

## **Management of a Patient with an Axillary Nerve Entrapment**

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*Category: Professional-in-Training*

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### ABSTRACT

**HISTORY:** A 27-year-old male reports to physical therapy evaluation with R shoulder pain following an injury during Jiu-jitsu 4 weeks prior. He experienced immediate onset of pain following a submission attempt where his arm was forcefully externally rotated. At time of evaluation, he experienced pain with pressing and pulling exercises in R shoulder that would sometimes radiate down to posteriolateral arm.

**PHYSICAL EXAMINATION:** Initial examination of the R arm revealed hypomobility throughout thoracic and lower cervical spine, tight posterior shoulder capsule with anterior humeral head migration, and limited shoulder ROM secondary to pain. Neural testing resulted in + radial nerve tension, which was reduced with head-tilt, indicating proximal facilitation. His rotator cuff strength was strong and pain-free. He had extreme tenderness to palpation and reproduction of arm symptoms over axillary nerve in quadrangular space.

#### DIFFERENTIAL DIAGNOSIS:

1. Labral tear
2. Rotator cuff tear/impingement
3. Radiculopathy
4. Neural tension
5. Axillary nerve entrapment

#### TESTS AND RESULTS:

R shoulder AP and lateral radiographic views

- Bony structure and alignment intact

#### FINAL WORKING DIAGNOSIS:

R axillary nerve entrapment with C5-6 facilitation resulting in "double crush"

#### TREATMENT AND OUTCOMES:

1. Thoracic and cervical manipulation
2. Posterior shoulder capsule mobilizations
3. Cross-friction to teres minor and major
4. Radial nerve sliders
5. Progressive scapular strengthening
  - a. Open-chain to closed-chain
  - b. Mid-range to end-range
6. Able to return to Jiu-jitsu and regular workout routine at 6 weeks.

#### ROLE OF PRIMARY AUTHOR:

Diagnosis and treatment of patient of interest.