

Tibial nerve stimulation for chronic pelvic pain. Is this non-invasive technique the right way?

Massimiliano Raggi

Pain Therapy Center, Rovereto, Italy

Percutaneous Tibial Nerve Stimulation was evaluated in one young patient suffering with chronic pelvic pain.

For the percutaneous technique, the device is inserted using a designated delivery system (Figure 1) and is positioned under ultrasound guidance (Figure 2) [1].

The device is wirelessly powered by an external control unit that controls all the electro-stimulation parameters and is worn by the patient in the lower third region of the leg (Figure 3) [2].



Figure 1. Device, delivery system and wireless external control unit.

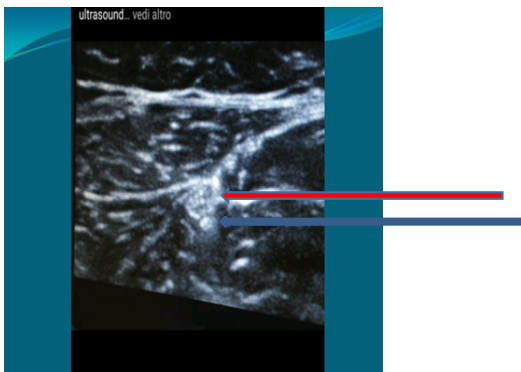


Figure 2. RED LINE: Posterior tibial Nerve, BLUE LINE: Lead.

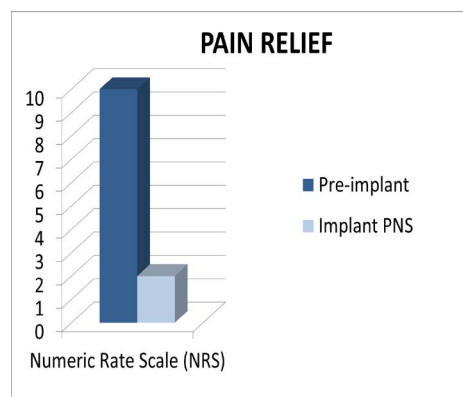


Figure 3. Placement of the device on the lower portion of the leg.

Effects were recorded by Visual Analogic Scale (VAS), for pain diary, the Health-related quality of life questionnaire and drug therapies at baseline and after 12 weeks of treatment.

Results

- VAS 10>2
- (HRQL) health-related quality of life low >high
- Drug therapies <50% (Graph 1).



Graph 1.

References

1. Peter KM, Carrico DJ, MacDiarmid SA, et al. Sustained therapies effects of percutaneous tibial nerve stimulation: 24-month results of the STEP study. *NeuroUrol Urodyn.* 2013; 32(1):24-9.
2. Deer T, Pope J, Benyamin R, et al. Prospective, multicenter, randomized, double-blinded, partial crossover study to assess the safety and efficacy of a novel neuromodulation system in the treatment of patients with chronic pelvic pain of peripheral nerve origin. *Neuromodulation* 2016; 19(1):91-100.

*Correspondence to:

Massimiliano Raggi
Pain Therapy Center
Rovereto
Italy
Tel: +390461904172-848806806
E-mail: massimilianoraggi@libero.it