OUTCOMES OF THE USE OF CORE STABILIZATION EXERCISES FOR THE TREATMENT OF LOW BACK PAIN AND EVIDENCE FOR TREATMENT BASED CLASSIFICATION: A CASE REPORT

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no funding

Compliance Statement
Verbal and written informed consent was given by the patient to be the subject of this case report. Identifying information such as her name and birth date were not included in the case report.

Background: Low back pain is a common diagnosis encountered by physical therapists that has a wide variety of treatment options. Delitto et al described a classification system for the conservative treatment of low back pain with four subgroups including manipulation and stabilization.

Purpose: The purpose of this case report is to describe the physical therapy management of a young adult with an eight month history of low back pain through therapeutic exercise focused on core strengthening and stabilization and the patient’s outcomes resulting from the episode of therapy. This case report also gives evidence for the use of a classification model based on intervention type for the prediction of treatment techniques that will be successful.

Case Description: The patient was a 24 year-old female with an eight month history of low back pain who had experienced no relief of pain with other treatments including chiropractic manipulation. She was unable to sit as needed at work, to complete activities involving trunk flexion, and was unable to participate in her regular running program. The patient attended five physical therapy sessions focusing on core strengthening and stabilizing exercises.

Outcomes: The patient experienced an elimination of her back pain, rating it 0/10 on the NPR scale, decreased her Oswestry disability score from 40% to 12% disability, was able to complete sitting and forward flexion activities as needed. She was also able to return to her running routine.

Conclusion: The patient’s initial failure with conservative treatment may be attributed to incorrect classification of manipulation, as her symptoms were consistent with the stabilization category. The successful outcomes this patient experienced appears to be attributed to identifying the correct category involving core strengthening exercises and to the patient’s motivation and adherence to her home exercise program.