

Acute Proximal Hamstring Repair Protocol

Phase	Goals	Precautions/Restrictions	Treatment
Weeks 0-3	<ul style="list-style-type: none"> • Decrease pain and inflammation • Minimize muscle atrophy • Protect healing repair 	<ul style="list-style-type: none"> • Gait: Non weight bearing • Brace locked in 90° knee flexion, 24/7, except for hygiene • No hamstring stretching or tension on graft, comfortable range only • No position of maximum tension: hip flexion + knee extension 	<ul style="list-style-type: none"> • PRICE principles • Isometrics: quadriceps, hip abduction, hip adduction, abdominals • Passive range of motion: <ul style="list-style-type: none"> ○ Hip ○ Knee (full flexion to 90 deg) • Active range of motion: hip abduction, hip flexion, hip adduction, ankle • Upper extremity exercise as long as no stress to repair
Weeks 3-6	<ul style="list-style-type: none"> • Protect healing repair • Normalize gait mechanics • Return to normal movements of daily living 	<ul style="list-style-type: none"> • Gait: Progressive weight bearing as tolerated • Discontinue brace • No hamstring stretching • No isolated hamstring strengthening 	<ul style="list-style-type: none"> • Progress to independent ambulation with normal gait mechanics • Begin unresisted active knee flexion • Begin straight leg raise (comfortable range) • Begin hamstring isometrics • Initiate closed kinetic chain exercises with squatting pattern • Initiate single leg proprioception • Initiate stationary bike (as ROM allows, may need high seat), aquatics as indicated
Weeks 6-12	<ul style="list-style-type: none"> • Symmetric ROM • Progress muscle strength, endurance, power • Return to vocational activities 	<ul style="list-style-type: none"> • No hamstring stretching 	<ul style="list-style-type: none"> • Progress lower extremity and core strengthening • Initiate bridging progression • Initiate isolated hamstring strengthening* • Initiate elliptical at 8 weeks
Weeks 12+	<ul style="list-style-type: none"> • Return to jog • >90% hamstring and hip extension strength symmetry; prefer concentric and eccentric isokinetic testing • Single leg hop testing >90% limb symmetry (if returning to level I sport) • Progressive return to sport 	<ul style="list-style-type: none"> • Anticipated return to sport between 16-24 weeks 	<ul style="list-style-type: none"> • Initiate hamstring stretching, if needed • Initiate walk/jog progression • Progress plyometrics and agility as appropriate • Isokinetic hamstring strength testing

*Hamstring strengthening should progress from shortened to lengthened positions; from positions that do not compress the tendon (hip extension) to those that do (hip flexion and/or seated); from slow and controlled movements to faster movements to energy storage (landing from a jump) to energy storage with release (drop vertical jump).

This protocol is not meant to be prescriptive but a recommendation to guide the rehabilitation process. Each patient's progress may vary based on specifics of their injury and procedure.