



Orthopedic Surgery, Sports Medicine & Arthroscopy Specialists

Jonathan Watson, MD

REHABILITATION PROTOCOL- Nonoperative FAI

The rehabilitation guidelines are presented in a criterion based progression program. Individual patients will progress at different rates depending on their age, associated injuries, pre-injury health status, rehab compliance, tissue quality and injury severity. Specific time frames, restrictions, and precautions may also be given to protect healing tissues and the surgical repair/reconstruction. The therapist should consult the referring physician with any questions or concerns.

INDIVIDUAL CONSIDERATIONS

PHASE 1 (~0-2 weeks)

REHAB GOALS	<ol style="list-style-type: none"> 1. Minimize swelling & pain 2. Normalize gait
PRECAUTIONS	<ol style="list-style-type: none"> 1. Do not force range of motion, some patients may have bony block to movement. 2. Ice as needed for pain
RANGE OF MOTION EXERCISES	<ul style="list-style-type: none"> ○ Soft tissue mobilizations/techniques as tolerated ○ Gentle psoas/lumbar extensor stretching
SUGGESTED THERAPEUTIC EXERCISES	<ul style="list-style-type: none"> ○ As above ○ Open chain- clamshells, prone heel squeeze ○ Closed chain- bridging ○ Isometric adductor squeeze ○ Balance/proprioceptive- double/single leg balance ○ Rhythmic stabilization in side lying
CARDIOVASCULAR EXERCISE	UBE
PROGRESSION CRITERIA	<ul style="list-style-type: none"> ○ No pain at rest/with rehab activities ○ Able to perform straight leg raise without pain

PHASE 2 (~3-4 weeks)

REHAB GOALS	<ol style="list-style-type: none"> 1. Progress strengthening, balance 2. Minimize pain and swelling
PRECAUTIONS	<ol style="list-style-type: none"> 1. Do not force range of motion. Avoid excessive load to iliopsoas 2. Ice as needed after activity

RANGE OF MOTION EXERCISES	<ul style="list-style-type: none"> ○ Continue phase 1 exercises ○ Gentle flexion, abduction, ER stretching
SUGGESTED THERAPEUTIC EXERCISES	<ul style="list-style-type: none"> ○ Continue phase 1 exercises ○ Open chain- clamshell against resistance, standing abduction/adduction/extension against resistance ○ Balance/proprioception- single leg stance, progress to uneven surface. Single leg lunge on wall w/psioball ○ Closed chain- bridging w/marching, double & single leg press in pain free ROM ○ LE- Romanian deadlift ○ Plyometrics- submax jumps on shuttle, double leg bouncing while maintaining contact on mini tramp ○ Functional- resistance band ambulation (forward/backward, side/side, monster walking)
CARDIOVASCULAR EXERCISE	<p>Continue phase 1</p> <p>Add elliptical as tolerated</p>
PROGRESSION CRITERIA	<ul style="list-style-type: none"> ○ No pain with ADLs/rehab activities ○ Able to hold SLR at 45 hip flexion supine against min resistance w/o pain ○ Able to maintain hip height within 2cm of uninvolved side during single leg stance phase test

PHASE 3 (~5-8 weeks)

REHAB GOALS	<ul style="list-style-type: none"> ○ Progress strengthening & LE drills ○ Minimize pain, inflammation
PRECAUTIONS	<ul style="list-style-type: none"> ○ Maintain pain free ROM, avoid hyperflexion of hips with strengthening
RANGE OF MOTION EXERCISES	<ul style="list-style-type: none"> ○ Continue exercises from phase 2. ○ Mobilizations/soft tissue technique as needed
SUGGESTED THERAPEUTIC EXERCISES	<ul style="list-style-type: none"> ○ Continue exercises from phase 2 ○ Balance/proprioceptive- multi-plane lunges ○ Closed chain- side planks, progress previous activities. Begin squats with machine, progress to back squats in pain free range. Begin single leg squats ○ Plyometrics- double leg jumps in pain free range, single leg bouncing on mini tramp ○ Sumo squats w/dumbbell/kettle bell

CARDIOVASCULAR EXERCISE	Continue phase 2
PROGRESSION CRITERIA	<ul style="list-style-type: none"> ○ No pain with ADLs/rehab activities ○ Able to perform single leg squat w/o pain or knee valgus ○ Able to consistently perform vertical drop jump from 18 inches without pain or knee valgus

PHASE 4 (~9+ weeks)

REHAB GOALS	<ul style="list-style-type: none"> ○ No pain with sport activities ○ Improvement of strength, endurance, neuromuscular control ○ Return to sport/work
PRECAUTIONS	<p>Post-activity soreness should resolve within 24 hours</p> <p>Avoid post activity swelling</p>
RANGE OF MOTION EXERCISES	<ul style="list-style-type: none"> ○ Continue with flexibility exercises from previous phase
SUGGESTED THERAPEUTIC EXERCISES	<ul style="list-style-type: none"> ○ Continue phase 3 activities. Progress with resistance/load. ○ Balance/proprioception- incorporate perturbations, multiplane lunges incorporate dynamic movements ○ Plyometrics- progress to double & single leg jumps on stable & unstable surfaces in pain free ROM ○ Squat to run med ball throws ○ Sport specific- can begin cutting, agility drills when tolerating running for 2 miles. Begin with single plane activities at 50% speed, advance speed then advance complexity of drills.
CARDIOVASCULAR EXERCISE	Walk/run progression
PROGRESSION CRITERIA- RETURN TO SPORT	<ul style="list-style-type: none"> ○ LE strength >90% of contralateral ○ Hop tests > 90% of contralateral ○ No pain/discomfort after activity ○ Completion of sport specific program ○ Physician clearance