

Trauma & Orthopaedics

Extracorporeal shockwave therapy (ESWT)

Extracorporeal shockwave therapy is a treatment that uses shock waves to treat chronic painful conditions of the musculoskeletal system. The shock waves are created outside the body. One area most frequently treated with Extracorporeal shockwave therapy is the foot/ankle.

A shock wave is an intense but short energy wave that travels faster than the speed of sound. It goes through the skin to the injured area and works by stimulating certain body parts, helping them heal faster. In addition to helping with healing process, the extracorporeal shockwave therapy also seems to directly affect nerves, which can reduce pain.

The shock waves used are mechanical, not electric and are created outside the body. Overall, it is a very low-risk procedure.

Why am I being offered Extracorporeal shockwave therapy?

Extracorporeal shockwave therapy is offered to patients who have not responded as expected to other treatments such as painkillers, rest, ice therapy, physiotherapy or steroid injections. The benefit of the extracorporeal shockwave therapy is that it can offer relief from pain and other symptoms. Studies have shown the treatment can help 50-70 out of every 100 people treated.



Patient Information

In the foot and ankle, extracorporeal shockwave therapy has been used to treat the following conditions:

- Plantar fasciitis
- Achilles tendonitis

It can also be used to treat other conditions elsewhere in the body.

What are the risks?

Most patients may feel some discomfort during the treatment, but it is usually tolerable. It is advisable to take mild painkillers such as paracetamol and/or codeine. If you don't have any contraindications to taking these medicines than take them around half an hour before the procedure.

After the treatment, you may experience redness, bruising, swelling and numbness in the area, but these effects are rare and should resolve within a week. There is a very small risk of tendon or ligament rupture and damage to the soft tissue.

When can't you use Extracorporeal shockwave therapy ?

You **must not** have extracorporeal shockwave therapy if you:

- Are pregnant
- Are taking anti-platelet medication, such as aspirin or clopidogrel
- Are taking anticoagulants medication such as warfarin or rivaroxaban)
- Have a blood clotting disorder
- Are under the age of 18
- Have been diagnosed with bone cancer
- Have a cardiac pacemaker or other cardiac device
- Have an infection in your foot
- Have a history of previous tendon or ligament rupture
- Have had steroid injections in the previous 12 weeks

These contraindications will already have been discussed with you by your consultant or healthcare professional.

Are there any other options?

Extracorporeal shockwave therapy is offered only after other conservative methods have not been successful. If extracorporeal shockwave therapy fails, an operation may be available, but this will be discussed with you at a review appointment after the treatment.

How do I prepare for Extracorporeal shockwave therapy?

Extracorporeal shockwave therapy is a minimally invasive treatment carried out in the outpatient department. You won't need to remain overnight in hospital. You must make sure that you are available for a course of 3 treatments, 1 week apart. You can eat and drink normally before the treatment. Do not take anti-inflammatory drugs such as Ibuprofen for 2 weeks before your treatment and do not take any during your treatment.

Consent to treatment

Please make sure that you have read this leaflet before the treatment. If you decide to proceed with the treatment, you will be asked to sign a consent form. This confirms you understand what the treatment involves, including any risks and benefits. Please let your consultant know if you have any questions or would like any further information.

Who will perform the procedure?

- foot and ankle consultant
- orthopaedic associate specialist
- advanced nurse practitioner
- physiotherapist

All of whom have undertaken specialist training to carry out the procedure.

What happens during Extracorporeal shockwave therapy?

You will have your treatment at the orthopaedic outpatient's department. You will be asked to lie on your front on the couch. Ultrasound gel will be placed on the skin over the injured area and the hand piece of the extracorporeal shockwave therapy device will be placed on this. The shock wave is then delivered via the handheld transducer using the gel as a conductive medium. The gel allows a tight bond between the skin and the

Patient Information

device allowing the waves to transmit to the tissues beneath. The waves are audible. If you experience severe discomfort during the treatment, please inform the health professional performing the procedure. They will be able to adjust the energy level to manage this or stop if you cannot tolerate it. The discomfort will stop at the end of the procedure. Each treatment takes around 3 - 4 minutes.

What happens after the treatment?

After the treatment, you will be able to get up and walk right away. If you feel any discomfort, you can take mild painkillers to feel better. Avoid anti-inflammatory medication or using ice packs as they can slow down the healing process. You can go back to your normal routine, including work right after the treatment. We advise you not to undertake any strenuous or high impact activity for 48 hours after the procedure. You will be offered a follow up appointment about 12 weeks after your final session.

If you experience severe pain or any loss of function after the treatment, please contact your GP or attend the nearest A&E department.

How fast does Extracorporeal shockwave therapy work?

Many patients feel better right after the treatment, but this improvement might only last for a short time. It's like the area is numb from the treatment. It takes several days for the injuries to start healing, but many patients see an improvement before the end of the second week. However, it can take weeks or even months for the healing process to finish.

Ensuring effectiveness

The National Institute for Health and Care Excellence (NICE) would like to check how well this treatment works. Therefore, every patient will be monitored before and after receiving Extracorporeal shockwave therapy. To help with this, we need you to fill a questionnaire before your treatment begins. You will be contacted at a later date after your treatment to complete a second questionnaire.

Patient Information

Contact us

If you have any questions or concerns regarding Extracorporeal shockwave therapy, please contact please contact one of the secretaries below:

Mr Dhukaram's secretary, Jas Viridi: 024 7696 5095

Mrs Chapman's secretary, Amber Jolliffe 024 7696 7117

The Trust has access to interpreting and translation services. If you need this information in another language or format, please ask and we will do our best to meet your needs.

The Trust operates a smoke free policy.

Did we get it right?

We would like you to tell us what you think about our services. This helps us to make further improvements and to recognise members of staff who provide a good service.

Have your say. Scan the QR code or visit:

www.uhcw.nhs.uk/feedback



Document History

Department: Trauma & Orthopaedics

Contact: 25091

Updated: April 2024

Review: April 2027

Version: 3

Reference: HIC/LFT/2061/16