CONDITION

Achilles tendinitis

Learn how Achilles tendinitis causes heel and tendon pain, how it is diagnosed, and how activity changes and progressive exercise can support recovery.

WHAT IT IS
Pain and irritation of the Achilles tendon

BODY SYSTEM
Muscles, bones and joints

MAIN SYMPTOMS
Heel or tendon pain, morning stiffness, swelling or thickening, reduced calf strength

WHAT CAUSES IT
Repeated tendon strain

HOW IT IS DIAGNOSED
Clinical examination, ultrasound or MRI if needed

MAIN TREATMENT
Activity adjustment and progressive strengthening

CAN IT BE CURED?
Sometimes - many improve with planned rehabilitation

IS IT AN EMERGENCY?
Sometimes - sudden pop or inability to stand on toes

LONG-TERM OUTLOOK
Recovery often takes weeks to months

Overview

Achilles tendinitis is pain and irritation involving the Achilles tendon, the strong band of tissue that connects the calf muscles to the heel bone. The tendon helps lift the heel when you walk, run, climb stairs, and jump.

Although "tendinitis" suggests inflammation, ongoing Achilles pain often involves changes in the tendon's structure rather than inflammation alone. Health professionals may call this Achilles tendinopathy . The terms are often used interchangeably in patient information.

There are two main patterns. Midportion Achilles tendinopathy affects the tendon a short distance above the heel. Insertional Achilles tendinopathy affects the area where the tendon attaches to the heel bone. These patterns can cause similar symptoms, but some exercises and footwear changes may need to be adjusted according to the location of the pain.

Achilles tendinitis often develops after the tendon is exposed to more strain than it can currently tolerate. A sudden increase in running, jumping, hill training, or sports practice is a common trigger. It can also occur in people who are not highly active.

The condition matters because tendon pain can limit walking, work, exercise, and sport. Recovery is often gradual. Many people improve without surgery, but the tendon usually needs a planned program of activity adjustment and progressive strengthening rather than complete rest alone.

Symptoms

Symptoms may begin gradually or appear after a change in activity. Pain is commonly worse during the first steps after getting out of bed or after sitting for a long time. The tendon may loosen as you move, then become sore again during or after activity.

Common symptoms include:

Some people notice a firm swelling or enlarged area in the tendon. In insertional tendinopathy, a bony prominence at the back of the heel may also rub against footwear.

A complete Achilles tendon rupture is different from tendinitis. It may cause a sudden pop or snapping sensation, sharp pain, and difficulty pushing off the foot or standing on the toes. Seek urgent medical assessment if these symptoms occur, even if the pain later becomes less severe.

Prompt medical care is also appropriate for rapidly increasing redness, warmth, swelling, drainage, or fever. These symptoms are not typical of uncomplicated Achilles tendinitis and may suggest infection or another problem.

Call emergency services for chest pain, sudden shortness of breath, fainting, or coughing up blood. These symptoms are not caused by routine tendinitis and require emergency evaluation.

- Pain, tenderness, or burning along the tendon or at the back of the heel
- Morning stiffness around the ankle and tendon
- Pain during running, jumping, climbing stairs, or walking uphill
- Swelling or thickening of the tendon
- Reduced ankle movement or calf strength
- Discomfort when shoes press against the back of the heel
- Symptoms that worsen after an increase in exercise intensity or distance

Causes and risk factors

The Achilles tendon responds to physical activity by adapting and becoming stronger. Problems can develop when the amount or intensity of loading increases faster than the tendon can adapt. Repeated strain may then affect the tendon's fibers and its ability to handle force.

Training-related triggers can include suddenly increasing running distance, adding speed sessions, returning to sport after a break, or doing more uphill activity. A change in playing surface, footwear, or job demands may also contribute.

Other factors associated with Achilles tendon problems include:

These factors do not mean that a person will develop tendinitis. Often, several factors are present at the same time.

Certain medicines can affect tendon health. Fluoroquinolone antibiotics, such as ciprofloxacin and levofloxacin, carry warnings about tendinitis and tendon rupture. Risk may be greater in some people, including older adults and those using corticosteroid medicines. If tendon pain begins while taking a fluoroquinolone, contact the prescribing clinician promptly for instructions.

Corticosteroid injections into or near the Achilles tendon may weaken it and increase rupture risk. This is different from taking every form of corticosteroid like prednisone or hydrocortisone for another medical condition. Do not stop a prescribed medicine without discussing it with the clinician responsible for your care.

- Tight or weak calf muscles
- Reduced ankle movement
- Previous Achilles or lower-limb injury
- Running and sports that involve repeated jumping or quick changes of direction
- Middle age, although the condition can occur at any age
- Higher body weight, which may increase the load on the tendon
- Health conditions such as diabetes, inflammatory arthritis, or high cholesterol
- Footwear that presses on the tendon or does not suit the activity

Diagnosis

A clinician usually diagnoses Achilles tendinitis by asking about symptoms, activity changes,

medical conditions, and medicines. The examination may include checking where the tendon hurts, whether it is thickened, how the ankle moves, and how well the calf muscles work.

