Social Skills Improvement in Children with Autism Spectrum Disorders

By

Dalal Fadawi Saud Alshammari Ahad Bahaekm & Moana Barnawi

Teaching Assistant, College Science and Arts. Northern Border University.
Rafha 76323 PO Box. 2945

Department of Early Childhood Students of University of Northern Colorado

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Dalal Alshammari(*) & Ahad Bahaekm & Moana Barnawi(**)

Abstract

Autism is a developmental disability that affects the normal functioning of the brain. Autism is present from birth and has an effect on how an individual learns. Individuals with autism often have difficulty with communication skills, social skills, and reasoning. Integrating students with Autism Spectrum Disorder (ASD) in inclusive classrooms with peers without disabilities is a common strategy for increasing social. Research has demonstrated that peers can help teach social skills to students with autism. The sample of the study will be selected non-randomly. There will be 24 students in this study. Also, three special education teachers will be in this study. All participants are native English speakers. The purpose of this study is to identify the best way to increase social skills for students with autism through inclusive classrooms.

Keywords: Autism-Peer support-Social skills-Students with Autism

(*) Teaching Assistant, College Science and Arts. Northern Border University. Rafha 76323 PO Box. 2945.
(**) Department of Early Childhood – Students of University – of Northern Colorado.
تحسين المهارات الاجتماعية لدى الأطفال المصابين باضطراب طيف التوحد

الملخص باللغة العربية

تهدف هذه الدراسة إلى التعرف إلى أفضل طريقة لزيادة المهارات الاجتماعية للطلاب ذوي اضطراب التوحد وذلك من خلال دمجهم في الفصول الدراسية العامة مع أقرانهم العاديين. تم اختيار عينة بشكل عشوائي. سيكون هناك 24 طالب و3 معلمين من الفصول العامة. جميع المشاركين لغتهم الأصلية هي اللغة العربية.

تم مقابلة معلمي الفصول العامة من خلال استخدام استبيان لتحديد تأثير وفاعلية المهارات الاجتماعية في الفصول الدراسية. وقد أظهرت استجابة المعلمين بشكل إيجابي في فاعلية دعم الأقران في زيادة المهارات الاجتماعية لدى اضطراب التوحد من خلال الأنشطة اليومية.

الكلمات المفتاحية: التوحد - دعم الأقران - المهارات الاجتماعية - الطلاب ذوي اضطراب التوحد.
Introduction

Peer Support for Students with Autism Spectrum Increases Social Interaction.

Autism is a developmental disability that affects the normal functioning of the brain. Autism is present from birth and has an effect on how an individual learns. Individuals with autism often have difficulty with communication skills, social skills, and reasoning. Common characteristics include lack of eye contact, social aloofness, difficulty with expressing needs verbally, repetition of words or phrases, and responding differently to sensory input. It is important to keep in mind that behaviors change over time as the student develops and learns. Integrating students with Autism Spectrum Disorder (ASD) in inclusive classrooms with peers without disabilities is a common strategy for increasing social opportunities for all students.

Inclusive classrooms mean that every student has the opportunity to learn in a neighborhood school. Inclusive classrooms concentrate on implementing best practices for students with special needs within the regular classroom. Within inclusive classrooms, all students have the chance to interact with and learn from their peers. Inclusive environments can provide opportunities for students with autism to increase their social interactions and in turn improve their social skills. Supporting social interactions and positive peer relationships are important in middle and high education and transition programming. Learning appropriate socialization skills is a necessary first step; teachers should develop social opportunities by using a systematic, direct instruction approach because it assumes to be the placement of students with autism in inclusive education settings with the result in social benefits for these students.
The proportion of students with ASD spending greater than 40% of their day in regular education continues to steadily rise, with recent statistics indicating an increase from 47% to 56% between 2004 and 2009 (U.S. Department of Education, National Center for Education Statistics, 2012). These figures likely reflect a growing understanding of the strengths and abilities of children with ASD, as well as an increased recognition that social interactions with typically developing peers can enhance the socio-communicative outcomes for students with ASD (Laushey & Heflin, 2000). Interacting with peers gives students with autism a chance to practice communication skills, develop friendships and see how peers behave in day to day situations.

