



## **REHABILITATION GUIDELINES FOR ACHILLES TENDON REPAIR PROTOCOL**

PHASE I (0-4 WEEKS POST-OP)	DATES:
Appointments	<ul> <li>MD follow-up visit 2 weeks</li> <li>Begin physical therapy 10-14 days after surgery</li> </ul>
Rehabilitation Goals	<ul><li>Protection of the surgically repaired tendon</li><li>Wound healing</li></ul>
Precautions	<ul> <li>In splint/cast applied by MD postoperatively</li> <li>NWB X 4 weeks with crutches</li> <li>Keep the incision dry and watch for signs of infection</li> </ul>
Suggested Cardiovascular Exercise	Upper Body Ergometer (UBE)
Progression Criteria	Pain and edema control

PHASE II (4-6 WEEKS POST-OP) DATES:		
Appointments	Continue physical therapy 2 times per week	
Rehabilitation Goals	<ul> <li>Protection of the post-surgical repair</li> <li>Ankle ROM (Active dorsiflexion to neutral)</li> </ul>	
Precautions	<ul> <li>WBAT 4-6 weeks with heel lift in CAM boot and crutches</li> <li>Active dorsiflexion (to neutral DF only)</li> <li>Seated ankle strength initiated with light resistance only</li> </ul>	
Suggested Therapeutic Exercises	<ul> <li>Pain-free active ankle range of motion (ROM), including ankle alphabet (neutral DF only) ankle pumps, etc.</li> <li>Pain-free isometric ankle inversion, eversion, and dorsiflexion to neutral only</li> <li>Open chain hip and core strengthening</li> </ul>	
Suggested Cardiovascular Exercises	<ul><li>UBE</li><li>Bike light resistance with CAM boot on</li></ul>	
Progression Criteria	<ul> <li>Edema and pain control</li> <li>Pain-free active dorsiflexion to 0°</li> </ul>	

PHASE III (6-8 WEEKS POST-OP) DATES:		
Appointments	<ul> <li>MD follow-up visit x 6 weeks</li> <li>Continue physical therapy 2x per week</li> </ul>	
Rehabilitation Goals	<ul> <li>Normalize gait on level surfaces without boot or heel lift</li> <li>Active ROM between 5° of dorsiflexion and 40° of plantarflexion</li> </ul>	
Precautions	<ul> <li>FWB weaning from CAM boot to supportive shoe</li> <li>Avoid over-stressing the repair (forceful plantarflexion while in a DF position)</li> <li>No impact activities</li> </ul>	
Suggested Therapeutic Exercises	<ul> <li>Frontal and sagittal plane stepping drills (side step, cross-over step, grapevine step)</li> <li>Active ankle ROM</li> <li>Gentle gastrocnemius/soleus stretching</li> <li>Bilateral calf raises</li> <li>Static balance exercises (begin in 2 foot stand progress to narrow base of support and gradually progress to single leg stand)</li> <li>Ankle strengthening with resistive tubing</li> <li>Low velocity and partial ROM for functional movements (squat, step back, lunge)</li> <li>Hip and core strengthening</li> <li>Pool exercises if the wound is completely healed</li> </ul>	
Suggested Cardiovascular Exercise	<ul> <li>UBE</li> <li>Bike</li> <li>Walking in Pool (no swimming)</li> </ul>	
Progression Criteria	<ul> <li>Normal gait mechanics in supportive shoe</li> <li>Squat to 30° knee flexion without weight shift</li> <li>Single leg stand with good control for 10 seconds</li> <li>Active ROM between 5° of dorsiflexion and 40° of plantarflexion</li> </ul>	

PHASE IV (8-12 WEEKS POST-OP) DATES:		
Appointments	Continue physical therapy 1-2 x week	
Rehabilitation Goals	<ul> <li>Normalize gait on all surfaces without heel lift</li> <li>Single leg stand with good control for 30 seconds</li> <li>Active ROM between 15° of dorsiflexion and 50° of plantarflexion</li> <li>Good control and no pain with functional movements, including step up/down, squat and lunges</li> </ul>	
Precautions	<ul> <li>No impact activities</li> <li>Do not perform exercises that create movement compensations</li> </ul>	
Suggested Therapeutic Exercises	<ul> <li>Frontal and transverse plane agility drills</li> <li>Weight bearing ankle range of motion and stretching</li> <li>Multi-plane proprioceptive exercises – single leg stand</li> <li>Concentric and eccentric gastroc strengthening</li> <li>Functional movements (squat, step back, lunge)</li> <li>Hip and core strengthening</li> </ul>	

Cardiovascular Exercises	<ul> <li>Stationary Bike,</li> <li>Walking on level surface</li> <li>Swimming x 10 -12 weeks</li> </ul>
Progression Criteria	<ul> <li>Normal gait mechanics on all surfaces</li> <li>Squat and lunge to 90° knee flexion without weight shift</li> <li>Single leg stand with good control for 30 seconds</li> <li>Active ROM between 15° of dorsiflexion and 50° of plantarflexion</li> </ul>

PHASE V (3-6 MONTHS POST-OP) DATES:		
Appointments	Continue physical therapy 1x week prn	
Rehabilitation Goals	<ul> <li>Good control and no pain with sport and work specific movements, including impact</li> </ul>	
Precautions	<ul> <li>Post-activity soreness should resolve within 24 hours</li> <li>Initiate plyometric exercise</li> <li>Slow progression to running</li> </ul>	
Suggested Therapeutic Exercises	<ul> <li>Impact control exercises beginning 2 feet to 2 feet, progressing from 1 foot to other and then 1 foot to same foot</li> <li>Movement control exercise beginning with low velocity, single plane activities and progressing to higher velocity, multi-plane activities</li> <li>Sport/work specific balance and proprioceptive drills</li> <li>Hip and core strengthening</li> <li>Stretching for patient specific muscle imbalances</li> </ul>	
Cardiovascular Exercise	Replicate sport or work specific energy demands	
Return to Sport/Work Criteria	<ul> <li>Dynamic neuromuscular control with multi-plane activities, without pain or swelling</li> </ul>	

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