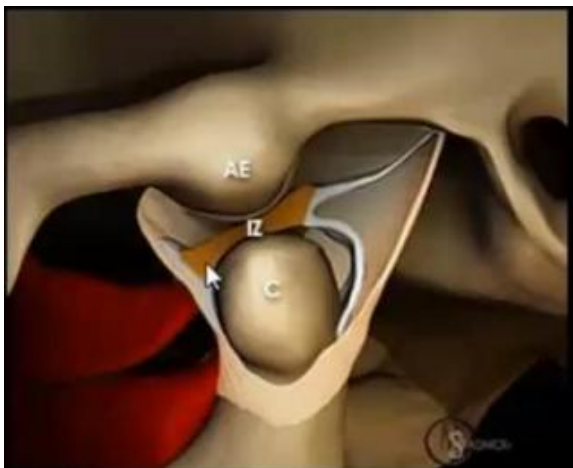
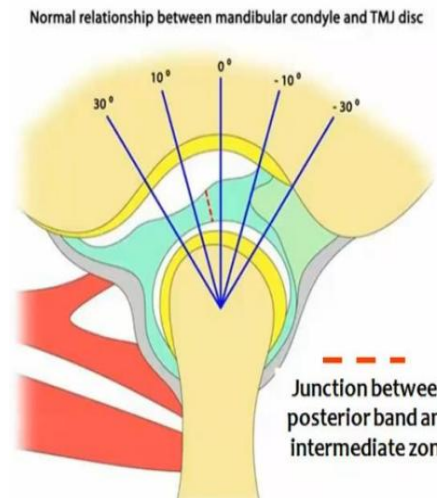
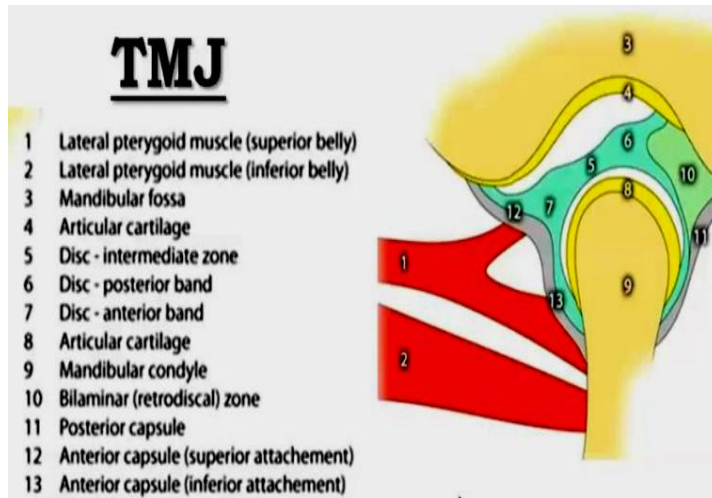


## TMJ IMAGING

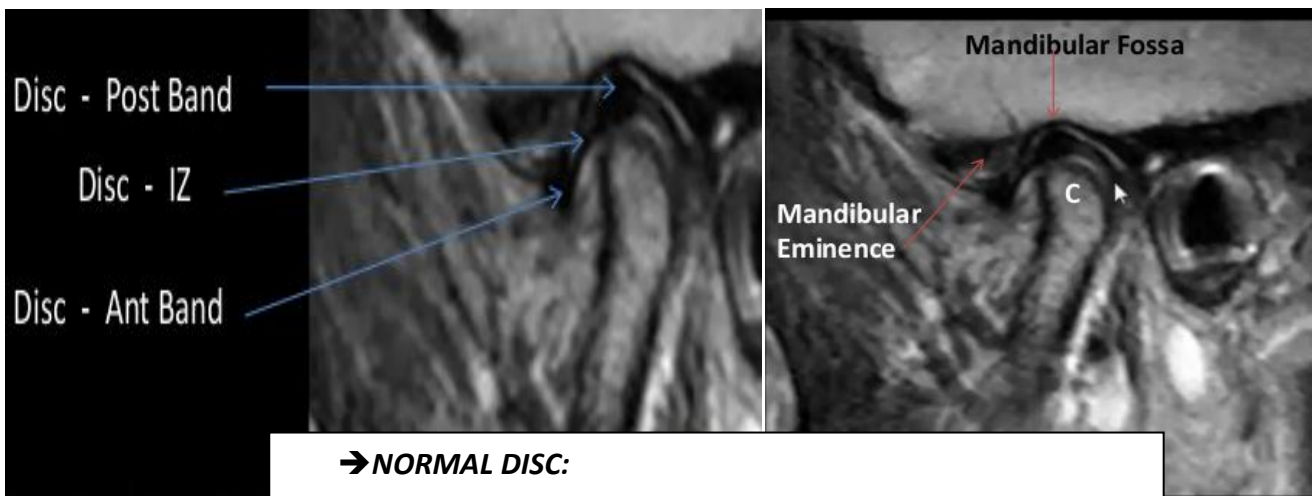


### →ARTICULAR DISC :

- Fibrous connective tissue
- Biconcave
- Ant band , post band ,intermediate zone
- Post band at 12 o'clock
- 

