

Therapist	

REHABILITATION FOLLOWING LATERAL RETINACULAR RELEASE

I. <u>IMMEDIATE POST-OPERATIVE PHASE</u>

Goals: Diminish swelling/inflammation (control hemarthrosis)

Initiation of quadriceps muscle training

Medial mobilization of patella Independent Ambulation

Weight Bearing: As tolerated two crutches

Swelling/

Inflammation Control: Cryotherapy

Lateral "C" buttress pad Compression Bandage Elevation & Ankle Pumps

Range of Motion: ROM to tolerance

At least 75 degrees flexion by day 2-3 Patellar mobilization (especially medial)

Muscle Retraining: Quadriceps isometrics

Straight Leg Raises (Flexion)

Hip Adduction

* Knee Extension (painfree arc)

Flexibility: Hamstring Stretches

Calf Stretches

AAROM Knee Flexion (to tolerance)

II. ACUTE PHASE

Goals: Control swelling/inflammation

Gradual Improvement in ROM

Quadriceps Strengthening (Especially VMO)

Note: Rate of progression based on swelling/inflammation.

Weight Bearing: Progress WBAT (one crutch)

^b Progression based upon pain, swelling, and quad control.

Discontinue crutch when appropriate.



Swelling/Inflammation: Continue use of lateral "C" pad

Compression bandage

Cryotherapy, elevation 5-6 times/day

Range of Motion: Rate of progression based upon swelling/inflammation.

At least 90-100 degrees flexion (Week 1)

^b At least 105-115 degrees flexion (Week 2)

^b At least 115-125 degrees flexion (Week 3)

Muscle Retraining: Electrical muscle stimulation to guads

Quad Setting Isometrics Straight Leg Raises (flexion)

Hip Adduction

Knee Extension 60-0 degrees, painfree arc ^a Mini-Squats with adduction (squeeze ball)

^a Leg Press

* Bicycle (Stationary) if ROM/Swelling permits

Proprioception Training

Flexibility: Continue Hamstring, Calf Stretches

Initiate quadriceps muscle stretching

III. SUBACUTE PHASE - MODERATE PROTECTION

Goals: Eliminate any joint swelling

Improve muscular strength and control without exacerbation of symptoms.

Functional exercise movements

Criteria to Progress to Phase III:

1. Minimal inflammation/pain

2. ROM (0-125 degrees)

3. Voluntary quadriceps contraction

<u>Exercises</u>: Continue muscle stimulation to quadriceps (if needed)

Quadriceps setting isometrics

4 way Hip Machine (hip adduction, abduction, extension, and flexion)

* Lateral Step-Ups (if able)
* Front Step-Ups (if able)

^a squats against wall (0-60 degrees)

^a Leg Press

Knee Extension (90-0 degrees), painfree arc

Bicycle

Pool Program (walking, strengthening, running)

Proprioceptive Training.



Flexibility: Continue all stretching exercises for LE

<u>Swelling/Inflammation</u>: Continue use of ice, compression, and elevation, as needed.

IV. ADVANCED PHASE - MINIMAL PROTECTION

Goals: Achieve maximal strength and endurance.

Functional activities/drills

Criteria to Progress to Phase IV:

1. Full Non-Painful ROM

2. Absence of swelling/inflammation

3. Knee extension strength 70% of contralateral knee.



Exercises: a Wall Squats (0-70 degrees) painfree arc

^a Dertical Squats (0-60 degrees)

^a Leg Press Forward Lunges Lateral Lunges Lateral Step-ups Front Step-ups

Knee Extension, painfree arc Hip Strengthening (4 way)

Bicycle Stairmaster_®

Proprioception drills

Sport Specific functional drills (competitive athletes)

Continue all stretching

Continue use of ice as needed

V. RETURN TO ACTIVITY PHASE

Goal: Functional return to work/sport

Criteria to Progress to Phase V:

- 1. Full Non-Painful ROM
- 2. Appropriate Strength Level (80% of greater of contralateral leg)
- 3. Satisfactory clinical exam

Exercises: Functional Drills

Strengthening Exercises (selected)

Flexibility Exercises

KEW: 11/96

^{*} If patient is able to perform painfree.

^a Exercise can be augmented by hip adduction contraction (ball squeeze).

^b Progression based upon assessment of pain, inflammation, and quadriceps control.