

**Include in Study notes: Date of injury? previous surgery?**

**SHOULDER ARTHROGRAM \*\*Images\*\***

- 3 Pl loc
- Cor T1 cl fat sat OBLIQUE
- Sag T2 cl fat sat OBLIQUE
- Cor T2 cl fat sat OBLIQUE
- Ax PD cl fat sat OBLIQUE
- Ax T1 no fat STRAIGHT  
--50 years old and Over--
- Obl Sag T1  
--Under 50 years Old--
- ABER 3 pl loc Arm over head
- ABER Sag T1 cl fat sat

**OBLIQUE CORONAL**



**\*\*Set up off of Coronal Loc**  
▶ If patient is unable to raise arm, copy GRx of Ax PD fat and have patient externally rotate arm  
7. Ax PD cl fat sat OBLIQUE

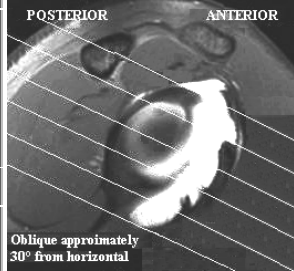
**HIP ARTHROGRAM (3T less than 50, 1.5T 50 or older) \*\*Images\*\***

- 3 Pl loc 1.5T OK if Patient not 3T Compatible
- Ax cal scan
- Cor T1 cl fat sat 4/0.4 20 FOV
- Cor T2 cl fat sat 4/0.4 20 FOV
- Sag PD cl fat sat 4/0.4 18 FOV
- OBLIQUE** Ax T1 cl fat 4/0.4 18 FOV GRx on cor, parallel to fem neck
- Ax T1 no fat sat 4/0.4 18 FOV Axial through lesser trochanter
- Ax T2 cl fat sat 4/0.4 18 FOV Axial through lesser trochanter
- Sag 3d SPGR IDEAL
  - ▶ **Reformat:** Water series into 1.5 mm in all 3 planes
  - ▶ **ALI:** Water series & reformats
  - ▶ **ALI\_SOURCE:** Remaining source images

**OBLIQUE SAGITTAL**

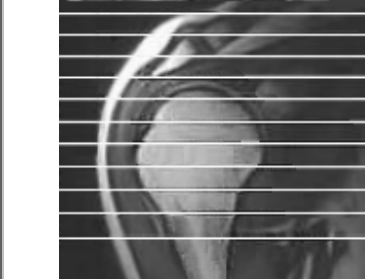


**OBLIQUE AXIAL**



Obllique approximately 30° from horizontal

**STRAIGHT AXIAL**



**ABER**



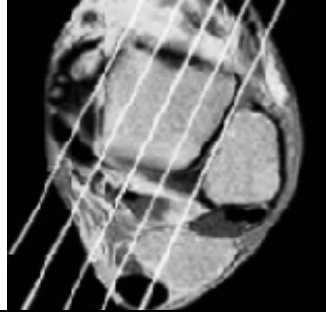
**KNEE ARTHROGRAM**

- 3 Pl loc
- Ax T2 cl fat sat--4 slices above patella through tib/fib joint
- Cor T1 cl fat sat --Popliteal Artery through patella
- Sag PD--Include all bone through ligaments
- Sag T2 cl fat sat
- Sag T1 cl fat sat

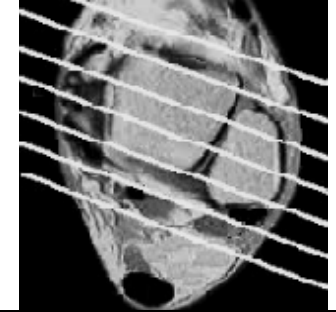
**ANKLE ARTHROGRAM**

- 3 Pl loc **\*\*Images\*\***
- Ax T1 cl fat sat 3/1 14 FOV  
**Cover 5 slices above ankle joint through the entire calcaneus.**
- Sag FSTIR MORTISE 3/0.5 14 FOV
- Sag T1 cl fat sat MORTISE 3/0.5 14 FOV
- Cor T1 cl fat sat MORTISE 3/0.5 14 FOV
- Cor PD no fat sat MORTISE 3/0.5 16 FOV
- Cor 3D GRE MORTISE 1.5/ 28 loc 14 FOV

