

THE EFFECT OF PROPRIOCEPTIVE TRAINING IN PATIENTS WITH RECURRENT DISLOCATION OF THE PATELLA

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Abstract: Eleven patients with recurrent dislocation of the patella were subjected to knee proprioceptive training. Patients exhibited a gain in their Lysholm and Activity scores (p 0.03 and 0.009). No patient needed operative procedure.

Key Words: Patella, Proprioception, Conservative Treatment, Quadriceps Muscle

INTRODUCTION

Patients with recurrent dislocation of the patella exhibit a decrease in symptoms in 70 percent of cases [1]. Those patients in whom conservative treatment fails are candidates for various operative procedures. In order to improve the success rate of conservative treatment, we introduced a new treatment protocol consisting of knee proprioceptive training.

METHODS

Eleven patients were subjected to a proprioceptive training protocol, which lasted for eight weeks with three training sessions per week. In addition, four patients were subjected to high load/low repetition quadriceps exercises [2], which were performed concurrently with proprioceptive training.

The proprioceptive protocol consisted of 5 sets of balancing in the sagittal plane, each lasting 35-60 s. The ankle joint was blocked by external brace. Clinical parameters including the Lysholm and Activity [3] scores were assessed before and one week after treatment. The data were analyzed using the nonparametric Wilcoxon test.

RESULTS AND DISCUSSION

All the patients improved subjectively with proprioceptive training. None of them needed any extra surgical procedure. There was a significant gain in their Lysholm and Activity scores with training (p 0.03 and 0.009, respectively).

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All the patients in our series were successfully treated with proprioceptive training in the short term (Fig. 1). In the longer, term the patients were prescribed similar but less intensive retaining proprioceptive protocol. The patients were also told not to engage in the activities involving high flexion/internal rotation moment imposition on their knee joints.

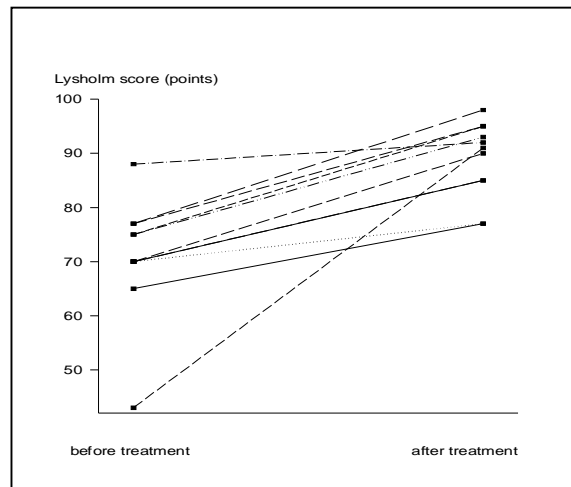


Fig. 1. The gain in Lysholm score with proprioceptive treatment for individual patients

Despite the lack of long term results, we consider proprioceptive training to present a promising alternative to conventional conservative protocols for patients with recurrent dislocation of the patella.

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