



Creating an inclusive classroom

A guide for education leaders

Who this is for:

This e-book is a resource for education leaders who want to understand the positive impact of creating a more inclusive educational environment. It is a guide for K–12 education leaders, including chief academic, technology, and information officers, school superintendents, directors of Title I funding, and school board members.



Estimated reading time:
8 minutes

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Using universal design for learning

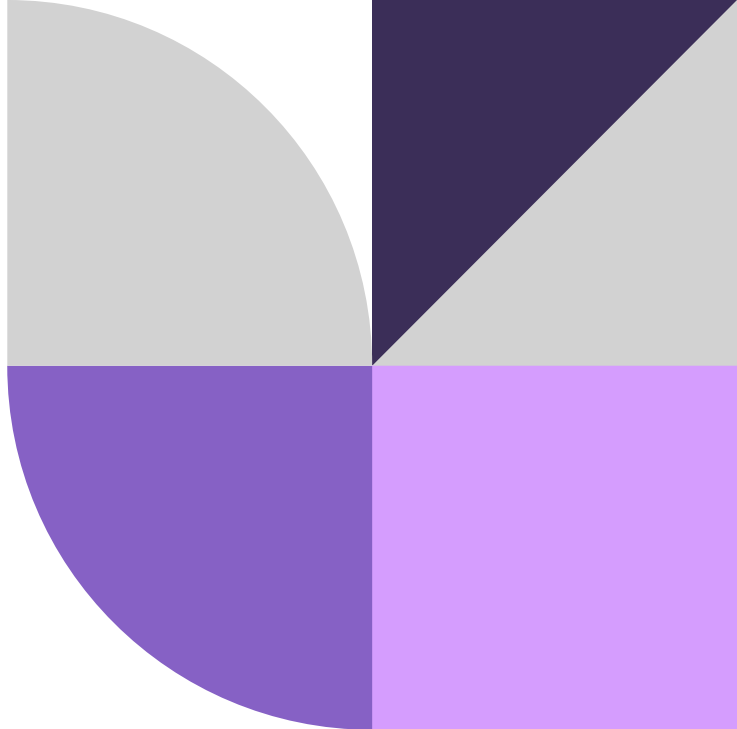
To enable students of all backgrounds and abilities to achieve their full potential, educators are increasingly incorporating the principles of inclusive design. The Inclusive Design Research Center defines this methodology as “design that considers the full range of human diversity with respect to language, culture, gender, age, and other forms of human difference.”¹

In the classroom, inclusive design principles recognize that learners require multiple ways to engage, express their creativity, and participate in building a foundation of knowledge—regardless of their ability, financial circumstances, primary language, location, or identity. This means creating learning experiences that provide each student with the opportunities, resources, technology, and support they need to thrive.



¹ [What do we mean by Inclusive Design?](#), Inclusive Design Research Centre, undated.

An inclusive environment enables all students to meaningfully engage in the curriculum together, regardless of their background and learning abilities. In addition to helping individuals develop the skills they need for future success, inclusive learning fosters a culture of collaboration and mutual respect that benefits everyone.



Education is core to Microsoft

At Microsoft, our mission is to empower every person and every organization on the planet to achieve more. That's why we've applied the principles of inclusive design to all Microsoft Education technology, and new solutions provide simpler and more granular controls to make learning easier for everyone.

This guide explains how inclusiveness in the classroom has evolved to better accommodate all learning styles and how technology can optimize the educational experience for students and teachers.

From standardization to a learning kaleidoscope

The way students absorb and express information is as different and nuanced as their fingerprints. Recent research shows that there is considerable variability even within individual learning patterns. These patterns are shaped not only by physical and mental abilities and social background, but also by emotions. The way students respond to teaching materials and challenges can change over the course of the school year, or even a single day, depending on the subject, situation, or student's emotional state.²

