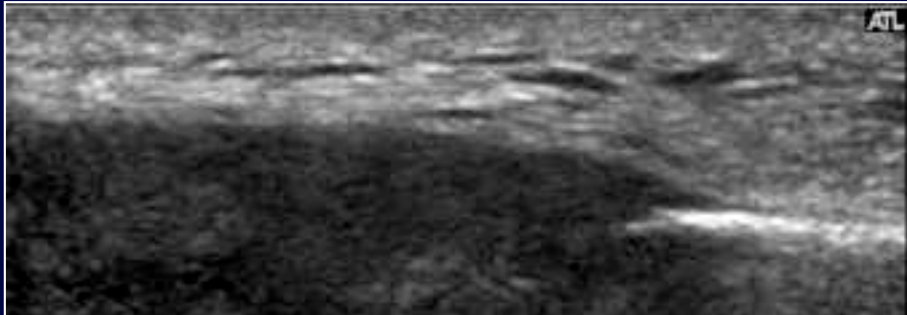


- Avulsions of the LT can be found in posterior shoulder dislocations as a result of a subscapularis traction





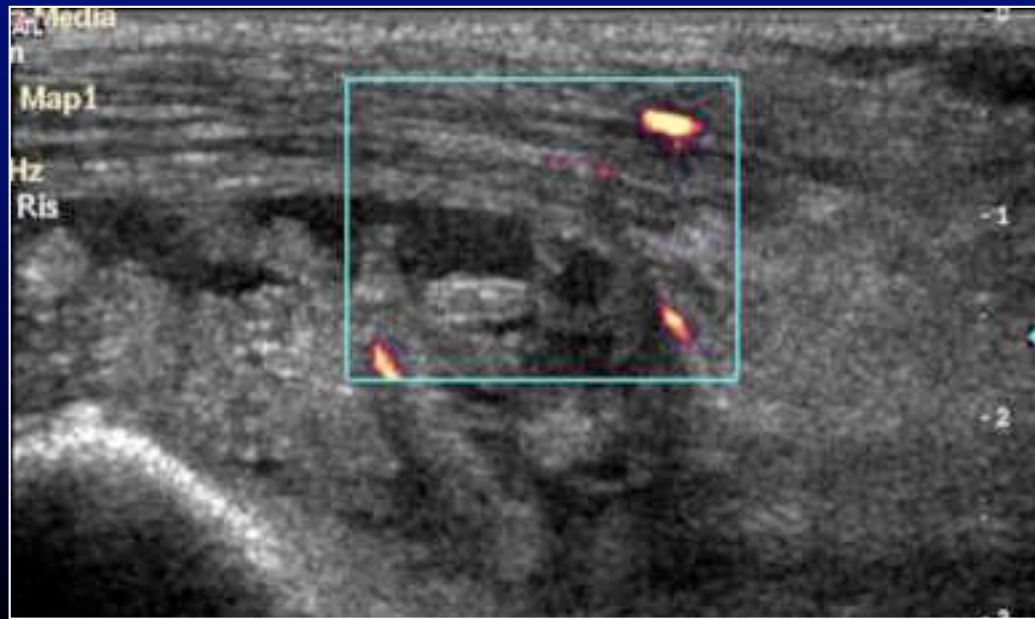




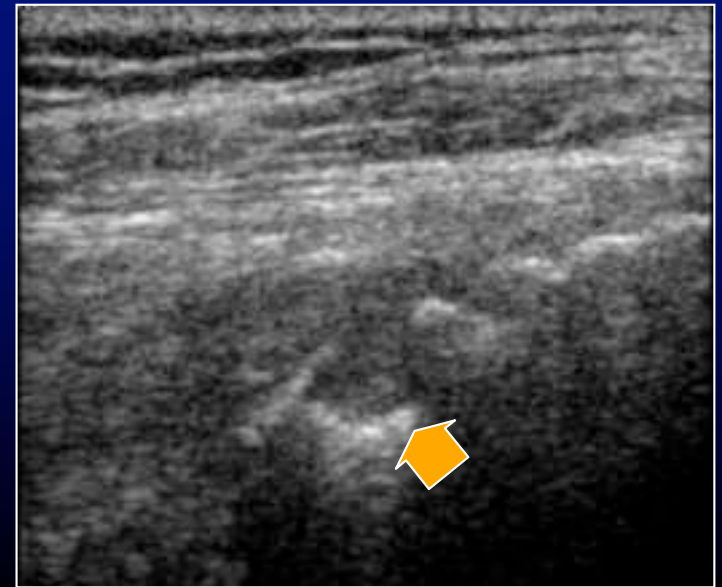
# Inflammatory conditions

- In RA, US reveals synovitis at early stages of disease, when no radiographic changes are yet evident, and differentiates synovial hypertrophy from effusions

