

Tai Chi Is a Promising Therapy for Fibromyalgia

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Fibromyalgia is a disorder with few proven effective treatment options. Guidelines suggest a multidisciplinary approach including medications and cognitive therapy. Exercise has been advocated as a treatment but is likely underutilized in part because many patients are not physically fit to exercise due to pain. Tai chi is a popular mind-body practice involving meditation combined with slow movements and relaxation techniques that has been thought to be effective in a variety of musculoskeletal conditions. A recent trial (Wang et al, 2010) aimed to assess the effects of tai chi on patients with fibromyalgia.

The authors conducted a single-blind, randomized, controlled trial comparing tai chi with a control intervention of education and stretching in patients who met established diagnostic criteria for fibromyalgia. Excluded patients included those who had participated in tai chi training in the previous 6 months and those with other medical conditions known to lead to fibromyalgia-like pain syndromes such as thyroid disease, arthritis, or lupus.

In the intervention group, tai chi was taught by a single tai chi master twice a week for 60 minutes over a 12-week period. Patients were instructed to practice at home for 20 minutes each day using an instructional DVD for a total of 24 weeks. Similar time commitments were needed in the control group to attend sessions on education and stretching and their effect on fibromyalgia. Although participants were not blinded, the authors deemphasized the potential benefit of tai chi to the intervention group, and the expected benefit predicted by the patients was the same in the tai chi and control groups.

A total of 66 patients were randomized in the study. The participants were overwhelmingly female (86%), had a mean body-mass index on average of 32.7, and had experienced fibromyalgia for an average of 11 years. The attendance rates over the 12-week period were 77% for the tai chi group and 70% for the control group. The primary outcome examined was a change in the patient-reported Fibromyalgia Impact Questionnaire (FIQ), which is a validated measure of the overall severity of patient symptoms. The authors found at 12 weeks that the tai chi group had a significantly greater improvement in the total FIQ score from baseline compared with the control group (mean between-group difference, -18.4 points; 95% confidence interval, -26.9 to -9.8 ; $p < .001$). The difference between the two groups increased over the course of the trial, and significance remained at 24 weeks—a full 3 months after formal instruction

had ceased. Secondary measures of sleep quality and self-reported measures of physical and mental health were also significantly better in the tai chi group.

Future trials of this technique in fibromyalgia should probably utilize some type of sham tai chi in order to assure adequate blinding. Although the control group also practiced stretching, it is not clear how much of the improvement can be attributed to simply increased physical activity in the tai chi group, an intervention long thought to improve fibromyalgia symptoms as well as mental health. For the clinician caring for patients with this difficult-to-treat disorder, this study is a welcome addition to the field. As tai chi is a relatively benign intervention with little risk for injury (no adverse events were observed in the trial), encouraging patients to try tai chi or similar relaxation/exercise interventions is a reasonable approach even with these limited data.