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## **Postoperative Rehabilitation Guidelines**

### **Meniscal Root Repair**

The intent of this protocol is to provide the clinician with a guideline of the post-operative rehabilitation course of a patient that has undergone a meniscal root repair. It is not means intended to be a substitute for one's clinical decision making regarding the progression of a patient's post-operative course based on their physical exam/findings, individual progress, and/or the presence of post-operative complications. If a clinician requires assistance in the progression of a post-operative patient, they should consult with the referring Surgeon.

**Progression to the next phase based on clinical criteria and/or time frames as appropriate.**

Key factors in determining progression of rehabilitation after Meniscal repair include:

- Tissue quality at Time of repair
- Other pathology (ligamentous injury)

**Phase 1- Maximum Protection - Weeks 1-4:**

**Goals:**

- Diminish inflammation and swelling
- Restore ROM
- Reestablish quadriceps muscle activity

### **Stage 1: Immediate Postoperative Day 1 – Week 3**

- Ice, compression, elevation
- Electrical muscle stimulation
- Brace for support with ROM limitation
- ROM 0-110
  - Motion is limited for the first 7-21 days, depending on the development of scar tissue around the repair site. Gradual increase in flexion ROM is based on assessment of pain and site of repair (0-110 degrees)
- Patellar mobilization
- Scar tissue mobilization
- Passive ROM
- Exercises
  - Quadriceps isometrics
  - Hamstring isometrics (if posterior horn repair, no hamstring exercised for 6 weeks)
  - Hip abduction and adduction
- Weight-bearing: TDWB weeks 1+2, 50% weight bearing week 3+4. WBAT at weeks 4-6.
- Proprioception training with brace locked at 0 degrees

### **Stage 2: Weeks 4-6**

- Progressive resistance exercises (PREs) 1-5 pounds
- Limited range knee extension (in range less likely to impinge or pull on repair)
- Toe raises
- Mini squats less (than 45 degrees flexion)
- Cycling (no resistance)
- Unloaded flexibility exercises

### **Phase 2: Moderate Protection Weeks 6-10**

#### **Criteria for progression to Phase 2:**

- ROM 0-110 degrees
- No change in pain or effusion
- Quadriceps control (MMT 4/5)

#### **Goals:**

- Increased strength, poser, endurance
- Normalize ROM of knee
- Prepare patients for advanced exercises

#### **Exercises:**

- Strength – Pre progression
- Flexibility exercises
- Lateral step-ups
- Mini squats

**Endurance Program:**

- Swimming (no frog kick), pool running-if available
- Cycling
- Stair machine

**Coordination Program:**

- Pool sprinting-if pool available
- Backward walking

**Phase 3: Advanced Phase Weeks 11-15****Criteria for progression to Phase 3**

- Full, pain free ROM
- No pain or tenderness
- Satisfactory clinical examination
- SLR without lag
- Gait without device, brace unlocked

**Goals:**

- Increase power and endurance
- Emphasize return to skill activities
- Prepare for return to activities

**Exercises:**

- Continue all exercises
- Plyometrics, pool program

**Phase 4: Activity Progression Phase****Progression Criteria**

- Full, pain free ROM
- Satisfactory clinical examination

**Criteria for discharge from skilled therapy:**

- Non-antalgic gait
- Pain free/full ROM
- LE strength at least 4/5
- Normal age appropriate balance and proprioception
- Resolved palpable edema

**Goals:**

- Prepare for return to full unrestricted activities

**Exercises:**

- Continue all exercises
- Advance plyometrics
- Agility program, Sport-specific functional progression