**MORTISE SAGITTAL**



**MORTISE CORONAL**



**ELBOW ARTHROGRAM**

- 3 Pl loc
- Ax T1 cl fat sat
  - ▶ Axial to humerus, GRx on coronal from 3 pl loc
- Ax T2 cl fat sat
  - ▶ Axial to humerus, GRx on coronal from 3 pl loc
- Sag T1
  - ▶ Sagittal to distal humerus on an axial image
- Cor T1 cl fat sat
  - ▶ Cor (parallel) to distal humerus on an axial image
- Cor PD cl fat sat
- ▶ Cor (parallel) to distal humerus on an axial image

**COIL:**  
8Ch or 16 ch Knee coil, 16 ch Wrap

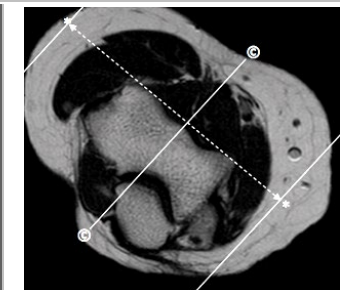
**Position: Prone, arm over head. Arm should be supine.**

**WRIST ARTHROGRAM ((3T less than 50, 1.5T 50 or older)**

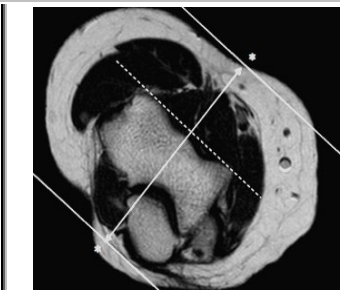
- 3 Pl loc Midline
- 3T & Artist (e-mail megan if scanned at 1.5T)  
Cor PD Cube Fat (60 slices) 1/0 14 FOV **\*\*do not decrease # of slices. It will decrease SNR**
- Ax T1 cl fat sat 3/0.5 10 FOV
- Ax T2 cl fat sat 3/0.5 10 FOV
- Cor T1 cl fat sat 2/0.2 10 FOV
- Cor T2 cl fat sat 2/0.2 10 FOV
- Sag T1 **no fat sat** 3/0.5 10 FOV
- \*\*IF at 1.5T run 8. Cor T1 SPGR fat 3d 1.2/0 10 FOV**

**COIL:**  
**HD Wrist if avail**  
Opt: Small 16ch Flex  
**if not 3T compatible:**  
Dedicated Wrist, 16 ch Flex coil. **Position: Prone, arm over head**

