

# NEWSLETTER



## CERVICOGENIC HEADACHE

This is the monthly newsletter for Waldron's Peak PT. The newsletters will be a way for us to let you know what is new with the clinic, and also keep you up to date on relevant and recent research regarding physical therapy and your health.

### Connect With Us



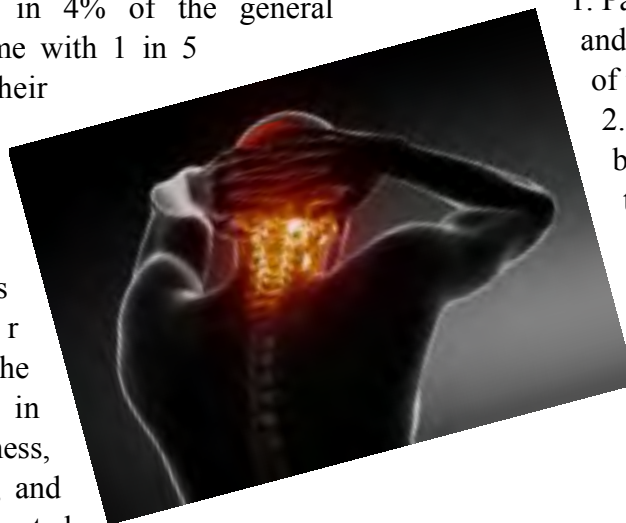
@WaldronsPeakPT



/WaldronsPeakPT

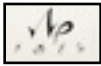
### Problem:

Headaches are a common and costly condition in the US with an estimated indirect cost of 31 billion dollars annually<sup>10</sup>. Cervicogenic headaches, headaches caused by the cervical spine or neck, can be found in 4% of the general population at any one time with 1 in 5 individuals describing their symptoms as severe<sup>11</sup>. The majority, but not all, of these individuals describe trauma including motor vehicle collisions as the cause of their symptoms. Frequently, the underlying impairments in the neck including weakness, coordination impairments, and loss of motion remain untreated leading to further symptoms and disability in this population. In particular, the upper cervical (C2/3) facet joints have been shown to be the source of 70% of cervicogenic headaches<sup>11</sup>.



The clinical diagnosis of cervicogenic headaches is made with the following criteria:

1. Pain that originates in the neck and radiates to the front and side of the head
2. Unilateral symptoms (may be bilateral but never occur together)
3. Symptoms radiate into the arm and shoulder on the same side
4. Provocation of pain by neck movement
5. History of neck pain

**Treatment:**

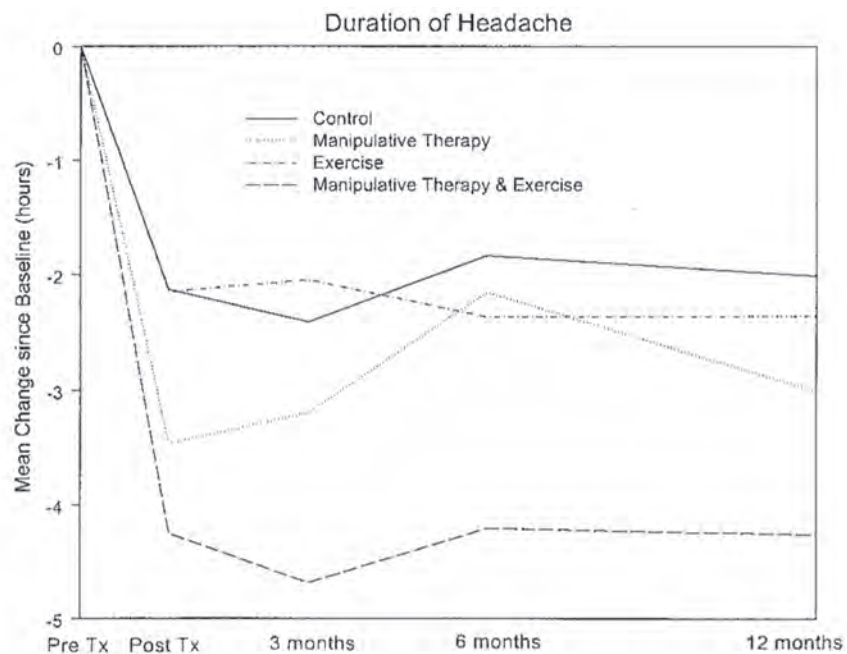
Physical Therapists' unique education and experience in manual therapy and exercise prescription make them an ideal treatment option for patients with cervicogenic headache. Clinicians utilize a multimodal approach with patients including thrust and non-thrust mobilizations of the cervical and thoracic spine (manual therapy) and low

