

# Ecological Disturbances & Recovery: Re-Imagining Accessibility Post-Pandemic

Ashlyn C Walden  
Dept. of Writing, Rhetoric, & Digital Studies  
Senior Lecturer, UNC Charlotte



**Abstract:** At a time when many faculty are both rising to and collapsing under the challenges of teaching during a pandemic, this presentation argues that the digital humanities are at a decisive moment concerning accessibility. Using mixed-methods data from eight first-year composition courses, this research analyzes and articulates how some students discern the accessibility of instructional materials through the framework of Universal Design (UD). More specifically, this presentation demonstrates how one might replicate, refine, and apply similar study designs which can ultimately help us to be more attentive to inclusivity in the initial stage of course development and research.

**Keywords:** accessibility, accessible course design, course development, online writing instruction, online literacy instruction, tech-mediated classrooms, pandemic teaching and learning, Universal Design (UD), User-Centered Design (UCD), student perceptions of accessibility

**Vitae:** Ashlyn Walden is a Senior Lecturer in the Writing, Rhetoric, and Digital Studies Department at the University of North Carolina at Charlotte. She teaches a combination of hybrid and online courses in composition and advanced writing and research. Research interests primarily include: digital composition and design, accessibility, Universal Design, and User-Centered Design.

**Access the Full Data Sets & Presentation:**

[Student Survey 1](#)

[Student Survey 2](#)

[Lightning Talk Presentation](#)



# Suggested Readings on Accessibility

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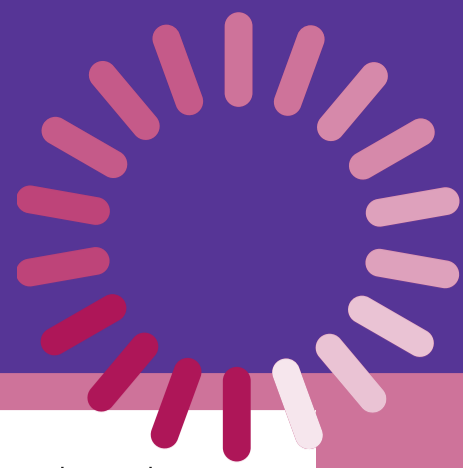


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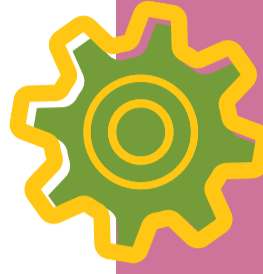
# 7 Principles of UD

Directly quoted from the Centre for Excellence in Universal Design (CEUD), (2014). The 7 Principles Retrieved from <https://universaldesign.ie/what-is-universal-design/the-7-principles/#p2>.



**Principle 1 Equitable Use:** The design is useful and marketable to people with diverse abilities.

- Provide the same means of use for all users: identical whenever possible; equivalent when not.
- Avoid segregating or stigmatizing any users.
- Provisions for privacy, security, and safety should be equally available to all users.
- Make the design appealing to all users.



**Principle 2 Flexibility in Use:** The design accommodates a wide range of individual preferences and abilities.

- Provide choice in methods of use.
- Accommodate right- or left-handed access and use.
- Facilitate the user's accuracy and precision.
- Provide adaptability to the user's pace.



**Principle 3 Simple & Intuitive to Use:** Use of the design is easy to understand, regardless of the user's experience, knowledge, language skills, or current concentration level.

- Eliminate unnecessary complexity.
- Be consistent with user expectations and intuition.
- Accommodate a wide range of literacy and language skills.
- Arrange information consistent with its importance.
- Provide effective prompting and feedback during and after task completion.

**Principle 4 Perceptible Information:** The design communicates necessary information effectively to the user, regardless of ambient conditions or the user's sensory abilities.

- Use different modes (pictorial, verbal, tactile) for redundant presentation of essential information.
- Provide adequate contrast between essential information and its surroundings.
- Maximize "legibility" of essential information.
- Differentiate elements in ways that can be described (i.e., make it easy to give instructions or directions).
- Provide compatibility with a variety of techniques or devices used by people with sensory limitations.

**Principle 5 Tolerance for Error:** The design minimizes hazards and the adverse consequences of accidental or unintended actions.

- Arrange elements to minimize hazards and errors: most used elements, most accessible; hazardous elements eliminated, isolated, or shielded.
- Provide warnings of hazards and errors.
- Provide fail-safe features.
- Discourage unconscious action in tasks that require vigilance.

**Principle 6 Low Physical Effort:** The design can be used efficiently and comfortably and with a minimum of fatigue.

- Allow user to maintain a neutral body position.
- Use reasonable operating forces.
- Minimize repetitive actions.
- Minimize sustained physical effort.

**Principle 7 Size & Space for Approach:** Appropriate size and space is provided for approach, reach, manipulation, and use regardless of user's body size, posture, or mobility.

- Provide a clear line of sight to important elements for any seated or standing user.
- Make reach to all components comfortable for any seated or standing user.
- Accommodate variations in hand and grip size.
- Provide adequate space for the use of assistive devices or personal assistance.