Executive function and attention span in euthymic patients with bipolar 1 disorder.

ABSTRACT

This is a cross sectional comparison study to assess executive function and attention span in euthymic patients with bipolar 1 disorder. It compares the performance of these two cognitive domains in 40 patients with bipolar 1 disorder to that of 40 healthy normal subjects using Trail Making (TMT), Digit Span (Forward and Backward) and Verbal Fluency (VF) tests. The association between demographic, clinical characteristics and performance in all tests were examined. Patients with bipolar illness showed significant impairment with moderate to large effect sizes (VF= 0.67, TMT A= 0.52, TMT B = 0.81, Digit Forward= 0.97, Digit Backward= 1.10) in all tasks of executive and attention functioning. These impairments are observed in the absence of active mood symptoms while duration and severity of illness are not found to have an effect on both cognitive domains. Medications received by patients with bipolar disorder have significant association with performance on executive tasks. The results of this study add on to the existing global evidence of cognitive impairment in bipolar illness despite its cross cultural differences. Its presence in the absence of mania, depression or mixed episode indicates that cognitive impairment is stable even after symptoms recovery.

Keyword: Attention span; Bipolar 1 disorder; Cognitive impairment; Executive function.