The purpose of this study is to identify the best way to increase social skills for students with autism through inclusive classrooms. The researchers assumed that social interactions play an important role in increasing basic social skills as well as improving the quality of life for people who have autism. Also, they assumed that social interactions improve the learning process. The researchers assumed that inclusion settings may be appropriate to gain social interactions for students with autism. This research is to find the best way for students with autism inside classrooms easily through increasing social opportunities with typical peers. It includes a small sample size, which is different from other resources. This study offers teaching and improving social skills in inclusive environment for students who have autism that interact with their peers in the classrooms. This idea is connected to other resources that already exist.
Research Question

▪ How do teachers foster peer support in inclusive middle and high school classrooms to increase social skills for students with Autism Spectrum?

▪ Purpose of the Study
▪ Significance of the Study
▪ Limitations of the Study
▪ Definition of Terms

Autism Spectrum Disorder (ASD): is a diagnosis characterized by delays in the development of socialization and communication skills (Dombrowski, 2018). There are many types for ASD. In this study, ASD is categorized as follows: 1- mild autism, 2- moderate autism, 3- severe autism, 4- Asperger's syndrome, and 5- Rett’s syndrome.

Literature Review

Peers can help teach social skills to students with autism. Peers also benefit by having students with autism in the classroom. When peers of students with autism are educated, and are given an opportunity to act as peer tutors, they learn acceptance to act as role models and become more aware of individual strengths and weaknesses (Wagner, 1999).

The efficacy and social validity of peer network interventions has been examined as an avenue for promoting social interactions and social skills for two high school students with ASD (Karen F. Gardner et al., 2014). The introduction of peer networks was accompanied by substantial increases
in peer interactions for both students. Each time the peer network was temporarily withdrawn in this study, the percentage of intervals containing social interactions decreased substantially despite students remaining in the same classes. While much attention has focused on fostering these important peer relationships among preschool and elementary students with ASD, there remains a dearth of guidance on effective avenues for supporting social connections in high school settings. Gardner et al. found that implementation of peer networks within a high school advisory classroom was associated with substantial and sustained increases in both social engagement and peer interactions. Peer networks established shared activities within an existing classroom setting that was otherwise not considered a context for meeting the social-related goals of students.

Social interaction interventions have been conducted among high school students with autism and their general education classmates (Cosgriff, J. C, 2012). Minimal social interaction typically occurs between high school students with autism and their general education peers unless programming is introduced to promote interaction. Three general education high school students were taught to set interaction goals and monitor their interactions with a peer with autism in their classes.

This study represents a departure from previous interventions by teaching general education students a strategy to prompt themselves to increase their interactions with classmates with autism. The current study falls in the camp of peer-mediated or peers support strategies in which the primary intervention Peer-Delivered Social Interaction Intervention 11 component is (a) general education peers as the active agent in initiating and maintaining social interaction with classmates with autism or intellectual disability.
According to Cosgriff, J. C (2012), “Despite the potential benefits of social interaction goal setting as demonstrated in this study, however, we have identified no published study in which general education high school students have learned to set goals for interacting with their classmates with autism and to monitor and evaluate their goal attainment daily”.

There is expanding evidence that peer-mediated interventions for students with autism are effective in increasing participation in natural settings (Kamps et al., 2002). Still unknown are the contributions peers make to the generalization of social behaviors.

Students with autism tracked over a 3-year period with participation in multiple peer mediation interventions indicated improved social interaction skills with nondisabled school students. The level of interaction also matched those of peers sampled. Peer training formats that have included the use of modeling, prompting, and reinforcement strategies within the context of activities, and those that included multiple peers over time, have shown notable changes in interaction skills for students with autism. These outcomes suggest a generalization of social skills by both students with autism and peers—a trend where social situations become more naturally reinforcing for students with autism, with an improvement in general responsiveness on the part of peers to students with disabilities. The second certain result was that consistent contact with peers, or familiarity via inclusive classes in the absence of peer training also generalizes social behaviors, though less interaction occurs than with structured peer mediation. Social interaction also occurred among the students with autism and strangers, although again less frequently than with trained or familiar peers. These findings recommend a generalization of
skills by students with autism under these studies and prepared peers modeling interaction in natural settings by many students to engage with students with disabilities in social situations when the expectation to do so is stated and reinforced by teachers and peers.