**SAGITTAL PLANE**



**CORONAL PLANE**



**TMJ: TEMPOROMANDIBULAR JOINTS (UH, RP @ 1SP ONLY)**

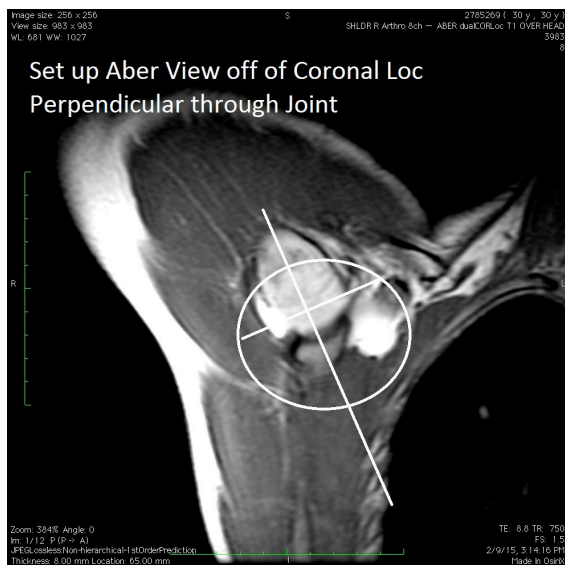
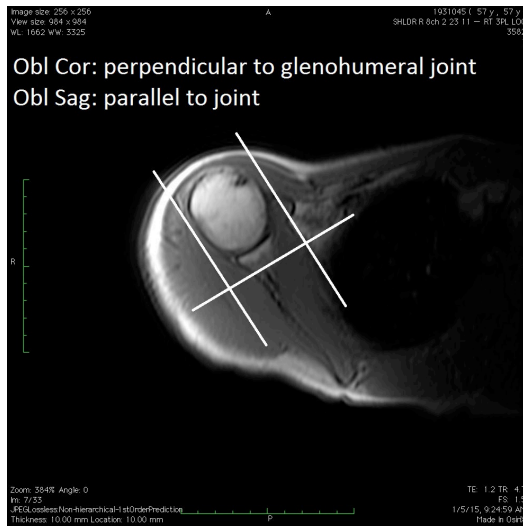
- 3 Pl Loc
- Ax CAL **\*\*IMAGES\*\***
- Ax T1 Quick localizer  
**CLOSED JAW**  
▶ **Coronal: PARALLEL to condyles**
- LEFT Cor T1 OBL 3/0.2 9 slices
- RIGHT Cor T1 OBL 3/0.2 9 slices  
▶ **Sagittal: MEDIAL Obl 20°-30° off Sagittal plane**
- LEFT & RIGHT: Sag PD OBL 3/0.2 9 slices
- LEFT & RIGHT: Sag T2 fat OBL 3/0.2 9 slices  
**OPEN JAW** **\*\*Note how many mm the patient is able to open their mouth in study notes. RP1: mm are on the back of the TMJ tool. TMJ bites: each step is 4mm**
- LEFT & RIGHT: Sag PD OBL 3/0.2 9 slices

