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Effectiveness of Muscle Energy Technique vs Proprioceptive Neuromuscular Facilitation in Mechanical Low Back Pain

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ABSTRACT

Introduction: Low back pain is a major cause of physical disability in the world. The origin of this condition can be due to different causes, with a specific cause or of unknown mechanical factor. However, fatigue of the trunk muscles, specifically the lower back, is now considered as one of the main risk factors associated with origin of low back pain and disabilities.

Aim: Thus, this review aims to explore recent literature focusing on evaluating the effectiveness of manual techniques like MET as compared to PNF in low back pain.

Methodology: Articles were searched from 2014 to 2024 through electronic search engines such as PubMed, google scholar using key words like low back pain, MET, PNF, pain, flexibility, functional performance. The studies published in English language and with full articles were included in the review. Case studies and case series were excluded from the review process.

Result: A total of 60 articles were present for the screening review out of which 6 studies matched with our inclusion criteria. 2 studies shows that METs were more effective than PNF stretching in managing the symptoms of Low back pain. Other 2 studies suggested that METs provided greater improvements in reducing pain, increasing flexibility, and improving functional performance compared to PNF stretching. Later on, another 2 studies have suggested that both METs and PNF stretching are valuable in restoring functional movement patterns in conditions involving low back pain and muscle tightness.

Conclusion: The studies concluded that the MET is more effective compared to PNF treating patients with low back pain. Both MET alone and MET combined with PNF shows effectively improve pain, functional performance, improving flexibility in patients with low back pain.

Keywords: Muscle energy technique, PNF, Mechanical low back pain

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