Hello and welcome. As we say in New Zealand, kia ora koutou. My name is Dean Sutherland. I'm based in Christchurch, New Zealand. For the past 15 years, I've been involved in supporting both young children and adults with autism spectrum disorders, with a particular focus on supporting communication and social relationships.

During this short video clip, I'm going to focus on summarising some recent research that I've been involved with here in New Zealand. For many young children with autism, developing spoken communication, speech, spoken language is particularly difficult. Some research studies suggest that up to 30% or 40% of young children with ASD may never go on to develop effective spoken communication. With this in mind, it's really important to think about other ways we can support young children with ASD develop communication skills.

The research study that we focused on looked at three common augmentative and alternative communication modes. These are - picture exchange systems, such as the commonly used PECS system, manual signs, such as those provided in the Makaton system, and speech-generating devices, and these are commonly seen these days as touchscreen tablets such as the iPad, that also have apps or applications that help provide symbols for a user to look at and then provide a synthesised electronic voice output. So, the study that we conducted was with young children who had particular difficulty developing spoken communication. We taught them to use all three modes of communication and then looked at how easily they learnt these systems but also how long they maintained these skills over a period of time.

Throughout the study, we also looked at their preferences, and did they prefer one mode of communication as opposed to the other modes? Studies were conducted in comfortable and quiet environments, and we had experienced research assistants who were familiar with young children with autism and also very empathic in the way they communicated with these young children. So the
focus of this research was to determine if children with ASD could learn to use three different modes of communication and if they demonstrated a preference for the different modes of communication, and if so, how did this preference impact on their acquisition and learning of the mode of communication?

The focus of the teaching activities was for children to request more - more access to a desired item or a desired activity. So, what did we find? Well, some children learned to use these three devices relatively quickly. Some children learned to use some modes of communication more quickly than others. For example, a number of children learned to use the iPad to request more relatively quickly compared to, let’s say, picture exchange or manual signs. Several children in the study had great difficulty learning to use manual signs to request more. Considering the preference assessments conducted throughout the study, the iPad was preferred in approximately 70% of all instances across all children. However, there were a number of children that didn’t demonstrate a preference for the iPad and in fact preferred the picture exchange-based mode of communication.

There were a few children that appeared to learn their preferred mode of communication more quickly than non-preferred modes as well. So, what does this tell us about supporting young children with ASD to develop communication skills? Well, it’s important to consider the individual. What are their preferred modes of communication and how can we best support that? But there’s also a word of warning. If we’re going to focus on iPads for so many young children with ASD, is this in fact their most preferred mode? And what do we do when the iPad breaks, when the iPad runs out of battery, or when an iPad is unavailable in some situations? Have we provided support for this young child to use other modes of communication to get their needs and wants met in different contexts?

There’s obviously a need for a lot more research in this area, particularly to look at more advanced forms of communication, such as social exchanges between one or more people, using different contexts, different people, classrooms, teachers, peers and so forth. There’s clearly more research to be done, but a really important lesson from this research is, I guess, the variety and individual nature of each child with ASD and the need to…considerately and empathically consider those individual needs and individual differences in these young children. I’d also like to acknowledge my colleagues at Victoria University in Wellington, particularly Professor Jeff Sigafoos and Dr Larah van der Meer, who have been so instrumental in this research, and colleagues here at the University of Canterbury, Dr Laurie McLay and Dr Martina Schäfer.

I wish you all the very best in your journey as you develop your understanding and skills in supporting young children with ASD, and wish you all the very best. Ka kite.