

The Prosody of Contrastive Focus in Children with High-Functioning Autism

Introduction

The expression of focus is crucial for effective communication [1]. Previous work on focus marking in children with Autism Spectrum Disorder (ASD) has mostly adopted a phonetic approach [2] and little is known about the phonology of focus prosody in ASD. This study addresses this gap by investigating the location of prominence and the strategies to signal it in children with High-Functioning Autism (HFA).

Methods

Speech data from 18 Portuguese-speaking children with HFA (5–15 years, $M = 8.06$, $SD = 2.31$, $IQ \geq 80$) and typically developing (TD) peers, matched for age, gender, and non-verbal IQ, were analysed from the Contrastive Focus Production Task of the PEPS-C [3]. Productions were annotated in Praat following the Portuguese ToBi framework [4], and analyses assessed accuracy of prominence placement, error patterns and prosodic strategies (pitch accents, boundary tones, and duration cues). Participants' scores on the Peabody Picture Vocabulary Test (PPVT) were included to explore associations with focus production accuracy.

Results

Preliminary findings suggested that children with HFA showed significantly lower accuracy in placing prominence on the correct target word than their TD peers ($U = 81.0$, $p = .005$). In error patterns, TD children most often placed prominence on a single non-target word (29% of mismatches), whereas HFA peers tended to distribute it across multiple words. Regarding prosodic strategies, TD children predominantly used the expected H*+L accent, even when misplacing prominence, while HFA children employed a wider variety of pitch accents and relied more on durational cues. Larger receptive vocabulary was associated with greater accuracy in HFA children (PPVT: $p = .53$, $p < .001$).

Conclusions

Findings suggest that the phonology of contrastive focus prosody is impaired in children with HFA, with mismatches in prominence location and intonation categories. These results provide new insights into the interplay between prosody and pragmatics in ASD.

Keywords: Prosody, Contrastive Focus, Autism Spectrum Disorder

References

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