There is a promoting social interaction skills between students with Autism Spectrum Disorders and their typical peers in school (Owen et al., 2008). They think the social difficulties differ from individual to individual who have ASD. These difficulties include impaired non-verbal communication, poor attention and few conversations with others. They assumed that the inclusion of students with ASD in general education would socially benefit these students. This study used peer training intervention to teach students with ASD social interactions. In this study, there were two students with ASD, one was in second grade and one was in fourth grade. Also, two to four typical students were present in training sessions. This study was conducted across approximately 6 months. Training lasted in three sessions from 30 to 45 min. This study shows that peer training can be a viable strategy for increasing interactions between typical peers and students with ASD. The results of this study indicated that peer training intervention improved initiations and responses for both students with ASD and their typical peers in inclusive school settings such as, lunchtime and recess.

Students with Autism Spectrum Disorders do not engage and interact in social interactions due to the inability associated with ASD (Cummings et al., 2017). This study evaluates whether explicit social skills instruction in a group in an afterschool setting developed the frequency of specific social skills in two students who have ASD. They believe that Social skills
and communication deficits are core features of ASD. Communication deficits in children with ASD include difficulty producing and understanding words, phrases, and gestures. As children with ASD become older, the communication deficit becomes more evident in difficulty with social communicative behaviors. These behaviors include difficulty with pragmatic language conversations and topics. In this study, there were fifteen students who participated. Seven of the participants were typical students and eight had an Autism Spectrum Disorder. Some of these participations were selected randomly. Two of these participants were ages 9 and 11 years in this study. The authors in this study used the book Skill Streaming Lesson Plans and Activities to develop the social skills lessons. It is a prosocial skills instruction manual that can be used by teachers, counselors, and others. The time of this study lasted once per a week for eight weeks from 4:30 –5:30 p.m. at a university computer lab. Each student sat strategically at a different computer, they surrounded themselves by different peers every week. The design of this research was appropriate because this study includes the effectiveness of an intervention on three various behaviors (i.e., asking for help, giving a compliment, and accepting a compliment). Data was collected two times per Minecraft club throughout this study. The results of this study showed that all participants responded to the intervention by rising their rate of asking for help and giving a compliment during the intervention sessions.

Moreover, teaching social skills to adolescents with Autism Spectrum Disorder in the classroom, which is the Program for the Education and Enrichment of Relational Skills (PEERS) (Laugeson et al., 2014). They believe that social skills training is a base treatment method
for teenagers with Autism Spectrum Disorder. Few studies examined the effectiveness of teaching social skills in the classroom. Moreover, the total participation was seventy-three students with autism who were in middle school with their parents and teachers. Participants were assigned to the PEERS treatment or social skills curriculum. Instruction was provided every day by classroom teachers and teacher aides in 14-weeks. The results of this study showed that participants in the PEERS treatment group significantly improved in social functioning in the areas of teacher-reported social responsiveness, social communication, social motivation, social awareness, and decreased autistic mannerisms. Adolescent self-reports indicated significant improvement in social skills knowledge. This study is considered one of the few teacher-facilitated treatment intervention studies showing effectiveness in increasing the social skills of teenagers with autism in the classroom.

The article addresses the use of Peer-Mediated Interventions (PMI) to improve the social interaction skills of students with Autism Spectrum Disorder (ASD) in inclusive classroom settings. As is known, the social interactions with peers play an important role in childhood and adolescence that can influence a student’s success in school, social and emotional development. Also, 80% or more students with ASD spend time in general education classes.

