Meniscus Transplant Rehabilitation Protocol

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This protocol provides general guidelines for rehabilitation following meniscus transplant. Progression should be individualized based on the procedure, healing, and patient response, with modifications as directed by the surgeon.

Phase	Goals	Precautions / Restrictions	Treatment

Weeks 0-4	● **Protect surgical site**
	● Active ROM: **0-90 degrees** (Maximum)
	● Reduce muscle atrophy
	● Reduce swelling
	● PRICE principles
	● Decrease pain and inflammation
		● ROM: **0-90 degrees**
		● PWB with the knee in full extension using crutches
		● Immobilizer locked in extension at all times while walking
			General guidelines
			● ROM (limited to **0-90 deg** x 4weeks):
			  ● Heel slides
			  ● Prone knee hangs/Supine knee extension with towel under ankle
			  ● Patella mobilizations
			● PRICE
			  ● Cryotherapy: 5-7 times per day
			  ● Compression with TubiGrip/TEDS
			● Quadriceps recruitment
			● Global LE isometric/proximal hip strengthening
			● Gait training with crutches
			Initial visit
			● FOTO, LEFS

Weeks 4-16	● Discontinue knee immobilizer
	● Full ROM
	● Reduce atrophy/progress strengthening
	● Reduce swelling
	● **Normalize gait**
	● SLR without extensor lag
		● Progress to WBAT (wean crutches)
		● **No loading at knee flexion angles >90 degrees**
		● **No jogging or sport activity**
		● **Avoid painful activities / exercises**
			General guidelines
			● ROM: **No limit**
			● Gait training from WBAT to independent
			● Core stabilization exercises
			● Global LE strengthening
			  ● Limit deep knee flexion angles **>90 degrees**
			  ● Begin functional strengthening exercises (bridge, mini-squat, step up, etc)
			  ● Double limb and single limb balance/proprioception
			● Aerobic training:
			  ● Walking program when walking with **normal gait mechanics**
			  ● Stationary bike/elliptical
			Week 6
			● FOTO, LEFS

Weeks 16-24	● Full ROM ● Increase functional LE strength ● **No effusion** ● Return to activity as tolerated	● Jogging program initiated at 16 weeks with MD aproval ● Basic plyometric exercises may begin at 16 weeks with caution to **avoid loaded deep knee flexion**	**General guidelines** ● Gradually increase lifting loads focusing on form, control, and tissue tolerance ● Progress as tolerated: ROM, Strength, Endurance, Proprioception/Balance, plyometrics **Week 16** ● FOTO, LEFS

Phase	Goals	Precautions / Restrictions	Treatment
Weeks 24+	● Full ROM ● Functional strengthening ● Return to sport/activity	● Return to sport 6-12 months post-op ● Return to high demand sport >8 months	**General guidelines** ● Gradually increase lifting loads focusing on form, control, and tissue tolerance ● Progress as tolerated: ROM, Strength, Endurance, Proprioception/Balance, agility, Sport specific skills **Week 24** ● FOTO, LEFS