

Case Study: AVerVision Document Cameras Help Bridge Learning Diversity in Union City, CA

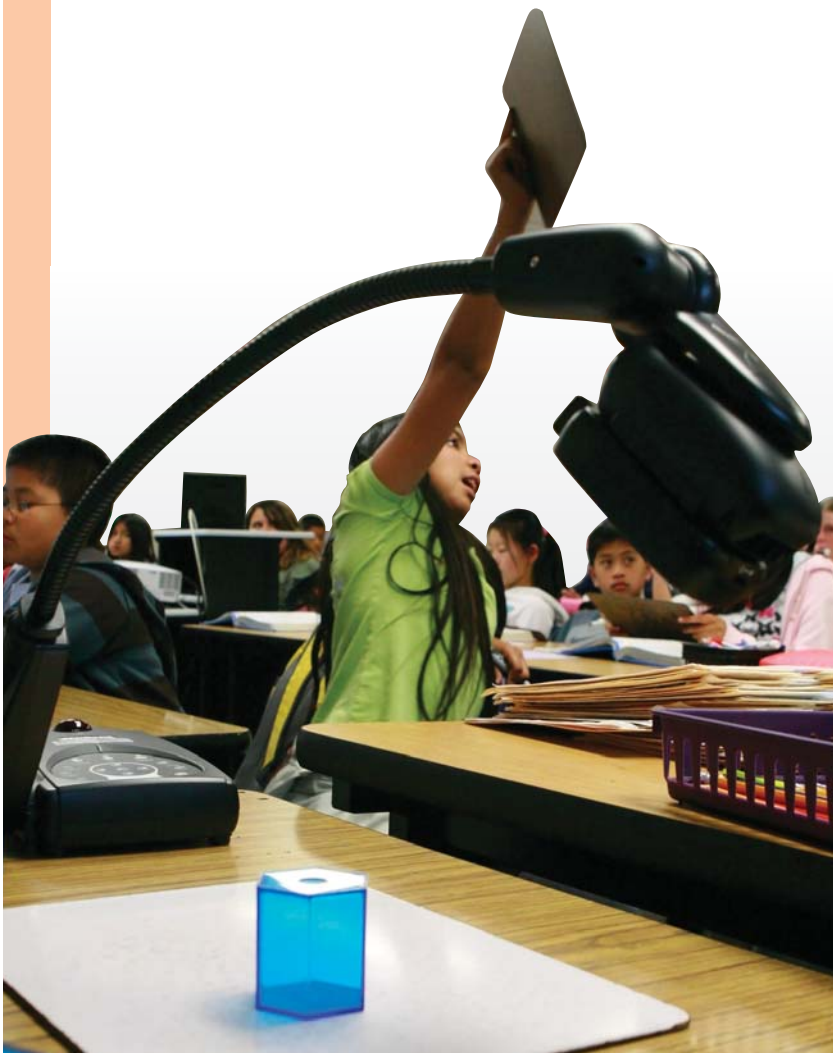


In an academic world surrounded by an abundance of technology, educators have quickly realized that students require more interaction and stimulation in order to enhance learning, retention and comprehension. While all children have potential students react and respond to a variety of sensory stimulation, especially when it comes to overcoming learning disabilities. These disabilities can include mental, physical, or even language difficulties. In today's day in age, where there are typically 25-30 students within the traditional elementary classroom, it is difficult to provide personal attention to student's with, or without learning issues. This, combined with the various ways students comprehend information makes it difficult to standardize a particular teaching method across the board. However, it is becoming more apparent that visual stimulation and interaction has shown positive improvements in comprehension and retention, for many students, disabled or not. Furthermore, since the concepts one learns in elementary school provide the basic building blocks for each student to advance his or her education, it is extremely important that students are given access to the proper tools to better their chances for success.

As the need for visual stimulation increases, classroom technology becomes more important to accommodate these requirements. Various types of visual and interactive technology in the classroom is becoming a necessity, not only for those with learning disabilities, but for all students who can benefit from visual information.

Because of this growing need for visual technology in the classroom, Alvarado Elementary School, in Union City, California, agrees with the belief that having visual technology in the classroom will increase students' capacity for learning. Keith Guernsey, 5th grade teacher at Alvarado Elementary School, strongly believes that being able to use such tools in the classroom serves as a powerful stimulus for students, especially for low performing, or learning disabled students. However, budget limitations have made it difficult for Union City School District to obtain newer technologies for all classrooms, and until recently, Mr. Guernsey had limited sources of technology in his classroom, which consisted of an overhead projector, computer, projector and a laser pointer. While these tools serve to benefit visual requirements, utilizing them together to form a clear interactive environment was difficult.

After winning second place in an AVerMedia Technologies contest, Mr. Guernsey was awarded an AVerVision150 document camera. Since he has been using his document camera, Mr. Guernsey, now more than ever fully believes that visual technology in the classroom is an absolute necessity, especially within a school where, for numerous students, English is not their first language. Upon integrating the AVerVision150 with his existing computer and multimedia projector, Mr. Guernsey noticed immediate improvements, especially in regards to the students who do have language processing difficulties and for those who were not performing at the academic level they should be. For example, the ability to display and correct homework and depict math problems on a large screen provides a clear visual for the entire class to see and follow, rather than straight lecture or writing on a whiteboard. Mr. Guernsey notes that it is much easier for students to comprehend the information because



they are now able to clearly see all the visual components as a group. Guernsey states, "The AVerVision150 has helped improve the efficiency and effectiveness of teaching my students. My classroom is extremely diversified; there are gifted students, very low students, students with learning difficulties, English learners, wealthy students, students from families at a low socio-economics status, students with difficult home lives, defiant students, handicapped students, and the list goes on. It is an unbelievable challenge to help all of these students academically at the same time since there is such a big learning gap between them. In fact, closing the gap has become a very common term used to describe the biggest challenge that we teachers, especially here in California, are faced with. The document camera helps all of my students, no matter what challenge they are faced with, to receive visually, focus visually, and to comprehend and process quickly. Thereby, all students in my class are put more on a level playing field. Thus, the document camera helps to close the gap."

Furthermore, the ability to connect the AVerVision150 to a laptop or any pc has allowed Guernsey to maximize different details that he could have otherwise not have had access to, while saving time during his lesson plans. And although his document camera allows him to create more creative and advanced lessons, he has found that it is the routine activities and common uses that have enhanced his teaching ability. The simple idea of displaying visuals and being able to capture images and play them back, zoom in on them, or even being able to pan objects up and down has greatly improved the students comprehension and provides a more creative interactive learning environment.

Since having the AVerVision150 in his classroom, Mr. Guernsey can not imagine ever going back to the basic whiteboard or overhead projector. He has witnessed every single student benefit from using his portable document camera and has been able to spend more time teaching and less time repeating information to his students. The AVerVision150 allows students to grasp key information by allowing them to clearly visualize the key concepts and components of the lesson or demonstration. It is technology like this that helps Mr. Guernsey level the socio-economic playing field in his class, providing more time for advancing instruction, rather than continuously backtracking.

