Physical Therapy Treatment of a Patient With Chronic Low Back Pain and a Previous History of A Substance Abuse Disorder: A Case Report

Marcus X. Alomar BS, DPT Student
Brian T. Swanson, PT, DSc, OCS, FAAOMPT
Department of Physical Therapy - University of New England Portland, ME

Unique

There is ample research on various approaches to treating low back pain, however there is limited research investigating the efficacy of treatment for patients with low back pain and a previous history of opioid dependency.

Purpose

The purpose of this case report was to describe the physical therapy treatment, including pain management strategies, for a patient with low back pain, a previous history of opioid dependency (oxycodeone), and apparent opiate induced hyperalgesia.

Foundation

• The National Survey on Drug Use and Health (NSDUH) reported that an estimated 27 million people in the United States have reported use of an illicit drug within the past month.¹

12 States Have More Painkiller Prescriptions Than People

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• Low back pain continues to be a major cause of disability in the United States, with an estimated 70 percent of adults experiencing low back pain at some point during their lifetime.²

• Active exercise programs that includes pain education and cognitive behavioral therapy demonstrated significant superior outcome at reducing pain intensity, anxiety/depression, disability, and fear-avoidance compared to therapeutic exercise and manual therapy alone for patients with non-specific chronic low back pain.³ With both illicit and prescription drug use rising in the US, it is likely clinicians will encounter patients with substance abuse disorders, as well as opiate induced hyperalgesia.

• The use of psychologically informed practice may be beneficial in this patient population.

Case Description

• 55-year-old female accountant
• Chief Complaint: Chronic LBP over the last 3 months
• Medical Diagnosis: Chronic LBP
• Overall pain levels appeared disproportionate to objective findings, 8/10 at worst.
• Referring MD later revealed past medical history of substance abuse disorder

Interventions

- Pain management
- Educational pain management
- Pain Education
- Pain Avoidance
- Psychological interventions
- Pain avoidance strategies
- Pain management strategies
- Pain management techniques
- Pain management interventions
- Pain management approaches
- Pain management methods
- Pain management techniques

Physiological State

Vicarious Experience

Persuasive Communication

Performance Accomplishments

• Patient educational process
• Patient education process
• Patient education methods

• Vicarious experiences
• Vicarious experiences
• Vicarious experiences

• Persuasive communication
• Persuasive communication
• Persuasive communication

• Performance accomplishments
• Performance accomplishments
• Performance accomplishments

• Physiological state
• Physiological state
• Physiological state

• Vicarious experience
• Vicarious experience
• Vicarious experience

• Persuasive communication
• Persuasive communication
• Persuasive communication

• Performance accomplishments
• Performance accomplishments
• Performance accomplishments

Outcomes

- Outcome measures
- Outcome measures
- Outcome measures

• Visit #1
• Visit #6
• Visit #12

• ODI
• ODI
• ODI

• FABQ-Work Scale
• FABQ-Work Scale
• FABQ-Work Scale

• FABQ-Physical Activity Scale
• FABQ-Physical Activity Scale
• FABQ-Physical Activity Scale

Special Tests

- Pain Rating
- Pain Rating
- Pain Rating

- VAS
- VAS
- VAS

- Joint Mobility
- Joint Mobility
- Joint Mobility

- Thomas Test
- Thomas Test
- Thomas Test

- Hip ABD, GMT
- Hip ABD, GMT
- Hip ABD, GMT

• Initial Exam
• Initial Exam
• Initial Exam

• Discharge
• Discharge
• Discharge

• Best: 4/10
• Best: 1/10
• Best: 3/10

• Worst: 8/10
• Worst: 2/10
• Worst: 3/6

• L1-3: 2/6
• L1-3: 3/6

• Bilaterally
• Bilaterally

• Hip ABD, GMT

• Bilaterally

• Thomas Test

• 5 Bilaterally

Discussion

• Fear-avoidance, in the presence of elevated levels of pain perception, could be a potential barrier to recovery for patients with chronic low back pain and a previous history of opioid dependency.

• An assessment of fear avoidance for patients with chronic pain can help clinicians define better treatment strategies.

• The use of education regarding opiate induced alterations concurrently with graded exposure activities, can help enhance self-efficacy and lower fear-avoidance beliefs.

• Including cognitive factors such as fear avoidance behaviors, anxiety, depression, stress and maladaptive coping into physical therapy treatment has shown to be an effective treatment approach in treating this patient.

Conclusion

The use of a comprehensive physical therapy program including cognitive functional therapy and pain education led to a reduction in pain and disability for a patient with a history of a substance abuse disorder. It would be beneficial to continue to investigate the application of this physical therapy approach in additional cases of opioid induced hyperalgesia.

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Contact: malomar@une.edu UNE Dept of Physical Therapy, 716 Stevens Ave. Portland, ME 04103

References


