**Latarjet Rehab Protocol**

**PHASE I (weeks 1-3) - Immediate post-op phase**

Goals:

* Minimize/control shoulder inflammation and pain
* Protection of surgical repair
* Gradual restoration of shoulder PROM
* Adequate scapular mobility and function

Patient education/precautions:

* NO AROM of the operative shoulder
* No excessive shoulder external rotation ROM/stretching. STOP at first felt end feel.
* WEAR SLING AT ALL TIMES. Remove only for showering with arm at side.
* No lifting of objects with operative shoulder/arm. Limit use of operative upper extremity.
* Sleep with sling supporting operative shoulder (towel placed under elbow to prevent shoulder extension)
* Education regarding posture, joint protection, positioning, etc.

Activity

* PROM/AAROM/AROM of elbow, wrist, and hand.
* Begin shoulder PROM (PT directed/administered)
	+ Forward flexion/elevation to tolerance
	+ Abduction in scapular plane to tolerance
	+ IR to 45 degrees at 30 degrees abduction
	+ ER in scapular plane from 0-25 degrees; begin at 30-45 degrees abduction.
	+ DO NOT FORCE ANY PAINFUL MOTION. RESPECT ANTERIOR CAPSULE INTEGRITY WITH ER.
* Scapular clock and isometric exercises.
* Ball squeezes
* Frequent ice/cryotherapy for pain and inflammation

Criteria to progress to Phase II

* Patient adherence to precautions and immobilization guidelines
* 100 degrees of passive forward elevation and 30 degrees of passive ER at 20 degrees abduction.
* Completion of phase I activities with minimal to no pain or difficulty.

**Phase II (approximately weeks 4-9) -Intermediate Phase**

Goals for phase II

* Minimize/control pain and inflammatory response
* Protection of surgical repair/integrity
* Achieve restoration of AROM gradually
* Wean from sling in weeks 6-7
* Initiate LIGHT waist level activities.

Patient education/Precautions

* No active
* shoulder movement until adequate PROM with good mechanics
* No lifting with operative shoulder/upper extremity
* No excessive ER ROM/stretching. Respect anterior capsule integrity
* No activities/exercises that place excessive load on anterior shoulder (push-ups, pectoralis flys, etc.)
* Avoid exercises that involve “empty can” /IR position in scaption due to risk of impingement

Activity

Early Phase II (approx. week 4)

* Progress shoulder PROM (do not force any painful motion)
* Forward flexion/elevation to tolerance
* Abduction in scapular plane to tolerance
* IR to 45 degrees at 30 degrees of abduction
* ER to 0-45 degrees at 30-40 degrees abduction
* Active assisted range of motion (AAROM) of shoulder typically begins at week 3
	+ Follow passive range of motion guidelines
	+ Progress from supine to lawn chair to standing
* Glenohumeral joint mobilizations as indicated when ROM significantly less than expected. Mobilization done in direction of limitation and discontinue once adequate ROM achieved
* Address scapulothoracic and trunk mobility limitations. Mobilizations done in direction of limitation and discontinued when ROM achieved
* Introduce posterior capsule stretching as indicated
* Continue ice/cryotherapy for pain and inflammation

Late Phase II (approx. week 6)

* Progress shoulder PROM (do not force any painful motion)
* Forward flexion/elevation/abduction in scapular plane to tolerance
* IR as tolerated at multiple angles of abduction
* ER to tolerance at multiple angles of abduction ONCE ACHIEVE 35 DEGREES ER AT 0-40 DEGREES OF ABDUCTION.
* Glenohumeral and scapulothoracic joint mobilizations as indicated
* Progress to AAROM/AROM activities of shoulder as tolerated with good mechanics (minimal to no scapulothoracic substitution with up to 90-110 degrees of elevation)
* Begin rhythmic stabilization drills (IR/ER in scapular plane, flexion/extension and abduction/adduction at varying angles of shoulder elevation)
* Continue AROM elbow, wrist, and hand
* Strengthen scapular retractors and upward rotators
* Initiate balanced AROM/strengthening program
* Low dynamic positions initially
* Muscular endurance with high repetition (30-50), low resistance (1-3 lbs)
* Exercises should be progressive in terms of muscle demand/intensity, shoulder elevation, and stress on anterior joint capsule
* Achieve full elevation in scapular plane before beginning elevation in other planes
* All activities should be pain free and without substitution patterns
* Exercises both open and closed-chain
* No heavy lifting or plyometrics at this time
* Initiate “full can” scapular plane to 90 degrees elevation with good mechanics
* Initiate IR/ER strengthening with tubing at 0 degrees of abduction
* Sidelying ER with towel roll
* Manual resistance ER in scapular plane in supine position
* Prone scapular exercise (30/45/90 degrees abduction) in neutral arm position

Criteria to progress to phase III

* Forward elevation PROM at least 155 degrees and AROM 145 degrees with good mechanics
* ER PROM within 8-10 degrees of contralateral side at 20 degrees abduction
* ER PROM at least 75 degrees at 90 degrees abduction
* Appropriate scapular posture at rest and dynamic scapular control with ROM and functional activities.
* Completion of phase II activities with minimal to no pain or difficulty.

**PHASE III (approximately weeks 10-15)**

Goals

* Normalize strength, endurance, and neuromuscular control
* Return to chest level functional activities
* Gradual and planned progression of anterior joint capsule stress

Precautions

* No aggressive overhead activities/strengthening that overstress anterior joint capsule
* Avoid contact sports/activities
* No strengthening or functional activities in any plane until near full ROM and strength in that plane of movement
* Patient education regarding gradual increase of shoulder activities

Activities

* Continue AROM and PROM as needed/indicated
* Initiate biceps strengthening with light resistance, progress as tolerated
* Gradual progression of pectoralis major/minor (avoid positions of excessive stress to anterior joint capsule)
* Subscapularis strength progression (pushup plus, cross body diagonals, forward punch, IR resistance band at 0/45/90 degrees abduction, etc.)

Criteria to progress to phase IV

* PROM forward elevation within normal limits
* PROM ER at all angle at all angles of shoulder abduction within normal limits
* AROM forward elevation within normal limits with good mechanics
* Good rotator cuff and scapular muscular performance for chest level activities
* Completion of phase III activities with minimal to no pain or difficulty

**Phase IV (approx. weeks 16-20) Overhead activities/return to activities phase**

Goals

* Stretching and PROM as needed/indicated
* Maintain full non-painful AROM
* Return to full work activities
* Return to full recreational activities

Precautions

* Excessive anterior joint capsule stress
* Avoidance of “triceps dips, wide grip bench press, military press, or lat pulls behind head. Always “see your elbows” when weight lifting.
* No throwing or overhead athletic moves until 4 months post-op or cleared by MD.

Activity

* Continue all exercises from phase III
* Overhead strengthening if ROM and strength below 90 degrees elevation is good
* Shoulder stretching/strengthening at least 4 x a week
* Return to upper extremity weight lifting program with emphasis on larger, primary upper extremity muscles (deltoids, latissimus dorsi, pectoralis major)
* Push-ups with elbows not flexing past 90 degrees
* Plyometrics/interval sports program if appropriate/cleared by PT and MD
* May initiate pre injury level activities/vigorous sports if appropriate/cleared by MD