ABSTRACT

Background: Disorders in executive functions are common cognitive sequelae of stroke and play a critical role in predicting recovery. To optimize the management of executive dysfunction post-stroke, additional knowledge translation efforts are needed to: 1) enhance clinicians’ use of evidence-based executive function assessments and interventions and 2) educate patients and their families. **Objectives:** Phase 1: To identify and critically appraise standardized executive function assessments, and interventions for executive function retraining post-stroke; Phase 2: To adapt the retrieved information to the needs of clinicians, persons with stroke and their families, and to identify barriers/facilitators to knowledge use. Phase 3: To develop and implement a multi-modal learning tool for clinicians, patients and their families, that will provide the latest evidence on the identification, assessment and treatment of executive dysfunction post-stroke.

**Methods:** Phase 1: Two comprehensive structured literature reviews were performed; 23 executive function assessments tested for use in persons with stroke and 15 computer-based tools / videogames for cognitive retraining were identified and critically appraised. Phase 2: Two focus groups will be conducted, one with occupational therapists and the other with persons with stroke and their families. Phase 3: The learning tool for clinicians will consist of 1) online modules on executive function assessment and intervention with interactive clinical scenarios, videos and quizzes, and 2) pocket cards summarizing executive function rehabilitation best-practices. The Patient/Family learning tool will include two online modules with videos demonstrating the impact of executive dysfunction and the use of intervention strategies.

**Expected contribution:** This multi-modal learning tool will be accessible to clinicians, patients and families immediately on the StrokEngine website. This tool will fill a valuable role in empowering patients and families by providing them with relevant information about executive function rehabilitation post-stroke.