Discrepancy Between Self-Report and Performance-Based Functional Cognitive Assessments

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INTRODUCTION

• Occupational therapists often rely on client self-report of ADL/IADL tasks that are difficult to directly observe given the complexity and cost of conducting observational testing.

• Functional cognition tests evaluate ability to manage everyday IADL challenges and have been shown to identify risk of IADL impairment.

• Studies find that performance-based tests of functional cognition are superior predictors of real-world functioning and community independence.

PURPOSE: The purpose of this study was to determine if self-report of ADL/IADL tasks vary based on scores on performance-based functional cognitions tests.

METHODS

Design and Participants

• Cross-sectional sample of 200 participants over the age 55 living independently in the community.

Measures

• Menu Task
• Medi-Cog (Mini-Cog + MTS-Revised)
• Performance Assessment of Self-Care Skills (PASS)
• Weekly Calendar Planning Activity (WCPA)
• Alzheimer’s Disease Cooperative Study Activities of Daily Living (ADCS)

Analyses

• Descriptive statistics and frequency distributions (see Table 1)
• Pearson correlations among variables (see Table 2)
• Student’s independent groups t-tests compared ADCS score for individuals unimpaired vs impaired on performance-based tests (see Figure 2)

RESULTS

Table 1. Demographic and Assessment Scores

<table>
<thead>
<tr>
<th>Age (SD, Range)</th>
<th>70.42 (8.27), 55-93</th>
</tr>
</thead>
<tbody>
<tr>
<td># Chronic Health Conditions</td>
<td>1.18 (1.27), 0-7</td>
</tr>
<tr>
<td>Education (yrs)</td>
<td>15.09 (3.04), 8-27</td>
</tr>
<tr>
<td>Menu Task</td>
<td>8.20 (2.02), 4-12</td>
</tr>
<tr>
<td>Medi-Cog</td>
<td>8.01 (1.88), 3-10</td>
</tr>
<tr>
<td>PSCT # Cues</td>
<td>10.08 (9.63), 0-48</td>
</tr>
<tr>
<td>WCPA Accuracy</td>
<td>10.08 (4.70), 0-17</td>
</tr>
<tr>
<td>ADCS Accuracy</td>
<td>74.87 (4.69), 42-78</td>
</tr>
<tr>
<td>Female</td>
<td>153 (76.5)</td>
</tr>
<tr>
<td>White</td>
<td>160 (80.4)</td>
</tr>
</tbody>
</table>

Table 2. Correlations Between Demographics, Performance-Based Tests of Functional Cognition, and Self-Report ADL/IADL

| Age | Education | MT | Medi-Cog | PSCT | WCPA

| IADL | .07 | .19* | .31* | .30* | .27* | .40* |
| ADCS | .04 | .19* | .29* | .31* | .26* | .41* |

*p < .05

Figure 1. Mean scores of Unimpaired and Impaired Groups

Table 2. Correlations Between Demographics, Performance-Based Tests of Functional Cognition, and Self-Report ADL/IADL

| Mean Score | MT | Medi-Cog | WCPA | ADCS | Total |

| Impaired | 43 | 42 | 41 | 44 | 45 |
| Unimpaired | 73 | 74 | 75 | 76 | 77 |

*p < .05

Figure 2. Student’s Independent Groups T-Tests Comparing Mean ADCS Score

*PASS = Shopping and Checkbook Balancing Task

Participants Who Predicted “Well” or “Extremely Well” Performance on MT (n = 163)

- Unimpaired: 53% (n = 88)
- Impaired: 47% (n = 75)

Participants Who Predicted “Fair” Performance on MT (n = 37)

- Unimpaired: 70% (n = 26)
- Impaired: 30% (n = 11)

CONCLUSIONS

• Performance-based assessments of functional cognition are sensitive to impairment in community dwelling older adults.

• Low to moderate correlations were found between scores on performance-based tests of functional cognition.

• Significant differences were found in self-reported ADL/IADL in the majority of unimpaired vs impaired groups.

IMPLICATIONS FOR PRACTICE

• There may be important differences between how individuals report their ADL/IADL ability and objective evaluation.

• Discrepancies exist between ADL/IADL self-report and actual assessed ability, and clinicians should supplement self-report with objective assessment when making discharge and clinical recommendations.

• Functional cognitive testing is appropriate for community dwelling older adults.

REFERENCES


Acknowledgements

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