Comparison of effects of a home exercise programme and a supervised exercise programme for the management of lateral elbow tendinopathy

Stasinopoulou Argiri Leeds Metropolitan University, UK

Abstract

Background: Home and supervised exercise programmes consisting of stretching and eccentric exercises have been recommended for the management of lateral elbow tendinopathy (LET). No studies have examined their comparative efficacy effectiveness.

Objective: In this study, whether a home exercise programme is more successful than a supervised exercise programme in treating patients with LET was investigated.

Methods: Patients with unilateral LET for at least 4 weeks were included in this trial. They were sequentially allocated to receive either a home exercise programme or a supervised exercise programme five times a week for 12 weeks. The exercise programme consisted of slow progressive eccentric exercises of wrist extensors and static stretching of the extensor carpi radialisbrevis tendon. Outcome measures were pain, using a visual analogue scale, and function, using a visual analogue scale and the pain-free grip strength. Patients were evaluated at baseline, at the end of treatment (week 12), and 3 months (week 24) after the end of treatment.

Results: 70 patients met the inclusion criteria. At the end of treatment, there was a decline in pain and a rise in function in both groups compared with baseline (p,0.0005, paired t test). There were significant differences in the reduction of pain and the improvement of function between the groups at the end of treatment and at the 3-month follow up; the supervised exercise programme produced the largest effect (p,0.0005, independent t test).

Conclusions: Supervised exercise programme is superior to home exercise programme to reduce pain and improve function in patients with LET at the end of the treatment and at the follow-up. Further research is needed to confirm our results.

Biography

Stasinopoulos Argiri is an Assistant Professor of Physiotherapy, coordinator of the programme MSc in Sports Physiotherapy and co-coordinator of the programme BSc in Physiotherapy. His primarily teaching areas include electrotherapy, sports physiotherapy, physiotherapy in musculoskeletal injuries of upper and lower extremities and how to write a scientific essay. He worked as a part-time Lecturer, from 2007 to 2011, at T.E.I. Lamias School of Physiotherapy (modules electrotherapy I and physical therapy in musculoskeletal injuries of upper and lower extremities) and, from 2010 to 2012, at the European University of Cyprus, Nicosia, Cyprus (modules electrotherapy I and II). He completed his PhD studies in the Leeds Metropolitan University, UK where his research focused on the management of tendinopathy using electrotherapeutic and non-electrotherapeutic modalities. He has presented his research findings in many seminars and symposiums. He is a reviewer in fourteen journals and member of the editorial board in six journals. His current research and clinical interests focus on tendinopathy

management, electrotherapy, rehabilitation of musculoskeletal injuries of upper and lower extremities, epidemiology of sports and musculoskeletal injuries, validity and reliability of questionnaires in Greek and systematic reviews in the area of musculoskeletal injuries assessment, prevention, and rehabilitation

D.Stassinopoulos@euc.ac.cy