How to Ensure an Optimal Labral Repair Outcome

John McDonald, MD

Texas Orthopedics, a division of OrthoLoneStar

Affiliate Faculty/Education Experience Director for Sports Medicine, Orthopaedic Surgery Residency Program, Dell Medical School

TEXAS ORTHOPEDICS
A DIVISION OF OrthoLoneStar

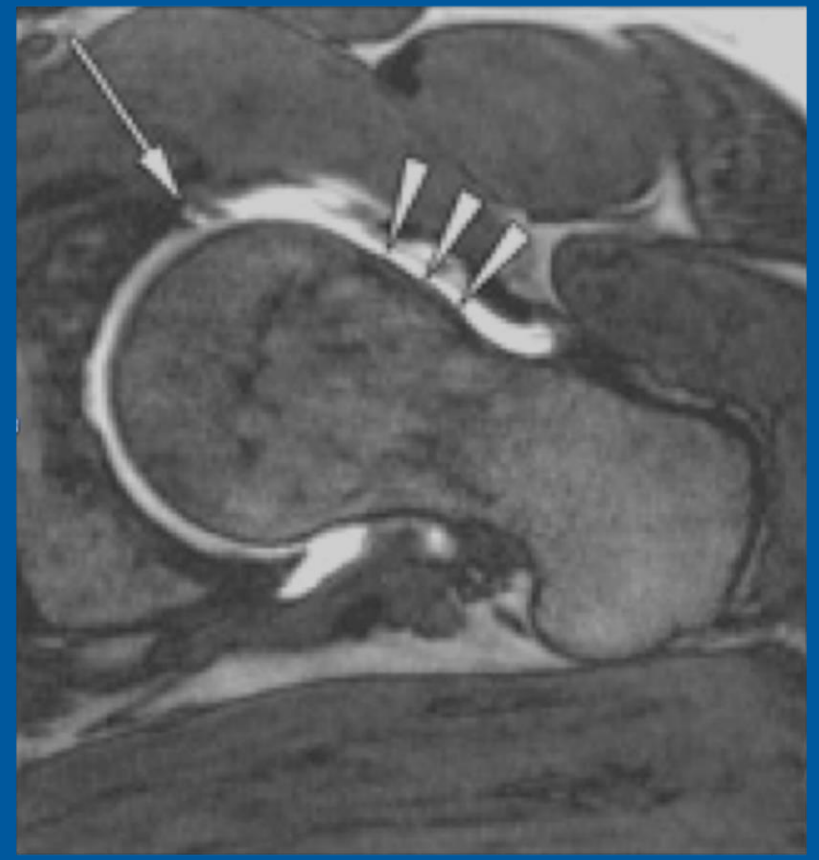
Smith & Nephew – Education consultant / Royalties

DISCLOSURES

TEXAS ORTHOPEDICS
A DIVISION OF OrthoLoneStar

Patient Selection

- FAI is NOT solely a radiographic diagnosis



TEXAS ORTHOPEDICS
A DIVISION OF OrthoLoneStar

Patient Selection

- Listen to your patient
  - Activities
  - Occupation
  - History
    - Where and when does it hurt
    - Deep or superficial
    - Ant, posterior, lateral

TEXAS ORTHOPEDICS
A DIVISION OF OrthoLoneStar

Patient Selection

- Physical Exam
  - Traditional tests
  - Asymmetry in ROM
    - Ellenbecker *et al. AJSM* 2007
      - No significant side to side difference in ROM for elite tennis or pro baseball players
      - Conclusion: Asymmetry is NOT a sport specific adaptation

- Diagnostic Injection

TEXAS ORTHOPEDICS
A DIVISION OF OrthoLoneStar

Protect your labrum

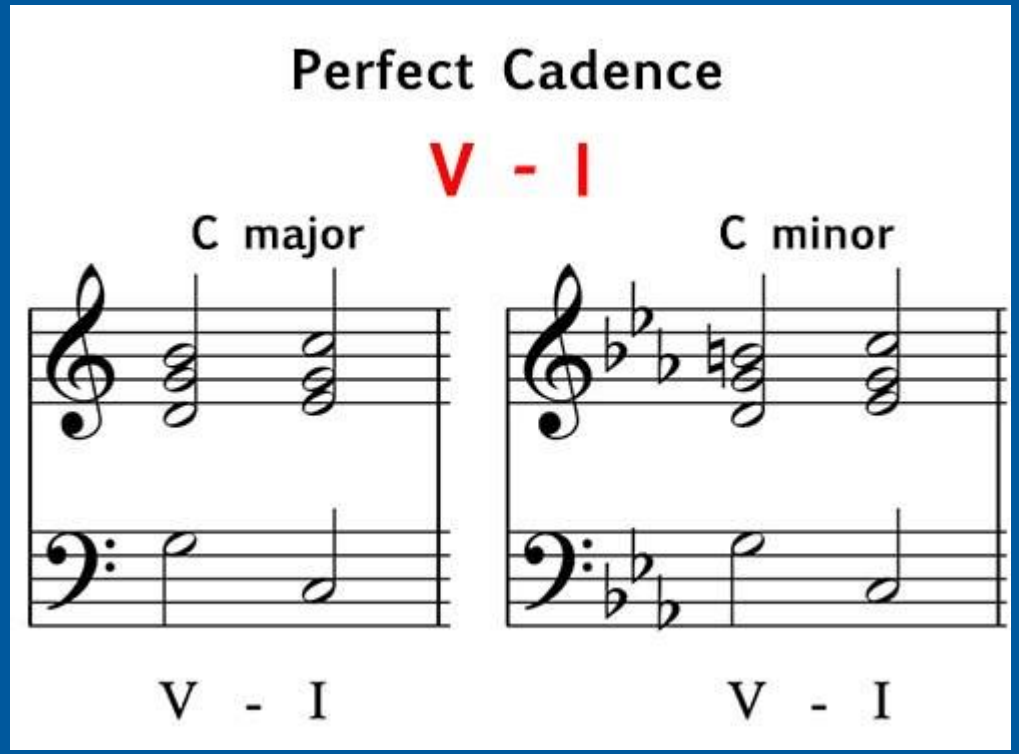
- Decompress the bony conflict
  - Fluoroscopy and Dynamic exam
    - Larson *Arthroscopy* 2009
    - Locks *Arthroscopy Tech* 2016
- Remember it's a dynamic process
- Handle the cartilage
  - Microfracture
    - McDonald *Arthroscopy* 2013
    - McDonald *KSSTA* 2014
  - Chondroplasty
  - Wave sign fixation
    - Makovicka *Arthroscopy* 2020

