Clinical Research Study Abstract

This study evaluated the treatment efficacy and patient satisfaction of a new Hand Traction Device called C TRAC in patients that failed conservative therapy for Carpal Tunnel Syndrome (CTS). Patients were diagnosed with Electromyography and Nerve Conduction Studies (EMG/NCS). Only patients with a positive Phalen's test and a Visual Analog Pain Scale of more than 5/10 were eligible for the study. The patients had tried Non Steroidal Anti-Inflammatory Drugs (NSAIDS), Resting Hand Splint (RHS) during the night, Acupuncture, and/or hand therapy for a minimum of 4 months.

In order to test C TRAC as the sole treatment for Carpal Tunnel Syndrome, patients included in the study stopped all other forms of therapy. (NSAIDS, Hand Therapy, Acupuncture, Massage, Manipulations, cortisone injections). A group of 19 patients used C TRAC hand traction device for 5 minutes 3 times daily for 4 weeks. After the 4 week period the device was used as needed. The patients were followed up weekly for 4 weeks, then at 7 months.

Visual Analog Scale was used to assess pain, tingling, and numbness in the treated hand. The number of times patients woke up at night and satisfaction with the use of the device were also evaluated. The average VAS for pain decreased from 8.53 to 1.05. The average tingling decreased from 8.15 to 0.95. The average numbness decreased from 8.47 to 0.95. The average number of times patients woke up per night because of CTS symptoms decreased from 3.05 to 0.10. Patients showed significant improvement at 4 weeks and were maintained at 7 months follow up. Fifteen patients (79%) rated their treatment as excellent and 4 (21%) as good and none (0%) as fair or poor.

Clinical Relevance: This device is very effective and well tolerated in treatment of Carpal Tunnel Syndrome in patients that failed conservative therapy.

NOTICES: (see yellow sticker on device)
- C TRAC does not relieve the symptoms of osteoarthritis of the base of the thumb.
- DO NOT use C TRAC if you have had surgery on the hand to be treated.
- DO NOT use if you have osteoporosis.
- DO NOT expose C TRAC to extreme heat.
- DO NOT use C TRAC if you have suffered a hand or wrist fracture.
- DO NOT use C TRAC if you have a hand or wrist deformity of the hand being treated.
- If you do not know if you have any of the above conditions, precluding you from using C TRAC, contact your physician prior to use.