TMJ Bites in back left cabinet next to breast biopsy supplies

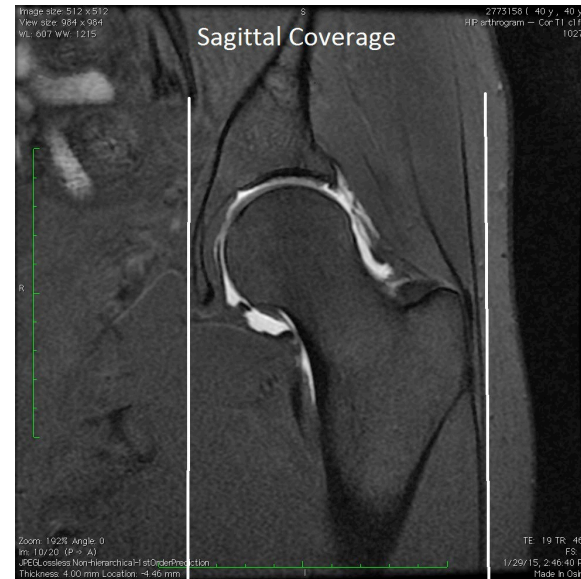
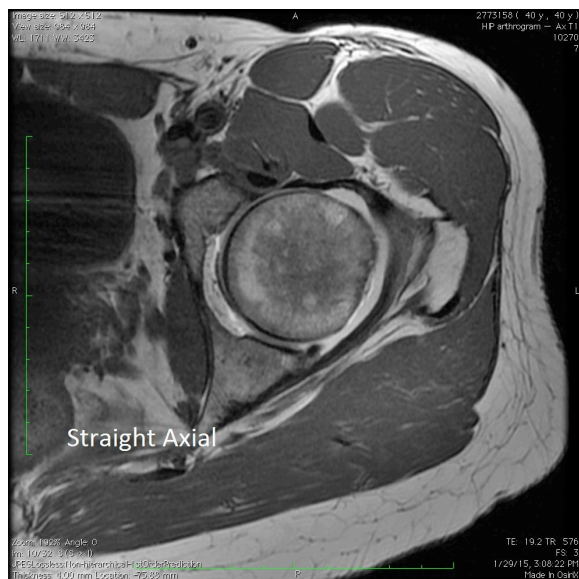
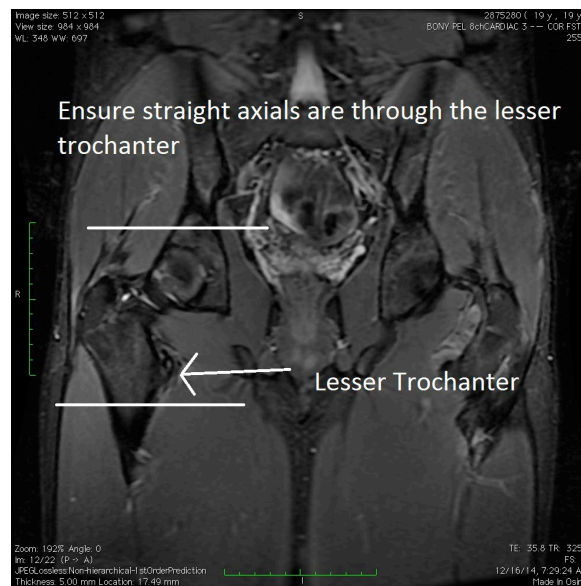
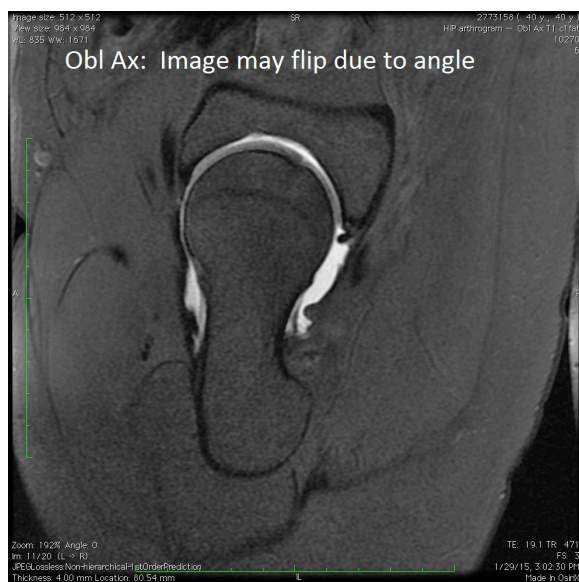
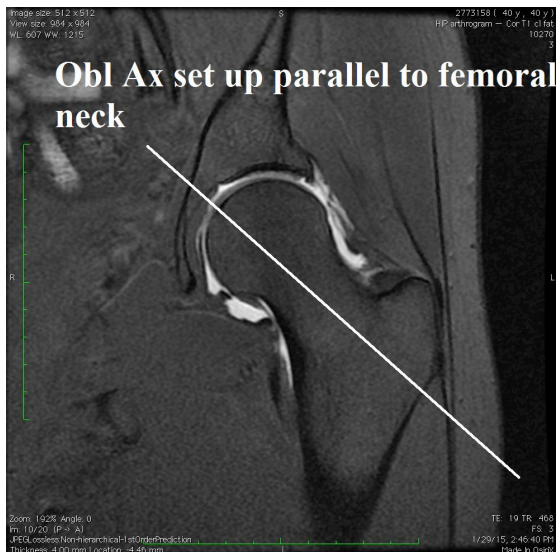
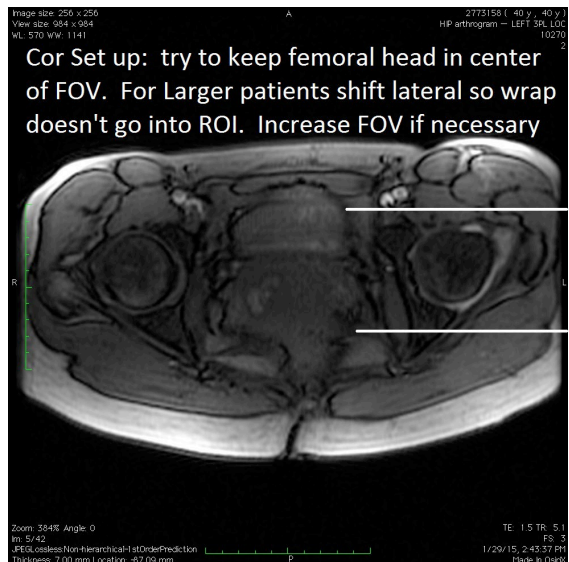