TEXAS ORTHOPEDICS
A DIVISION OF OrthoLoneStar

Surgical Cadence

- In traction
  - Diagnostic arthroscopy
- Out of traction
  - Femoral osteoplasty
  - Rim trimming
- In traction
  - Labral repair
  - Cartilage work
- Out of traction
  - Dynamic exam
  - Finish bony work
  - Capsular closure

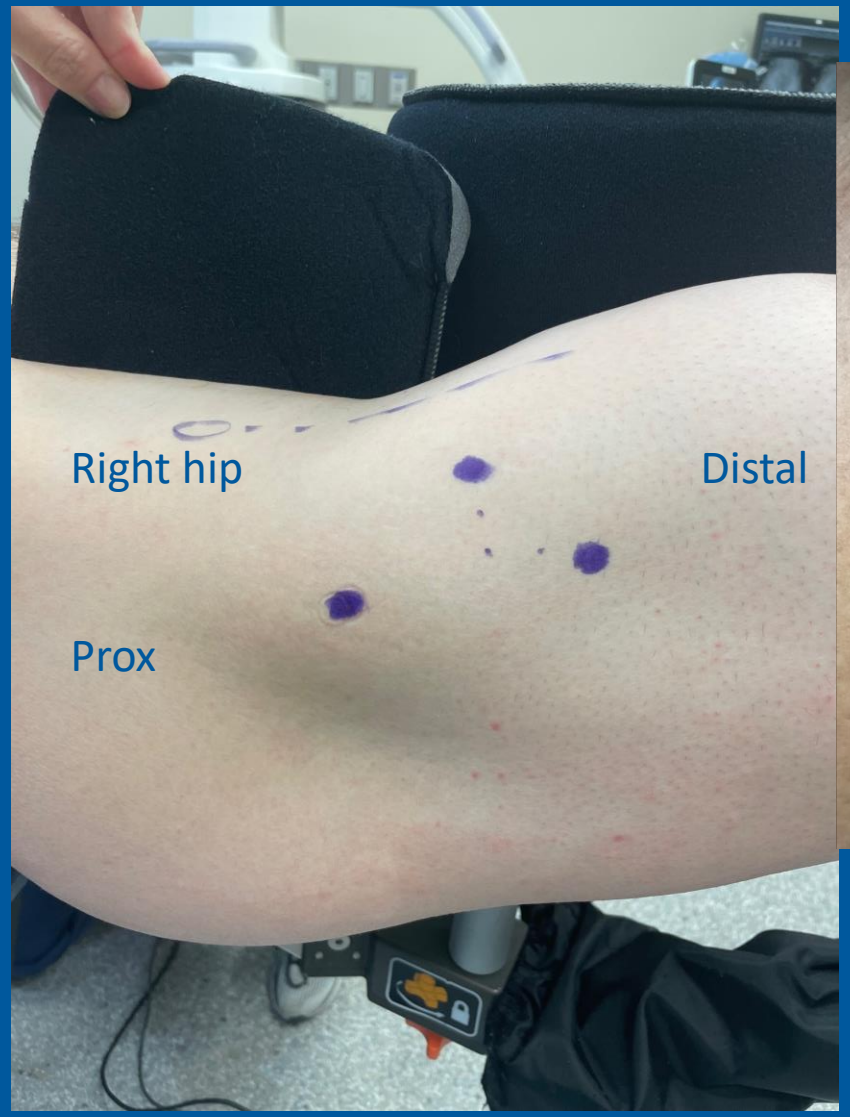
- **Benefits:**
  - **Decrease traction time**
  - **Enables a customized CAM resection**
  - **Gives your brain a break**



