

Anthony Puglisi

Graduate Student

Project Authors: Steven A. Browning, SPT, CSCS; Erin R. Ciarrocca, SPT; Bridget S. Duffy, SPT and Anthony M. Puglisi, SPT

Faculty Mentor: Peter M. Leininger, Ph.D, OCS

Summary:

To determine the role of diagnostic ultrasound conducted by physical therapists in assessing acromiohumeral distance for management of shoulder pathologies.

Methods:

Terms: (“acromiohumeral distance” OR “acromiohumeral space”) AND (“physical therapy” OR physiotherapy OR rehabilitation) AND (“diagnostic ultrasound” OR sonography OR sonogram OR ultrasonography). Limits: English, peer-reviewed, human subjects, since 2000. Selection criteria: diagnostic ultrasound used by a physical therapist to measure acromiohumeral distance in adults with shoulder pathologies. Each article was independently assessed.

Findings:

Twenty Articles met criteria. Studies used diagnostic ultrasound to determine the effectiveness of interventions, to identify structural differences between groups, to diagnose subacromial impingement syndrome, to predict functional outcomes, and to compare ultrasound measurements to other assessment tools.

Clinical Relevance:

Ultrasound is a non-invasive, accurate, portable, cost-effective, safe alternative to MRI.

Conclusions:

There is moderate to strong evidence in support of physical therapists using diagnostic ultrasound to assess acromiohumeral distance in patients with shoulder pathologies.