



## Hip Arthroscopy—Labral Repair, Acetabuloplasty, Femoroplasty Physical Therapy Protocol

**General Guidelines:** The included protocol is intended to be a guideline for the therapist in assisting the patient having undergone an arthroscopic hip procedure. The overall speed of progression is determined by the therapist upon achieving the designated goals. Determined length of therapy is 2-3 times weekly for 6-10 weeks with emphasis on a home exercise program. Modalities may be used as needed.

### **Rehabilitation Protocol**

#### **Phase 1: 0-2 weeks postop**

**Goals:** Control pain, diminish swelling, begin regaining hip range of motion, prevent muscle atrophy

**Weight bearing:** Foot-flat weight bearing with axillary crutches as tolerated unless otherwise indicated (based on femoroplasty resection).

- For acetabular microfracture—touch down weight bearing for 6 weeks

#### **Restrictions:**

- Avoid hip flexion > 90°
- Hip extension limited to 0° (neutral) for 4 weeks
- Avoid hip external rotation when the hip is extended past neutral until 6 weeks postop
- Avoid active straight leg raises/resisted hip flexion until 3 weeks postop to prevent iliopsoas tendonitis.
- Avoid impact activity

#### **Exercises:**

- Quad isometric contractions
- Gluteal isometric contractions
- Ankle pumps

- Range of Motion: active assist hip range of motion (standing, supine, side-lying) in all planes--Hip adduction, abduction, extension in neutral rotation, flexion to 90°, internal rotation, external rotation
- Weight-shifting—proprioception and weight acceptance (avoid in patient with acetabular microfracture)
- Gentle open chain hip abduction/adduction with progressive resistance

### **Phase 2: 2-6 weeks postop**

Goals: Control pain, progress hip range of motion, single leg stand control, normalize gait, improve muscular control

Weight bearing: as tolerated. Progression to wean off crutches with normalization of heel-toe gait pattern without pain

- For acetabular microfracture—touch down weight bearing for 6 weeks

### Restrictions:

- Hip extension limited to 0° (neutral) for 4 weeks
- Avoid hip external rotation when the hip is extended past neutral until 6 weeks postop
- Avoid forceful stretching
- Avoid impact activity

### Exercises:

- Continue Phase 1
- Soft tissue mobilization
- Straight-plane hip distraction
- Active/Active Assist hip range of motion: continue to progress as tolerated with end-range stretching. Avoid hip hyperextension and external rotation
- Supine Bridging—double leg, advance to single leg
- Short external rotator strengthening
- Advance theraband resistance in all hip motions
- Quad/hamstring strengthening
- Heel/toe raises
- Prone/standing hamstring curls
- Gentle core strengthening
- Proprioception: single leg balance, side stepping, backward walking once normalized forward gait, BOSU trainer
- Stationary upright cycling—increase resistance as tolerated
- Aquatic exercise: pool walking, sidestepping, water bicycle
- Cardiovascular: elliptical, stationary bike, treadmill walking (no jogging/running).

### **Phase 3: 6-12 weeks postop**

Goals: Maintain full range of motion, enhance leg muscular strength and endurance, improve proprioception and neuromuscular control, return to functional activities

Weight bearing: as tolerated

#### Exercises:

- Continue Phase 2/lower extremity strengthening
- Continue cardiovascular training
- Introduce advanced hip flexion/strengthening: stair climber, recumbent leg press,
- Improve proprioception/neuromuscular control
- Front/lateral lunges
- Front/lateral step ups
- Core strengthening
- Impact control exercises progression: two-feet landing→one foot to the other→one foot to same foot→single plane drills→multi plane drills
- Initiate running progression protocol once demonstrates satisfactory single leg landing control without pain: light jogging→jogging→running on level track surface/treadmill→running on level pavement at 3 months

#### **Phase 4: 3-4 months postop**

Goals: Maintain full range of motion, enhanced hip flexion/hip abduction/hip adduction/quad/hamstring strength 80% of contralateral leg, improve lower limb endurance, achieve normal running gait

#### Exercises:

- Continue Phase 3 exercises
- Continue daily flexibility/stretching /hip and core strengthening
- May initiate eccentric knee extensions
- Straight-ahead running on level surfaces (no trail running until 4 months)
- Agility drills: side steps, figure of eight drills, stair running, shuttle running, ladder drills, straight ahead acceleration/deceleration
- Begin plyometric drills, two-leg and single-leg jumping. May introduce sport-specific drills
- At 4-6 months: Safe return to athletic participation (variable depending on extent of procedure and rehabilitation progress)
  - Full pain-free range of motion, hip flexion/hip abduction/hip adduction/quad/hamstring strength >80% of contralateral leg, satisfactory single-leg hop equivalent to contralateral side
  - Physician clearance examination prior to return to full sport participation
- Maintenance program for continued knee strength and endurance

Schmerl M, Pollard H, Hoskins W. Labral injuries of the hip: a review of diagnosis and management. J Manipulative Physiol Ther. Oct 2005;28(8):632.

Stalzer S, Wahoff M, Scanlan M. Rehabilitation following hip arthroscopy. Clin Sports Med. Apr 2006;25(2):337-357