TEXAS ORTHOPEDICS
A DIVISION OF OrthoLoneStar

Portal Placement / Capsulotomy

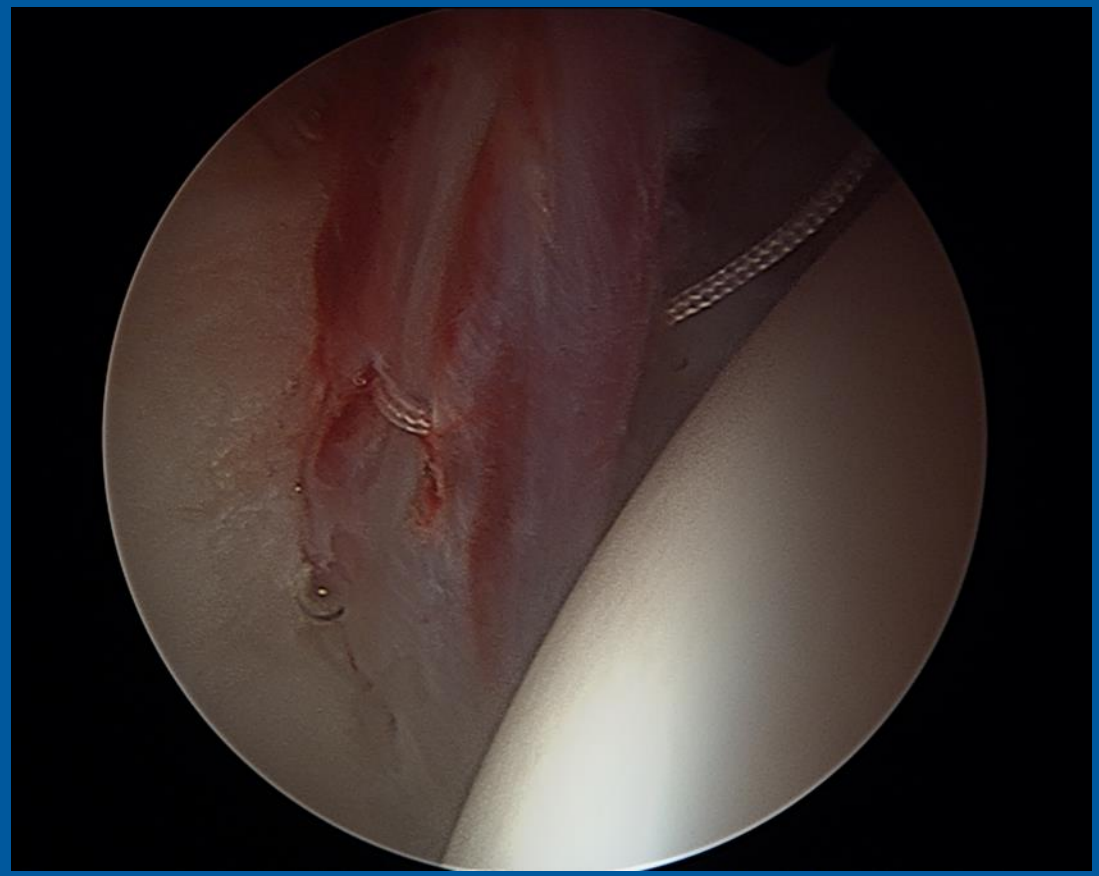
- Anterior lateral
- Mid-anterior
- Modified DALA



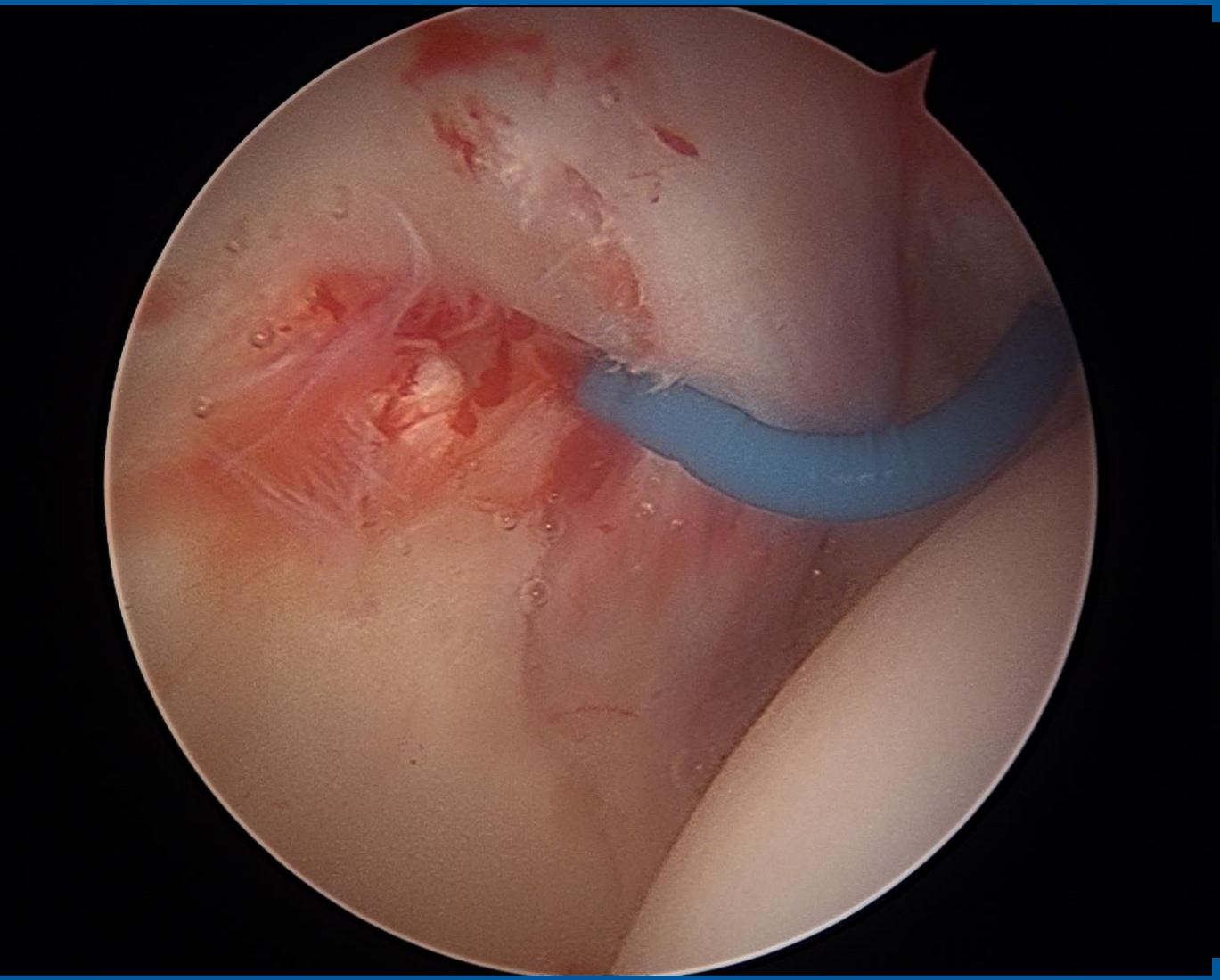
TEXAS ORTHOPEDICS
A DIVISION OF OrthoLoneStar

