



Patella Tendon Repair Post-surgical Rehabilitation Protocol

The following is a protocol for post-operative patients following patella tendon repair. The primary goal of this protocol is to protect the repair while steadily progressing towards and ultimately achieving pre-injury level of activity. Please note this protocol is a guideline. Patients with additional surgery (i.e. collateral ligament repair, meniscal repair) will progress at different rates. Achieving the criteria of each phase should be emphasized more than the approximate duration. If a patient should develop an increase in pain or swelling or decrease in motion at any time, activity should be decreased until problems are resolved.

Post-op Days 1 – 14

- Dressing:
 - POD 1: Debulk dressing
 - POD 2: Change dressing, keep wound covered
 - POD 7-10: Sutures out, D/C TED hose when effusion resolved
- Brace x 8 weeks – Locked in extension for ambulation.
- Crutches – Partial weight bearing (PWB)
- Patella mobilization
- Calf pumping
- AAROM 0-45 degrees (passive extension, active flexion, heel slides)
- Passive extension with heel on bolster or prone hangs
- Electrical stimulation – sub-maximal quad sets for muscle re-education
- Quad sets, Co-contractions quads / hamstrings
- Standing straight leg raise (SLR) x 4 (in brace)
- Gentle hamstring stretch
- Ice pack with knee in full extension after exercise

Goals

- Full passive extension
- Good quad control
- Pain / effusion controlled

Weeks 2– 4

- Brace x8 weeks – Locked in extension for ambulation
- Crutches – Weight bearing as tolerated (WBAT), D/C when gait is normal
- Continue appropriate previous exercises
- AAROM 0-70 degrees (passive extension, active flexion)
- SLR x4 on mat (in brace)
- Hamstring curls 0-45 degrees on weight machine with light resistance
- Double leg heel raises
- Proprioceptive training (in brace)
 - Single leg standing in parallel bars
 - Double leg BAPS for weight shift
- Stretches – Hamstring , ITB

Goals

- ROM 0 – 70 degrees
- No extensor lag

Weeks 4 - 6

- Brace x 8 weeks – Locked at 0-30 degrees for ambulation
- Continue appropriate previous exercises
- AAROM 0-90 degrees (passive extension, active flexion)
- Standing SLR x 4 (in brace) with Theraband bilaterally
- Hamstring curls 0-90 degrees on weight machine with light resistance
- Forward, lateral, and retro step downs in parallel bars (in brace 0-45 degrees)
 - No knee flexion past 45 degrees (small step)
- Single leg heel raises (in or out of brace)
- Elliptical trainer (in brace)

Goals

- Normal gait
- ROM 0-90 degrees

Weeks 6 - 8

- Brace x 8 weeks – Gradually open to available range
- Continue appropriate previous exercises
- AAROM, AROM through full range
- Active knee extension without weight (no brace)
- SLR x4 on mat with light weight below the knee (no brace)
- Leg press 0-60 degrees – Light resistance (no brace)
- Mini squats, wall squats 0-60 degrees (no brace)
- Proprioceptive training (in brace) – Single leg BAPS, ball toss and body blade
- Stationary bike (no brace) – Progressive resistance and time
- Treadmill – Forwards and backwards walking (in brace)
- Pool therapy (flutter kicks from hip with knee in extension)

Goal

- ROM 0-110 degrees

Weeks 8 - 12

- D/C brace
- Continue appropriate previous exercises and following ex without brace
- PROM, AAROM, AROM to regain full motion
- Short arc quads
- Hamstring curls on machine through full range – Light to moderate resistance
- Leg Press 0-90 degrees – Light to moderate resistance
- Hip weight machine x4 bilaterally
- Fitter
- Slide Board
- Treadmill – Walking progression program

Goals

- Full ROM
- Walk 2 miles at 15 min/mile pace

Months 3 – 4

- Continue appropriate previous exercises
- Knee extension weight machine with light to moderate resistance
- Functional activities – Figure 8's, gentle loops, large zigzags
- Treadmill – Walking progressive program

Goals

- Equal thigh girth
- Equal quad flexibility in prone (heels to buttocks)
- Run 2 miles at easy pace

Months 4 – 6

- Continue appropriate previous exercises
- Agility drills / Plyometrics
- Sit-up progression
- Stairmaster
- Running progression to track
- Transition to home / gym program

Goal

- Return to all activities

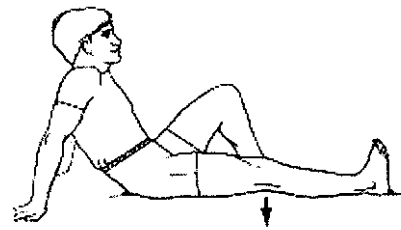
****NO CONTACT SPORTS UNTIL 6 MONTHS POST-OP****



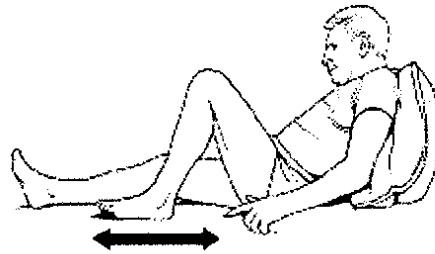
KNEE POST-OP PHASE I

Perform exercises below frequently: 30 reps, 3 – 5x a day

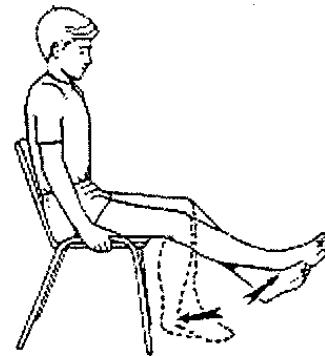
Quad Isometrics



Heel Slides



Active Assisted Motion



Ice Position 15 minutes 2-3 x per day

