Increased risk of developing psychiatric disorders in children with attention deficit and hyperactivity disorder (ADHD) receiving sensory integration therapy: a population-based cohort study

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Abstract

Parents of children with attention deficit hyperactivity disorder (ADHD) have been found to prefer sensory integration (SI) training rather than guideline-recommended ADHD treatment. This study investigated whether SI intervention for children with ADHD was associated with a reduced risk of subsequent mental disorders. From children < 8-years-old newly diagnosed with ADHD in a nationwide population-based dataset, we established a SI cohort and a non-SI cohort (N = 1945) matched by propensity score. Incidence and hazard ratios of subsequent psychiatric disorders were compared after a maximum follow-up of 9 years. The incidence of psychiatric disorders was 1.4-fold greater in the SI cohort, with an adjusted hazard ratio of 1.41 (95% confidence interval 1.20–1.67), comparing to the non-SI cohort. Risks were elevated for emotional disturbances, conduct disorders, and adjustment disorders independent of age, gender, or comorbidity. Among children with only psychosocial intervention, the incidence of psychiatric disorders was 3.5-fold greater in the SI cohort than in the non-SI cohort. To our knowledge, this is the first study to report an increased risk of developing psychiatric disorders for children with ADHD who received SI compared to those who did not. Potential adverse effects of SI for ADHD children should be carefully examined and discussed before practice.