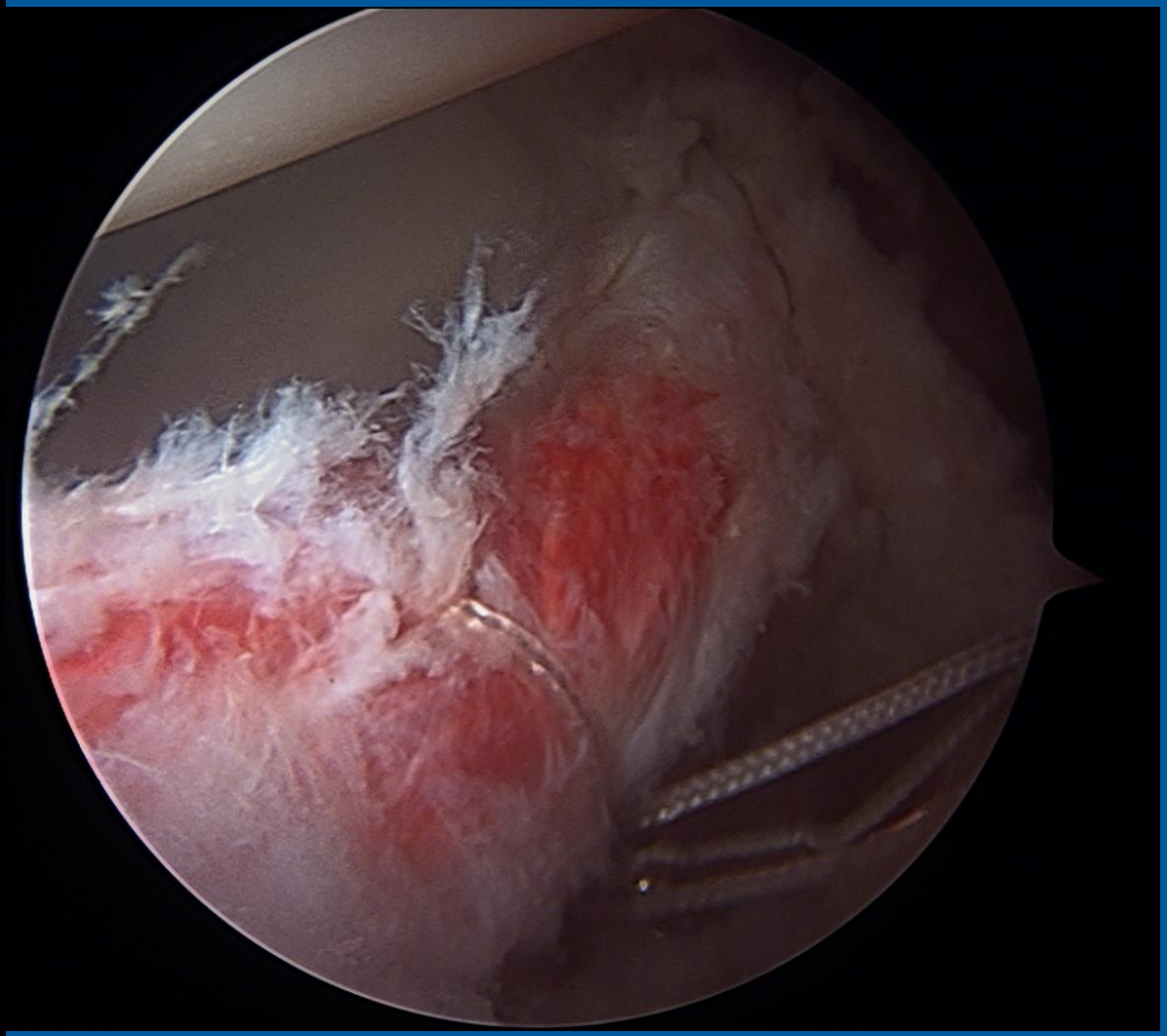
Snitches get Stitches

- Labral base
  - Medium sized labrum / upright labrum
- Loop
  - Large floppy labrum
  - Small labrum with solid structure
- Iberian / cinch variant
  - Small labrum with poor structure
  - Medium flat labrum



