

Simple pain-killers such as paracetamol or anti-inflammatory medicines can help reduce the pain. Ask advice from your doctor or pharmacist before taking anti-inflammatory medicines as they can have troublesome side-effects in some people.

The simple measures above will help the majority of people with heel pain. If the pain continues, a splint to wear on your ankle at night to prevent your Achilles tendon and plantar fascia tightening up while you sleep is often very effective in improving the severe pain that many people get first thing in the morning. Your surgeon may offer to inject some cortisone into the attachment of the plantar fascia to damp down the inflammation. These measures will reduce the pain in most people who are not helped by simple treatment.

If you still have pain after one or two injections, your surgeon may want to investigate your problem a bit further. If no other medical problem or cause of stress in your heel is found, a number of other treatments can be tried:

Physiotherapy.

Wearing a plaster cast to rest the inflamed tissues.

Pain control treatments such as transcutaneous nerve stimulation (TENS) or acupuncture.

#### WILL I NEED SURGERY?

Only if all non-surgical treatments fail would an operation be considered. It is rare to need an operation for heel pain. It would only be offered if all simpler treatments have failed and, in particular, you are a reasonable weight for your

height and the stresses on your heel cannot be improved by modifying your activities or footwear.

The aim of an operation is to release part of the plantar fascia from the heel bone and reduce the tension in it. Many surgeons would also explore and free the small nerves on the inner side of your heel as these are sometimes trapped by bands of tight tissue. This sort of surgery can be done through a cut about 3cm long on the inner side of your heel. Recently there has been a lot of interest in doing the operation by keyhole surgery, but this has not yet been proven to be effective and safe. Most people who have an operation are better afterwards, but it can take months to get the benefit of the operation and the wound can take a while to heal fully.

#### WILL I HAVE TO GIVE UP SPORT?

You may need to reduce your sport for a while to allow your tendon to heal. Some people who have surgery will not get enough tendon strength or flexibility to allow them to return to running or sport.



Plantar Fasciitis

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Sport and Orthopaedic Clinic Limited  
BUPA Hospital Bristol, 3 Redland Hill  
Bristol, BS6 6UT  
Phone 0044 (0)117 3171796  
Fax 0044 (0)117 973 8678

# PLANTAR FASCIITIS

## INTRODUCTION

The function of the heel in walking is to absorb the shock of your foot striking the ground as it is put down and to start springing you forward on the next step. It contains a strong bone (the calcaneum). Under the bone are a large number of small pockets of fat in strong elastic linings, which absorb much of the shock (fat pads). The heel is attached to the front of the foot by a number of strong ligaments which run between the front part of the calcaneum and various other parts of the foot. The strongest ligament is the plantar fascia, which attaches the heel to the toes and helps to balance the various parts of the foot as you walk. It therefore takes a lot of stress as you walk.

In some people the plantar fascia becomes painful and inflamed. This usually happens where it is attached to the heel bone, although sometimes it happens in the mid-part of the foot. This condition is called plantar fasciitis. This condition is usually due simply to constant stress, and is therefore commoner in people who spend all day on their feet or are overweight. Stiffness of the ankle or tightness of the Achilles tendon increase the stresses on the heel. Most people with plantar fasciitis have a rather tight Achilles tendon.

People who have high-arched ("cavus") feet or flat feet are less able to absorb the stress of walking and are at risk of plantar fasciitis. Sometimes it starts after an injury to the heel like a fall from a ladder. People who have a rheumatic condition such as rheumatoid arthritis or ankylosing spondylitis may get inflammation anywhere a ligament is attached to bone (enthesopathy), and plantar fasciitis in these people is part of their general condition.

Usually plantar fasciitis eventually gets better itself, but this can take months or even years. If you have it once you are more likely to get it again.

## HOW DO I KNOW I HAVE A TEAR?

You GP may have arranged an x-ray and told you that you have a bone spur. The bone spur you have is a symptom but not the cause of your problem. Near the plantar fascia attachment the fascia has torn and inflamed. Near, but not at the tear, some extra bone may form producing a small "spur". In fact, it is a shelf of bone, not a sharp spur. These "heel spurs" are more common in people with plantar fasciitis, but they can be found in people with no heel pain. The heel spur is caused by the same process as the heel pain, but the spur is not itself the cause of the pain.

## CAN I TREAT IT?

You can try to avoid the things that cause heel pain to start: Avoid getting overweight where your job allows, minimise the shock to your feet from constant pounding on hard surfaces. Reduce the shocks on your heel by choosing footwear with some padding or shock-absorbing material in the heel. If you have high-arched feet or flat feet a moulded insole in your shoe may reduce the stresses on your feet. If you have an injury to your ankle or foot, make sure you exercise afterwards to get back as much movement as possible to reduce the stresses on your foot and your heel in particular. If you start to get heel pain, doing the above things may enable the natural healing process to get underway and the pain to improve.

As heel pain is basically a stress problem in the tissues of the heel, the



main treatment is to reduce stress. Your doctor will advise you about weight loss and appropriate footwear.

A soft heel pad is useful to wear in your shoe to act as a shock-absorber when you walk. Some surgeons advise a bigger insole with a medial arch support. If you have a high-arched or flat foot, your surgeon might recommend a podiatrist build a custom insole to reduce stress.

If you have a stiff ankle or tight Achilles tendon a physiotherapist can advise on exercises for these. Stretching the Achilles tendon and plantar fascia is very effective general treatment for many patients.