Color Doppler → synovial hyperemia



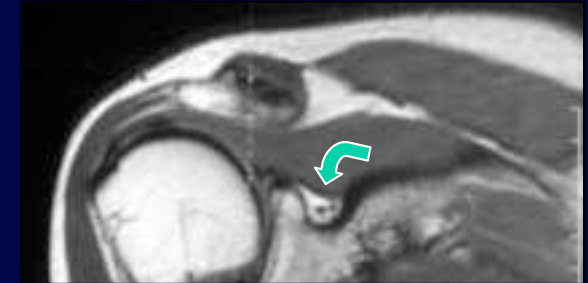
Bone erosions



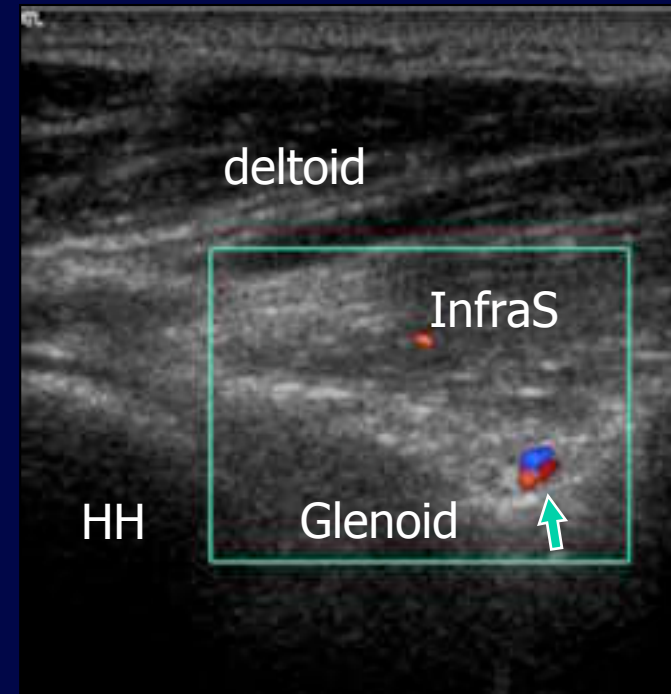
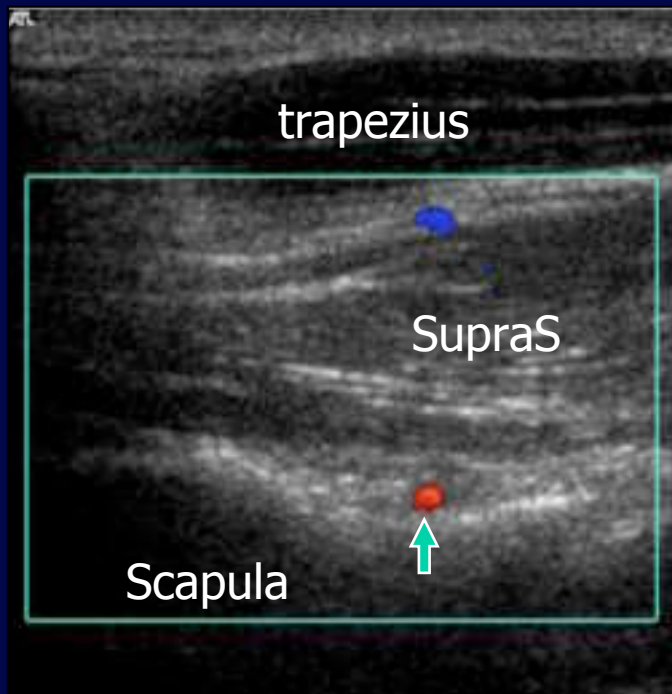
# Suprascapular nerve - anatomy

The SUPRASCAPULAR NERVE courses

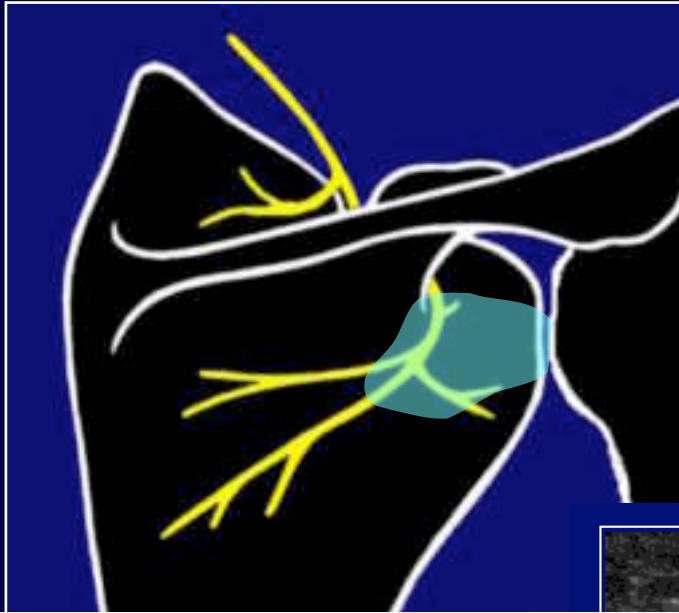
- in the **coracoglenoid notch** sending branches to supply the supraspinatus