TEXAS ORTHOPEDICS
A DIVISION OF OrthoLoneStar

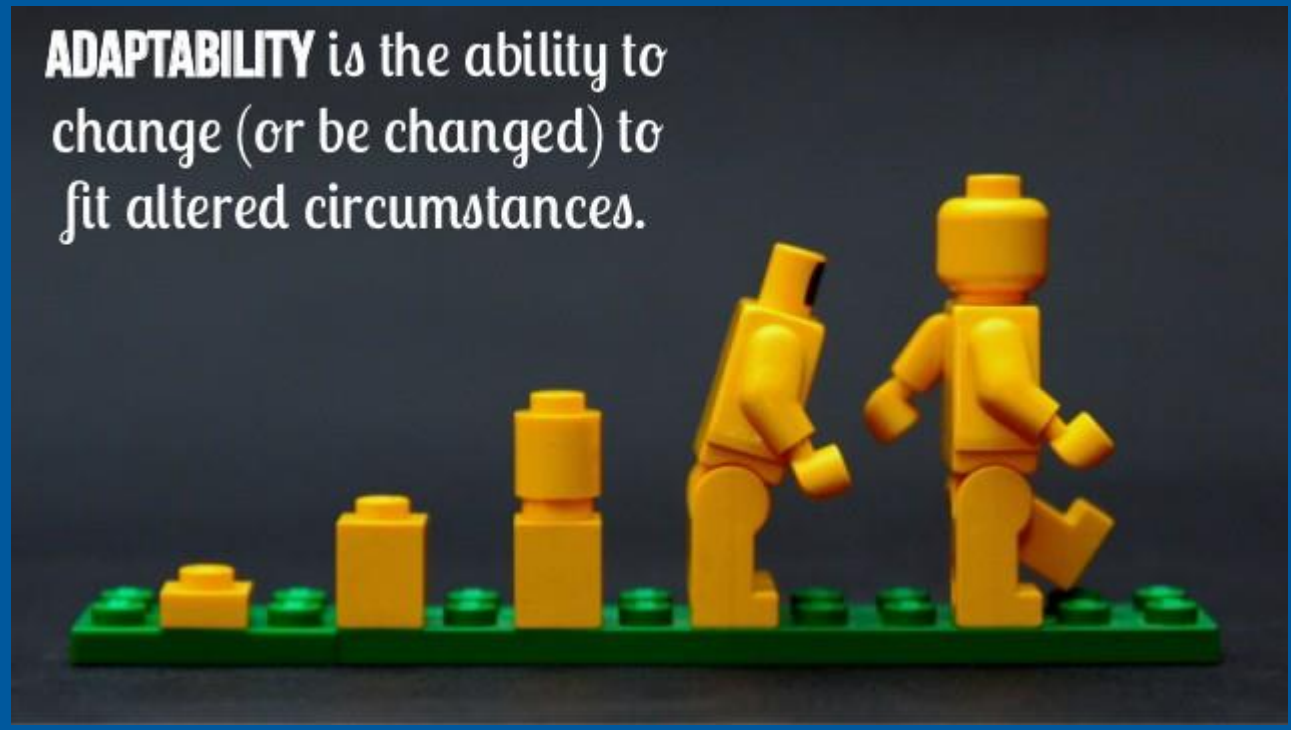




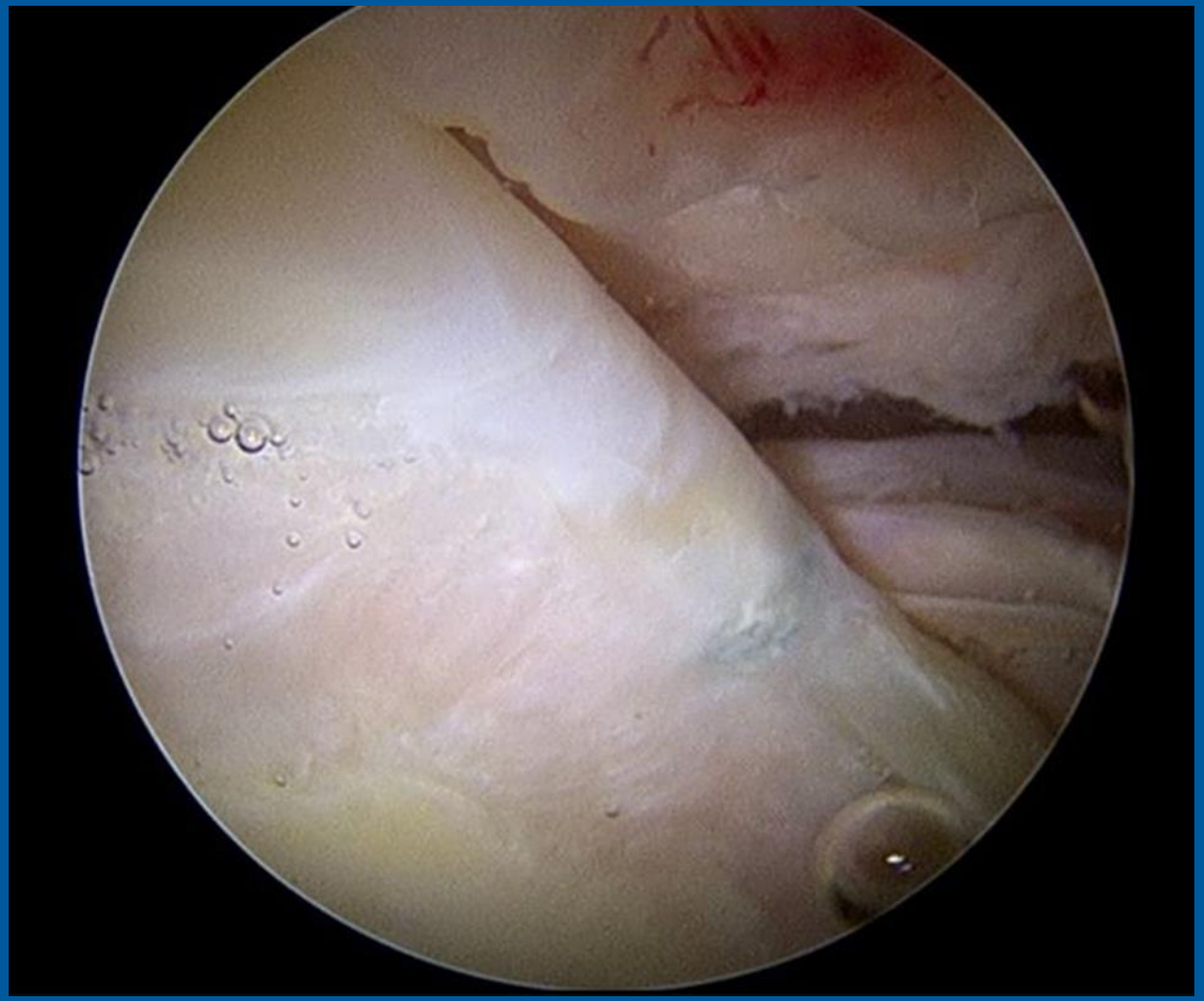
TEXAS ORTHOPEDICS
A DIVISION OF OrthoLoneStar

