Objective
To evaluate the best available evidence of social skills interventions for children who use augmentative and alternative communication (AAC), with special consideration of the following variables:
• Cause of impaired communication
• Setting of intervention
• Target of intervention
• Specific social skill trained
• Intervention procedures

Introduction
Children who develop language through AAC face unique barriers in their ability to acquire social communication skills
• Environmental barriers (e.g., lack of public knowledge, inclusion)
• Differential language learning (e.g., operating device competency, communication breakdowns)
• Contributing psychosocial factors (e.g., motivation)
• Comorbidities (e.g., Autism spectrum disorder)

Methods: Search for Evidence
Databases & Journals searched for evidence:
• EBSCOHost, PubMed, PsychINFO, and ERIC
• Augmentative and Alternative Communication, Journal of Speech, Language and Hearing Research, and the Journal of Intellectual Disability Search Terms:
• A search was conducted using a combination of different search terms such as "social skills," "augmentative and alternative communication" and "child".
• A hand search of references lists, applicable was completed as the final step
• This search resulted in 846 articles who's titles an abstracts were screened (many were redundant across databases).

Inclusion Criteria:
• Children aged 3-21 who use AAC as their primary mode of communication
• All intervention types included in review
• Published between 1990-2018
Final search results:
• A total of 9 studies met search criteria and inclusion criteria.

Appraisal of Evidence: Methods and Main Findings
1. Extraction of information from each study relevant for the review question
2. Assessment of evidence quality based on the following criteria:
   • Randomization of participants, rigor of design and statistical methods, clarity of participants definition, psychometric quality of outcome measures, rates of attrition, fidelity of treatment, generalization/maintenance of results following intervention, and potential confounding variables.
3. Determination of overall quality
   • Common methodological limitations included lack of randomization, lack of blinding, small sample sizes, lack of reported effect sizes, and the potential for confounding variables impacting results (e.g., attrition, spillover effects, teacher intervention confounds, previously established relationships).
4. Synthesis of evidence:
   • Efficacy of social skills interventions seems to vary based on: cause of impaired communication, setting of intervention, target of intervention (child AAC user or peer), skilled trained, and intervention procedures (see Figure 1 below)

Conclusion
• Cultivation of social communication skills requires understanding of cognitive and language processes of the child who uses AAC, motivational factors, and successful management of environmental and physical barriers
• Child AAC users with complex social and cognitive limitations require additional supports and time to acquire skills
• Interventions should ideally target both the child AAC user and their communication partners in varied settings to promote for generalization of skills
• Interventions should target a range of social- communicative skills to increase the overall social reciprocity of peer-to-peer interaction

Limitations
• Studies meeting search and inclusion criteria may have been missed due to library inaccessibility or under-informative abstracts.
• Studies before 1990 were not included
• This review did not specifically focus on the impact of psychosocial competencies on relationship development

Gaps in Knowledge
• Increasing design rigor
• Research that evaluates the social validity (the value) of intervention intended to train social communication skills
• Research that addresses the generalization across environments and maintenance of the skills over extended periods of time
• Prioritizing patient and family goals
• Preservice and in-service training for professionals on intervention

Acknowledgements
This project was completed to fulfill a graduation requirement in the University of Delaware’s Speech-Language Pathology Master’s Program.

References
9. Light, J. C. (1999). Teaching partner training leads to successful generalization of skills to new environments (school, home, etc.). Teaching partner training leads to successful generalization of skills to new environments (school, home, etc.).
10. Light, J. C. (2001). Teaching partner training leads to successful generalization of skills to new environments (school, home, etc.). Teaching partner training leads to successful generalization of skills to new environments (school, home, etc.).

Contact Information
Shelby McMenamin
University of Delaware
smcmen@udel.edu