- MRI of TMJ is done oblique sagittal – perpendicular on mandibular Head

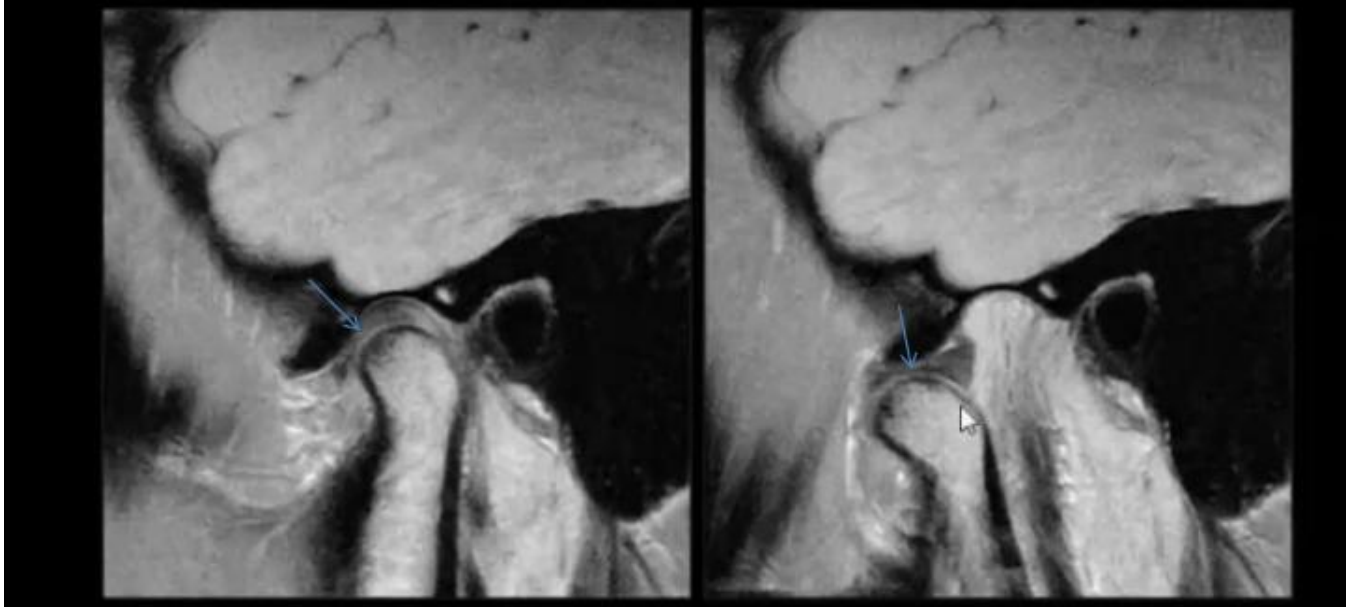
### TMJ DISC

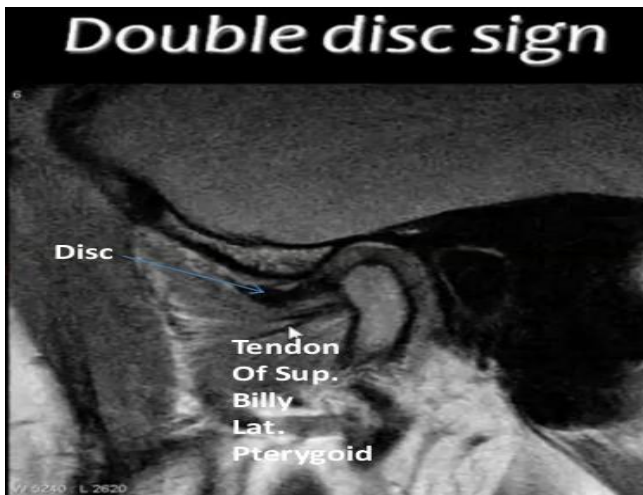


#### → **NORMAL DISC:**

- Biconcave
  - Low signal in all sequences
  - Biconcave
  - Located between condyle & temporal
    - ⇒ Disc in **closed mouth** → IZ between Eminence & Condyle
    - ⇒ In **open mouth** → IZ also between Eminence & Condyle
- "As the disc move anteriorly with the condyle"*

