

Posterior Labrum Repair Protocol

Stage I (0-4 weeks):

Key Goals:

- Protect the newly repaired shoulder.
- Allow for decreased inflammation and healing.
- Maintain elbow, wrist and hand function.
- Maintain scapular control.
- 1. Immobilizer use:
 - a. The immobilizer will be placed on patient's shoulder in surgery.
 - b. The patient may remove the immobilizer for dressing and hygiene.
 - c. The patient should wear the immobilizer full-time for four weeks.

2. Restrictions:

- a. No shoulder elevation or internal rotation.
 - i. The capsular repair is stressed with movement into internal rotation. Since the repair is performed with the shoulder in a neutral position internal rotation must be limited for six weeks following the repair.
- b. When arm is out of the immobilizer, forearm needs to stay away from the abdomen. The hand should remain with "thumb up" and in the plane of the brace.
- c. Acceleration of rehabilitation for "fast healers" may reduce results and lead to long-term problems.
- 3. Exercises:
 - a. Pendulum exercises.
 - Active assistive range of motion of the involved elbow, wrist and hand in the plane of the body. The patient may progress to active range of motion as comfort improves.
 - c. Scapular control exercises (Immobilizer on)
 - d. Core training(Immobilizer on)

Stage II (5-15 weeks):

Key Goals:

- Full active elevation at 12 weeks from surgery.
- Surgical shoulder internal rotation of 80% of uninvolved shoulder.
- Normal scapular mechanics 12 weeks from surgery.
 - Scapular mechanics should be evaluated on a regular basis.
- Normal scapular stabilizer, rotator cuff and core strength at 16 weeks from surgery.

1. <u>Weeks 5-6:</u>

- a. Brace use:
 - i. Immobilizer will be used at this time while sleeping until six weeks post-op.
 - ii. Sling is worn during the day for comfort. Wean as comfort improves.
- b. Range of motion:
 - i. Internal rotation:
 - 1. Passive to active assistive to active range of motion as able.
 - 2. No posterior capsule stress.
 - 3. No prolonged internal rotation end range holds.
 - ii. External rotation:
 - 1. Passive to active assist to active range of motion as able
 - a. Begin in supine with scapula stabilized, and progress to other postures as tolerated.
 - iii. Flexion/Abduction:
 - 1. Passive to active assistive to active range of motion as able.
 - a. Supine with scapula stabilized.
 - iv. Gleno-humeral mobilizations:
 - 1. No posterior glides until 10 weeks from surgical date.
- c. Balance training:
- d. Strengthening (4 weeks):
 - i. Isometric shoulder strengthening.
 - ii. Core training.

- 2. <u>Week 7:</u>
 - a. Immobilizer use at night can be discontinued.
 - b. Range of motion:
 - 1. As tolerated no limits.
 - c. Strengthening:
 - i. Scapular stabilizer strengthening.
 - ii. Core training.

3. <u>Week 8:</u>

- Warning: No soreness with rotator cuff strengthening.
- The program must be modified to avoid cuff aggravation.
 - a. Balance training.
 - b. Range of motion:
 - i. No posterior apprehension or impingement.

ii. Scapular mechanics need to be functioning properly and if not need to be addressed.

- iii. Hip mobility:
 - 1. Deficits should be addressed in preparation for eventual return to throw program.
- c. Strengthening:
 - i. Scapular mechanics.
 - 1. Lower and middle trapezius strengthening should be an integral part of the rehab program to assure proper scapular mechanics.
 - ii. Forearm strengthening.
 - iii. Rotator cuff strengthening.
 - iv. Core training.

4. Week 12:

- a. <u>Testing:</u>
 - i. Full pain free active range of motion for elevation and internal rotation.

- ii. A 20 degree difference in shoulder internal rotation is acceptable.
- iii. Normal scapular mechanics.
- iv. ROM is within 10 degrees of other side.
 - 1. ROM should be within 5 degrees or less by 16 weeks.
- v. Squat screen.
- vi. Hurdle step screen.
- vii. Shoulder mobility screen.
- viii. Hand held dynamometer:
 - 1. 0 degrees with arm at side IR and ER.
 - 2. Seated IR and ER at 90 degrees of abduction and 45 degrees of external rotation.
 - 3. ER/IR=65%

Warning:

- Any deficits in mobility, stability, or scapular mechanics need to be addressed now prior to beginning return to throw program at 20 weeks.
 - b. Range of motion:
 - i. Any flexibility deficits need to be addressed before return to program begins at 16 weeks.
 - 1. See above testing.
 - 2. Begin sleeper stretch.
 - c. Strengthening:
 - i. Scapular stabilizer.
 - ii. Rotator cuff.
 - iii. Plyometric training
 - i. Upper extremity.
 - ii. Lower extremity.
 - iv. Core training.
 - v. Endurance training.

Stage III (Weeks 20-26)

Initiation of Interval Sport Program for Baseball, Tennis, and Golf:

- Return-to-sport activities after injury that include attention to the entire body.
- A gradual progression of applied forces to lessen the chance of re-injury.

- Proper warm-up and maintenance exercises.
- Proper biomechanics to minimize the chance of re-injury.
- Variability is based on each athlete's skill, level, goals and injury.
- Program needs to be followed rigidly. Some athletes will try and rush through the plan.
 - No skipping of steps is allowed.
 - Patient must demonstrate successful completion of each step.
- Program should be supplemented with a high-repetition, low intensity weight training program focusing on the posterior rotator cuff and scapular musculature.
- Outcome measures:
 - PSFS: Patient specific functional scale.
 - Quick Dash: Quick disabilities of the arm, shoulder and hand score.
- 1. Basic menu of program:
 - a. Warm-up.
 - b. Stretch.
 - c. 1 set of each exercise prior to ISP.
 - d. ISP.
 - e. 2 sets of each exercise.
 - f. Cryotherapy.