Title: Longitudinal Associations between Mother and Father Parenting Stress and Child Behavior in Children with ASD

Authors: Geovanna Rodriguez, Sigan Hartley

Introduction: Co-occurring behavior problems such as impulsivity, hyperactivity, social anxiety, and mood dysregulation are highly prevalent in children with autism spectrum disorder (Mannion, Leader, & Healy, 2013) and have been shown to be significantly associated with parents’ self-reported level of parenting stress (Hayes & Watson, 2013). The majority of studies examining the link between level of parenting stress and the co-occurring behavior problems of children with ASD have been cross-sectional. Only a few longitudinal studies (Hastings, 2002; Neece, Green, Baker, 2012) have attempted to tease apart the time-order effects that connect these variables in samples of children with neurodevelopmental conditions. Moreover, little is known about whether the direction and strength of these associations differ for mothers versus fathers. The overall aim of the present study was to examine the bidirectional relationship between level of parenting stress and severity of child co-occurring behavior problems across four waves of data spanning 3 years in sample of 188 families of children with ASD. The secondary aim of this study was to compare the strength of these associations in mothers vs. fathers within couples.

Method: Children with ASD (aged 5 to 12) and their parents (N= 188 families) were part of a larger longitudinal study examining family outcomes in ASD. At Time 1, parents had an average age of 40.02 years (SD = 6.70). The target child with ASD had an average age of 7.23 years (SD = 2.4). The majority of target children were male (87%), about half had intellectual disability (46%), and 22% were of ethnic/racial minority status. Participants were assessed at four time points, approximately 12 months apart. Mothers and fathers independently completed the Child Behavior Checklist (CBCL; Achenbach & Rescica, 2002) and a measure of parenting burden (Zarit, Reever, & Bach-Peterson, 1980) during lab or home visits.

Results: For the present study, separate cross-lag panel analyses using MPlus software were run for mothers and fathers to examine the relation between parenting stress and child behavior problems spanning each 12 month period. Stability between mother and father-reported child co-occurring behavior problems and level of parenting stress from Time 1 to Time 4 were found for both mothers and fathers across all four waves (p < .001). Cross-lagged path effects (i.e., directed regression paths) were examined. According to mother-report, a significant relation was identified between level of parenting stress and severity of child co-occurring behavior problems; higher levels of parenting stress at Time 1 predicted higher severity of child co-occurring behavior problems at Time 2 (β=.26, p < .001), and level of parenting stress at Time 2 predicted higher severity of child co-occurring behavior problems at Time 3 (β=.42, p < .001). No cross-lagged effects were found between mother-report of level of parenting stress at Time 3 and severity of child co-occurring behavior problems at Time 4. According to father-report, a similar pattern emerged with cross-lagged effects; level of parenting stress predicted severity of child co-occurring behavior problems from Time 1 to Time 2 (β=.17, p < .05). Higher levels of parenting stress at Time 2 also predicted higher severity of child co-occurring behavior problems at Time 3 (β=.23, p < .01) for fathers. There were no cross-lagged effects for Time 3 to Time 4. The strength of these associations were slightly stronger for mothers than for fathers.

Discussion: Overall, analyses provide evidence of a bidirectional relation between level of parenting stress and severity of child co-occurring behavior problems in families of school-aged children with ASD. Our findings suggest that while the time-order pattern of associations is similar for mothers and fathers of children with ASD, associations are stronger in mothers. From a family resiliency perspective, it is important to understand the factors that may buffer against these negative bidirectional effects and thus this should be the focus of future research.
References/Citations:


