



Bucket Handle Meniscus Repair

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GENERAL GUIDELINES

Patients may begin the following activities at the dates indicated (unless otherwise specified by the physician):

- Bathing/Showering without brace after suture removal
- Sleep with brace locked in extension for 6 weeks
- Brace locked in extension for 8 weeks for ambulation
- Use of crutches continued for 6 weeks
- No weight-bearing for 4 weeks

PHYSICAL THERAPY ATTENDANCE

The following is an approximate schedule for supervised physical therapy visits:

Phase I (0-8 weeks):	2 visits/week
Phase II (8-12 weeks):	1-2 visits/week
Phase III (3-4 months):	1 visit/week first month, reduce to One visit every 2 weeks based on patient Goals and access to equipment
Phase IV (4-6 months+):	Discontinue PT on completion of Functional progression

REHABILITATION PROGRESSION

The following is a general guideline for progression of rehabilitation following ACL quadriceps tendon autograft reconstruction. Progression through each phase should take into account patient status (e.g. healing, function) and physician advisement. Please consult the physician if there is any uncertainty concerning advancement of a patient to the next phase of rehabilitation.

PHASE I

Begins immediately post-op through approximately 8 weeks.

Goals:

- Protect meniscus fixation and surrounding soft tissues
- Control inflammation
- Minimize the effects of immobilization through ROM exercises (heel slides and flexing over side of table)
- Educate patient regarding limitations and the rehabilitation process.

Brace:

- 0-8 weeks: Brace locked in full extension for gait and sleeping, unlock for therapeutic exercises.

Weightbearing Status:

- 0-4 weeks: No weight bearing
- 4-6 weeks: Weight bearing as tolerated with two crutches and brace locked in extension
- 6-8 weeks: Weight bearing as tolerated with brace locked in extension, no crutches

Therapeutic Exercises:

- Quad sets
- Ankle pump, progress to resistive theraband exercises
- Limit flexion to 60 degrees x 4 weeks, then progress to 90 degrees. Advance past 90 degrees after 6 weeks. Do not exceed 120 degrees for 4 months.
- Non-weight bearing calf, hamstring stretches
- SLR in flexion, abduction, flexion, adduction, extension with brace in full extension until quadriceps strength is sufficient to prevent extension lag
- Patellar mobilizations as needed
- Begin aquatic therapy at 4 weeks with emphasis on normalization of gait

PHASE II

Begins at approximately 8 weeks post-op and extends to approximately 3 months. Criteria for advancement to Phase II:

- Good quad set, SLR without extension lag
- Approximately 90° of flexion
- Full extension
- No signs of active inflammation

Goals:

- Increase flexion range of motion
- Increase quadriceps strength
- Restore normal gait
- Avoid over stressing the graft

Brace:

Wean brace at 8 weeks post op with help of physical therapist – unlock brace to 60 degrees and walk with one crutch. May discontinue brace when no limp observed by therapist

Weightbearing status:

At 8 weeks may discontinue use of crutches if following criteria are met:

- No extension lag with SLR
- Full extension
- Flexion 90°
- Non-antalgic gait pattern (may use one crutch or cane until gait is normalized)

Therapeutic Exercises:

- Wall slides 0-45-degrees, progressing to mini-squats
- 4-way hip for flexion, extension, abduction, adduction
- Stationary bike
- Leg press 0-60° flexion
- Step-ups (Begin at 2" and progress towards 8")
- Knee extensions 50°-90°
- Toe raises
- Balance exercises (e.g. single-leg balance)

- Elliptical at 8 weeks post-op

PHASE III

Begins at approximately 3 months post-op and extends through approximately 4 months. Criteria for advancement to Phase III

- Full knee extension, at least 100° of flexion
- Good quadriceps strength
- No patellofemoral or soft tissue complaints
- No signs of active inflammation

Goals:

- Restore full range of motion
- Continue improvement of quadriceps strength
- Initiate isolated hamstring strengthening
- Improve functional strength and proprioception

Therapeutic Exercises:

- Progression of closed kinetic chain and balance activities
- Closed kinetic chain terminal knee extension with resistive tubing or weight machine
- Hamstring curls 0-60° of flexion
- Swimming-no breaststroke
- Jogging in pool with wet vest or belt
- Stairmaster (small steps initially)

PHASE IV

Begins at approximately 4 ½ -5 months and extends through 6-7 months post-op. Criteria for advancement to Phase IV:

- No significant swelling/inflammation
- Full, pain-free ROM
- No evidence of patellofemoral joint irritation
- Strength approximately 70% of uninvolved lower extremity per isokinetic evaluation
- Sufficient strength and proprioception to initiate agility activities
- Normal running gait

Goals:

- Symmetric performance of basic and sport specific agility drills
- Single hop and three hop tests 85% of uninvolved leg
- Quadriceps and hamstring strength at least 85% of uninvolved lower extremity per isokinetic strength test

Exercises:

- Continue and progress flexibility and strengthening program based on individual needs and deficits
- Initiate plyometric program as appropriate for patient's athletic goals
- Agility progression including, but not limited to:
 - Side steps
 - Crossovers
 - Figure 8 running
 - Shuttle running
 - One leg and two leg jumping
 - Cutting

- Acceleration/deceleration/springs
- Agility ladder drills
- Continue progression of running distance based on patient needs
- Initiate sport-specific drills as appropriate for patient

RETURN TO FULL ACTIVITY

The patient may resume full activity level including sports participation when he/she completes an appropriate functional progression and has clearance from the physician. This usually occurs at approximately 4-6 months post-op.