

ZUSAMMENSTELLUNG VON WISSENSCHAFTLICHE PUBLIKATIONEN ZUR WIRKUNG VON PULSIERNDER MAGNETFELD THERAPIE BEI MIGRÄNE

1998

Initial exploration of pulsing electromagnetic fields for treatment of migraine

Abstract

Two studies were conducted during which 23 patients with chronic migraine were exposed to pulsing electromagnetic fields over the inner thigh. In an open study, 11 subjects kept a 2-week headache log before and after 2 to 3 weeks of exposure to pulsing electromagnetic fields for 1 hour per day, 5 days per week. The number of headaches per week decreased from 4.03 during the baseline period to 0.43 during the initial 2-week follow-up period and to 0.14 during the extended follow-up which averaged 8.1 months. In a double-blind study, 9 subjects kept a 3-week log of headache activity and were randomly assigned to receive 2 weeks of real or placebo pulsing electromagnetic field exposures as described above. They were subsequently switched to 2 weeks of the other mode, after which they kept a final 3-week log. Three additional subjects in the blind study inadvertently received half-power pulsing electromagnetic field exposures. The 6 subjects exposed to the actual device first showed a change in headache activity from 3.32 per week to 0.58 per week. The 3 subjects exposed to only half the dose showed no change in headache activity. Large controlled studies should be performed to determine whether this intervention is actually effective.

2001

Impulse magnet-field therapy for migraine and other headaches: a double-blind, placebo-controlled study

Abstract

This double-blind, placebo-controlled study assessed the efficacy of 4 weeks of impulse magnetic-field therapy (16 Hz, 5 μ T), delivered through a small device, for different types of headache and migraine. Eighty-two patients were randomly assigned to receive either active treatment or placebo (n = 41 each) and were characterized according to one of seven diagnoses (migraine, migraine combined with tension, tension, cluster, weather-related, posttraumatic, or other). Efficacy was assessed in terms of duration, severity, and frequency of migraine and headache attacks, as well as ability to concentrate. Data for 77 patients were analyzed. In the active-treatment group, all assessed criteria were significantly improved at the end of the study (P <0.0001 vs baseline and placebo). Seventy-six percent of active-treatment patients experienced clear or very clear relief of their complaints. Only 1 placebo-patient (2.5%) felt some relief; 8% noted slight and 2% reported significant worsening of symptoms. No side effects were noted.