Interacting with peers can be challenging, and there are social skills deficits for the students with Autism Spectrum Disorder (ASD) that can adversely affect students that lead to withdrawal and isolation, making integration into the school and community difficult. Moreover, the Peer-Mediated Interventions (PMI) approach was used to facilitate social
interaction in students with ASD. The outcomes of the PMI are to increase social interaction of students with ASD in inclusive settings in classrooms. The study involves a systematic analysis of studies and focuses on the use of PMI to improve the social interaction skills of students with ASD in inclusive environments. The 14 studies took place in settings in which students with disabilities were included with typical developing peers. Eight studies utilized a single setting and the total participants were 38 males and 6 females, they were mostly adolescents or young adults ranging in age from 13- to 21-years-old. Peers were also taught to naturally interact with participants by responding as well as a variety of procedures were used to train peers to implement initiation and promote methods and strategies with participants with ASD. The strategies included verbal and gestural prompts to elicit the participants’ use of scripted social phrases and offering praise for each correctly used phrase. It is interesting the studies noted positive generalization and the results used peer interventionists based upon similar selection criteria. Also, teachers used strategies that included verbal explanation, modeling, role-playing, feedback, visual aids, and prompting to train peers. Several studies involved direct instruction across several sessions on how to interact with participants with ASD.

The article review supporting social interactions and positive peer relationships is an important element of comprehensive secondary education and transition programming. The students with Autism Spectrum for Disorders (ASDs), have a lack of social connections. Also, the study showed the efficacy and social validity of peer network interventions as an avenue for promoting social interactions and social skills for two high school students with ASD. The study offers recommendations for designing social-
focused interventions for adolescents with ASD and highlights future research directions. Adolescence is frequently characterized as a period of substantial change within the social lives of young people (Rubin, Bukowski, & Laursen, 2009). For many adolescents with Autism Spectrum Disorders (ASDs) social interactions is a complex and challenging endeavor. The efforts, skills and opportunities they need to enjoy increased interactions with peers take on importance with increased social interaction in inclusive classrooms. Moreover, peer-mediated interventions hold particular promise for enhancing the social connections of adolescents with ASD (Carter et al., 2014). These studies illustrate engaging adolescent peers actively in social-focused intervention efforts. Also, peer networks involve establishing a cohesive social group of peers around a student with disabilities to promote social, communication, and other outcomes within the classroom and/or across the school day. The purpose of the present study was to examine the efficacy, social validity, and treatment fidelity of peer networks for students with ASD in a high school setting. A group of 18-year-old European American males in their senior year of high school were diagnosed with autism. For the peer partners, teachers had to recommend at least two peers (i.e., peer partners) who did not have ASD, who demonstrated appropriate social skills. The measures include social interactions, social engagement of the students’ engagement with peers as either active, passive, or unengaged. Social-related goal, support behaviors has a checklist included these behaviors: promote student to interact with other peers, encourage other peers to interact with the student. The occurrence of various support behaviors directed toward the focus student by peer partners and the facilitator was recorded using a checklist completed at the end of each
observation. Both adult facilitators considered these peer networks to be an acceptable social support model within these advisory classes.

The students with Autism Spectrum Disorders (ASD) have significant delays in socialization. Students with ASD often struggle to develop meaningful social relationships with their peers. Learning appropriate socialization skills is a necessary first step that is often taught using a systematic, direct instruction approach. The purpose of this study was to assess the effectiveness of a Teaching Interaction (TI) procedure on four social skills. Before the intervention, the participants showed relatively low levels of the four social skills targeted; however, after intervention, all participants showed a significant increase in their ability to perform the skills. Furthermore, the data show that all participants maintained the learned social skills over time. Teaching social skills through a group instructional format provides several advantages over individual instruction of the same skills (Charlop, Schreibam, & Tryon, 1983). Also, social skills instruction provides an increased opportunity for students to learn through observation of their peers. Therefore, teaching socialization skills within the context of a social group provides an opportunity for the targeted skills to be practiced and shaped within the naturalistic setting, which may lead to an increased likelihood of generalization (Dotson, Leaf, Sheldon, & Sherman, 2010). The intervention that shows potential to assist students in this population in advancing their social competence is the Teaching Interaction procedure. Additionally, a set of six inclusion criteria were set for approving participation in this study. Direct observations of students with ASD in their school environments, record reviews, and parent interviews were utilized to determine potential participants within one
school setting. Each session began with cooperative free play activities while the teacher conducted performance probes on each social skill with each participant. Overall, all participants demonstrated the targeted social skill behaviors when, and only when, the TI procedure was implemented.

