Psychometric Properties of the Persian Version of Multiple Sclerosis Treatment Adherence Questionnaire

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ABSTRACT

Introduction: Multiple Sclerosis (MS) is currently a leading cause of neurologic disabilities, especially among young adults. Various disease-modifying drugs (DMDs) are available, aimed to slow down the progression of symptoms. Despite the success of DMDs through the last decade, treatment adherence has remained a challenge in MS care and management. Although there are self-reported, quantitative measures for treatment adherence, they cannot predict and determine the underlying causes of non-adherence. Therefore, self-reported questionnaires are more informative in clinical settings. The Multiple Sclerosis Treatment Adherence Questionnaire (MS-TAQ) is the only specifically designed instrument to assess treatment adherence in MS patients. This study evaluated the validity and reliability of the Persian translation of MS-TAQ.
Methods and Materials: The back-translation method was employed for proper translation with maximum precision in the first phase. In the second phase, face validity was evaluated by qualitatively distributing the questionnaire to 10 MS patients. Quantitative face validity was analyzed using the impact score. The content validity was assessed by a panel of 20 faculty members, qualitatively by interview and quantitatively using both content validity ratio and content validity index. The final validated version was given to another 10 MS patients to evaluate internal consistency by Cronbach's alpha.
Results: The Persian translation was carried out by an English translator, the backward translation to English was performed by a native English speaker who was also fluent in Persian, and a third English expert approved the original English version of MS-TAQ. In the face validity assessment, 10 MS patients were interviewed, and their comments were applied. No item was removed in face validity, as no items had an impact score of less than 1.5. The panelists' comments in the content validity assessment were also applied, with six items added in the qualitative section and five removed in the quantitative assessment. The Cronbach's alpha was 0.8 for the whole questionnaire.
Conclusion and Discussion: MS-TAQ is a reliable and validated instrument for treatment adherence assessment in Iranian MS patients. Further evidence is needed to validate the construct of MS-TAQ, which is an ongoing part of this study in selected hospitals affiliated with Isfahan University of Medical Sciences.

Keywords: Multiple sclerosis, Psychometrics, Translations