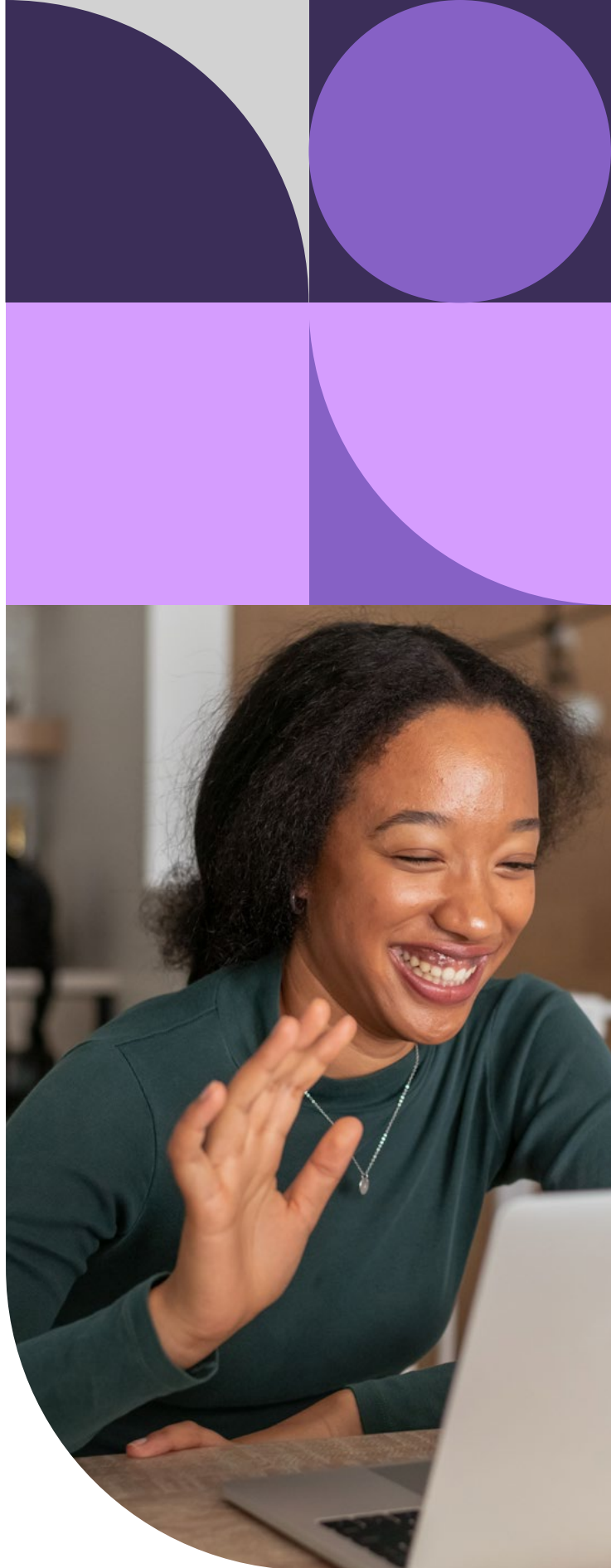
While educators have long realized that standard learning models have limitations, schools lacked the resources and technology to accommodate for individual differences at scale.



² Learner Variability Is The Rule, Not the Exception, Digital Promise Global, 2018.

The passage of federal laws such as the Americans with Disabilities Act (ADA), the Individuals with Disabilities Education Act (IDEA), and Title I, as well as requirements for Individualized Education Programs (IEPs) and 504 plans, paved the way for accommodating students' diverse needs by modifying physical infrastructure and using technology. They brought students with and without disabilities together, giving them the opportunity to make progress toward different goals in the same setting.

Inclusive learning goes further, extending well beyond making changes to accommodate disabilities. It recognizes that every individual—not just groups of individuals—has unique needs and learns differently. The goal is to enhance the learning experience for all by providing tools that can adjust to individual learning preferences. For example, teachers can allow students to complete assignments and demonstrate their mastery of learning skills in the method that suits them best, whether that means using dictation or creating a graphic design to express their knowledge.



An inclusive approach to education directly improves access to resources and support for all students, supporting the full continuum of vision, hearing, neurodiversity, and mobility needs. It also helps people dealing with anxiety or depression and provides tools to help students minimize distractions and focus attention on the task at hand.

Inclusivity and accessibility features make it possible for each student to have a learning environment that fits their individual needs, whether that means adjusting the color palette for color blindness, translating content to a more familiar language, choosing to hear a narrator read on-screen text, or controlling a mouse through eye movements.

Technology that contains built-in support for these and other inclusivity measures helps not only students, but also educators and administrators. While providing an inclusive learning environment is important, it can also put additional demands on faculty and staff if they must search for, learn, incorporate, and routinely update a set of tools. When inclusion tools are incorporated into classroom software, education professionals have more time to spend with students and hone their lesson plans.



The positive impact of inclusive learning

Schools that initiate inclusive learning solutions serve all students and their individual needs, which also benefits teachers and entire school systems.

Impact for students

- Increases agency and independence
- Makes learning accessible to all
- Better prepares students for the workplace and higher education
- Fosters well-being
- Increases student engagement
- Provides support in a non-stigmatizing way



Impact for teachers

- Empowers educators to adapt instruction to the needs of specific students
- Improves student engagement and motivation, which reduces behavioral distractions
- Enables support for students' unique learning needs without increasing workloads for teachers

Impacts for school systems

- Improves compliance with accessibility standards
- Improves learning outcomes across broader segments of the student population
- Promotes equity and inclusion



// “Inclusive education is the most effective way to give all children a fair chance to go to school, learn, and develop the skills they need to thrive.”³

³ [Inclusive Education](#), UNICEF, undated.