Sample

The sample of the study will be selected non-randomly. There will be 24 students in this study. The first participants will be from three middle schools who are six typical students and six students who have autism. The second participants will be from three high schools and there are six typical students and six students with autism. The ages of the participants are from 14-17 years old. The students will be volunteer chosen from a public middle and high school in a midsize city in the Rocky Mountain region of the U.S. Also, three special education teachers will be in this study. All participants are native English speakers.

Instrument

The first instrument will include observation and use check list interaction through three daily activities indoor and outdoor. Once the target students are identified, each teacher will be asked to nominate six typical students who have excellent social skill supporters. The researchers will ask the students to divide into three groups during lunch time. Then, they will try to encourage the students with autism to open the conversation in different topics such as movie, sports, and travel. After they are talking about their favorite sports, they will play in sport class and focus on verbal communication in isolation, and then introduce it in a social setting with peers. Also, peer social interaction includes outdoor activities such as finding things at a park or the best way to solve a problem as a team.
Check List Interaction Through Three Daily Activities

<table>
<thead>
<tr>
<th>Student name:</th>
<th>Date:</th>
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<td>1-</td>
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<td>- &gt; Always</td>
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<tr>
<td>Appears to enjoy interacting</td>
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<td>2</td>
<td>3</td>
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<tr>
<td>2-</td>
<td></td>
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<tr>
<td>Able to enter to group successfully</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
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<tr>
<td>3-</td>
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<td></td>
<td></td>
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<tr>
<td>Communicate effectively with peers</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
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<tr>
<td>4-</td>
<td></td>
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<td></td>
<td></td>
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<tr>
<td>Shows enjoyment</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
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<tr>
<td>5-</td>
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<td>Sharing ideas verbally</td>
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<td>6-</td>
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<tr>
<td>Appears comfortable with group</td>
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<td>7-</td>
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<tr>
<td>Shows interest in different activities</td>
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<td>8-</td>
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<tr>
<td>Appears engaged, involved</td>
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<td>9-</td>
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<tr>
<td>Uses peer’s name</td>
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<tr>
<td>10-</td>
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<td></td>
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<tr>
<td>Shows emotional and body gestures</td>
<td>1</td>
<td>2</td>
<td>3</td>
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</table>

The second instrument will interview the teachers. The Interview questionnaire will be used to identify the effect of using social interactions in classrooms. For example, the researchers will ask the special education teachers open-ended questions. Some examples of the interview questionnaire are, how do the students with autism interact with their typical peers? How do you think classroom activities increase social interactions with students who have autism and their peers without disabilities?

Procedure

Two observations will be conducted, which will last 20 minutes each. Those observations will be in the classrooms and lunch groups. Also, the researchers will schedule different times for each activity. In addition,
two interviews will be conducted, which will last approximately 60 minutes. All those observations and interviews will last one week. Additionally, for the students, the researchers will meet them at the classrooms after getting district approval to make observations in schools.

Analysis
The researchers will use social interaction check list to establish a range of typical social interaction in indoor and outdoor activities in which the researchers observed. Using observation procedures already described, the researchers will collect data on the social interactions, social engagement, and proximity of peers present in schools. Activities can help in many ways to make students’ social interactions more comfortable. The teachers will have all the strategies implemented in the activities that targeted social interaction. During interviews, teacher’s partners responded positively about their activities. When asked if the activities foster peer interaction, they seemed pleased with the outcomes. Attending activities with students and observing their behavior is the best way to help students increase better social skills. The three special educators also would continue encouraging proximity between students with and without autism to facilitate interactions. Also, they observed positive student outcomes, and planned to share strategies with staff to facilitate interactions in other inclusive classrooms.

Conclusion
In this study, social interaction by peer groups was the leading predictor of favorable attitudes, suggesting that in addition to continuing evidence-based interventions to prepare students with ASD to enter a social environment, educators should intentionally prepare a positive peer environment that facilitates social success.
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