Abstract

Pediatric neuropsychological diagnostics in our country struggles with a lack of high-quality memory test methods that are standardized, contain norms for our population, and are able to examine mnestic functions of children and adolescents (which represents a relatively wide age cohort) in more detail. Some of these problems are encountered with the available tests: some tests are adopted tests for adults, but do not take into account the specificities of child development, while tests developed for the child population test only part of memory.

The aim of this work was to evaluate the test-retest reliability of memory tests from the recently emerging Neuropsychological Battery for Children (NB-D). The Neuropsychological Test Battery for Children aims to become a quality tool for assessing, not only, mnemonic function in children and adolescents. Probands aged 6–19 years (n = 44, 56.8% females) were administered selected memory subtests from the NB-D (Verbal Memory and Learning immediate and delayed recall, Nonverbal Memory immediate and delayed recall, Story Memory immediate and delayed recall, Working Memory, and Cued recall.

The data were processed by correlation analysis, Pearson and Spearman correlation coefficients were used. Cohen's d and the intra-class correlation value were also used to interpret the results. The results revealed strong test-retest reliability at a significance level of $p < 0.001$ for most subtests. For the subtests that did not achieve adequate reliability, these results can be explained by the low variability of the raw scores.

Our results suggest that the memory subtests have good test-retest reliability, but due to the relatively small size of the statistical sample, further research is needed to obtain more accurate results.

Key words: test-retest reliability, memory tests, child neuropsychology