

Background

Methods

Autism Spectrum Disorder (ASD) is characterized by difficulties with communication and social interaction. An important aspect of treating ASD is early intervention to alleviate the social learning deficits present in children with ASD. Parents naturally play an important role in a child's development, and some research suggests responsive caregiver interactions lead to better communication in typically developing children as well as children with ASD. Several studies have demonstrated a positive relationship between parental responsivity and increased communication skills (McDuffie, A & Yoder, P; Flippin, M & Watson, L; Haebig et al.; Walton et al.). Trials have also shown interventions that focus on increasing the responsiveness of a caregiver's parenting style can have a positive impact on a child's language outcomes (Shire et al., Baranek et al., Kasari et al.). In this systematic review, our aim was to answer our research question: "In young children with autism spectrum disorder, how is parenting interaction style (responsiveness vs. directiveness) related to concurrent and later communication outcomes?"

Search Terms

PubMed

- Autism spectrum disorder, ASD, Asperger's, PDD-NOS, pervasive developmental disorder, PDD, autistic, or autism
- Child
- Parent responsivity, responsiveness, or directiveness
- Communication or language

PsychINFO and ERIC:

- Autism spectrum disorder, ASD, or autism
- Parent responsiveness,
- responsivity, directiveness, or directivity
- Communication or language

Child or children

Inclusion Criteria

- Peer-reviewed articles published 1990-2018
- English-only
- Intervention or description articles
- Diagnosed or at risk due to related
- symptoms for ASD **Exclusion Criteria:**

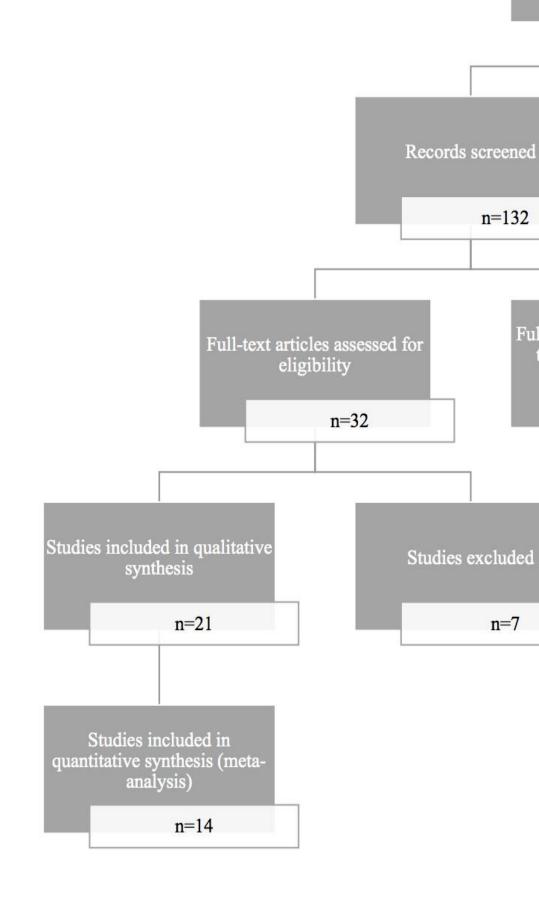
• Children over 6

Co-morbid conditions

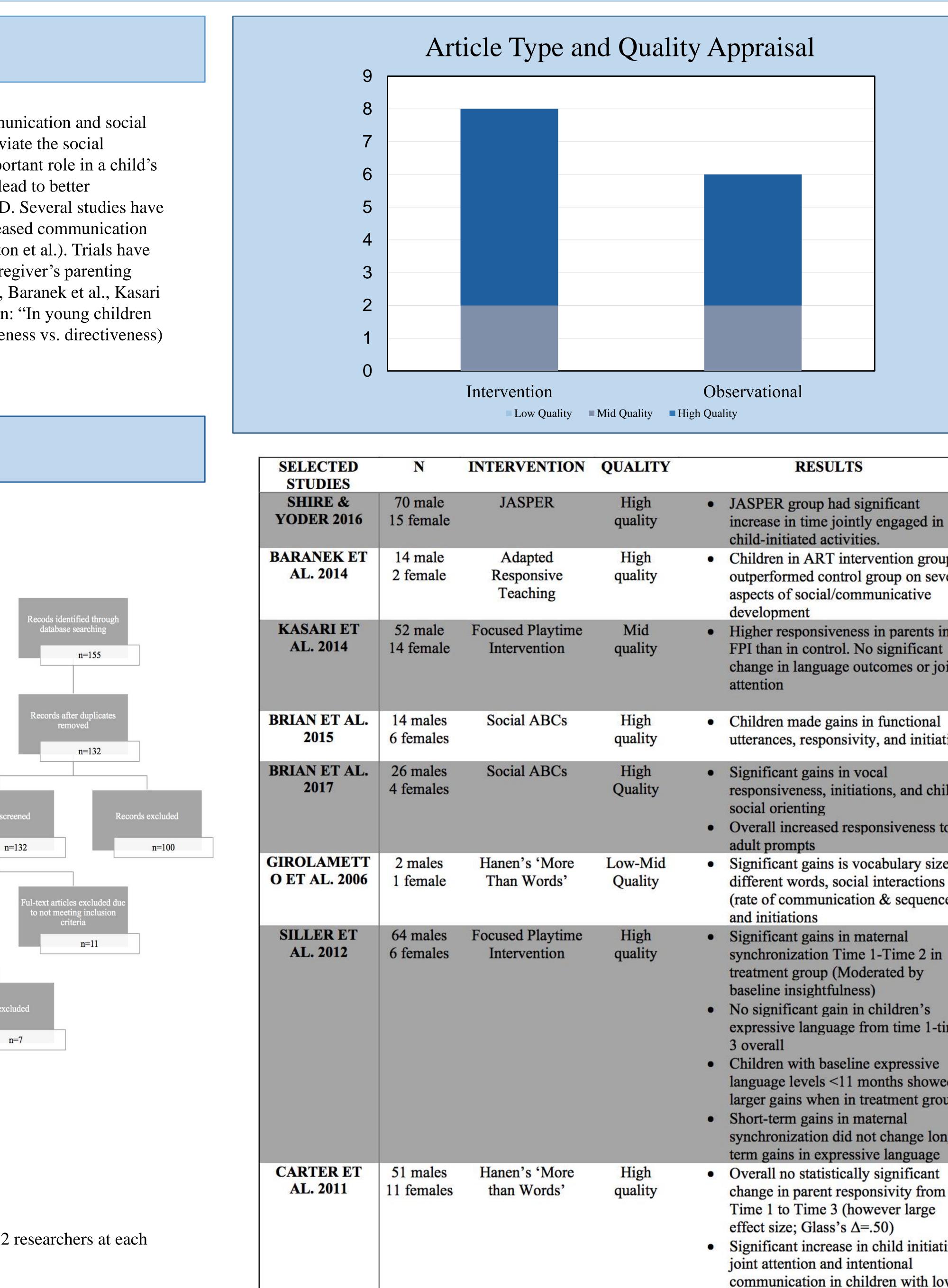
Procedures:

