**Shoulder Physical Exam**

|  |  |
| --- | --- |
| **Observation** | |
| Bony abnormality |  |
| Muscle abnormality |  |

|  |  |
| --- | --- |
| **Palpation ABC’s** | |
| **A**cromioclavicular joint |  |
| **B**iceps tendon |  |
| **C**oracoid |  |
| **S**ubacromial space |  |

|  |  |
| --- | --- |
| **ROM/Strength: SITS** | |
| **Supraspinatus/Deltoid:Abduction scapular plane:** | |
| ROM Active  ROM Passive |  |
| Full tear:Drop Arm Test |  |
| Motor: Empty Can |  |
| **Infraspinatus/Teres Minor External Rotation(ER)** | |
| ROM Active  ROM Passive |  |
| Full tear: ER Lag |  |
| Motor: Resisted ER |  |
| **Subscapularis Internal Rotation (IR)** | |
| ROM Active (spinous level)  ROM Passive |  |
| Full tear: IR Lag |  |
| Motor: Gerber lift off/Belly press |  |

|  |  |  |
| --- | --- | --- |
| **Provocative Tests: BIAS** | | |
| **Biceps:** | | |
| Yergason's (resisted supination) |  | |
| Speed's (resisted flexion) |  | |
| **Impingement:** | | |
| Neer's |  | |
| Hawkins |  | |
| **Acromioclavicular** | | |
| Scarf |  | |
| Cross arm |  | |
| ***Stability*** | | |
| *Apprehension/Relocation* | |  |
| *Load and Shift* | |  |
| *O'Brien* | |  |

**Descriptions of tests:**

**SITS ROM/Strength**

**Supraspinatus/deltoid**:

* ROM: Abduction: 0-180 degrees is normal. + painful arc in abduction may indicate subacromial or GH pathology
* Full tear test: Drop arm: From arms overhead, have patient lower arms slowly in adduction, thumbs down.  If patient is unable to maintain strength against gravity below 90 degrees (arm "drops"), this may indicate acute full supraspinatus tear.
* Strength: Empty Can Test: Position the arm in 90 degrees forward flexion, 30 degrees abduction, thumbs down. Press firmly down on the forearms and ask the patient to resist.

**Infraspinatus/TM**:

* ROM: External Rotation (ER): Starting with elbows at sides, flexed to 90 degrees, then externally rotate outward.

Normal ER ROM is at > 30 degrees, but depends on muscle bulk—asymmetry may indicate pathology.

* Full tear ER Lag Test: if ER is asymmetric, extend ER in passive rom as far as possible—if pt unable to hold position and ‘lags’ back to limited ER position, + ER lag test may indicate IR/TM tear.
* ER Strength: Have the patient start in neutral ER position (elbows at sides, flexed 90) and attempt external rotation against resistance.

**Subscapularis:**

* ROM: Internal Rotation (IR): Have the patient place one hand behind his back and reach as far superiorly as possible.  Note the spinal level and compare both sides.
* Full tear IR Lag Test: if IR is asymmetric, extend IR in passive rom as far as possible up spine—if pt unable to hold position and ‘lags’ back to limited IR position, + IR lag test may indicate Subscapularis tear.
* IR Strength: Gerber liftoff test: Have the patient place one arm behind their lower back and try to push away from the body.  Inability to perform the "lift off" represents subscapularis weakness from a tear or other injury.

**Provocative Tests**

**Biceps:**

* Yergason’s test: With the patient's elbow flexed at 90 degrees, have pt supinate and flex forearm against resistance.

+ Pain AT BICEPS may indicate biceps tendonitis or subluxation of the long head tendon.

* Speed’s test: Have patient hold shoulder at 60 degrees of forward flexion with arm supinated and elbow flexed at 20 degrees.  Ask the patient to attempt forward flexion of the arm against your resistance

 + Pain AT BICEPS may indicate biceps tendonitis.

**Impingement**:

* Hawkins’ test: In 90 degrees of forward flexion and 90 degrees of elbow flexion, passively internally rotate the arm.

+ Pain may indicate subacromial impingement syndrome.

* Neer’s test: Raise patient’s extended arm in passive forward flexion to an overhead position.

+ Pain may indicate subacromial impingement syndrome.

**Acromioclavicular tests:**

* Scarf test: Patient actively moves arm in horizontal adduction—ie ask pt to put their hand on their other shoulder.

+ Pain at the AC joint may indicate acromioclavicular joint pathology.

* Cross arm test: With pt’s arm at 90 degrees of forward flexion, have pt actively cross arm in horizontal adduction against your resistance.

+ Pain at the AC joint may indicate acromioclavicular joint pathology.

**Stability tests:**

* Apprehension test: Perform with the patient supine or seated.  Have the patient abduct to 90 degrees with the elbow flexed, hand pointing upward.  Try to externally rotate the arm while gently pushing anteriorly on the humerus and watch for a reaction from the patient.  Apprehension indicates a positive test for anterior instability.
* Relocation test: Perform following the apprehension test.  Use the same positioning, but press posteriorly on the humerus instead.  If the patient has anterior instability, this should cause a decrease in pain.
* Load and Shift: As the patient lies in a supine position with the shoulder relaxed, the examiner places both hands around the patient's upper arm and first the humeral head is "loaded," or pushed against the glenoid fossa, and then the humeral head is moved (shifted) anteriorly and posteriorly.
* Obrien’s test: Patient flexes their arm to 90° with the elbow fully extended and then adducts the arm 10-15°medial to sagittal plane. The arm is then maximally internally rotated (thumb down) and the patient resists the examiner's downward force. The procedure is repeated in supination (thumb up). Pain with thumb down that is relieved when thumb up is a positive test for labral pathology.