

Rehabilitation Protocol: Microfracture of the Femoral Trochlea/Patellar Defect

Phase I (Weeks 0-8)

- **Weightbearing:** Weightbearing as tolerated in hinged knee brace locked in extension
- **Hinged Knee Brace:** Locked in extension for ambulation – opened up 0-40° for ROM exercises
- **Range of Motion** – Continuous Passive Motion (CPM) Machine for 6-8 hours per day for 6-8 weeks
 - o Set CPM to 1 cycle per minute – range from 0-40°
 - o Passive Range of Motion and stretching under guidance of PT
- **Therapeutic Exercises**
 - o Quadriceps/Hamstring isometrics

Phase II (Weeks 8-12)

- **Weightbearing:** Advance to full weightbearing as tolerated – discontinue crutch use
- **Discontinue Use of Hinged Knee Brace**
- **Range of Motion** – Advance to full/painless ROM (PROM/AAROM/AROM)
- **Therapeutic Exercises**
 - o Emphasize Patellofemoral Program
 - o Closed chain extension exercises
 - o Hamstring curls
 - o Toe raises
 - o Balance exercises
 - o Begin use of the stationary bicycle/elliptical

Phase III (Months 3-6)

- **Weightbearing:** Full weightbearing
- **Range of Motion** – Full/Painless ROM
- **Therapeutic Exercises**
 - o Advance closed chain strengthening exercises, proprioception activities
 - o Sport-specific rehabilitation
- Gradual return to athletic activity as tolerated – including jumping/cutting/pivoting sports
- Maintenance program for strength and endurance