Tips for making classrooms more inclusive

Universal Design for Learning (UDL) is a framework for teaching and learning that aims to give all students an equal chance to learn. It removes barriers to learning by providing flexibility in how students can access and engage with educational materials and demonstrate their knowledge.

Its three core principles of representation, action and expression, and engagement can help educators make classrooms and schools more inclusive and equitable.



- **Representation**

When educators offer options to access curricula in different forms—text, audio, visual, or kinetic—students with different needs are represented, and it's easier for them to absorb information in the way that works best for them. For example, if students are having trouble concentrating on their reading, they may elect to have lessons read aloud to them instead.

- **Action and expression**

Providing students with different ways to demonstrate the educational material they have learned fosters creativity and enables them to hone new skills. For example, instead of only requiring a paper-based test for all students at the end of a lesson, educators might give students the choice to create a video or a graphic presentation of the same material.

- **Engagement**

Educators can also incorporate fun or game-like elements where appropriate to improve engagement for specific lessons. They can encourage more interaction among students. For example, the Collaboration for Effective Educator Development, Accountability, and Reform (CEEDAR Center) suggests having peer-to-peer check-ins in which each student talks with a classmate and reports back to the teacher on how they're doing.

For more specific, detailed guidance on ways to make the classroom more inclusive, teachers can consult the [CAST UDL guidelines](#) and this [CEEDAR Center report](#) on removing barriers to learning and engagement.



