Autism and Behavior

A NEURO-AFFIRMING APPROACH USING ASSISTIVE TECHNOLOGY



RETHINKING AUTISM:
EMBRACING
NEURODIVERSITY WITH
ASSISTIVE TECHNOLOGY
RESOURCE SERIES

Autism is a developmental disability with differences in social communication, social interaction, and restricted patterns of behavior, interests, or activities. Neurodiversity is often used in the context of autism, as well as other neurological or developmental conditions. "Neurodiversity describes the idea that people experience and interact with the world around them in many different ways; there is no one "right" way of thinking, learning, and behaving" (Baumer & Frueh, 2021). Through a neurodiversity-affirming lens, differences are considered variations rather than deficits.

This resource series informs educators of the need for a neurodiversity-affirming approach when thinking about how to use assistive technology to support students with communication and regulation.

Assistive technology (AT) can play a key role in supporting these differences by enhancing communication, fostering predictability, and addressing sensory needs. The table below demonstrates the shift from a traditional medical model to a more inclusive perspective on the communicative and behavioral patterns seen in autistic students.

TRADITIONAL MEDICAL MODEL	NEURODIVERSITY-AFFIRMING PARADIGM	
Persistent deficits in social communication and social interaction	Differences in perceptions, values, and approaches to social and communicative interaction	
Restricted, repetitive patterns of behavior, interests, or activities	 Preference for structure, order, and predictability Differences in intensity and function of some sensory stimulation 	
Deficits in nonverbal communication	Differences in using and understanding nonspeaking communicative behaviors	
Deficits in social–emotional reciprocity	Differences in practices of expressing social– emotional connection	
Deficits in developing, maintaining, and understanding relationships	 » Differences in social rules and conventions and differences in preferences for some social behaviors » Social dynamics that manifest in regard to neurodiversity are similar to social dynamics that manifest in regard to other forms of human diversity (e.g., diversity of ethnicity, gender, or culture) 	

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In addition to these differences in social communication and interaction, many autistic students require support to develop safe, symbolic ways to communicate their wants, needs, and preferences. Without a safe symbolic system that is consistently honored by others, students may engage in less safe and more physical ways to communicate and regulate.

The examples below highlight how differences in communication and regulation may impact a student's engagement and learning in educational settings.

AREAS OF CONSIDERATION	PRE-K/ELEM EXAMPLE	MS/HS EXAMPLE
 » Differences in perceptions, values, and approaches to social and communicative interaction » Differences in using and understanding nonspeaking communicative behaviors 	A student is unable to open something, and they do not have a way to ask for help. The student may become upset and engage in unsafe behaviors.	A student's calculator needs batteries and they cannot verbally explain. The teacher may mistakenly think the student is intentionally not following directions.
Preference for structure, order, and predictability	A student in 2nd grade may thrive on the routine. On days when the schedule changes unexpectedly, the student may become dysregulated.	A 10th grade student has a change in schedule due to schoolwide testing. The student experiences difficulty with transitioning and refuses to leave a preferred class for 30 minutes.
Differences in intensity and function of some sensory stimulation	A student may become upset and attempt to leave the classroom if a classroom activity involves messy materials (e.g., shaving cream).	A student might need to move (e.g., jump, pace) during class instead of sitting at their desk. When teachers and other students tell them to "sit down," the student could struggle to express needs which could lead to unsafe behavior towards others.

Thank you for reviewing this initial resource explaining how to consider communication and regulation needs from a neurodiversity-affirming perspective. For additional information about using assistive technology supports and strategies, please refer to the following handouts:

- ☐ Autism and Behavior: AAC Supports and Strategies
- ☐ Autism and Behavior: Visual Supports and Strategies
- ☐ Autism and Behavior: Sensory Supports and Strategies

REFERENCES

Baumer, N., & Frueh, J. (2021, November 23). *What is neurodiversity?*. Harvard Health Publishing-Mind & Mood. https://www.health.harvard.edu/blog/what-is-neurodiversity-202111232645

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