Tibialis Posterior Tendon Reconstruction

What is the tibialis posterior tendon?

The tibialis posterior tendon serves as one of the major supporting structures of the foot, helping it to function while walking. Sometimes this tendon can become overstretched or inflamed leading to a progressively flat foot. There are several names for this type of condition such as, tibialis posterior tendon dysfunction, adult acquired flatfoot deformity and tibialis posterior insufficiency. These terms all describe the same condition.

How is the reconstruction done?

You will be admitted on the day of operation. The operation takes about 1½ to 2 hours and is done under a general anaesthetic or a spinal anaesthetic. This generally involves an osteotomy of the heel bone (Calcaneum) and a tendon transfer (Flexor Digitorum Longus – FDL – tendon of the foot) to the Navicular bone (small bone at the top of the foot). Not infrequently, additional procedures may be required including calf muscle lengthening or osteotomy of a midfoot bone (Cuneiform/Metatarsal).

The operation is done through several incisions (cuts) – one on the outer side of the heel to cut the heel bone and another on the inner side of the ankle to remove the damaged tendon and to do a tendon transfer. Further incisions may be required for additional procedures. A cut is made in the heel bone; the cut bone is moved inwards and fixed with one screw/plate. The damaged tendon is removed and another tendon (FDL) is attached to the navicular bone through a drill hole or secured using a bone anchor. The wound is closed with dissolvable stitches. Your foot will be protected in a below-knee backslab.

You will be kept in overnight for pain management and elevation. You will be assessed by a physiotherapist before leaving hospital.

After the operation

It is important to keep the leg elevated as much as possible especially for the first 2 weeks. You will usually be able to go home when you feel ready. You will need to arrange for someone to drive you home.

You will be non-weight bearing on the operated leg for a period of 6 weeks and have a below-knee cast / boot for that duration to protect the foot. After 6 weeks, you will be placed in a boot for a further 3 – 4 weeks and you may start gradual weightbearing. Your first clinic follow-up is usually 12 to 14 days after surgery.

Wound care – The backslab should be kept dry. At yours fist clinic appointment, would inspection and suture removal would be undertaken.

Work - If you have a sedentary job you should be able to return to work within 2 weeks (if you can arrange safe transport). If your job is physical, you may need to stay off work until the boot / cast is removed.

Recovery - Your ankle will continue to improve up to 12 months following surgery. Intermittent swelling and aches are common in the initial phase of recovery.

What risks are there involved in the procedure?

- Infection
- Nerve damage – causing numbness and painful scar
- Deep vein thrombosis (DVT) and pulmonary embolism (PE) – blood clots in the vein or lungs
- Non / Delayed union of bone osteotomy
- Reconstruction failure
- Prolonged swelling and stiffness
- Prolonged recovery
- Residual pain and deformity

It is beyond the scope of this document to identify all the most extreme (less than one in a thousand) risks that you might be prone to but we will be very happy to discuss any worries about specific concerns and also about any family history or your own personal history of problems in the past which are much more relevant. If there is anything you do not understand or if you have any questions or concerns, please feel free to discuss them with us.

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