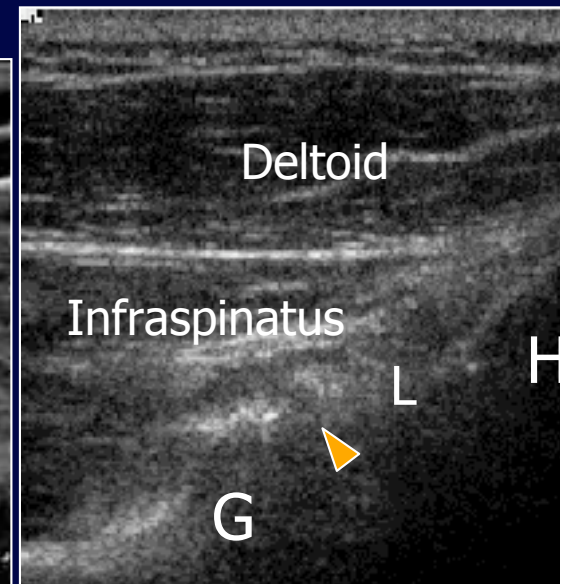
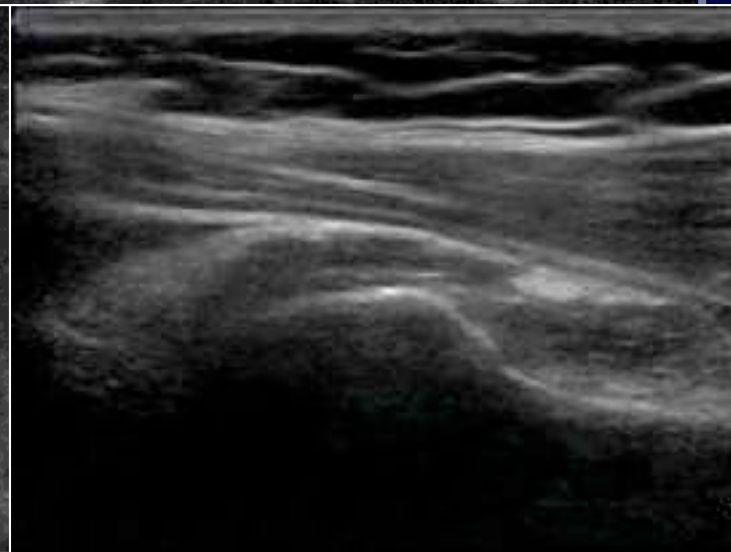
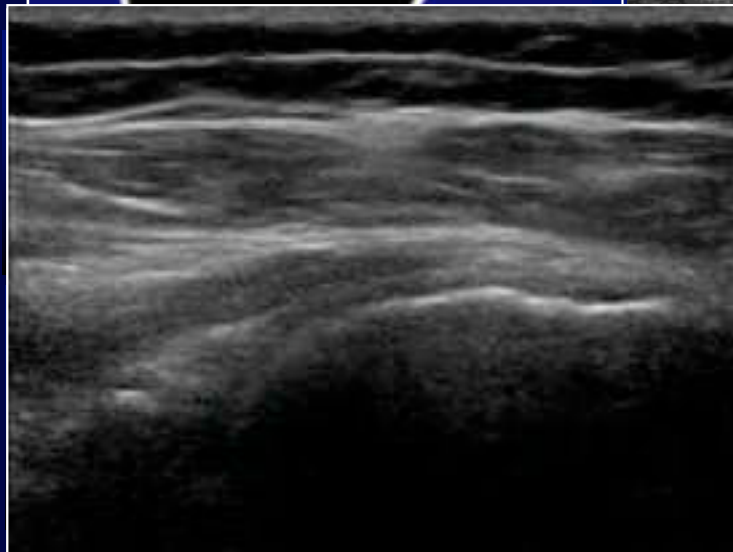
Suprascapular artery



# Suprascapular Nerve - ganglia

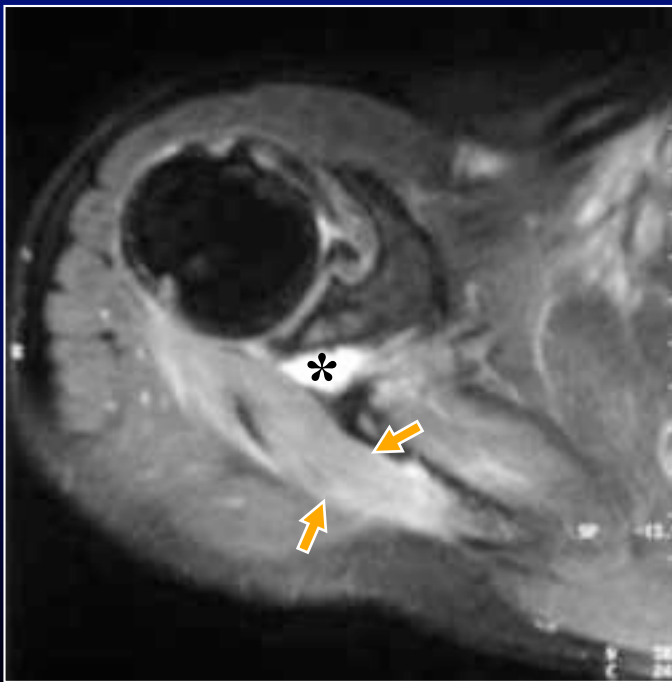
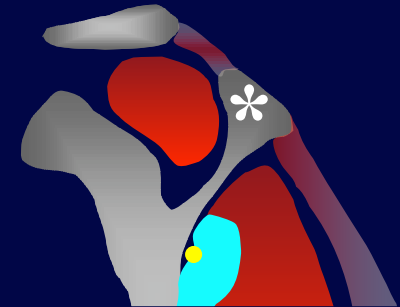
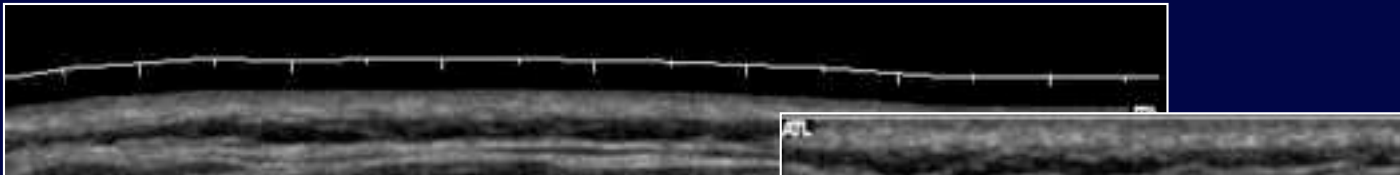


- Paralabral cysts are the leading cause of suprascapular neuropathy
  - 0.4-2% of shoulder pain
  - athletes, young people



