Achilles Tendinopathy/Calf Strain Exercises

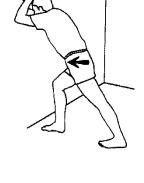
STRETCHING

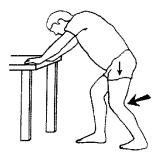
Standing Gastrocnemius Stretch

- Standing in front of a wall, place both hands on the wall, and step back with the leg you are planning to stretch, keeping the other supporting leg forward and bent at the knee.
- Turn the foot of your stretching leg inward (so that your toes are pointing at the wall in front of your supporting leg). Keep the stretching leg's heel on the floor.
- Slowly lean forward and feel the gentle stretch in the back of your calf.
- Hold the stretch for 15-30 seconds.
- Relax and take a deep breath. This is one repetition.
- Do several sets of 3 repetitions for each leg, a day.

Standing Soleus Stretch

- This exercise is performed the same way as the standing calf stretch above, except you keep the stretching leg's knee slightly bent.
- You will feel the stretch in a different area in the back of your calf.
- Once again, it is important to keep the stretching leg's heel to the floor and foot turned slightly inward.





STRENGTHENING

Heel Raise

- While standing behind a chair, table, or in front of a wall for support, slowly contract the muscles in your calves and go up on your toes, raising your heels off the ground as far as you can.
- Hold this position for 5-10 seconds.
- Slowly lower your heels back to the starting position, relax, and take a deep breath. This is one repetition.
- Do 3 sets of 10 repetitions a day.
- If this exercise becomes too easy, you can do the exercise with the balls of your feet on a bottom step and your heels off of the step. You may also perform the exercise on one single leg at a time, to make the exercise more challenging.

Single Leg Balance

- Stand and try to balance on the exercising leg without any support (keep a chair next to the non-exercising leg to use for balance as needed).
- Hold this position for 30 seconds, then relax and take a deep breath. This is one repetition.
- Do 2 sets of 3 repetitions for each leg, every day.
- Once the exercise becomes easier to do with the exercising foot flat on the floor, try lifting the heel slightly off the floor
- Also, do this exercise with your eyes open at first. As it gets easier, try the exercise with your eyes closed.
- Once that gets easier, do this exercise while standing on a folded towel or pillow.

Hopping/Jumping

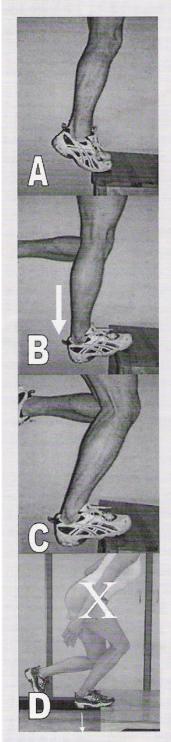
- Once you can do the above exercises without much of a problem, try hopping (initially on both legs, then later only on one leg) across the room and back. Then repeat the exercise using the other leg. This is one repetition.
- Do 2 sets of 3 repetitions for each leg every day.
- Make sure that the path you are taking is free of obstacles or loose carpeting or rugs.
- Once the exercise becomes easier, perform the exercise jumping as high as you can each time you move forward, as opposed to just hopping.
- Make sure that you land softly, bending at both the ankle and knee. Avoid landing hard onto your feet and heels.

Excerpted from the premier patient guide to sports injuries, *100 Questions & Answers About Your Sports Injury*. Howard TM, **Ho GWK**, Lewis J. 100 Questions & Answers About Your Sports Injury. Sudbury: Jones and Bartlett Publishers 2008.









Heel Drop Exercises for Achilles Tendinopathy

Exercise 1:

- 1. Wearing good shoes that have minimal flexibility in the sole, stand on the edge of a step and let your heels hang off.
- 2. Using both legs, push up onto your toes (Figure A).
- 3. Lift your left foot up so that you stand on the toes of your right foot only. Keep your right knee straight.
- 4. Using only your right leg, slowly lower your heel towards the ground (Figure B). Be sure to lower yourself in a controlled fashion.
- 5. Replace your left foot onto the step. Push up with both legs to return to starting position (Figure A). Perform 15 repetitions with the right leg.
- 6. Repeat the above using the left leg. Perform two sets of 15 repetitions for both the right and left legs.

Exercise 2:

- 1. Stand on the step again, up on your toes (Figure A), and lift your left foot up.
- 2. Lower your heel to the ground slowly using only your right leg, but this time keep your right knee bent (Figure C).
- 3. Perform 15 repetitions with the right leg and then repeat with the left leg. Perform two sets of 15 repetitions for both right and legs.

Tips:

Maintain good alignment. Keep your knees, hips, and ankles positioned with one over the other. Avoid excessive trunk flexion (Figure D).

Your legs will be sore. This is actually good; it's part of the healing process. In a couple of weeks you will notice that your legs are not sore anymore after performing the exercises. When this happens, you'll want to increase the resistance by using a weight sled in the gym, putting weights in a backpack, or holding weights (this will make your legs sore again).

During the first four to six weeks of exercises, you should not run or play sports. During the last four to six weeks, your doctor may allow you to return to some of these activities.