

# Music Improves Morning Transitions for Children with Autism

**D**OES MUSIC HAVE THE POWER TO TRANSFORM? For children with autism it just might. A study to be published in the *Journal of Autism and Developmental Disorders* showed that when two children with autism were greeted by their teacher with a song highlighting the morning routine, their ability to independently complete that routine increased. Songs helped the children enter the classroom, greet the teacher and classmates, and engage in play.

## The Challenge of Transitions

Transitions are difficult for most young children. Anyone entering a child care setting has witnessed a child in tears clinging to a parent, noted the amount of time it takes to get children outside to play, or watched the chaos that can ensue at snack time. As hard as these transitions may be for typically developing children, they are often exacerbated for those with autism.

Previous research has identified three strategies that help children with autism successfully transition from one activity to the next: structure and predictable routines, visual cues, and songs. While findings demonstrate that music therapy can be beneficial, it was unclear the effect it might have on children's morning arrival routine. This study is the first to examine the effect of greeting songs on the performance of young children with autism. It addressed the following questions:

- Does the use of an individually composed song, sung by teachers, increase appropriate independent performance during the morning arrival routine of young children with autism?
- Can classroom teachers apply the principles important to music therapy in a particular routine?
- Does use of the song increase interactions between the child with autism and his peers?



## DOES THE USE OF AN INDIVIDUALLY COMPOSED SONG INCREASE INDEPENDENT PERFORMANCE DURING THE MORNING ARRIVAL ROUTINE OF YOUNG CHILDREN WITH AUTISM?

Petra Kern, an author of the study, wrote a greeting song for each boy. The music was composed to match the child's personality and the lyrics included five steps that were part of the morning routine. The boys were expected to:

- Enter the classroom independently,
- Greet a teacher or classmate,
- Greet a second teacher or classmate,
- Wave goodbye to their caregiver, and
- Engage in appropriate play.

Kern taught the caregivers and teachers the songs she composed. In addition, she used circle time in each classroom to teach the song to each child's classmates.

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Prior to the song, the first child's independent activities were limited to entering the classroom and finding a toy with which to play. With the introduction of the song, his independence steadily progressed, so that by the tenth session he demonstrated consistent independence in four of the five steps. When the teacher stopped using the song, the child's performance immediately decreased and by the second day he was back where he had initially started. The song was reintroduced three days later, and he immediately improved, and by the ninth session he performed all of the steps of the routine independently.

The second child's independence most often was limited to entering the classroom prior to using the song. Once the song was introduced, he still had difficulty, particularly with the goodbye step. The researcher and teacher eliminated this from the child's routine (the caregiver left before the child entered the classroom) resulting in significant improvement—he often completed three and even all four steps independently.

Like the first child, as soon as the teacher stopped using the song, the independent behavior also stopped. When the song was reintroduced, the child once again completed all four steps on his own.

### CAN CLASSROOM TEACHERS APPLY THE PRINCIPLES IMPORTANT TO MUSIC THERAPY IN A PARTICULAR ROUTINE?

The effects just described occurred with the teacher, not the music therapist, implementing the song in the morning greeting routine. Neither teacher had formal musical training or experience with music therapy interventions. As demonstrated by other studies, teachers can successfully incorporate intervention strategies into their classrooms when training and monitoring are provided. That said, the teacher did have difficulty with some aspects of singing the song, notably the change in tune used in the good-bye portion.

### DOES USE OF THE SONG INCREASE INTERACTIONS BETWEEN THE CHILD WITH AUTISM AND HIS PEERS?

Researchers noted that several parents and teachers perceived that relationships improved. In fact, the mother of one classmate noted that her son was intimidated by the child with autism prior to the intervention, but with the song was anxious to arrive early and participate in singing it.

Peer interactions, however, were measured only with the second child. The song motivated classmates to interact with the child. This effect lasted even when the song was stopped. ■

This study was limited in size. It included two boys, age three, with autism. Both were in the mild to moderate range on the Childhood Autism Rating Scale. They had limited speech and social interaction with peers. The morning arrival transition was particularly problematic for both boys.

Additional participants included 13 classmates, 5 classroom teachers, and the two children's caregivers. Neither the teachers nor caregivers had previous experience with music therapy interventions.

## Conclusion

The study offers encouraging findings to help children with autism through a difficult part of their day. Given the extremely small sample size, the authors recommend it be replicated with additional participants. The study suggests future research on the effects of songs in other challenging routines for young children in inclusive classrooms.

Furthermore, the potential affect on peer relationships calls for more research on how songs designed for children with autism affect their peers.

## Data Collected

Adult and child behaviors were observed and measured during morning arrival time. These sessions lasted between two and ten minutes. One child was observed for 28 sessions over two months and the other was observed for 31 sessions over three months.

Data collectors noted if adults provided prompting (assistance with any steps in the routine). Children were observed to determine how they responded—independently, with some assistance, no response, incorrectly, or inappropriately.

## To Learn More

Kern, P., Wolery, M., & Aldridge, D. (in press). Use of songs to promote independence in morning greeting routines for young children with autism. *Journal of Autism and Developmental Disorders*.