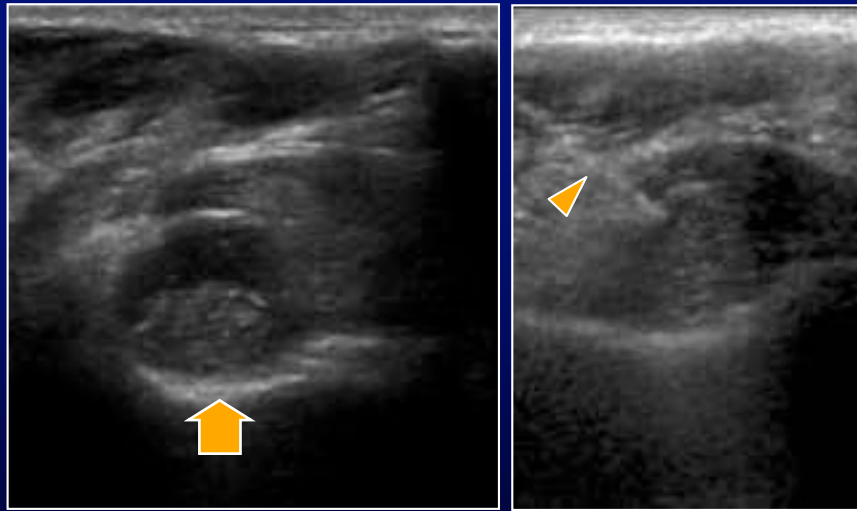
# Suprascapular Nerve Syndrome

## SPINOGLENOID NOTCH GANGLION



# Suprascapular Nerve Syndrome

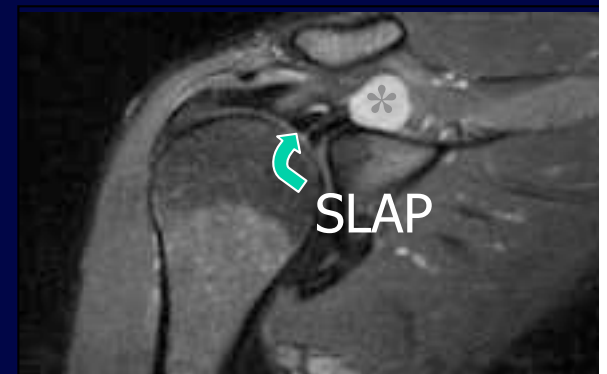
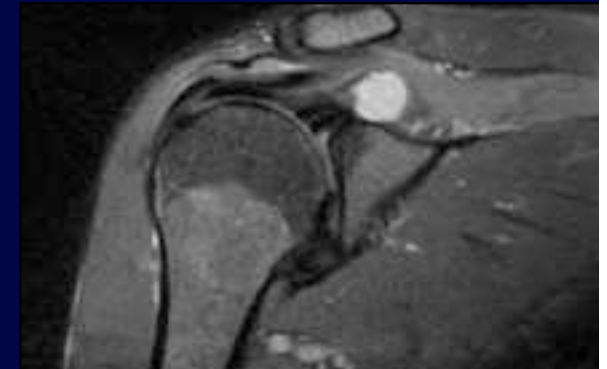
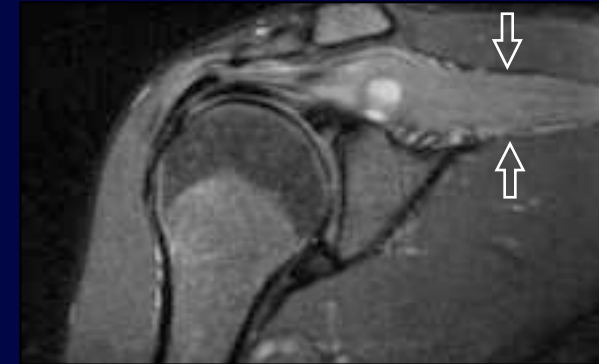
## SUPRASPINOUS NOTCH GANGLION



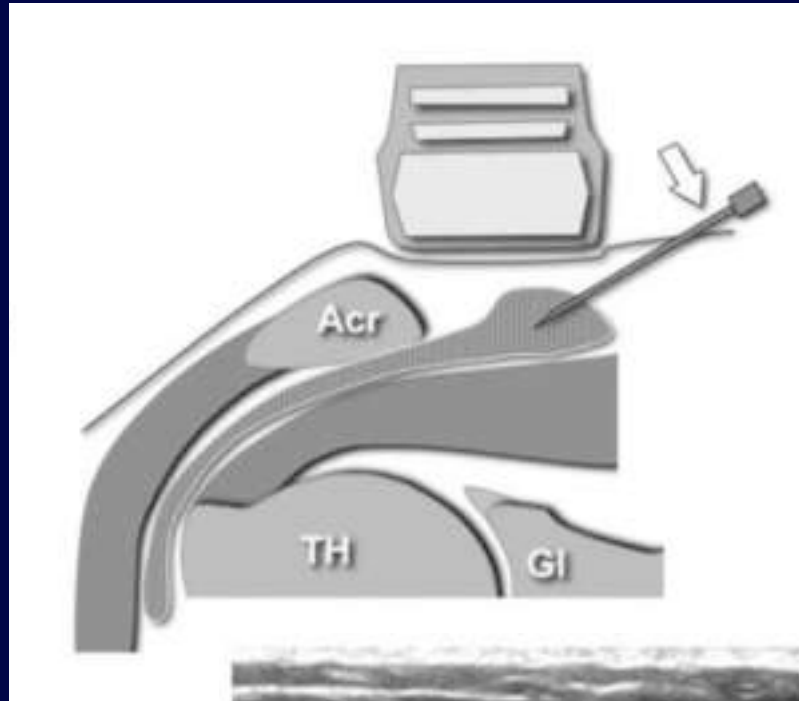
- US can guide the aspiration of the cyst for decompressive purposes