You may be asked to walk, rise onto your toes, or perform another movement that loads the tendon. The clinician may also squeeze the calf while watching for foot movement. This helps assess whether the Achilles tendon could be ruptured.

Imaging is not always needed when the history and examination are typical. An ultrasound can show tendon thickening, tears, and changes in tendon structure. Magnetic resonance imaging, or MRI, provides more detailed images and may be used when the diagnosis is uncertain, symptoms are not improving as expected, or surgery is being considered.

An X-ray does not show the tendon well, but it can identify bone spurs, calcium deposits, arthritis, or other bone-related causes of heel pain.

Other conditions can resemble Achilles tendinitis. These include bursitis, which is irritation of a small fluid-filled sac near the heel; a partial tendon tear; heel-bone stress injury; nerve irritation; and pain referred from another area. Examination helps distinguish among these possibilities.

Treatment and management

Treatment aims to reduce painful overload while gradually improving the tendon's strength and ability to handle activity. Management should account for the location of the pain, the person's goals, and other health conditions.

Complete rest is usually not the long-term solution. Instead, a clinician or physical therapist may recommend temporarily reducing or changing activities that strongly provoke symptoms. Running might be replaced for a time with lower-impact exercise, such as cycling or swimming, if those activities are comfortable. Everyday movement is often continued within tolerable limits.

Progressive tendon-loading exercise is a central treatment for midportion Achilles tendinopathy. Programs commonly include calf raises or similar exercises that load the tendon. The resistance, movement speed, and training volume are increased gradually. Some programs emphasize lowering the heel slowly, known as eccentric exercise , while others use both the lifting and lowering phases.

Exercise for insertional symptoms may need modification. Dropping the heel below the level of a step can compress the tendon against the heel bone and may worsen pain in this area. A physical therapist can help select an appropriate starting position and progression.

Pain during rehabilitation does not always mean that damage is occurring. However, pain that is severe, causes limping, or remains clearly worse afterward may indicate that the load needs

adjustment. A clinician can provide a practical pain-monitoring plan.

Additional measures may include:

Over-the-counter pain medicines may provide short-term relief, but they do not restore tendon strength. Nonsteroidal anti-inflammatory drugs like ibuprofen or naproxen , or NSAIDs, are not suitable for everyone and can affect the stomach, kidneys, heart, or other medicines. A pharmacist or clinician can help determine whether a pain medicine is appropriate.

Extracorporeal shockwave therapy uses sound waves directed at the painful area. It may be considered for some persistent cases, particularly when exercise-based care has not been enough. Evidence and availability vary.

Research has not shown consistent benefit from platelet-rich plasma injections for Achilles tendinopathy. Corticosteroid injections around the Achilles tendon are generally approached cautiously because of the risk of tendon weakening and rupture.

Surgery is usually reserved for symptoms that remain disabling after a sustained course of nonsurgical treatment. The procedure depends on the problem and may involve removing damaged tendon tissue, addressing a bony prominence, or repairing the tendon. Recovery can take months, and surgery has risks such as infection, wound problems, nerve injury, and continued pain.

- Supportive shoes that do not rub the painful area
- A temporary heel lift to reduce strain in selected cases
- Ice for short-term comfort after activity
- Physical therapy to address calf strength, ankle movement, and return-to-sport planning
- A gradual warm-up and phased return to running or jumping

Complications

Persistent pain can reduce activity and lead to calf weakness or difficulty returning to work and sport. The tendon may remain thickened even after pain and function improve. Structural changes on a scan do not always match the severity of symptoms.

A partial or complete tendon rupture is a more serious complication. A rupture can occur without known tendinitis, but a painful or weakened tendon may be more vulnerable. Sudden forceful movement is a common setting.

Changing the way you walk to avoid pain can also contribute to discomfort elsewhere, including the foot, knee, hip, or back. A gradual rehabilitation plan can help restore a more

normal movement pattern.

Complications after surgery may include infection, delayed wound healing, scarring, nerve symptoms, blood clots, or another tendon injury. A surgeon should explain the expected benefits and risks before a procedure.

Follow up

Routine follow-up is appropriate if pain interferes with normal walking, work, sleep, or exercise; keeps returning; or does not begin to improve with sensible activity changes. Earlier review may be needed for people with diabetes, inflammatory disease, poor circulation, or a history of tendon rupture.

Recovery often takes weeks to months because tendons adapt slowly. Progress may not be steady. Temporary symptom increases can happen when exercise or activity is advanced too quickly.

Follow-up visits may focus on calf strength, ankle movement, morning stiffness, walking ability, and tolerance of exercise. Return to sport should usually be based on function rather than time alone. Running and jumping loads are generally reintroduced in stages.

Seek urgent assessment for a sudden pop, new weakness when pushing off, inability to stand on the toes, or a rapid change in the tendon's shape. Prompt review is also needed for spreading redness, marked warmth, fever, or an open wound near the tendon.

Sources

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