13. Diseases of the Musculoskeletal and Connective Tissue

Reference

Shinohara S, Katsumi Y. Clinical effects of peripheral acupuncture point stimulation based on the concept of the muscle meridians for complaints during movements. *Zen Nihon Shinkyu Gakkai Zasshi* (*Journal of the Japan Society of Acupuncture and Moxibustion: JJSAM*) 2003; 53(1): 4–7 (in Japanese with English abstract). IchushiWeb ID: 2003270662

1. Objectives

To evaluate the clinical effect of remote acupuncture point treatment for symptoms of muscle meridian disease (経筋病, defined as muscle stiffness, jerking, cramp, or pain during movement).

2. Design

Randomized controlled trial (RCT).

3. Setting

Center of Acupuncture Science. Outpatient Clinic of the Department of Orthopedics at Meiji University of Oriental Medicine (current Meiji University of Integrative Medicine) Hospital, Kyoto, Japan.

4. Participants

A total of 88 outpatients with complaints of knee joint pain and other problems associated with movement disability diagnosed as muscle meridian disease.

5. Intervention

Arm 1: Real meridian treatment group. Intradermal needles were inserted to about a depth of 0.5 mm at the brook (滎穴) or stream (兪穴) acupuncture points on the muscle meridian related to pain, and fixed with bandages (n=30).

Arm 2: Sham treatment group. Only bandages were put on the same points as in Arm 1 (n=30).

Arm 3: Other meridian treatment group (n=28). Intradermal needles were inserted to a depth of about 0.5 mm near the brook (滎穴) or stream (兪穴) acupuncture points, and fixed with bandages (n=30).

6. Main outcome measures

Visual analog scale (VAS) score for pain. The occurrence of tenderness at the brook and stream acupuncture points.

7. Main results

Treatment in Arm 1 (P<0.0001) and in Arm 2 (P=0.029) significantly decreased pain. The decline in mean VAS score was greater in arm 1 than in Arm 2. Tenderness occurred very frequently at the brook and stream acupuncture points on the meridian related to knee pain.

8. Conclusion

Contact stimulation of the brook and stream acupuncture points on the meridian related to knee pain significantly reduces pain. However, the decrease (therapeutic effect) is greater when needle insertion is to a depth of 0.5 mm. Tenderness at the brook and stream acupuncture points occurs very frequently in a large population of patients with knee joint pain, for which the large number of cases are known.

9. From acupuncture and moxibustion medicine perspective

Not mentioned.

10. Safety assessment in the article

Not mentioned.

11. Abstractor's comment

In this interesting study, intradermal needling and contact stimulation at the brook and the stream acupuncture points decreased pain as measured on a VAS. The brook and stream acupuncture points related to knee pain are tender and this tenderness can be used to find the abnormal muscle meridian and to decide whether this treatment strategy is needed. However, complaints which lead to the diagnosis of muscle meridian disease were not described, and no analysis of intergroup differences was performed. The discussion should have focused on clarification of the protocol (i.e., description of the ratio of the numbers of stream and brook acupuncture points treated, method and duration of stimulation, and timing of the pain assessment). As pain is one of the most common indications for acupuncture and moxibustion treatment, its use for complaints other than knee pain should be investigated. Further studies on its merits and drawbacks are awaited.

12. Abstractor and date

Furuhata T / Kaneko Y, 8 December 2010, Kawakita K, 25 December 2010.