

Joshua D. Stein, M.D.
Trinity Clinic Orthopaedic and Sports Medicine
1327 Troup Hwy
Tyler, TX 75701
(903) 510-8840

ROTATOR CUFF REPAIR REHAB PROTOCOL

This rehabilitation protocol has been developed for the patient following a rotator cuff surgical procedure. This protocol will vary in length and aggressiveness depending on factors such as:

- Size and location of tear
- Degree of shoulder instability/laxity prior to surgery
- Acute versus chronic condition
- Length of time immobilized
- Strength/pain/swelling/range of motion status
- Rehabilitation goals and expectations

Early passive range of motion is highly beneficial to enhance circulation within the joint to promote healing. The protocol is divided into phases. Each phase is adaptable based on the individual and special circumstances. The **overall goals** of the surgical procedure and rehabilitation are to:

- Control pain, inflammation, and effusion
- Regain normal upper extremity strength and endurance
- Regain normal shoulder range of motion
- Achieve the level of function based on the orthopedic and patient goals

The physical therapy should be initiated within the first week and one half to two full weeks post-op. The supervised rehabilitation program is to be supplemented by a home fitness program where the patient performs the given exercises at home or at a gym facility.

Important post-op signs to monitor:

- Swelling of the shoulder and surrounding soft tissue
- Abnormal pain response, an increase in night pain
- Severe range of motion limitations
- Weakness in the upper extremity musculature

Return to activity requires both time and clinical evaluation. To safely and most efficiently return to normal or high level functional activity, the patient requires adequate strength, flexibility, and endurance. Functional evaluation including strength and range of motion testing is one method of evaluating a patient's readiness to return to activity. Return to intense activities following a

rotator cuff repair requires both a strenuous strengthening and range of motion program along with a period of time to allow for tissue healing. Symptoms such as pain, swelling, or instability should be closely monitored by the patient.

Phase 1: Week 1-3 Rotator Cuff Repair

WEEK	EXERCISE GOAL
1-3	ROM Gradual □ Passive ROM in scapular plane Pendulum exercises Elbow (flex/ext) range of motion Initiate rope/pulley week 3-4 post-op Initiate passive ER wand exercise week 3-4 not to exceed 45° of ER at 45° abduction STRENGTH NO Active Shoulder flexion or abduction allowed in the first 3 weeks Grip strengthening with putty or ball BRACE Brace for 3 weeks or as noted Brace removed to perform exercises above MODALITIES E-stim as needed Ice 15-20 minutes GOALS OF PHASE: <ul style="list-style-type: none">• Promote healing of repaired rotator cuff• Control pain and inflammation• Gradual increase of ROM• Independent in HEP• Delay muscle atrophy

Phase 2: Week 3-6

Rotator Cuff Repair

WEEK	EXERCISE GOAL
-------------	----------------------

3-6

ROM Gradual □

Continue PROM as needed

Initiate Grade I-II joint mobilization

Pendulum exercise

Elbow (flex/ext) range of motion

Rope/Pulley (flex/abd/scaption)

Wand activities in all planes

Initiate gentle posterior capsule stretching

Initiate gentle IR stretching

STRENGTH

Continue grip strengthening as needed

Initiate submaximal isometrics at week 4

Initiate supine AROM exercises without resistance

Initiate UBE without resistance at week 4

Initiate scapular stabilizer strengthening-active assisted

Shrugs

Shoulder retraction

BRACE

Discontinue brace at week 3-4

MODALITIES

E-stim as needed

Ice 15-20 minutes

GOALS OF PHASE:

- Control pain and inflammation
- Initiate light RC muscle contraction
- Gradual increase in ROM
- Initiate light scapular stabilizer contraction

Phase 3: Week 6-12

Rotator Cuff Repair

WEEK EXERCISE GOAL

6-12

ROM Full ROM

Continue all ROM from previous phases 10-12 wk
Posterior capsule stretching
Initiate Grade II-IV joint mobs as needed
Rope/Pulley (flex, abd, scaption)
Towel stretching
Wand activities in all planes

STRENGTH

Continue with all strengthening from previous phases increasing resistance and repetition
Manual rhythmic stabilization exercises at 90° flex
Shoulder shrugs with resistance
Shoulder retraction with resistance
Supine punches with resistance
Prone shoulder extension
Prone rowing
Prone ER with abduction
Initiate forward flexion, scaption, empty can
Sidelying ER
Initiate D1/D2 patterns supine then standing
Push-up progression
UBE for endurance training
Initiate plyotoss at chest then progress to overhead
Bicep/Tricep work
Isokinetic ER/IR at neutral at week 10-12

MODALITIES

Ice 15-20 minutes

GOALS OF PHASE:

- Minimize pain and swelling
- Reach full ROM
- Improve upper extremity strength and endurance
- Enhance neuromuscular control
- Normalize arthrokinematics

Phase 4: Week 12-24

Rotator Cuff Repair

WEEK	EXERCISE GOAL
-------------	----------------------

12-24	
-------	--

	ROM
--	------------

	Continue with all ROM activities from previous phases
	Posterior capsule stretching
	Towel stretching
	Grade III-IV joint mobs as needed for full ROM

	STRENGTH
--	-----------------

	Progress strengthening program with increase in resistance and high speed repetition
	Initiate IR/ER exercises at 90° abduction
	Progress rhythmic stabilization activities to include standing PNF patterns with tubing
	Initiate single arm plyotoss
	Initiate military press, bench press, flys, lat pulldowns
	UBE for strength and endurance
	Initiate sport specific drills and functional activities
	Initiate interval throwing program week 16-20
	Initiate light upper body plyometric program week 16-20
	Progress isokinetics to 90° abduction at high speeds

	MODALITIES
--	-------------------

	Ice 15-20 minutes
--	-------------------

	GOALS OF PHASE:
--	------------------------

- | | |
|--|--|
| | <ul style="list-style-type: none">• Full painless ROM• Maximize upper extremity strength and endurance• Maximize neuromuscular control• Initiate sports specific training/functional training |
|--|--|