

Working Memory and Intraindividual Variability in Response Time Mediate Fluid Intelligence Deficits Associated With ADHD Symptomology.

Brydges CR, Ozolnieks KL, Roberts G.

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Abstract

OBJECTIVE:

To determine if decreased fluid intelligence was associated with ADHD, and was mediated by deficits in working memory and intraindividual variability in motor responding.

METHOD:

The present study tested 142 young adults from the general population on a range of working memory, response time, and fluid intelligence tasks, and an ADHD self-report symptoms questionnaire.

RESULTS:

Total and hyperactive ADHD symptoms correlated significantly and negatively with fluid intelligence, but this association was fully mediated by both working memory and intraindividual variability in response time. However, inattentive symptoms were not associated with fluid intelligence.

CONCLUSION:

These results have important implications for clinicians using speeded psychometric tests as part of their assessment battery, working memory interventions for ADHD patients that focus on performance improvement without controlling for response consistency, and also demonstrate potential differences in the neuropsychological profiles of ADHD subtypes.