Achilles Tendon Rupture Non-Operative Rehabilitation Protocol

0-2 weeks
Posterior slab/splint; non-weight-bearing with crutches

2-4 weeks
- Aircast walking boot with 2-cm heel lift*†
- Protected weight-bearing with crutches
- Active plantar flexion and dorsiflexion to neutral, inversion/eversion below neutral
- Modalities to control swelling
- Knee/hip exercises with no ankle involvement; e.g., leg lifts from sitting, prone, or side-lying position
- Non-weight-bearing fitness/cardiovascular exercises; e.g., bicycling with one leg, deep-water running
- Hydrotherapy (within motion and weight-bearing limitations)

4-6 weeks
Weight-bearing as tolerated*†
Continue 2-4 week protocol

6-8 weeks
- Remove heel lift
- Weight-bearing as tolerated*†
- Dorsiflexion stretching, slowly
- Graduated resistance exercises (open and closed kinetic chain as well as functional activities)
- Proprioceptive and gait retraining
- Modalities including ice, heat, and ultrasound, as indicated
- Fitness/cardiovascular exercises to include weight-bearing as tolerated; e.g., bicycling, elliptical machine, walking and/or running on treadmill, StairMaster
- Hydrotherapy

8-12 weeks
- Wean off boot
- Return to crutches and/or cane as necessary and gradually wean off
- Continue to progress range of motion, strength, proprioception

>12 weeks
- Continue to progress range of motion, strength, proprioception
- Retrain strength, power, endurance
- Increase dynamic weight-bearing exercise, include plyometric training
- Sport-specific retraining

*Patients are required to wear the boot while sleeping.

†Patients can remove the boot for bathing and dressing but are required to adhere to the weight-bearing restrictions according to the rehabilitation protocol.