**Coil: 8HRBRN**

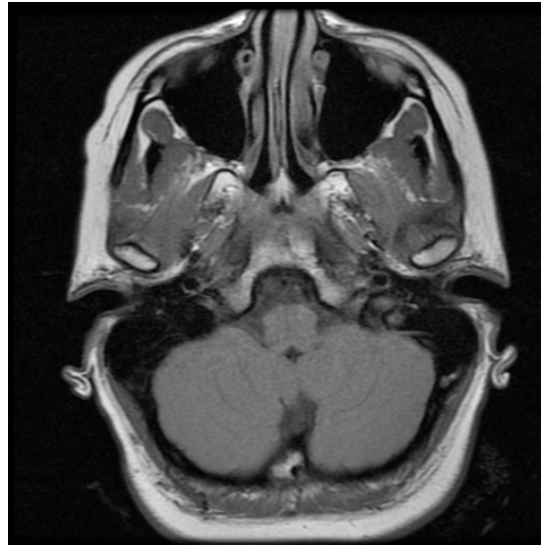
# Shoulder Arthrogram Set Up:



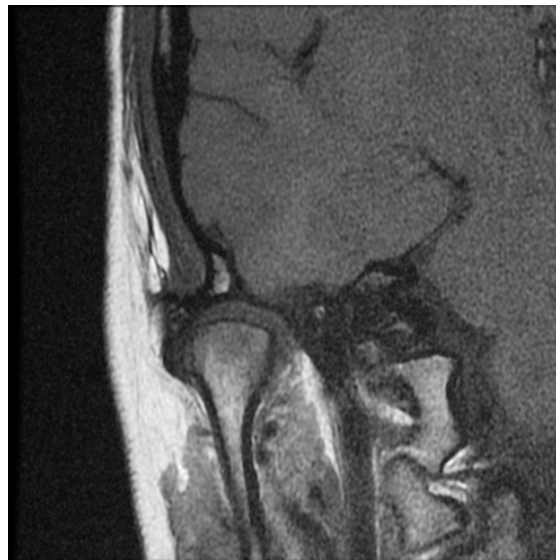
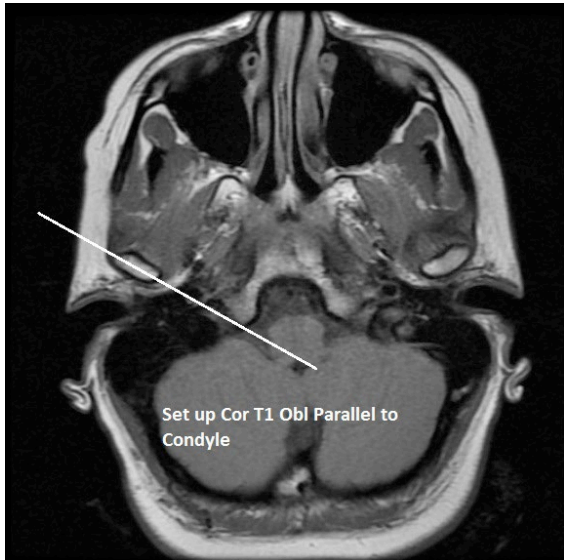
# Hip Arthrogram Set up:



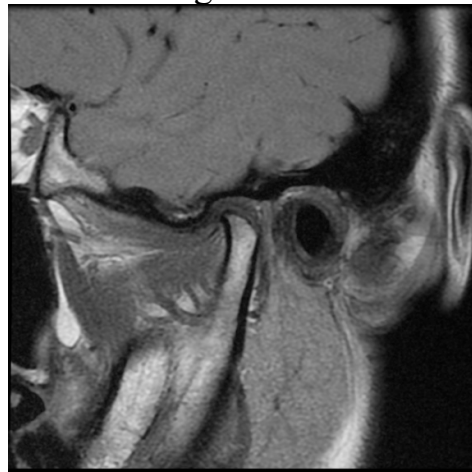
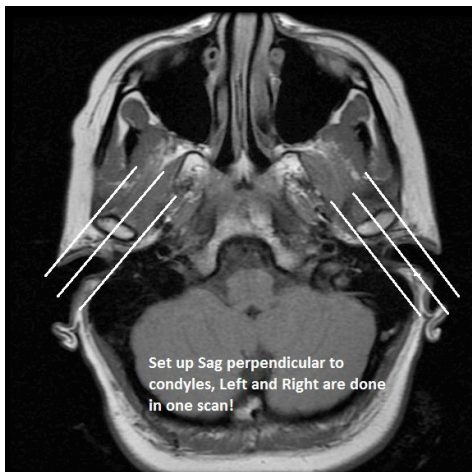
**TMJ Set Up:** Prior to test have patient open TMJ device to their max comfort. Have resting on patient's chest during the exam.



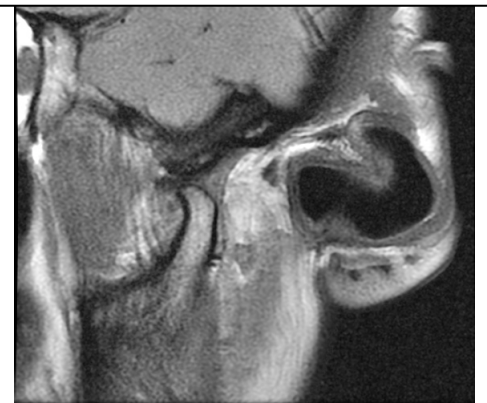
TMJ Coronal:



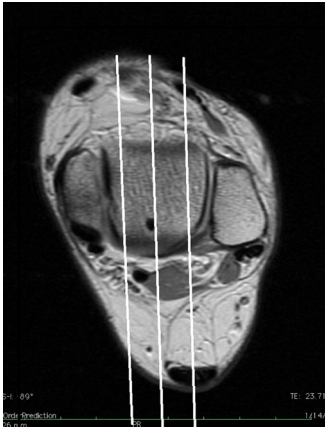
TMJ Sagittal:



Have patient open the TMJ device. Instruct them to not move their head.



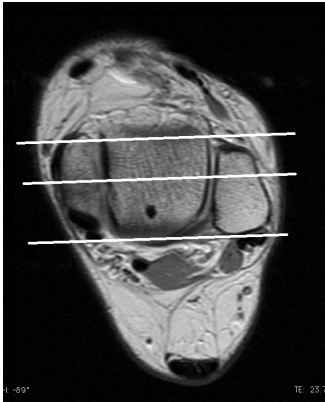
## **Ankle Arthrogram:**



### **Mortise Sagittal**

**Angle parallel to the talus bone (will also end up being parallel to the calcaneus.)**

**Cover skin to skin**



### **Mortise Coronal:**

**Angle Perpendicular to the talus bone (Will also end up being perpendicular to the calcaneus)**

**Cover entire calcaneus to metatarsals**