Language Regression as a Predictor of Outcomes in Autistic Children Through the Preschool Years

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**BACKGROUND**

- Parents frequently report observing word loss (i.e., regression) in young autistic children, but the evidence for differences in resulting language outcomes remains equivocal.
- Most previous studies reported worse language outcomes in the regression group (e.g., Bernabei et al., 2007). Some evidence suggests no effect (Pickles et al., 2009; Tamanaha et al., 2014), and one reported better current outcomes in the regression group (Davidovitch et al., 2000).
- Most studies require strict word loss criteria be met based on the ADI-R, which may exclude many children experiencing subthreshold losses (Pearson et al., 2018). By employing progressively less strict sets of definitional criteria, the current study sought to capture what may be a more dimensional symptom onset pattern.
- In addition, little is known about regression in preverbal communication skills such as cooing, babbling, and vocal imitation.
- Autistic children demonstrate an uneven language profile across the preschool years, but it is not yet known whether regression impacts expressive and receptive language equally (Davidson & Ellis Weismer, 2017).
- Using a standardized measure specifically designed to assess expressive and receptive language independently, this study added needed clarity and refinement to our current understanding of the impact of regression in ASD.

**METHOD**

- Do autistic children with a history of language/communication regression demonstrate different expressive and receptive language outcomes across the preschool years than autistic children without a history of communication language regression?
- Among autistic children with a history of language/communication regression, does the number of words used before loss predict expressive and receptive language outcomes across the preschool years?

**RESULTS**

- **Question 1:** Controlling for child age and nonverbal IQ, children with history of regression had lower AC raw scores at visit 2 (44 months) than those without, no matter which set of regression criteria were used (Figure 3). This difference was not significant for any set of criteria at visit 4 (66 months).
- **Question 2:** Controlling for child age and nonverbal IQ, number of words used before loss predicted AC and EC raw scores at visit 2 (44 months), among those who met criteria for Any Communication Skill Loss. This effect was not significant for any set of criteria at visit 4 (66 months).

**CONCLUSIONS**

- Regression in ASD may have a small, transient (within the first 12 months following assessment) effect on receptive language.
- Differences in language outcomes between children with and without regression are no longer detectable by school entry (66 months).
- Regression in ASD may be dimensional rather than dichotomous, underspecified by traditional criteria.
- Regression in ASD does not appear to develop into a unique language profile or require a specialized clinical approach.
- Clinicians are advised to personalize speech-language intervention to the individual strengths and needs of each autistic child.

**REFERENCES**


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