### Normal TMJ – closed & open mouth





Thickened insertion of Lateral pterygoid ms → Double disc sign

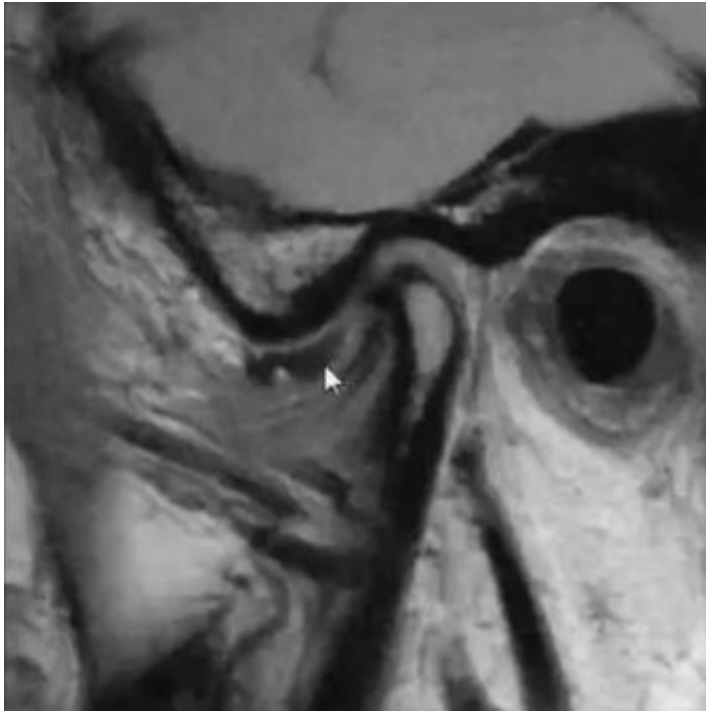
### • TMJ INTERNAL DERANGEMENT

Change of disc biconcave shape to:

- Rounded
  - Flattened
  - Stuck disc = Fixed to temporal bone due to adhesions
  - Crumpled
  - Perforated
- Etiology :
    - Trauma    - Spasm    - Arthritis
    - Bilaminar Zone defect

**Bilaminar zone** : structure attached to posterior band , control disc anterior motion during mouth opening





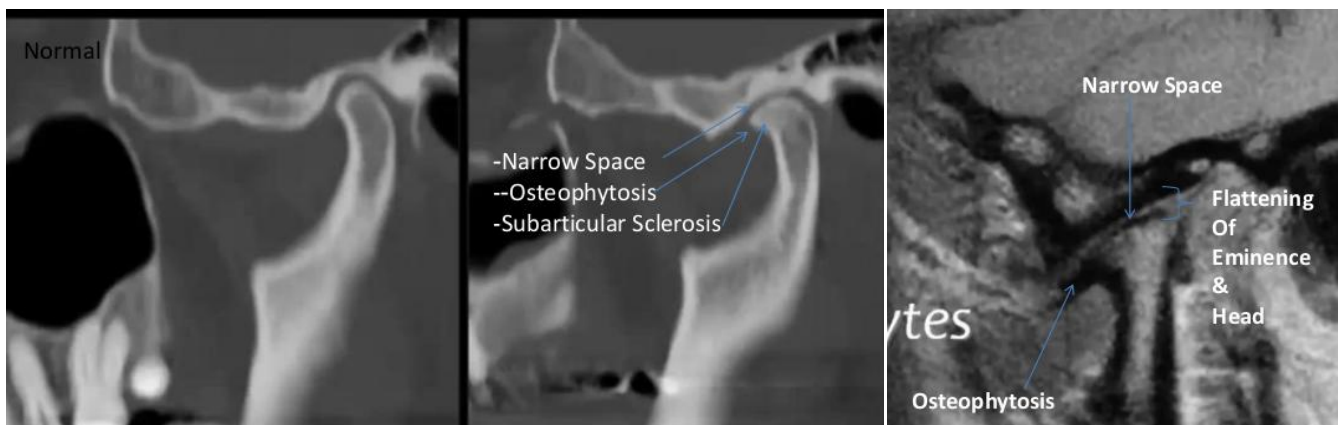
### ***Stuck Disc:***

Disc is **Fixed**

adherent to temporal bone  
either in closed or opened  
mouth

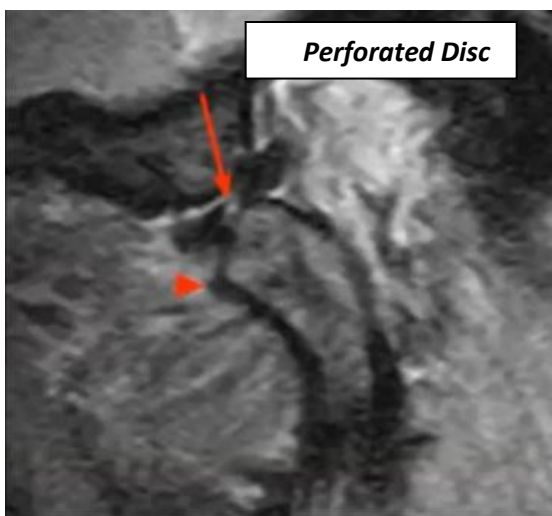
### ⇒ INDIRECT SIGNS OF INTERNAL DERANGMENT:

1. Large effusion
2. Thickened lateral pterygoid muscle
3. Osteo Arthritic Changes





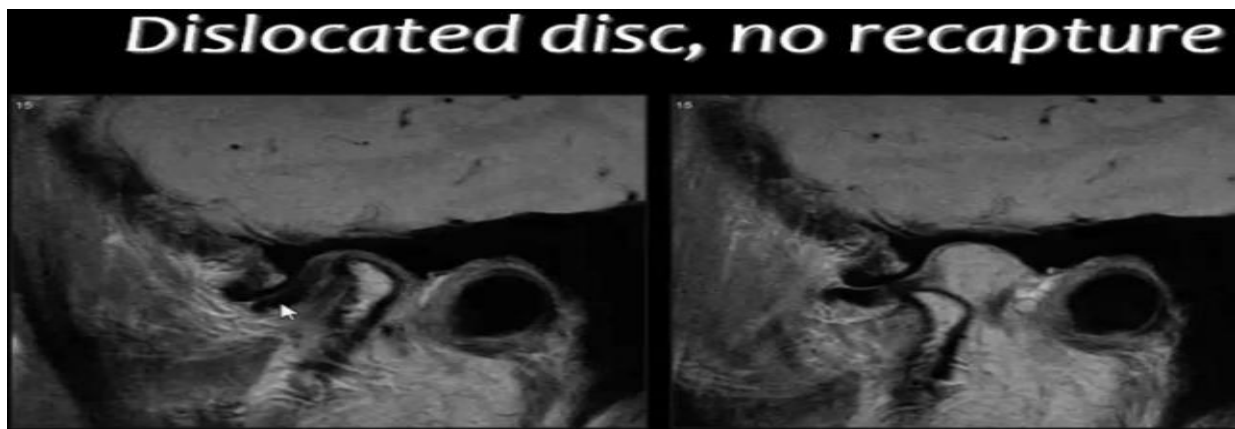
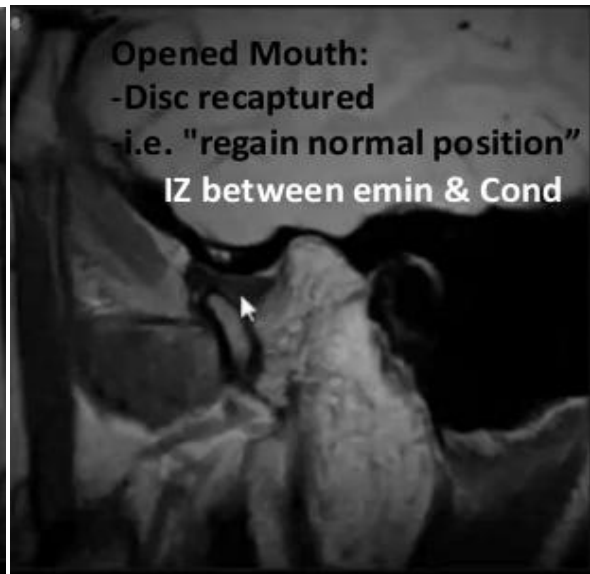
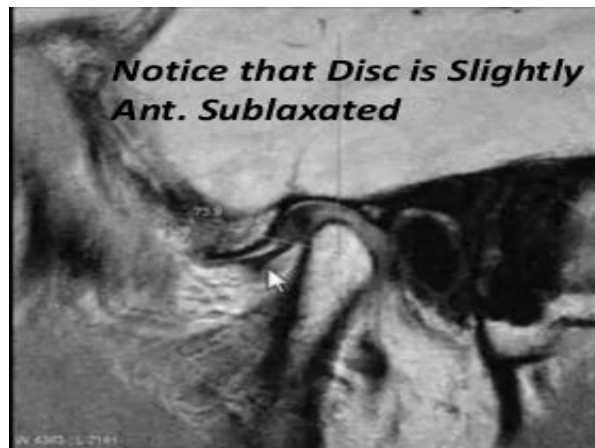
**Ankylosis : 2 Types Fibrous & Bony**



