

Sitting Balance Scale: A Review



▶ As physical therapists, we know intuitively and practically that it is important to assess sitting balance, but many of the measures available to our profession are geared toward assessing standing balance, or at the very least static sitting posture.



So we went on a quest to find tools that were available that focused exclusively on static and dynamic sitting balance. This was not necessarily an easy task; as we mentioned, most of the measures available were either for standing balance or had a subsection for sitting balance. In our quest, we did come across one fairly new measure, the Sitting Balance Scale (SBS), that proposed to measure sitting balance in frail older adults.¹ This intrigued us enough to take a closer look.

The authors of the SBS, Medley and Thompson, have insightfully identified the deficit in our profession of a scale that is valid and reliable in assessing the elements of sitting balance (static and dynamic). They also identified the need for standardized terms that describe

sitting balance. To address these issues, the SBS was developed.

The SBS consists of 11 items, pared down from an original of 38 obtained through focus groups and content experts in the areas pertinent to geriatric care. The items represent various functional abilities related to sitting balance, such as “sitting unsupported with eyes closed,” “turning to look behind over left and right shoulders when sitting,” and “pick up objects from the floor while sitting unsupported on foam.”

Scoring

Scoring on the SBS is done on a zero-to-4 point Likert scale ranging from zero (worse performance) to 4 (best performance). Data for both nonambulatory and ambulatory older adults were taken from a sample of 127 community-dwelling older adults and 29 frail older adults from home health and long-term care settings. Scores were used to establish reliability of the items and validity of the SBS.

It was reported by the authors that the SBS had good internal consistency (Cronbach’s alpha = 0.762) with intrarater reliability ranging from 0.96 to 0.99 for the total score, with interrater reliability in the good range with a Cronbach’s alpha = .87. Differences were reportedly found using a Mann Whitney U between the performance scores of those participants who had pathologies and those without (healthy subjects). In individuals with pathology, the average rank was 20.16 for the total score as opposed to a rank of 91.82 for the total scores in those without pathology.

Use and Validity

The SBS is a new instrument developed to measure static and dynamic elements of sitting balance in frail older people. From this brief review, the SBS appears to be a valid and reliable tool, but due to its newness, future studies using a larger sample size need to be conducted to further confirm its psychometric properties and usefulness in the community for which it was developed. Furthermore, as the authors have pointed out, the scale’s responsiveness to meaningful change has not been established. Examining this would establish usefulness in the clinic.

We will continue our journey to find a functional tool that objectively examines sitting balance in the older population, but as far as we can tell, the Sitting Balance Scale is a good start. ■

Reference

1. Medley, A., & Thompson, M. (2011). Development, reliability and validity of the Sitting Balance Scale. *Physiotherapy Theory Practice*, 27(7), 471-481.

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