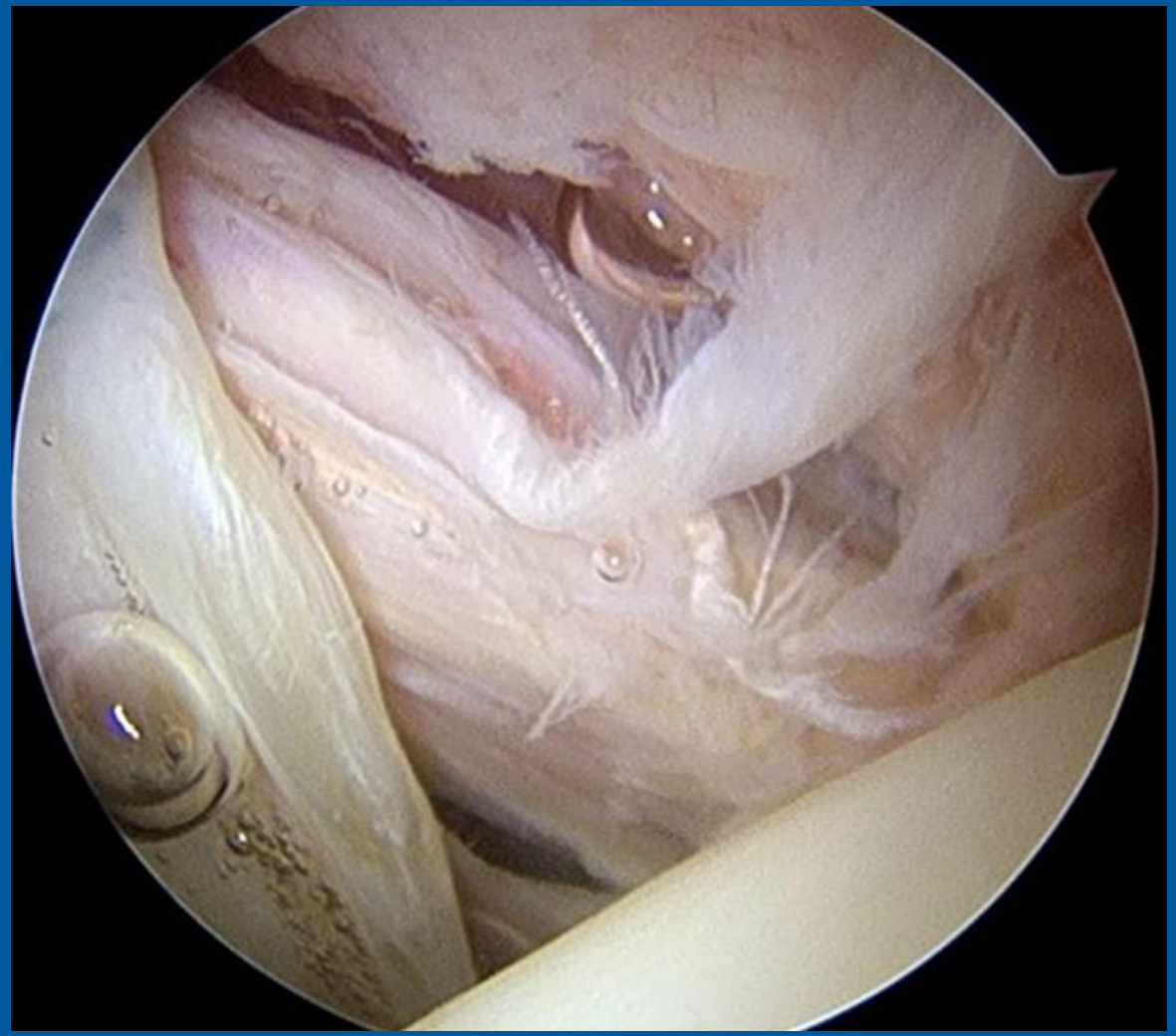
Anchor choice

- Knots
  - Alternating half-hitches
  - Sliding (+/- locking) knots
  - Watch your knot stack!
- Knotless
  - Tensioning of repair
  - Find your drill hole
- Biocomposite vs All-Suture
- Back up option availability

