

REFERENCE FOR REHABILITATION PROFESSIONALS CLINICAL PRACTICE GUIDELINE: A CORE SET OF OUTCOME MEASURES FOR ADULTS WITH NEUROLOGICAL CONDITIONS

This Clinical Practice Guideline aims to standardize practice by providing rehabilitation clinicians with recommendations for a core set of outcome measures for adults with neurological conditions that should be routinely used in all settings.

Use of the Core Set of Outcome Measures

- The core set should be administered with patients who have goals and the capacity to improve transfers, balance, and/or gait to assess change over time
- o Measures in the core set include: The Berg Balance Scale, Functional Gait Assessment, Activities-Specific Balance Confidence Scale, 10-Meter Walk Test, 6 -Minute Walk Test and the 5 Times Sit to Stand
- o In cases when a patient cannot complete one or more of the core set, a score of 0 should be documented
- o Core set should be administered under the same test conditions at least two times, at admission and discharge, and when feasible between these periods

Moderate recommendation (Level II*)

Benefits

- Comparison interventions and programs
- Measurement of patient progress over time and across continuum of care
- Comprehensive examination of balance, gait, transfers to assist with clinical-decision making
- Standardization of entry-level

o Risk, Harm, Cost

 Organizational costs to alter medical records, time for staff training and test administration, cost of testing forms and equipment

Exclusions

- In the acute care setting, in situations where a patient's length of stay is short or when the patient is abruptly discharged, administration of the core set at interim and discharge may not be feasible
- If a patient does not have goals or a prognosis to improve in specific construct areas, the measure should not be collected
- When a measure in the core set cannot be administered, the clinician should document "not administered" and provide rationale

Static and Dynamic and Standing Balance Assessment: Berg Balance Scale (BBS)

Strong recommendation (Level I*)

Benefits

- Excellent internal consistency and reliability
- High clinical feasibility, minimal equipment, free, requires less than 20 minutes to administer

o Risk, Harm, Cost

- No adverse events documented in research
- Preponderance of benefit compared to harm

Exclusions

- Patients who do not have goals to improve static and dynamic sitting and standing balance
- Patients with a high level of balance ability may experience a ceiling effect

Walking Balance Assessment: Functional Gait Assessment (FGA)

Moderate recommendation (Level I*)

Benefits

- Excellent internal consistency and reliability
- High clinical feasibility, minimal equipment, free, requires less than 20 minutes to administer

o Risk, Harm, Cost

- No adverse events documented in research
- o Preponderance of benefit compared to harm

Exclusions

- Clinicians should use discretion when applying the FGA for patients who do not have explicit goals to improve balance while walking
- Not appropriate for patients who do not have the capacity to walk (score 0)

Balance Confidence Assessment: Activities-Specific Balance Confidence Scale (ABC) Strong recommendation (Level I*)

o Benefits

- Excellent internal consistency and reliability
- High clinical feasibility, free, requires less than 5 minutes to administer
- Minimal time-cost

o Risk, Harm, Cost

- Potential burden to patients, as the ABC is a patient-reported measure
- Preponderance of benefit compared to harm

\circ Exclusions

 Clinicians should use discretion when applying the ABC with patients undergoing neurological rehabilitation who do not have goals to improve balance confidence

For more detailed information, please refer to the original document: https://journals.lww.com/jnpt/Fulltext/2018/07000/A_Core_Set_of_Outcome_Measures_for_Adults_With.10.aspx

LEVEL OF EVIDENCE*

I	II	III	IV	V
Evidence obtained from at least one, high quality (>50% critical appraisal score) study of psychometric properties	Evidence obtained from multiple, lesser quality (< 50% critical appraisal score) studies of psychometric properties	Evidence obtained from one study of lesser quality (< 50% critical appraisal score) of psychometric properties	Not applicable to studies of psychometric properties	Expert opinion (or best practice)



REFERENCE FOR REHABILITATION PROFESSIONALS CLINICAL PRACTICE GUIDELINE: A CORE SET OF OUTCOME MEASURES FOR ADULTS WITH NEUROLOGICAL CONDITIONS

Walking Speed Assessment: 10 Meter Walk Test (10mWT) Strong recommendation (Level I*)

Benefits

- Excellent reliability (chronic)
- Minimal equipment

o Risk, Harm, Cost

 Minimal risk provided the patient's vital signs are monitored and appropriate guarding is provided

Preponderance of benefit compared to harm

Exclusions

- Not appropriate for patients who do not have the capacity to walk
 - Score 0 meters/second for patients who are unable to walk at a given point in time, but who have goals and the capacity to walk in the future

Walking Distance Assessment: Six Minute Walk Test (6MWT)

Moderate recommendation (Level I*)

Benefits

- Excellent reliability (chronic)
- · High clinical feasibility, minimal equipment

o Risk, Harm, Cost

 Minimal risk provided the patient's vital signs are monitored and appropriate guarding is provided

Preponderance of benefit compared to harm

Exclusions

- Not appropriate for patient who do not have the capacity to walk
 - Score 0 meters for patients who are unable to walk at a given point in time, but who have goals and the capacity to walk in the future
- Limited feasibility in certain settings (e.g., limited walkway or fixed environmental barriers)
 - If unable to administer due to feasibility, document "unable to administer"

Transfer Assessment: Five Times Sit to Stand (5TSTS)

- Best practice recommendation (Level V*)
- o Risk, Harm, Cost
 - May extend the length of session
- o Preponderance of benefit compared to harm

Documentation of Patient Goals

- Best practice recommendation (Level V*) for use with patients with acute, chronic stable, and chronic progressive conditions
- o Clinicians should document patient-stated goals and monitor changes in individuals with neurologic conditions using an outcome measure such as the Goal Attainment Scale, reporting task, the performance conditions, and the time to complete or level of independence desired.

Benefits

- Provides an opportunity for patients and clinicians to share their beliefs and values
- May capture activities or constructs not included in other measures, but are important to patients
- May assist clinicians identifying and addressing discrepancies between perceived and actual performance

o Preponderance of benefit compared to harm

Exclusions

- Patients with impaired consciousness, cognition and/or communication
 - A caregiver may be able to provide a proxy response

Discussing Outcome Measure Results and Collaborative/ Shared Decision-Making with Patients

 Best practice recommendation (Level V*) for assessment of patients with acute, chronic stable, and chronic progressive conditions

Benefits

- Patients more informed and engaged in rehabilitation
- Better alignment of the plan of care with patient's goals, preferences and measurement results

o Risk, Harm, Cost

- May extend length of the session
- Patients may have difficulty understanding the results, or experience stress/discomfort

The core set may be viewed as a "starting point" for measure selection, with additional condition-specific measures as recommended by the EDGE task force used to provide insight into issues specific to their patient's health condition

For more detailed information, please refer to the original document: https://journals.lww.com/jnpt/Fulltext/2018/07000/A_Core_Set_of_Outcome_Measures_for_Adults_With.10.aspx

LEVEL OF EVIDENCE*

I	II	III	IV	V
Evidence obtained from at least one, high quality (>50% critical appraisal score) study of psychometric properties	Evidence obtained from multiple, lesser quality (< 50% critical appraisal score) studies of psychometric properties	Evidence obtained from one study of lesser quality (< 50% critical appraisal score) of psychometric properties	Not applicable to studies of psychometric properties	Expert opinion (or best practice)