



HUDSON PRO ORTHOPAEDICS & SPORTS MEDICINE

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Rehabilitation Guidelines for Patellar Tendon Repair

The rehabilitation guidelines are presented in a criterion based progression program. General time frames are given for reference to the average, but 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.

PHASE I (Surgery to 2 weeks post op)

APPOINTMENTS	Meet with physician at 1-2 weeks post op Begin physical therapy 3-5 days after surgery
REHAB GOALS	1. Protection of the post-surgical repair
PRECAUTIONS	1. Continuous use of the dial brace locked in extension and crutches for TDWB for ambulation. Brace must be worn and locked at all times other than when performing rehabilitation exercises 2. Follow range of motion guidelines 3. Keep the incision and sutures dry
RANGE OF MOTION	0-50 degrees of passive knee motion, unless specifically stated otherwise by the physician
THERAPEUTIC EXERCISE	Ankle pumps, isometric quad sets, ham sets, glut sets
CARDIOVASCULAR EXERCISE	Upper body circuit training or UBE
PROGRESSION CRITERIA	2 weeks post op

PHASE II (begin 2-6 weeks post op)

APPOINTMENTS	Meet with physician at 4 weeks post op Physical therapy 1x week
REHAB GOALS	1. Normalize gait with WBAT using the brace locked in extension. The need for crutches will be determined by the therapist and physician based on your progress 2. Protection of the post-surgical repair

PRECAUTIONS	<ol style="list-style-type: none"> 1. Continuous use of the brace locked in extension and crutches for ambulation. Brace must be worn and locked at all times other than when performing rehabilitation exercises 2. Follow range of motion
RANGE OF MOTION	0-90 degrees of knee motion without active quad extension, unless specifically stated otherwise by the physician
SUGGESTED THERAPEUTIC EXERCISE	<ul style="list-style-type: none"> • Heel Slides • Knee extension range of motion with foot resting on a towel roll • 4 way leg lifts with brace locked in extension • Gentle patellar mobilizations
CARDIOVASCULAR EXERCISE	Upper body ergometer or upper extremity circuit training
PROGRESSION CRITERIA	<ol style="list-style-type: none"> 1. 6 weeks post-op 2. Knee ROM = 0 – 0 - 90 degrees

PHASE III (begin 6-8 weeks post op)

APPOINTMENTS	Meet with physician at 8 weeks post op Physical therapy 1 x week
REHAB GOALS	<ol style="list-style-type: none"> 1. Normalize gait on level surfaces using brace opened to 30-40 degrees without crutches 2. Initiate active quadriceps contractions in weight bearing
PRECAUTIONS	<ol style="list-style-type: none"> 1. Avoid weight bearing flexion 2. ROM limits
SUGGESTED THERAPEUTIC EXERCISE	<ul style="list-style-type: none"> • AROM for open chain knee flexion and extension • Closed chain quad control from 0-40 degrees with light squats and leg press • Prone knee flexion • Stationary bike • Patellar mobilizations
CARDIOVASCULAR EXERCISE	Upper body ergometer or upper extremity circuit training
PROGRESSION CRITERIA	<ol style="list-style-type: none"> 1. Normal gait mechanics without the brace on all surfaces. 2. Knee ROM = 0 – 0 - 90 degrees

PHASE IV (begin at 8 weeks and continue until progression criteria is met)

APPOINTMENTS	Meet with the physician at 12 weeks post op Physical therapy 1 x every week
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REHAB GOALS	<ol style="list-style-type: none"> 1. Normalize gait on all surfaces without brace 2. Single leg stand with good control for 10 seconds 3. Full knee ROM 4. Good control with squat to 45 degrees
PRECAUTIONS	<ol style="list-style-type: none"> 1. Avoid any forceful eccentric contractions 2. Avoid impact activities 3. Avoid exercises that create movement compensations
SUGGESTED THERAPEUTIC EXERCISE	<ul style="list-style-type: none"> • Non-impact balance and proprioceptive drill • Stationary bike • Gait drills • Hip and core strengthening • Stretching for patient specific muscle imbalances • Quad strengthening – closed chain exercises short of 60 degrees knee flexion. Functional movements (squat, step back, lunge) • Hip and core strengthening
CARDIOVASCULAR EXERCISE	Stationary Bike, Stair Master, Swimming
PROGRESSION CRITERIA	<ol style="list-style-type: none"> 1. Normal gait mechanics without the brace on all surfaces 2. Squat and lunge to 70 degrees knee flexion without weight shift 3. Single leg stand with good control for 10 seconds 4. Full AROM for knee flexion and extension

PHASE V (begin after meeting Phase IV criteria ~ 4 months)

APPOINTMENTS	Meet with physician at 18-20 weeks post-op Physical therapy 1 x every 1-2 weeks
REHAB GOALS	1. Good control and no pain with sports and work specific movements, including impact
PRECAUTIONS	<ol style="list-style-type: none"> 1. Post activity soreness should resolve within 24 hours 2. Avoid post activity swelling 3. Avoid running with a limp
SUGGESTED THERAPEUTIC EXERCISE	<ul style="list-style-type: none"> • Impact control exercises beginning 2 feet to 2 feet, progressing from 1 foot to other and then 1 foot to same foot • Movement control exercise beginning with low velocity, single plane activities and progressing to higher velocity, multi-plane activities • Sports/work specific balance and proprioceptive drills • Hip and core strengthening • Stretching for patient specific muscle imbalances
CARDIOVASCULAR	Replicate sport or work specific energy demands

EXERCISE	
RETURN TO SPORT/WORK CRITERIA	1. Dynamic neuromuscular control with multi-plane activities, without pain or swelling