

## **PSYCHOMETRIC TESTING OF SPIDER: DATA CAPTURE TOOL FOR SYSTEMATIC LITERATURE REVIEWS**

### ABSTRACT (151 WORDS)

**OBJECTIVE:** Systematic literature reviews contributes to evidence-based occupational therapy, yet no data capture tool currently exists to validly and reliably appraise the characteristics and quality of primary studies.

**METHOD:** We determined the psychometrics of SPIDER (Systematic Process for Investigating and Describing Evidence-based Research), and piloted it with 201 studies included in a systematic literature review.

**RESULTS:** Content validity showed item relevance (index = 0.60) with 73% agreement between two experts. For the quality construct, seven of nine quality indicators were positively and significantly ( $p < 0.05$ ) correlated with the overall quality score. The quality scores were significantly ( $p < 0.05$ ) and positively correlated with two objective measures, inferring criterion validity. Intra-rater reliability was moderate to perfect ( $kappa = 0.4-1.0$ ) for experienced reviewers. Crosstab analyses showed less variation in experienced reviewers' inter-rater reliability.

**CONCLUSION:** SPIDER provides plausible opportunities for occupational therapy researchers and graduate students to appraise the characteristics and quality of primary studies, but requires testing across other settings.

**Key words:** validity and reliability; data capture tool; evidence based reviews; measurement