Abstract #2010

Content Relevance of the Foot and Ankle Ability Measure in Patients with Achilles Tendon Diseases

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**Introduction/Purpose:** The Foot and Ankle Ability Measure (FAAM) is a widely used evaluative, region-specific patient reported outcome measure. Its construct validity, test-retest reliability, and responsiveness are reasonably well supported in patients with a variety of lower extremity musculoskeletal conditions. However, since its development, the FAAM’s content relevance has never been subject to patient assessment. Therefore, this study was designed to assess the content relevance of the FAAM among patients with Achilles tendon diseases.

**Methods:** IRB-approved, prospective, observational study of patients with Achilles tendon diseases. Subjects gave informed consent to complete a standard FAAM and a FAAM content relevance questionnaire. For each item of the relevance questionnaire, the standard FAAM’s visual analogue scale was replaced by a categorical scale asking subjects to rank the individual item as 1-Not Relevant, 2-Somewhat Relevant, or 3-Very Relevant to their lower extremity condition. The same was asked regarding both the entire ADL and Sports subscales, respectively. Descriptive statistics (mean, standard deviation) were calculated using pooled individual question scores and then 95% confidence intervals were constructed. Any individual item or subscale with a mean score above 2.0 was considered to have substantial content relevance. Floor and ceiling effects were deemed to have been present if 20% or more of patients gave all items of a subscale either the lowest or highest possible scores, respectively.
Results: There were 59 respondents with mean age of 52.6 years (range, 28 to 79 years). Mean time from presentation to content relevance assessment was 19.6 weeks (range, 1 to 100 weeks). There were 39 (66%) surgical patients and 20 (34%) nonsurgical patients. Diagnoses included 28 (47%) rupture, 18 (31%) tendinosis, and 13 (22%) paratenonitis. 10 (17%) were pre-treatment and 49 (83%) post-treatment. For each individual item and subscale, the mean relevance was above 2.0 indicating substantial relevance. The 95% confidence interval crossed below this threshold for only one item, ‘Personal Care’ (mean 2.02, 95% CI 1.79 to 2.24). No floor effects were detected. Ceiling effects were apparent for only the Sports subscale (n=25,42.4%).

Conclusion: These findings demonstrate that the FAAM has substantial item and subscale-level content relevance in patients with Achilles tendon diseases. Future work should aim to provide additional psychometric data specific to patients with Achilles tendon diseases in order to allow more precise use of the FAAM in this specific patient population.

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<th>Source of Evidence</th>
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<th>Construct Validity</th>
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<td>PF CAT, FFI-Spi</td>
</tr>
</tbody>
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* PAI: Physical Function Index, FFI: Split, same addressing Allusion only.
* PHQG: Physical Function Questionnaire for Hip and Gastric Surgery.
* LE-CAT: Lower Extremity Physical Function Computerized Adaptive Test

PT: Physical therapy
LE: Lower extremity
DM: Diabetes mellitus
SMFA: Short Musculoskeletal Functional Assessment
SF-12 PCS: Short Form-12 Physical Component Score
AAOS: American Academy of Orthopaedic Surgeons
FAOS: Foot and Ankle Outcome Score
PHQG: Patient Referred Outcomes Measurement Information System
LE-CAT: Lower Extremity Functional Computerized Adaptive Test