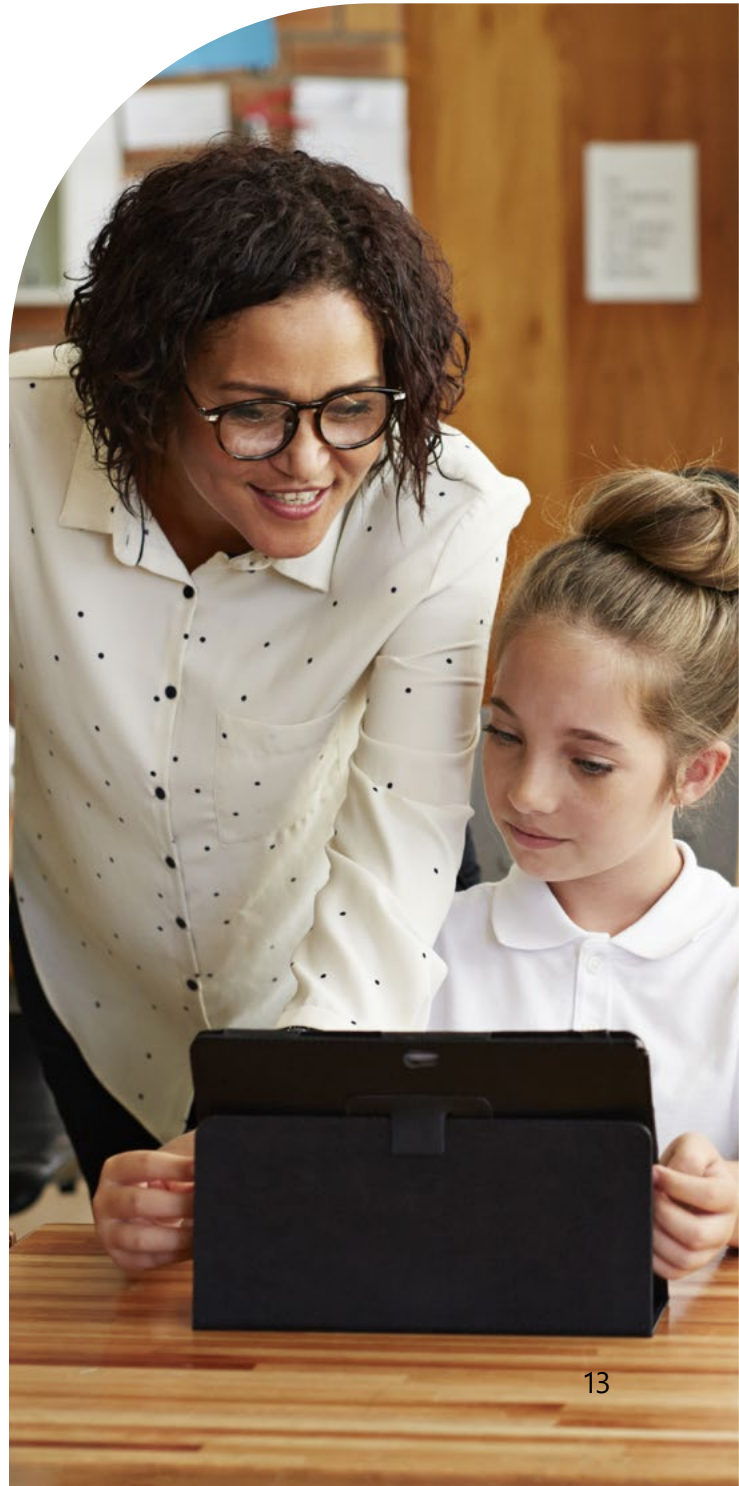
The role of technology

Increasing inclusivity with UDL is about building a foundation for success for all students. One way to do so is through tools that enable students to personalize their learning environment, which optimizes educator time and improves learning outcomes.

Technologies built with inclusivity in mind can also help students who may need extra support or accommodations to blend in and learn alongside their peers. These students no longer need to miss out on educational opportunities because they're afraid of standing out.

Modern technology also provides increasingly more options for user interaction, ranging from touchscreens to gesture recognition, haptic feedback, and brain interfaces. It allows students to adjust settings for individual variations in vision, hearing, mobility, and neurodiversity, placing everyone on a level playing field. For example, students learning a new language can use software that makes their words easier for others to understand, enabling smooth and natural conversations for all.

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Videoconferencing supports student collaboration on projects with classrooms around the globe, making it easier to share ideas in real time or on a virtual whiteboard. Soon, students may be going on virtual reality field trips, comparing notes as they manipulate museum artifacts and make discoveries.⁴

Microsoft provides a robust platform of built-in technologies that help students fully engage with their curriculum, classmates, and teachers in powerful new ways. These technologies are designed to support greater classroom inclusion and enable educators to spend less time creating workarounds and more time working with their students.

// This explosion of new technologies has profoundly affected the ways in which students with and without disabilities are using digital devices and resources for learning.”⁴

⁴ Future Ready Assistive Technology: Fostering State Supports for Students With Disabilities, Center on Technology and Disability, 2016.



Examples of Microsoft technologies that support inclusion and UDL principles include:



Reading

[Microsoft Learning Tools](#) and features like Immersive Reader provide a critical link for students who need help accessing course content and require literacy support. For students who have dyslexia, Immersive Reader can provide accommodations for people to have better access to text, including online using the Edge web browser, by stripping away distractions, adjusting text size for optimal comprehension, adjusting spacing of text and lines, or simplifying fonts.



Writing

Tools such as [Microsoft Editor](#) help build writing skills with suggestions for spelling and punctuation, grammar, and style. Using the [Text Predictor](#) feature anticipates next words and makes suggestions as students type, making it easier for them to follow an ongoing lecture as they take notes in class. In addition to typing away at a keyboard, students also have the choice to [dictate](#) their documents, emails, notes, presentations, and slides.



Math

[Math Assistant](#), available in [Microsoft OneNote](#), as a mobile app, and on the Edge browser, provides students with support for solving math equations. For example, a student can type in any math problem and have OneNote display step-by-step instructions that help the student understand how to reach the solution on their own.



Instruction

Solutions such as automatic alt text and [Microsoft Translator for Education](#) enable students to access the content that teachers are presenting. For example, Translator provides real-time subtitles and translation of text, websites, pictures, and voice, while automatic alt text uses AI algorithms to automatically suggest image and slide descriptions.

In addition, technology features such as Microsoft Windows 11 [Accessibility settings](#) allow students and educators to make changes and configure all devices to meet specific needs.

Accessible technologies like the ones above support diverse learning needs without adding extra work to educators' already tight schedules.

Expanding educational opportunity for everyone

There's never been a bigger need for schools to increase inclusivity. Disruptions to learning in recent years have left many schools and families unprepared to deal with the sudden shift in learning methods and revealed the need to provide students of all abilities with more help and personalized assistance.

Fortunately, technologies that aim to improve reading fluency, problem-solving skills, and overall learning, such as Immersive Reader, are enabling schools and educators to meet the unique needs of each student more effectively and efficiently than previously possible, especially when used in support of inclusive frameworks such as UDL.



Microsoft Education

When students have the individualized resources and opportunities that they need to succeed, they achieve more positive educational outcomes, along with benefits that impact teachers and school systems.

The next step is to learn more about how solutions and technologies from Microsoft can support inclusion at your school or school district.

[Contact us >](#)



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