



Study Summary

ECHO Study Suggests Children with Autism Are More Likely to Experience Emotional & Behavioral Challenges Like Anxiety, Depression, & ADHD

Authors: Heather E. Volk, et al.

Who sponsored this study?

The Environmental influences on Child Health Outcomes (ECHO) Program, National Institutes of Health supported this research.

Why was this study needed?

The study aimed to understand how common behavioral and emotional problems are in children with autism spectrum disorder (ASD), using a large national group of participants and looking at differences between boys and girls. It also explored whether children with greater difficulties in social communication related to ASD tend to have more behavioral and emotional challenges.

What were the study results?

Children with ASD had higher scores on the Child Behavior Checklist (CBCL)—a questionnaire that helps identify emotional and behavioral problems in children and adolescents. Higher CBCL scores among children with ASD indicate a possible connection to greater emotional and behavior problems overall—including depression, anxiety, and ADHD—compared to children without ASD. Conversely, higher CBCL scores were strongly linked to the likelihood of receiving an ASD diagnosis, especially for children scoring in the top 30%. Among children with ASD, girls showed significantly higher levels of anxiety and depression compared to boys, with differences depending on their age. As autism-related traits measured by the Social Responsiveness Scale (SRS) increased, CBCL scores also rose, suggesting that children with more autism-related traits might also experience other emotional or behavioral challenges.

What was the study's impact?

This study suggests that increased monitoring of behavioral and emotional problems may be beneficial for children with ASD. The results of this study indicate that children with ASD may be more likely to experience these issues throughout their early life.

Who was involved?

The study included 7,998 children from 37 ECHO Cohort Study Sites across the United States. This included 553 children who had a clinician diagnosis of ASD, including 432 boys and 121 girls.

What happened during the study?

The study surveyed parents of children aged 2.5 years to 18 years to collect information about their child's demographics, ASD diagnoses from a doctor, and scores from two behavior assessments: the SRS and the CBCL. Researchers compared average CBCL scores, which measure emotional and behavioral problems, based on whether the child had ASD and whether they were male or female. They also used statistical methods to see if children with ASD were more likely to have higher CBCL scores and to understand how SRS scores related to CBCL scores.

Footnote: Results reported here are for a single study. Other or future studies may provide new information or different results. You should not make changes to your health without first consulting your healthcare professional.

What happens next?

Additional research could help researchers understand what kinds of support and interventions could be effective for children with ASD, who may be more likely to experience emotional and behavioral challenges.

Where can I learn more?

Access the full journal article, titled "Co-occurring Psychopathology in Children with and without Autism Spectrum Disorder (ASD): Differences by Sex in the ECHO Cohorts," in [Journal of Autism and Developmental Disorders](#).

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