*Chiou, 99*

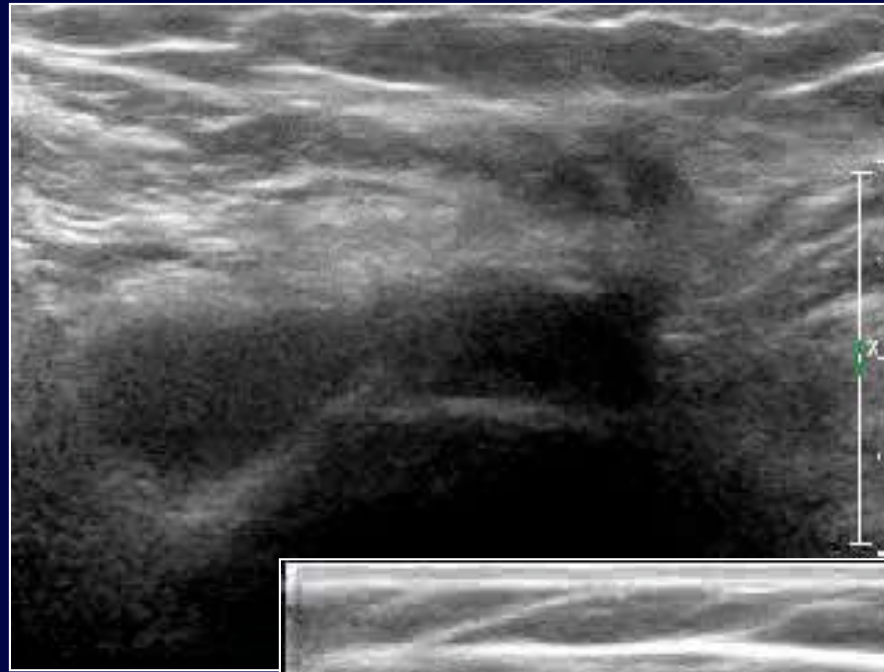
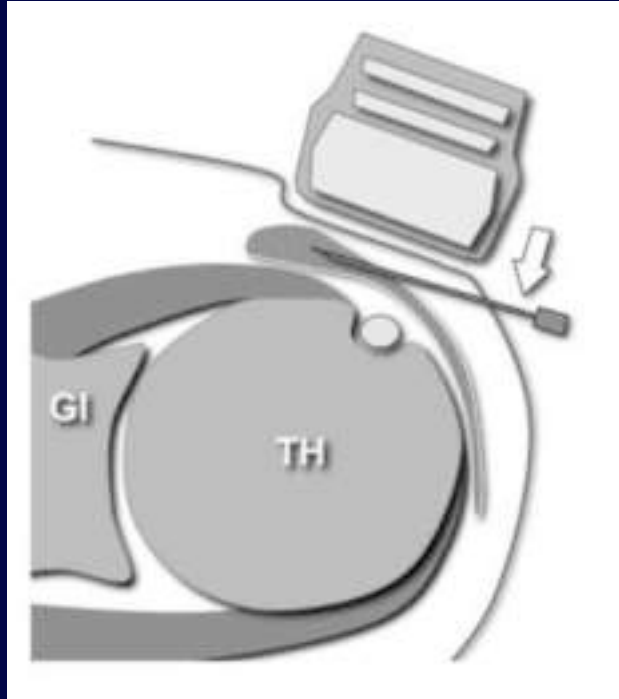
- Tunnels through the tear, usually across the base of the triangular hyperechoic labrum

