

The Effect of Picture Exchange Communication System and Speech Therapy on Communication Development of 4-8 Years Old Autistic Children

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Abstract

Objective: This study compares the effect of speech therapy and picture exchange communication system (PECS) on communication development of 4-8 years old autistic children.

Materials & Methods: This is an experimental and comparative study. In this study 10 subjects including picture exchange communication system and speech therapy groups were selected using the available sampling method on the base of including and excluding criteria. Both groups were matched according to age and developmental indices of Niussha scale. Dependent variables were listening, receptive language, expressive language, cognition, speech and social communication. Intervention was applied for both groups similarly divided in 40 minute sessions 3 times a week for 3 months. Our parameters were evaluated by Niussha development scale before and after the interventions. The results were analyzed clinically and statistically by sum-ranks Wilcoxon and rank-signed Wilcoxon.

Results: Post test comparison between the two groups revealed that the members of picture exchange communication system group had a more progress in listening, receptive language, cognition and social communication skills rather than speech therapy group. But these differences were not statistically significant and T (sum ranks) was between critical values.

Conclusion: Considering the results, it could be concluded that picture exchange communication system is a effective strategy to train non-verbal autistic children. Moreover it could be used as a supplement teaching method beside other therapeutic methods such as speech therapy.

Keywords: Speech therapy/ Picture exchange/ Communication system/ Non-verbal autistic children/ Communication skills/ Neusha developmental scale