Hindi Translation, Validation and Test-retest Reliability of the Trunk Impairment Scale 2.0: A Cross-sectional Study Protocol

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Introduction: Stroke is one of the leading cause of impaired trunk control, weight shifting and equilibrium reaction. The Trunk Impairment Scale (TIS) was created to assess specific trunk motions associated with activities in daily living in stroke patients by assessing their static and dynamic sitting balance and trunk coordination. The lack of a Hindi version of TIS 2.0 limits its usefulness for the 609 million Hindi speakers. The results of stroke rehabilitation could be significantly enhanced by creating a Hindi version.

Aim: To translate the TIS 2.0 into Hindi, validate the translated version and determine its test-retest reliability in Hindi speaking stroke patients.

Materials and Methods: Experts with linguistics and medical background will translate the scale into Hindi with the authors'

permission. Accuracy will be ensured by back-translation into English after the translations have been harmonised into a single version. Scale-level Content Validity Index Average and Item-level Content Validity Index will be calculated by an expert panel using the Delphi technique to validate the content. To ensure cultural relevance and intelligibility, a small group of stroke patients who speak Hindi will test the pre-final version. Bland-Altman plots and Intraclass Correlation Coefficients will be used to evaluate test-retest reliability in order to guarantee consistency.

Keywords: Stroke, Trunk, Translation, Reliability, linguistic.