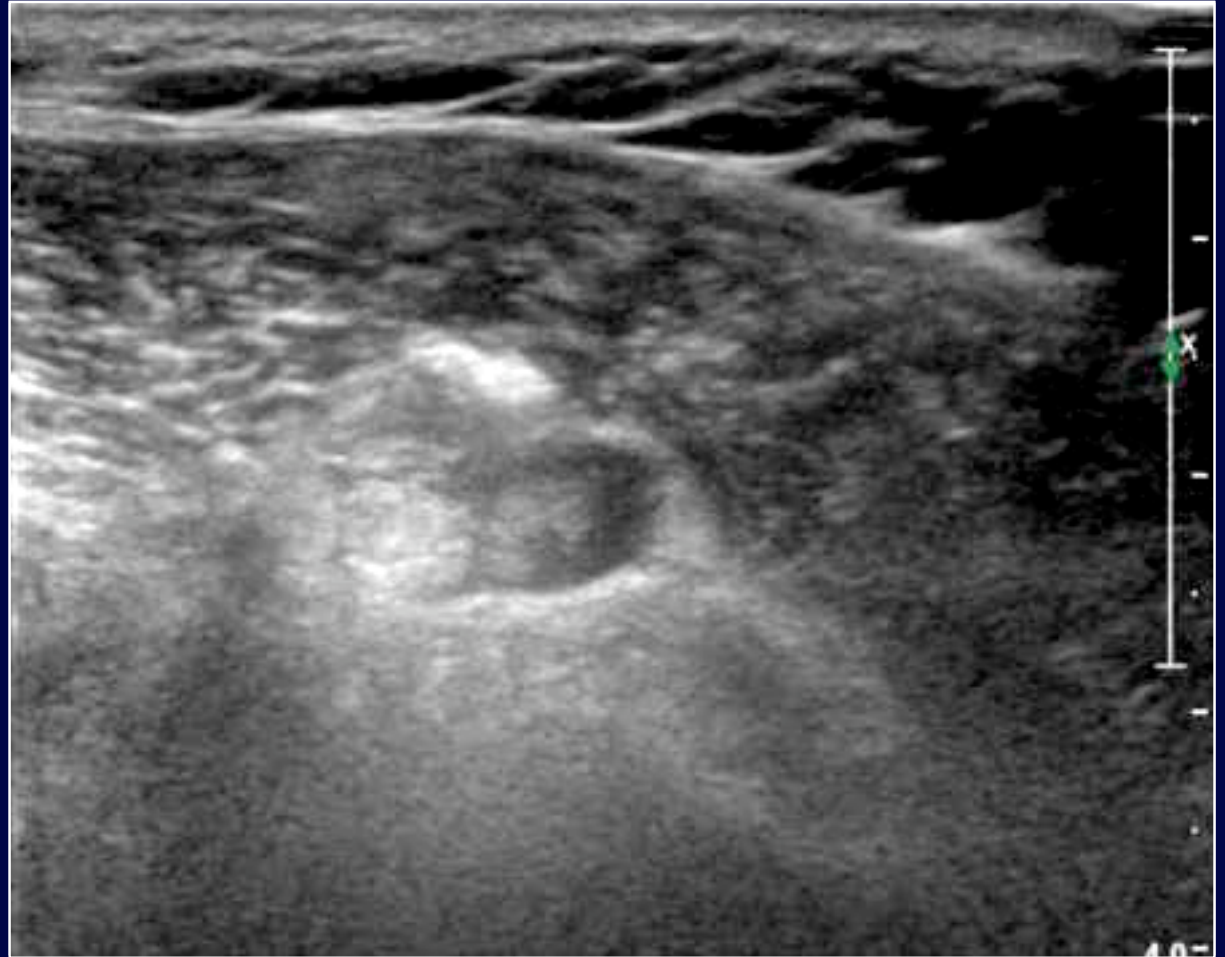
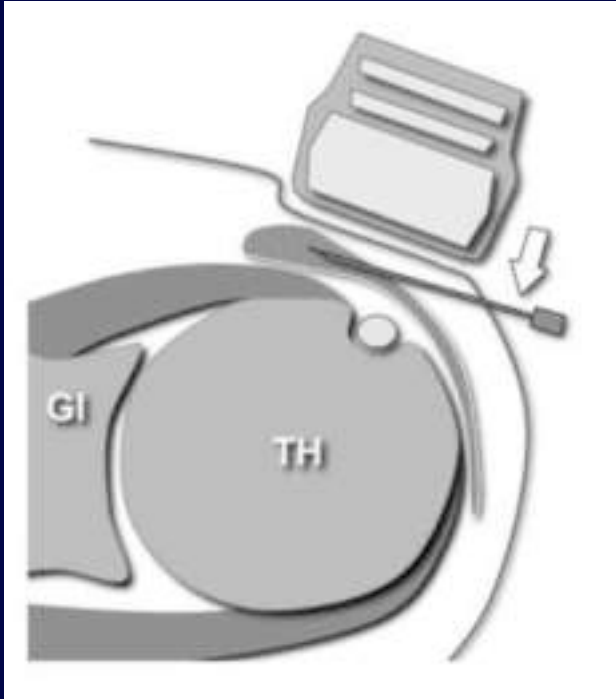


