

University Orthopedics, Inc.  
Sports Medicine Division

## ISOLATED MENISCUS REPAIR POST-OP REHABILITATION PROTOCOL

The following is a protocol for postoperative patients following an isolated meniscus repair. The primary goal of this protocol is to protect the reconstruction while steadily progressing towards and ultimately achieving pre-injury level of activity. Please note this protocol is a guideline. Patients with additional surgery 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.

### PHASE I: 0-2 WEEKS POSTOPERATIVE

#### GOALS:

- Minimize effusion and pain
- Full passive extension
- Normal patellar mobility
- Knee flexion to 60 degrees
- Good quad control

#### DRESSING PROCEDURE:

- POD 1: De-bulk dressing, TED Hose in place
- POD 2: Change dressing, keep wound covered, continue TED Hose
- POD 7-10: Sutures out, D/C TED Hose when effusion resolved

#### AMBULATION AND BRACE USE:

Brace x 6 weeks: Locked in extension  
Crutches – Partial weight bearing (PWB) in brace

#### EXERCISES:

Upper Body Ergometer for conditioning  
No stationary biking  
**No active hamstring exercises**  
Patellar mobilization (teach patient)  
Calf pumping  
AAROM 0-90 degrees – Heel slides with towel assist  
Passive extension with heel on bolster or prone hangs  
Electrical stimulation in full extension with quad sets and SLR  
Quad sets, Co-contractions quads / HS  
SLR x 4 in brace (until demonstrates good quad control)  
Core and hip strengthening  
Double leg heel raises  
Gentle Hamstring stretching  
Ice pack with knee in full extension after exercise

### PHASE II: ~2-4 WEEKS POSTOPERATIVE

#### GOALS:

- Pain/effusion control
- No extensor lag
- Improve local muscular endurance

#### AMBULATION AND BRACE USE:

Brace x 6 weeks – Locked in extension  
Crutches – PWB in brace

#### EXERCISES:

##### **No active hamstring exercises**

Continue appropriate previous exercises  
Scar massage when incision healed  
PROM, AAROM AROM 0-90 degrees only  
SLR x 4 (add light ankle weights if quad control)  
Weight shifts (UE support)  
Core and hip strengthening  
Stretches – Hamstring, Hip Flexors, ITB, Gastroc-Soleus

### PHASE III: ~4-6 WEEKS POSTOPERATIVE

#### GOALS:

- ROM 0-90 degrees
- No effusion
- Increase strength/balance

#### AMBULATION AND BRACE USE:

Brace x 6 weeks – Locked in extension  
Crutches – PWB in brace

#### EXERCISES:

Continue appropriate previous exercises  
PROM, AAROM, AROM 0-90 degrees only  
Mini squats 0-45 degrees with UE support (table or suspension training system)  
Passive flexion to 90 degrees (push up with opposite leg)

Leg press 0-45 degrees with light resistance (up to  $\frac{1}{4}$  body weight)  
Modified SLDL (cone touch exercise)  
Core and hip strengthening exercises

Stationary bike with seat high for ROM – Complete cycle as able

AT THIS POINT, SOME PATIENTS MAY HAVE USED UP THEIR ALLOWABLE BENEFITS FROM THEIR INSURANCE COMPANY. HOWEVER, THIS DOES NOT MEAN THE PATIENT IS DONE WITH THEIR REHABILITATION. THE THERAPIST WILL WORK WITH THE PATIENT TO HELP SET UP A PROGRESSIVE HOME EXERCISE PROGRAM IF IT IS NECESSARY. IT IS RECOMMENDED THE PATIENT JOIN A HEALTH CLUB/GYM AT THIS POINT TO MAXIMIZE REHAB POTENTIAL.

#### **PHASE IV: ~6-9 WEEKS POSTOPERATIVE**

##### GOALS:

- Full ROM
- Normal gait
- Increase strength/balance

##### AMBULATION AND BRACE USE:

Brace – Open to available range; begin weaning  
Crutches – Weight bearing as tolerated (WBAT), D/C when gait normal

##### EXERCISES:

Continue appropriate previous exercises  
PROM, AAROM, AROM – Gradually increase motion through full range  
Standing SLR x 4 with light resistance band bilaterally  
Wall squats 0-45 degrees  
Leg press 0-60 degrees with resistance no more than  $\frac{1}{2}$  body weight  
Hamstring curls 0-60 degrees – Carpet drags or rolling stool (closed chain)  
Forward, lateral and retro step downs in parallel bars – No knee flexion past 45 degrees (small step)  
Single leg heel raises  
Core and hip strengthening  
Proprioceptive training – Single leg balance (eyes open/eyes closed); double leg forgiving surface  
Treadmill – Forwards and backwards walking  
Stationary bike – Progressive resistance and time  
Elliptical trainer

#### **PHASE V: ~9-12 WEEKS POSTOPERATIVE**

##### GOAL:

- Walk 2 miles at 15 min/mile pace

AMBULATION: normal gait mechanics without assistive devices

##### EXERCISES:

Continue appropriate previous exercises with progressive resistance  
Wall squats 0-90 degrees  
Leg press 0-90 degrees with resistance as tolerated  
Hamstring curls 0-90 on weight machine with light resistance  
Forward, lateral and retro step downs (medium to large step)  
Hip weight machine x 4 bilaterally  
Proprioceptive training – Single leg balance (eyes open/eyes closed); Dynamic movement of UE and Les; single leg balance on forgiving surface  
– Grid exercises  
Fitter  
Slide board  
Treadmill – Walking progression program  
Pool therapy

#### **PHASE VI: 3+ MONTHS POSTOPERATIVE**

##### GOAL:

- Run 2 miles at easy pace
- Return to all activities

##### EXERCISES:

**No Squatting or Leg press > 90 degrees until beyond 4 months post-op**  
**No hard cutting or pivoting on involved knee until 4-5 months post-op**  
**No contact sports until 6 months post-op**  
Continue appropriate previous exercises  
Core and hip strengthening  
Hamstring curls on weight machine through full range

Short arc quads

Squatting exercises

Leg press exercises

Functional activities – Figure 8s, gentle loops, large  
zigzags with gradual progression towards sharper cuts

Stairmaster – Small steps

Treadmill – Running progression program

Pool therapy – Swimming laps

#### **CRITERIA FOR RETURN TO SPORTS:**

Gradual and progressive return to sports at **4 months** if all of the following criteria are met:

- Pain free running
- No more than 1+ knee effusion
- Isokinetic testing:
  - Quadriceps Peak Torque Deficit  $\leq 10\%$
  - Total Work  $\leq 10\%$
  - Pain free running
- All Functional Tests  $\geq 90\%$  and pain free with good neuromuscular control:
  - Single Hip for distance
  - Triple Hop for distance
  - Triple crossover hop for distance
  - Timed 6 meter hop
  - Unilateral Vertical hop
  - Y Balance test for symmetry

This protocol is designed to be administered by a licensed physical therapist and/or certified athletic trainer. Please do not hesitate to contact our office should you have any questions concerning the rehabilitation process.