load endurance exercise of the upper quarter musculature<sup>4</sup>. The combination of manual therapy and exercise has been shown to be more beneficial than primary care management, medications, modalities, or exercise alone in patients with neck pain, with or without headache<sup>1-3</sup>.

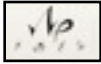
**Evidence:**

These effective treatments have been shown to be 1/3 the cost of Physical Therapy including exercise and modalities alone (\$1200) or primary care management (\$1300) over the course of one year<sup>7</sup>. Authors note 30% and 10% of patients treated with this approach experience a clinically important reduction in pain and resolution of headache symptoms, respectively, than would have occurred

with an alternate approach<sup>1,2,4</sup>. It is important to note the positive effects of these treatments are noted in both the short and long term. The beneficial effects of this treatment approach continue to be observed up to one and two years post treatment with higher patient satisfaction versus other treatment approaches<sup>2,4,5,6</sup>.

**Referral:**

In conclusion, cervicogenic headaches are a common and costly condition, but the first line treatment for these symptoms should include Physical Therapy with an emphasis on manual therapy and exercise. Patients whose headache symptoms include the aforementioned criteria should seek care from their Physical Therapist. If you or someone you know suffers from headaches, or symptoms, contact our staff at Waldron's Peak Physical Therapy.



## References:

1. Hoving JL, Koes BW, de Vet HC, et al. Manual therapy, physical therapy, or continued care by a general practitioner for patients with neck pain. A randomized, controlled trial. *Ann Intern Med* 2002;136(10):713-22.
2. Gross AR, Hoving JL, Haines TA, et al. A Cochrane review of manipulation and mobilization for mechanical neck disorders. *Spine* 2004;29(14):1541-8.
3. Koes BW, Bouter LM, van Mameren H, et al. The effectiveness of manual therapy, physiotherapy, and treatment by the general practitioner for nonspecific back and neck complaints. A randomized clinical trial. *Spine* 1992;17(1):28-35.
4. Jull G, Trott P, Potter H, et al. A randomized controlled trial of exercise and manipulative therapy for cervicogenic headache. *Spine* 2002;27(17):1835-43; discussion 43.
5. Bronfort G, Evans R, Nelson B, Aker PD, Goldsmith CH, Vernon H. A randomized clinical trial of exercise and spinal manipulation for patients with chronic neck pain. *Spine* 2001;26(7):788-97; discussion 98-9.
6. Evans R, Bronfort G, Nelson B, Goldsmith CH. Two-year follow-up of a randomized clinical trial of spinal manipulation and two types of exercise for patients with chronic neck pain. *Spine* 2002;27(21):2383-9.
7. Korthals-de Bos IB, Hoving JL, van Tulder MW, et al. Cost effectiveness of physiotherapy, manual therapy, and general practitioner care for neck pain: economic evaluation alongside a randomized controlled trial. *BMJ* 2003;326(7395):911-6.
8. Jull G, Trott P, Potter H, Zito G, Niere K, Shirley D, Emberson J, Marschner I, Richardson C. A Randomized Controlled Trial of Exercise and Manipulative Therapy for Cervicogenic Headache. *Spine*. 2002; 27(17):1835-1843.
9. Zito, G., Jull, G., Story, I. Clinical tests of musculoskeletal dysfunction in the diagnosis of cervicogenic headache. *Manual Therapy*. 2006; 11: 118-129.
10. Schwedt T, Shapiro R. Funding of Research on Headache Disorders by the National Institutes of Health. *Headache* 2009;49:162-169).
11. Bogduk N, Govind J. Cervicogenic headache: an assessment of the evidence on clinical diagnosis, invasive tests, and treatment. *Lancet Neurol* 2009; 8: 959-68