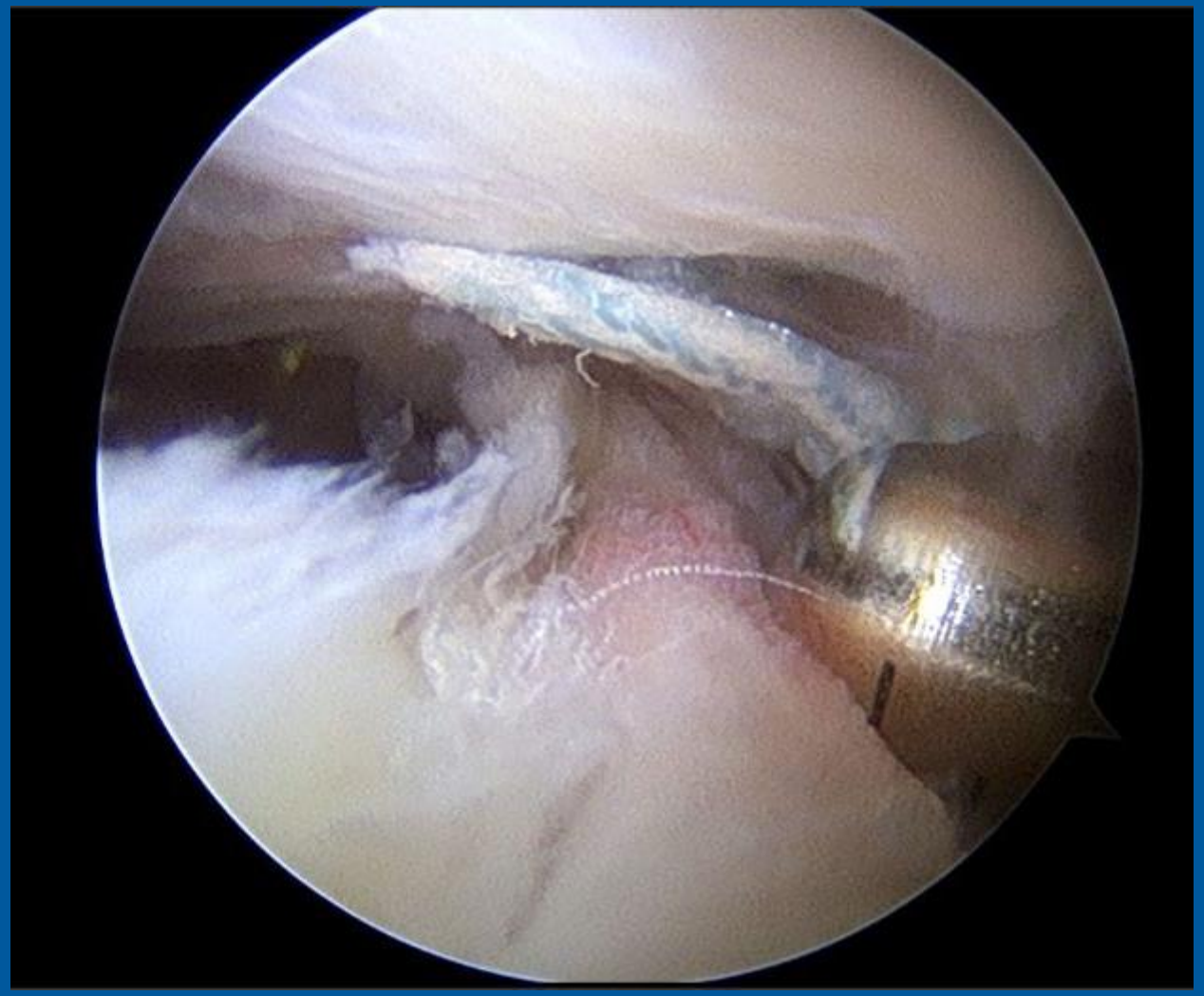


TEXAS ORTHOPEDICS
A DIVISION OF OrthoLoneStar





TEXAS ORTHOPEDICS
A DIVISION OF OrthoLoneStar



TEXAS ORTHOPEDICS
A DIVISION OF OrthoLoneStar

Anterior Anchor Placement

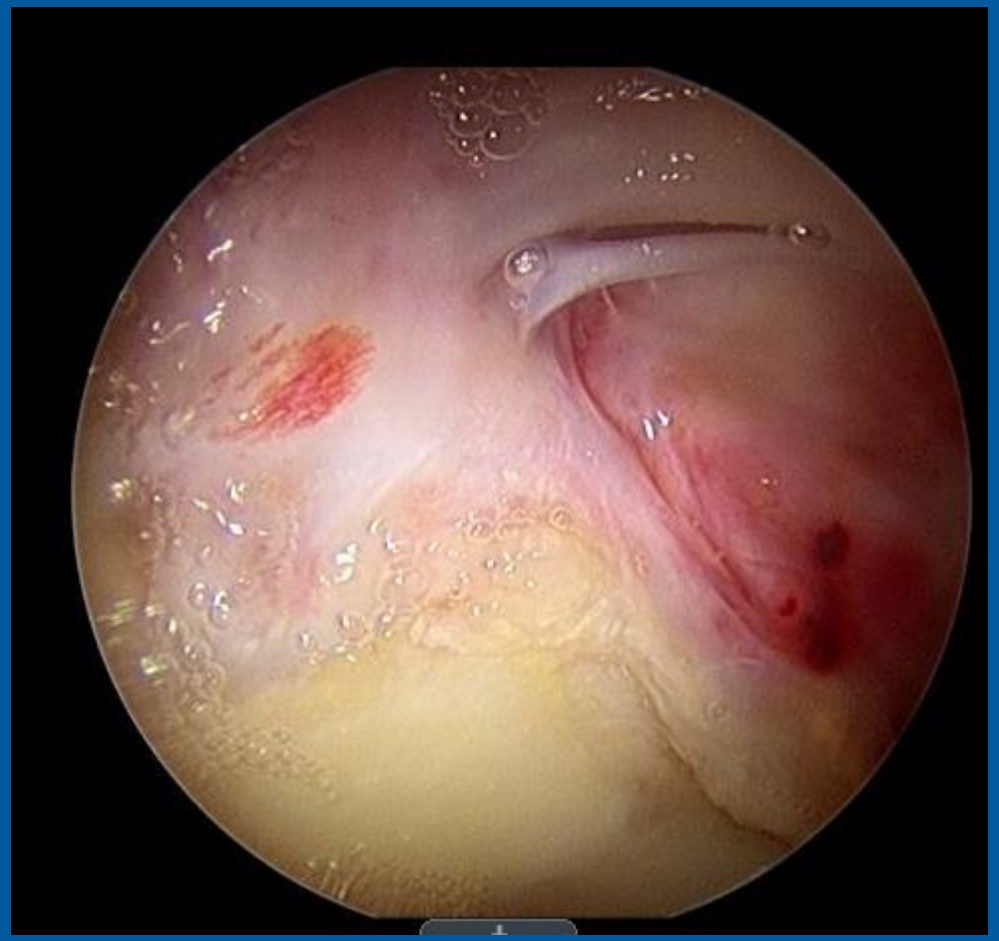
- Thinnest part of the acetabulum
  - Lertwanich *AJSM* 2011
- Drill this yourself
- Mid-anterior vs DALA
- ? Curved guide
- Watch the knot stack
- Probe your drill hole
- Notify your anesthesia provider about psoas tendon sheath perforation

