

North Carolina Teacher and Special-Education Preschool Students Rely on Juno Classroom Sound System

Debra Thompson teaches special-education preschool children at Mary McArthur Elementary School in Fayetteville, North Carolina. She understands the importance of using a high-performance sound system in the classroom.

The Challenge: Unreliable Sound System Disrupts Teaching

Around the country, educators recognize the challenges of teaching children with hearing loss and other disabilities. In Thompson's class, some students have hearing aids or cochlear implants, while others who don't have devices still struggle to hear or focus on the classroom instruction.

Students with hearing loss often have trouble saying words or modulating their volume when they speak, because they have difficulty hearing themselves. Because Thompson teaches preschool children ages 3 to 5, she has the added challenge that her students are naturally louder and more active than older children, and it can be difficult to keep their attention.

"When you teach young students with hearing loss, developmental delays or autism, a great sound system isn't a luxury—it's a necessity," Thompson says. "I've always used an amplification system, but it hasn't always been reliable. One system we used wouldn't even reliably turn on. Some days it would work, and other days it wouldn't—and we couldn't figure out why. That was frustrating for me and the kids, because we rely so heavily on having a sound system."

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Special Education Teacher
Mary McArthur Elementary School

The Solution: Juno Advanced Classroom Audio System

The Cumberland County School District researched and purchased the Juno system from FrontRow in October 2013. Juno is an advanced classroom audio system that combines the convenience of portable audio products with the sound quality and coverage of installed systems. It also features sophisticated voice-activated lesson capture and sharing technology for students who miss a lesson or need additional review time.

"Juno is a freestanding system with great portability and sound that doesn't require any installation," Thompson says. "It's really easy to use, too. I was up and running quickly with essentially no learning curve."

Thompson downloaded the software and a FrontRow technician walked her through the features of the system. She asked him a few questions and was fully prepared to use Juno in class the next day.

"Since we switched to Juno, I've had zero problems with the sound system," Thompson says. "I wear the microphone around my neck and no matter where I go in the classroom, the sound quality is superior to any system I've used before. There's never any feedback or other sound interference like I've experienced with past systems."



The FrontRow Juno system is an installation-free infrared amplification system with a lightweight teacher microphone. "The sound quality is superior to any system I've known before," says Debra Thompson.

Thompson uses the system's second, pass-around microphone to encourage children to say words and make sounds. When the students aren't using the microphone, it's available for the instructional assistant to use. Juno allows for both microphones to be used simultaneously with no interference or delay.

"When students' PFM systems are integrated with Juno, they can hear me through my microphone and they can also hear their peers through the pass-around microphone," Thompson explains. "They have access to the entire learning environment, which is vital to learning, participation and success."

Juno integrates all classroom technology and media, so if a teacher plays a video or audio learning activity on a computer, Juno amplifies the sound directly to students' PFM systems as well as to the whole class.

For example, Thompson often plugs her iPad into Juno and has the children gather for "listen activities," such as identifying the sound of a dog barking. With the system before Juno, she had to take her microphone off and physically hold it near the iPad — which still produced poor audio quality and limited her ability to interact with students.

The Results: Student Performance Dramatically Improves

Since using the Juno system, Thompson has seen a dramatic increase in her students' verbal capacity.

"With Juno, my students just grab the pass-around microphone and this is part of the natural lesson flow," she says. "I constantly hand them the microphone and say, 'You say it.' Now kids who weren't vocalizing or verbalizing are doing so routinely."



Thompson has seen significant improvement in listening skills with all children, particularly the children in her class with cochlear implants.

Thompson says her students' listening skills have also improved greatly. For example, she's seen a significant improvement in the children with cochlear implants. These students especially benefit from web-based listening exercises amplified by the Juno system.

"I understand the importance of using a high-performing sound system in the classroom — and so do my students," Thompson says. "If I forget to turn on my microphone, the kids come up and turn it on for me. This is the best testament to how much better Juno is than our previous system, and how much my students rely on it."

About FrontRow

Since 1963, FrontRow's extensive acoustic and audiological products and experience have helped teachers bring learning to life. FrontRow systems are designed with a deep understanding of speech intelligibility, childhood development, evolving technology and real-world usability.

FrontRow classroom amplification systems can vastly improve a teacher's clarity so that children in the back of the classroom hear as clearly as those in the front. FrontRow products are practical, cost-efficient solutions for improving instructional quality in more than 60 countries and tens of thousands of classrooms worldwide.



Thompson has her instructional assistant use the pass-around microphone to help team-teach, but equally as important, to encourage student participation.

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