

AZUSA PACIFIC UNIVERSITY

**THE EFFECTS OF YOGA AS AN ADJUNCT TO TRADITIONAL CORE STABILITY
EXERCISE ON NON-SPECIFIC CHRONIC LOW BACK PAIN**

by

Rachel Kim

A capstone project submitted to the
School of Behavioral and Applied Sciences
in partial fulfillment of the requirements
for the degree Doctor of Physical Therapy

Azusa, California

December, 2019

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Tamara Eichelberger, PT, Ph.D., Committee Chair

Susan Shore, PT, Ph.D., Chair, Doctor of Physical Therapy Department

Robert K. Welsh, Ph.D., ABPP, Dean, School of Behavioral and Applied Science

PREVIEW

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DEDICATION

I wish to this to my family, friends, and everyone else who has supported me through this process.

PREVIEW

ACKNOWLEDGMENTS

I would like to thank my mentor, Dr. Eichelberger, for her constructive feedback, guidance, and encouragement during this process. In addition, I would like to thank Dr. Karim, Azusa Pacific University DPT staff, and all my classmates for their support during my time at APU.

PREVIEW

ABSTRACT

THE EFFECTS OF YOGA AS AN ADJUNCT TO TRADITIONAL CORE STABILITY EXERCISE ON NON-SPECIFIC CHRONIC LOW BACK PAIN

Rachel Kim
Doctor of Physical Therapy, 2019
Azusa Pacific University
Advisor: Tamara Eichelberger, PT, Ph.D.

Background. Research has shown that seven out of ten people will experience low back pain and eighty-five percent of these cases are non-specific in nature, meaning that the source of pain is unidentified. *Purpose.* The purpose of this case study was to evaluate the effects of hatha yoga as an adjunct to traditional core stability exercises on chronic low back pain compared to traditional core stability exercise alone. *Literature review.* A comprehensive literature review was conducted, and seven articles were included in the literature review. Current literature supports the use of traditional core stability exercise for the treatment of chronic low back pain. Recent research has also shown improvement in low back pain with the use of mind-body therapies, such as yoga, due to its multi-faceted approach to chronic pain. *Case Description.* The patient was a sedentary 59-year-old Korean female who had been experiencing non-specific chronic low back pain for

four months prior to starting physical therapy. Outcome measures used in this case study was the Fear-Avoidance Beliefs Questionnaire (FABQ) and the Numeric Pain Rating Scale (NPRS) along with Manual Muscle Tests (MMT) and Sahrman Lower Abdominal Muscle Exercise Progression levels. The patient reported lower scores on the FABQ and NPRS by the end of her 6-week intervention period and increased MMT and Sahrman Lower Abdominal Muscle Exercise Progression levels. *Discussion.* The use of hatha yoga as an adjunct to traditional core stability exercises proved to be effective in reducing pain levels for this patient. Because research has been limited, further studies that look at the use of both yoga and traditional core stability interventions for patients with non-specific chronic low back pain are needed.

Keywords: Non-specific chronic low back pain, hatha yoga, core stability, pain, mind-body therapy, case report

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