

## PCL RECONSTRUCTION PROTOCOL

(TO BE GIVEN TO PHYSICAL THERAPIST)

	WEIGHT BEARING	BRACE	ROM	THERAPEUTIC EXERCISE
<b>WEEK 1:</b>	<ul style="list-style-type: none"> <li>• Full in brace</li> </ul>	<ul style="list-style-type: none"> <li>• Locked at 0° extension</li> <li>• OK to remove for hygiene and exercises</li> <li>• Wear while sleeping</li> </ul>	<ul style="list-style-type: none"> <li>• Locked in extension</li> </ul>	<ul style="list-style-type: none"> <li>• Extension: Passive knee extension using towel roll, prone hangs</li> <li>• Strengthening: Begin quad setting with knee support, plantarflexion/dorsiflexion, eversion/inversion strengthening</li> <li>• Avoid Hamstring strengthening until 6 weeks post op</li> </ul>
<b>WEEK 2:</b>	<ul style="list-style-type: none"> <li>• Full in brace</li> </ul>	<ul style="list-style-type: none"> <li>• Locked at 0° extension</li> <li>• OK to remove for hygiene, exercises AND SLEEP</li> </ul>	<ul style="list-style-type: none"> <li>• As tolerated</li> </ul>	<ul style="list-style-type: none"> <li>• Extension: Passive knee extension using towel roll, prone hangs</li> <li>• Open kinetic chain: SLR w/ brace in full extension until quad strength prevents extension lag, Hip abd/adduction, hip extension,</li> <li>• No hamstring strengthening until 6 weeks post op</li> <li>• Closed Kinetic Chain: Heel raises, leg press with minimal resistance</li> <li>• Trunk stabilization</li> <li>• Manual Interventions: patellar mobs, tibiofemoral mobs into extension, soft tissue as indicated</li> </ul>

<b>WEEKS 3-4:</b>	<ul style="list-style-type: none"> <li>• Full in brace</li> </ul>	<ul style="list-style-type: none"> <li>• Brace unlocked, with ROM set to 0-90° for exercise</li> <li>• OK to remove for hygiene, exercises AND SLEEP</li> </ul>	<ul style="list-style-type: none"> <li>• Increase flexion PROM approx. by 10° per week</li> <li>• Achieve and maintain full passive and active extension</li> </ul>	<ul style="list-style-type: none"> <li>• Open Kinetic Chain: Straight leg raises into flexion with emphasis on endurance of quadriceps and full knee extension</li> <li>• Open Kinetic Chain: Hip strengthening and leg extensions 90-40 degrees without weight – quad activation</li> <li>• Closed Kinetic Chain: step ups, heel raises progressing to single leg</li> <li>• No hamstring activation or active knee flexion</li> <li>• Manual interventions, modalities and trunk stabilization exercises, front and side planks</li> </ul>
<b>WEEKS 4-6:</b>	<ul style="list-style-type: none"> <li>• Full with brace</li> <li>• Start transitioning off brace after Day 28</li> </ul>	<ul style="list-style-type: none"> <li>• Brace unlocked, with ROM set to 0-90° for ambulation</li> <li>• OK to discontinue brace at day 28 if patient has no extension lag</li> </ul>	<ul style="list-style-type: none"> <li>• ROM 0-90 degrees</li> </ul>	<ul style="list-style-type: none"> <li>• Manual interventions, modalities and trunk stabilization exercises, advance hip/core</li> <li>• Gait training, wall slides (0-30°), Mini-squats (0-30°), Leg press (0-60°)</li> </ul>
<b>WEEKS 6-8:</b>	<ul style="list-style-type: none"> <li>• Full</li> </ul>	<ul style="list-style-type: none"> <li>• None</li> </ul>	<ul style="list-style-type: none"> <li>• Full active and passive extension and flexion ROM</li> </ul>	<ul style="list-style-type: none"> <li>• Manual interventions, modalities and trunk stabilization exercises</li> <li>• Gait training, wall slides (0-30°), Mini-squats (0-30°), Leg press (0-60°)</li> </ul>
<b>WEEKS 8-16:</b>	<ul style="list-style-type: none"> <li>• Full</li> </ul>	<ul style="list-style-type: none"> <li>• None</li> </ul>	<ul style="list-style-type: none"> <li>• Full</li> </ul>	<ul style="list-style-type: none"> <li>• Advance closed chain strengthening</li> <li>• Progress proprioception activities</li> <li>• Begin Stairmaster, elliptical, and running straight ahead at 12 weeks</li> </ul>

<p><b>WEEKS</b> <b>16-24:</b></p>	<ul style="list-style-type: none"> <li>• Full weight bearing</li> </ul>	<ul style="list-style-type: none"> <li>• None</li> </ul>	<ul style="list-style-type: none"> <li>• Full and pain free range of motion</li> </ul>	<ul style="list-style-type: none"> <li>• <b>Begin Stationary Bike (seat higher than normal)</b></li> <li>• Progress intensity of strengthening program, stair climber, walking incorporating single leg activities</li> <li>• Functional Goals: reciprocal stair ascending, walking with normal gait pattern</li> <li>• Progress intensity of strengthening program incorporating single leg activities</li> <li>•</li> <li>• 16 weeks: begin jumping</li> <li>• 20 weeks: advance to sprinting, backward running, cutting/pivoting/changing direction, initiate plyometric program and sport specific drills</li> </ul>
<p><b>MONTH 6+</b></p>	<ul style="list-style-type: none"> <li>• Full weight bearing</li> </ul>	<ul style="list-style-type: none"> <li>• None</li> </ul>	<ul style="list-style-type: none"> <li>• Full and pain free range of motion</li> </ul>	<ul style="list-style-type: none"> <li>• Begin jogging – advance to full running at 9 months</li> <li>• Advance proprioception, balance training</li> <li>• Plyometrics</li> <li>• Full cutting and return to sport around 9 months if all criteria met</li> </ul>