

## Deana Szeto and Jennifer Haydon

• AT in the classroom setting has made an important improvement for students with disabilities to learn in different ways.

• Efforts toward having these types of technological devices in schools reflect a movement toward better understanding relationships between specific technology applications and positive classroom outcomes for students with disabilities.

**Where can assistive technology be used?**  
Home and School Environment

School is a popular setting for students because it's where children have highest demands



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**Who is assistive technology for?**  
People with Disabilities

Multi-research is the main performance

Video: [www.case-solutions.com](http://www.case-solutions.com)



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**Two Types of AT**  
Text-to-Speech




**Social Feedback**



**Reading Challenge**





**Computer Usage**




**Roschelle, et al (2001)**

• compared both groups and individual feedback with the use of two different types of technology

**Students and Teachers Perceptions about AT**



**How does assistive technology affect children's development?**

- Social-emotional development
- In education

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### Let's hear from our Pair Share

What do you know about assistive technology?  
Do you, or someone you know, have a disability?  
What's your experience working with children with disabilities?

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**What is Assistive Technology?**



**Assistive Tech in Education**

AT has increased the ability for students with disabilities to learn and make a more active role in classroom setting



**Activity: Design an Assistive Tech Device**

Philip is a kindergartener. He uses a wheelchair because he can't walk. He can't talk and has difficulty using his hands.


Philip wants to talk to others and participate in daily activities.

**Effectiveness of AT Use in Classrooms**




**Text-to-speech**

- Schmitt, McCallum, Hsieh, Chhabra, and Singas (2007)
- Examined if students listening while reading, learning plans, card direct reading
- Study focused on what would happen if listening while reading was extended
- They found text-to-speech improved reading comprehension
- When students listen while reading the text, it helped them process information easier



### References

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**Who is assistive technology for?**

People with disabilities

Multi-sensory & low-cost alternatives

Microsoft Learning Center  
CaseSolutions.com




**Two Types of AT**

Text-to-Speech

Computer Usage



**Social Emotional**



**Reading Children**



• Schep, Lisa Benmann, and Susan King


• examined the success of speech-generating devices in classroom performance

• based on two children with autism

• Purpose of this study was to find evidence regarding the effectiveness in a public school setting


• Custom AT provided helpful students ages 3-5 increase their performances

• Students in special education received interventions provided by AT devices

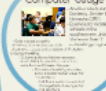


• Roschelle, et al (2001)

• compared both group and individual feedback with the use of two different types of technology



**Computer Usage**



**Electronics AT use in classroom**



**Students and Teachers Perceptions about AT**



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**Assistive Tech in Education**

AT provides support for children with disabilities to learn and relate to others in the classroom setting

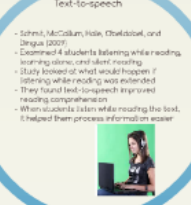
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## *Pair Share*

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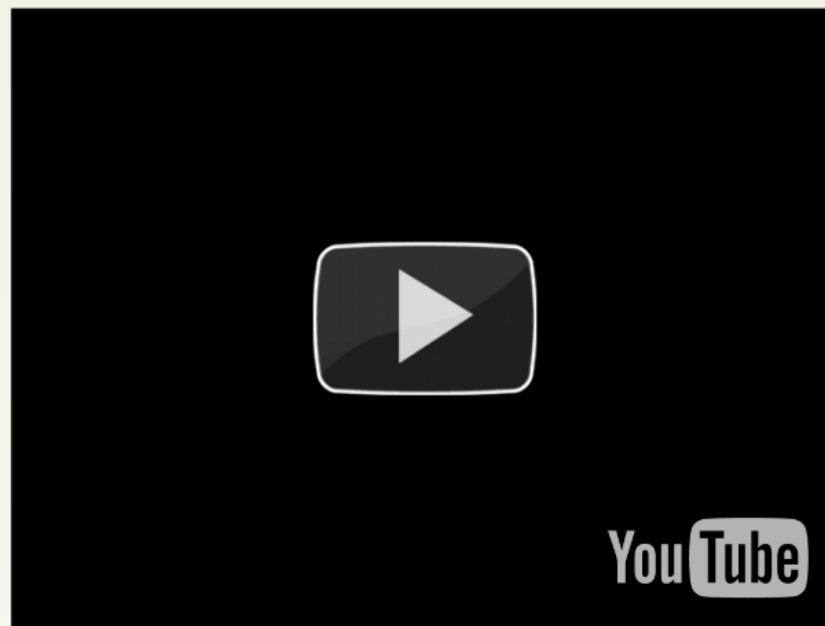
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# *What is Assistive Technology?*



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**ASSISTIVE TECHNOLOGY**

## *Who is assistive technology for?*

People with disabilities

Much research is from users'  
perspectives

[http://childtrends.org/?  
indicators=children-with-limitations](http://childtrends.org/?indicators=children-with-limitations)

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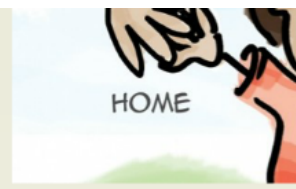
# *Where can assistive technology be used?*

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School is a popular setting for studies because it's where children have highest demands



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- Social-emotional development
- In education

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