Articles were independently reviewed with at least 20% of articles reviewed by 2 researchers at each step:

- Text/Abstract review interrater reliability 80% (100% with consensus)
- Full text review interrater reliability 86% (100% with consensus)
- Quality Appraisal (using Joanna Briggs Critical Appraisal Tools (Briggs, 2017))– interrater
- reliability 85% (100% with consensus)
- Data extraction interrater reliability 100%



Systematic Review of Parenting Interaction Style and Communication Outcomes in Children with Autism Spectrum Disorder **Christine South, Grace Padget, Makayla Anderson Division of Speech and Hearing Sciences, University of North Carolina at Chapel Hill**



gh lity gh lity id lity	 JASPER group had significant increase in time jointly engaged in child-initiated activities. Children in ART intervention group outperformed control group on several aspects of social/communicative development Higher responsiveness in parents in FPI than in control. No significant
	change in language outcomes or joint attention
gh lity	 Children made gains in functional utterances, responsivity, and initiations
gh llity	 Significant gains in vocal responsiveness, initiations, and child social orienting Overall increased responsiveness to adult prompts
-Mid lity	 Significant gains is vocabulary size, different words, social interactions (rate of communication & sequences) and initiations
gh lity	 Significant gains in maternal synchronization Time 1-Time 2 in treatment group (Moderated by baseline insightfulness)
	 No significant gain in children's expressive language from time 1-time 3 overall
	 Children with baseline expressive language levels <11 months showed larger gains when in treatment group
	 Short-term gains in maternal synchronization did not change long- term gains in expressive language
gh lity	 Overall no statistically significant change in parent responsivity from Time 1 to Time 3 (however large effect size; Glass's Δ=.50)
	 Significant increase in child initiating joint attention and intentional communication in children with lower object interest at entry (i.e. played with fewer than 3 toys)

- Walton et al.)
- al.; Haebig et al.; Siller et al.)

than others

- child language outcomes
- outcomes
- with ASD
- studies

- 899–912. doi:10.1002/aur.1582
- Journal of Early Intervention, 33(3), 220–234. doi:10.1177/1053815111427445

- Autism and Developmental Disorders, 43(9), 2218–2227. doi:10.1007/s10803-013-1763-5

- change. Developmental Psychology, 44(6), 1691-1704. doi:10.1037/a0013771

Results

• Our search strategy and inclusion and exclusion criteria yieled 14 articles

• Studies found increases in children's communication outcomes as measured by duration of time jointly engaged, social smiling, functional utterances, initiations of intentional communication, social play, receptive language, and/or vocalizations

• Most intervention studies reported positive impact on language outcomes when the intervention increased parent responsiveness (Shire et al.; Baranek et al.; Brian et al. (2015 & 2017); Girolametto et al.; Kasari et al.)

• Longitudinal and case studies showed a link between parent responsiveness and better language outcomes (McDuffie, A & Yoder, P; Flippin, M & Watson, L; Haebig et al.;

• There is some evidence that these interventions were more successful with subpopulations of children with specific deficits, such as lower initial language abilities, and the findings in intervention trials were mirrored by findings in case studies (Carter et

Discussion

• Heterogeneity of ASD symptoms requires that investigation be conducted about which subpopulations of ASD may be more impacted by parent responsiveness interventions

• Kasari et al. study found no significant link between increased parental responsivity and

• Possible confounding variables such as initial parent insightfulness may be moderating

• Further quality research is needed to examine the effects of parent-mediated intervention and the long-term impacts it may have on the language abilities of children

• Most of the children were male, because females with ASD are traditionally underrepresented due to lower prevalence of diagnosis, therefore results may not be generalizable to female children with ASD

• Limitations include a lack of exploration into the gray literature and English-only

References

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