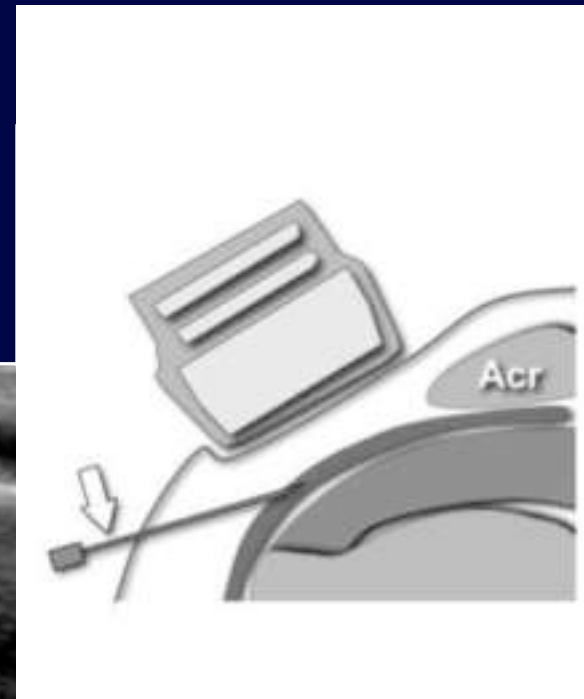
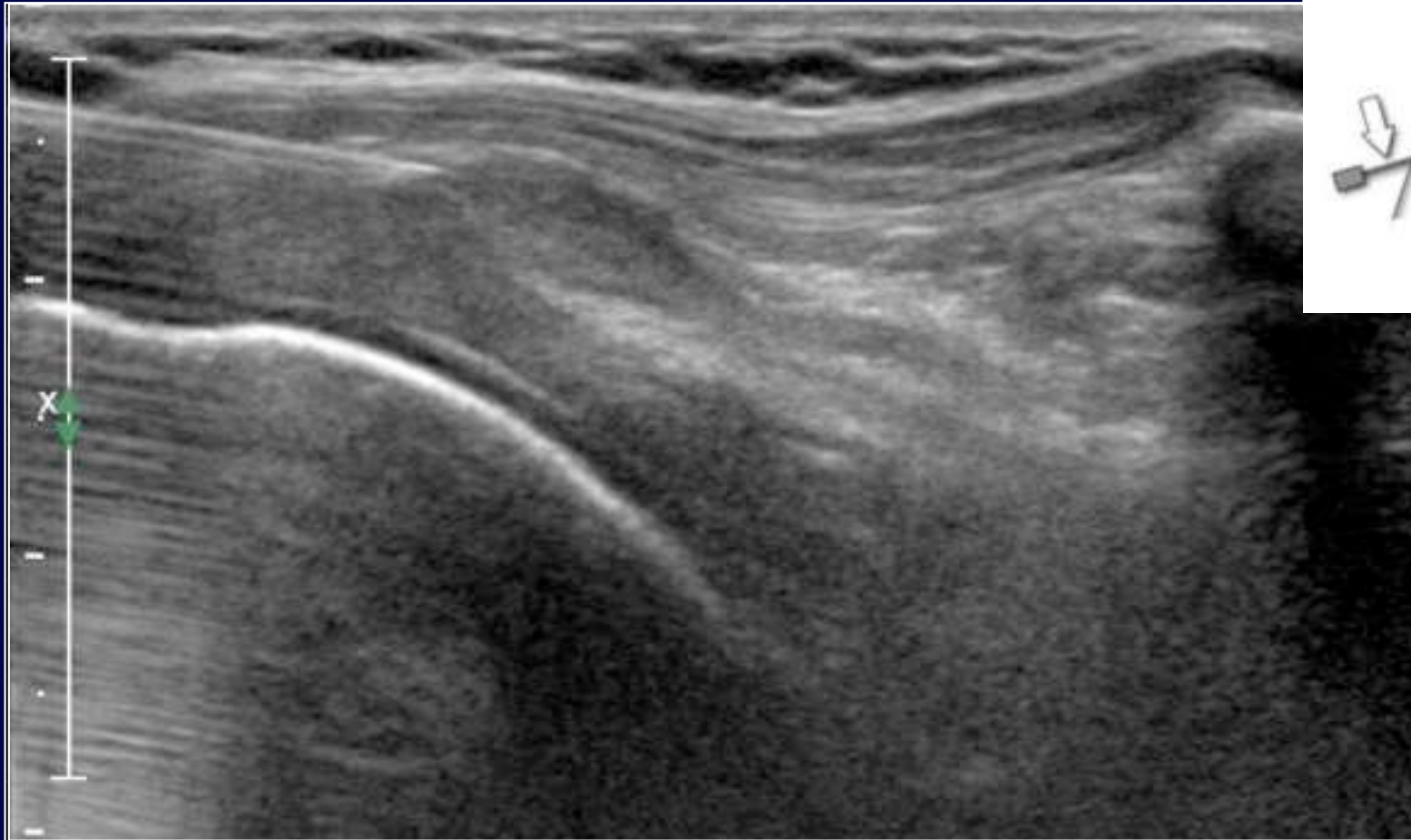
# US-guided injections

