Impact of Tourette syndrome on education

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Background:

Tourette syndrome (TS) is characterized by motor and vocal tics. Previous studies have shown that TS has an impact on academic achievements. The aim of this study was to investigate the association between TS and education, including the influence of severity of tics and comorbidities.

Methods:

During 2005-2007, 395 participants were included in a large cohort (314 with TS and 81 controls) and mean age was 12.60 ± 2.64 years. The cohort was re-examined after 6-8 years where N=276 participants (223 with TS and 53 controls) were included with a mean age of 18.52 ± 2.73 years. At both timepoints, severity of tics and the presence and severity of comorbidity were assessed. Educational achievements were assessed through structured interviews.

Results and Conclusions:

Vocal tics were found to be inversely associated with having passed lower secondary school at a prospective level. At a cross-sectional level, severity of motor tics was found to be inversely associated with having passed high school. The severity of comorbidity was found to be associated with educational level at a longitudinal view, but not cross-sectional. Overall, children with TS had a lower passing rate at lower secondary school and high school compared to healthy controls. We found that this difference was more likely driven by severity of comorbidities than tic severity. Tic severity only influenced children with TS in order to give them the right support and thereby optimize educational opportunities.