Bostonglobe.com

TEXAS ORTHOPEDICS
A DIVISION OF OrthoLoneStar

Prevent Adhesions

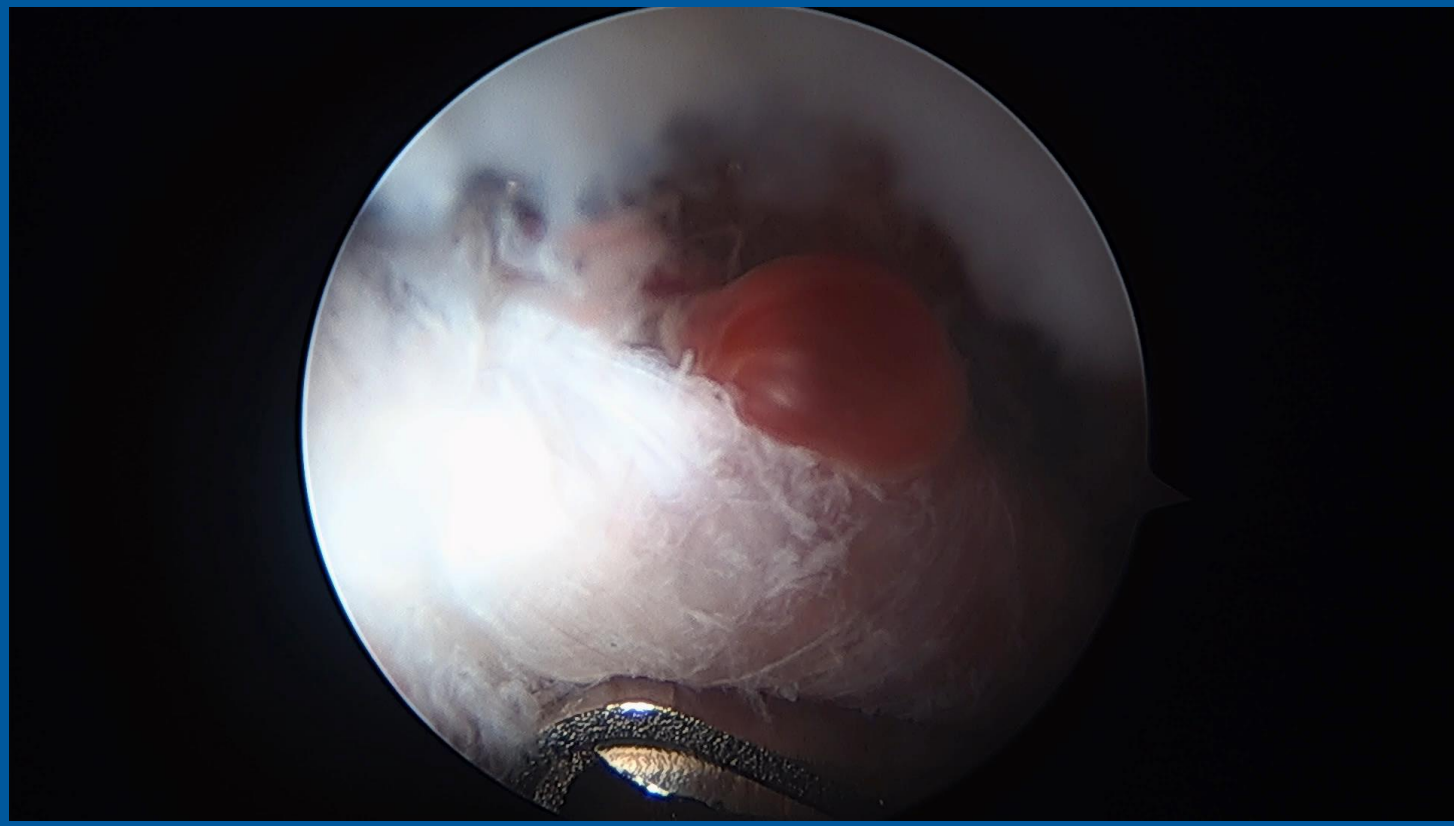
- Repair the capsule
- Early ROM
  - Circumduction decreases risk of adhesions by 4x
    - Willimon *KSSTA* 2014
- Protected weight-bearing

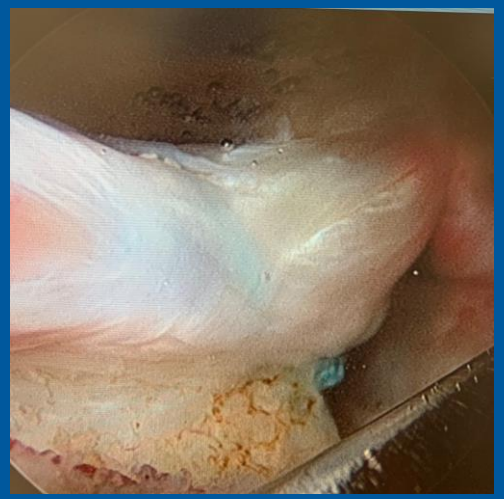


TEXAS ORTHOPEDICS
A DIVISION OF OrthoLoneStar

Don’t Be Afraid to Repair

- Labral cyst
- Shredded labrum
- Hydroxy-appetite deposition





TEXAS ORTHOPEDICS
A DIVISION OF OrthoLoneStar

Summary

- Patient selection is key
- Protect your labrum from the bone
- Limit complications with surgical cadence
- Portal placement and capsulotomy are paramount
- Be adaptable with suture techniques
- Choose your anchor wisely
- If it feels not quite right, it probably isn't
- Prevent adhesions
- Don't be afraid to repair

TEXAS ORTHOPEDICS
A DIVISION OF OrthoLoneStar

Thank you!

TEXAS ORTHOPEDICS
A DIVISION OF OrthoLoneStar

Patient Selection

- Not a radiographic diagnosis

- Listen to your patient
  - Activities
  - Occupation
  - History: where and when does it hurt

- Physical Exam
  - Traditional tests
  - Ellenbecker *et al. AJSM* 2007
    - Tennis and Baseball professionals
    - No significant side to side difference in ROM for elite tennis or pro baseball players
    - Conclusion: Asymmetry is NOT a sport specific adaptation
      - If you find asymmetry on symptomatic side → warrants further testing.

Patient Selection

- If you don't know the sport well….ask and observe!

- Caution!
  - Narcotic use
  - Pain out of proportion (except in adolescents)
  - When you are the "savior"

TEXAS ORTHOPEDICS
A DIVISION OF OrthoLoneStar

TEXAS ORTHOPEDICS

A DIVISION OF OrthoLoneStar

Smith & Nephew – Education consultant / royalties

DISCLOSURES

TEXAS ORTHOPEDICS

A DIVISION OF OrthoLoneStar

OLS Slide

- An OLS slide template is also included, should you need OLS branded presentations

OrthoLoneStar