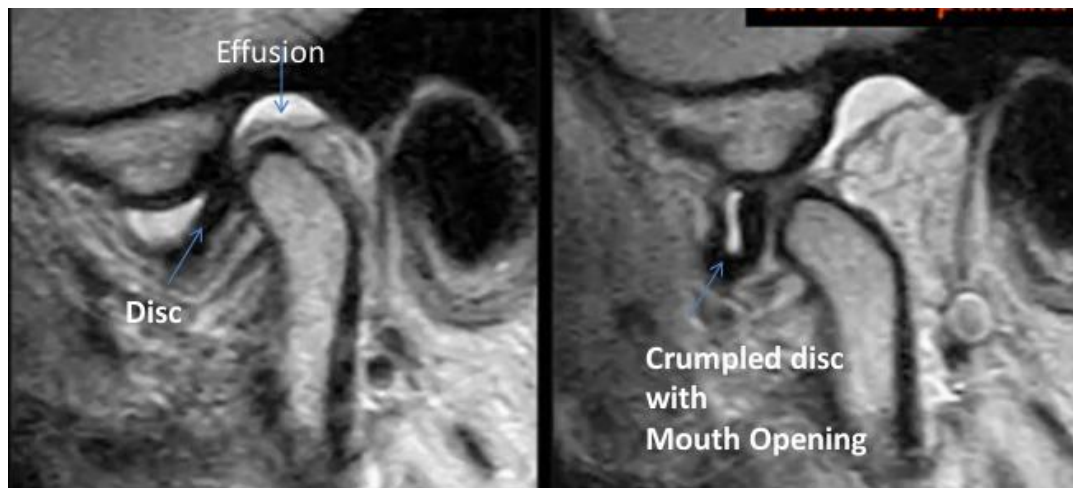
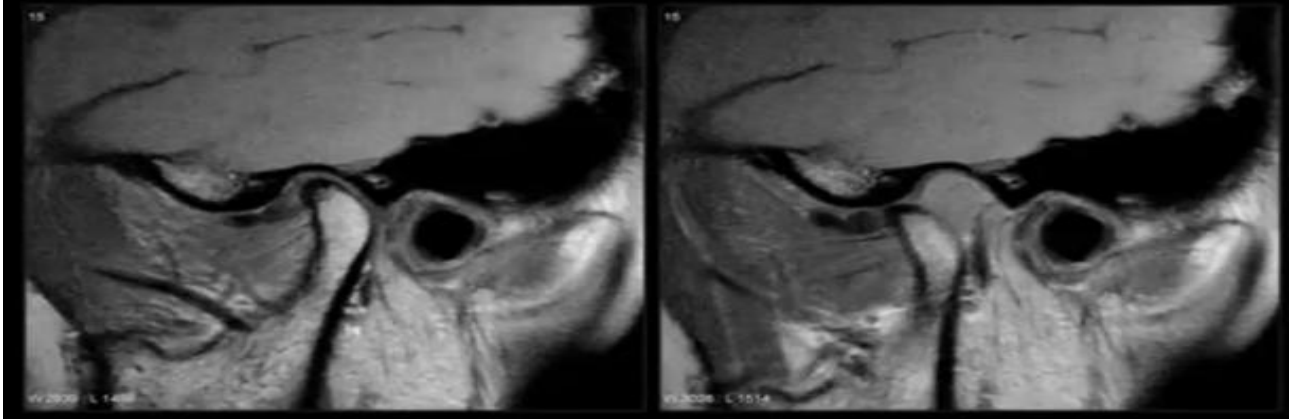
## • TMJ DYSFUNCTION

- ⇒ **Def:** Abnormal relation of Disc & articular surface
- ⇒ 1 M : 8 F
- ⇒ **C.P.:** - pain - Click - function restriction
- ⇒ Disc is subluxated or dislocated
  - Most common : Anterior +/- recapture on opening mouth





## Dislocated disc, no recapture



## Synovial Osteochondromatosis