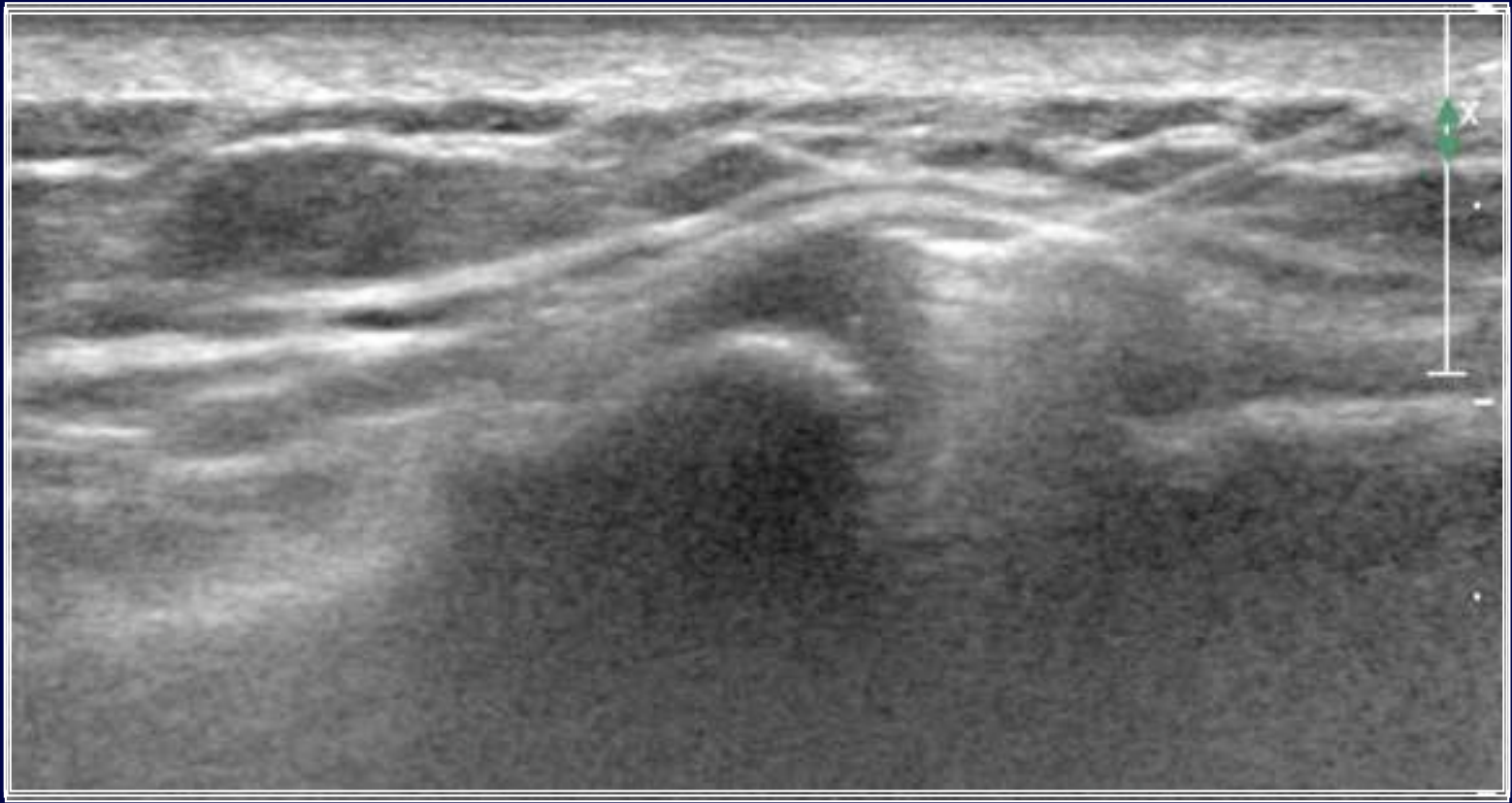


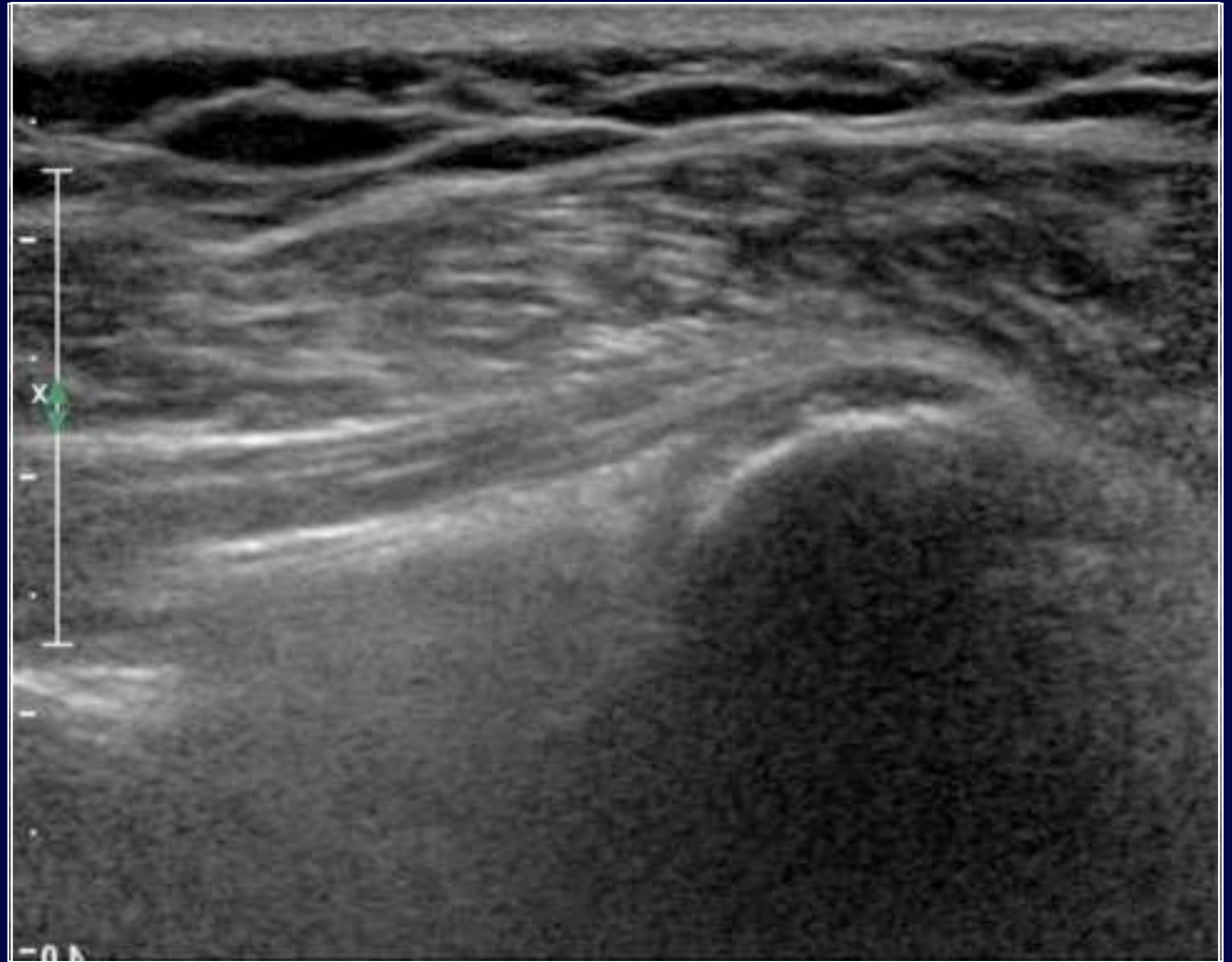
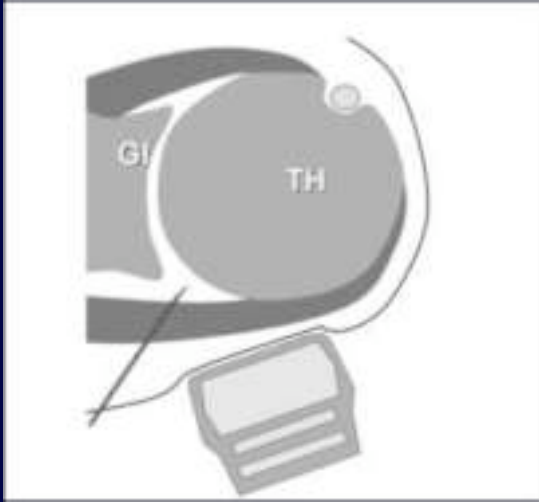












Is there a place for MSUS in the assessment of the non rotator cuff lesions of the shoulder ?

LHBT

Bones

Arthritis, bursitis

Nerve lesions