

# Accessible Web Design



## Motivations

*Webmasters make their websites accessible to individuals with disabilities.*

- Accessible design is good design, and often benefits all users.
- Accessible design ensures that content is reaching the largest possible audience.
- Web users are diverse. They include people using phones, tablets, and a wide variety of other devices. People with disabilities are part of this diverse mix.
- An accessible website makes people with disabilities feel welcome.
- Accessibility is required by law.

## Access Challenges

*Mainstream technology is inaccessible to some people.*

- People who are blind may use screen reader software or Braille devices to access a website; they can only access content that is text-based.
- People who are deaf cannot access audio content unless it is captioned or transcribed.
- Some individuals may not be able to use a mouse; they need to be able to navigate a web page and access all content with the keyboard alone.
- Some people with low vision, dyslexia, attention deficit, or cognitive disabilities have difficulty processing long lines of text and/or cluttered screens, and depend on white space, simple screen images, and good color contrast.

## Principles

*Design websites to be:*

### PERCEIVABLE

- Provide text alternatives for non-text content.
- Caption multimedia.
- Present content in different ways.

### OPERABLE

- Make all functionality available from keyboard alone.
- Allow enough time to read content.
- Help users navigate and find content.

### UNDERSTANDABLE

- Make content appear and operate predictably.
- Help users avoid and correct errors.

### ROBUST

- Maximize compatibility with current and future user tools.

## Examples

- A website with good HTML heading structure is easy to navigate. Screen reader users can jump from heading to heading with a single keystroke.
- A video that includes closed captions is accessible to users who are deaf. It is also fully searchable and can be automatically translated into other languages.
- A web-based form in which labels on fields are clearly identified in the markup is accessible to screen reader users and is easier for everyone to complete since labels are bigger targets than checkboxes or radio buttons.
- A website with a large default font, good color contrast, and plenty of white space is more accessible to a variety of users. Most users find simple designs to be more pleasing and easier to use than busy, hard-to-read, cluttered designs.

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## Impact

*Accessible web resources benefit society by:*

- ensuring that all citizens, regardless of ability or technology, have full access to information and can fully participate.
- enhancing academic and career fields with the expertise and perspectives of people with disabilities.
- providing more and better structured data for indexing and searching websites, documents, and media.

## Resources

*The following resources can help you get started in designing accessible websites.*

### STANDARDS & GUIDELINES

- W3C Web Content Accessibility Guidelines (WCAG) 2.0  
[w3.org/TR/WCAG20](http://w3.org/TR/WCAG20)
- Section 508 Standards  
[section508.gov](http://section508.gov)

### FURTHER GUIDANCE

- AccessWeb  
[uw.edu/doit/Resources/accessweb.html](http://uw.edu/doit/Resources/accessweb.html)
- Web Accessibility in Mind (WebAIM)  
[webaim.org](http://webaim.org)
- W3C Web Accessibility Initiative  
[w3.org/WAI/train.html](http://w3.org/WAI/train.html)
- UW Accessible IT Tools and Resources  
[uw.edu/accessibility/web-resources](http://uw.edu/accessibility/web-resources)

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## Leadership

*DO-IT: Disabilities, Opportunities, Internetworking, and Technology*

DO-IT is a collaboration of:

**College of Engineering**  
**College of Education**  
**UW Information Technology**



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