

14 BASIC APPROACHES TO CREATING ACCESSIBLE DOCUMENTATION PROJECTS: WHAT IS ACCESSIBILITY, AND WHAT DOES IT HAVE TO DO WITH DOCUMENTATION PROJECTS?

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As an aspiring technical communicator, you want to learn how to take complex information and make it meaningful and useful for specific audiences and purposes.¹ Technical communicators transform knowledge about complex products so that people can use them effectively. In this way, technical communicators play a vital role in making sure that products, information, and services reach target audiences. One broad term for a range of technical communication genres is “documentation projects,” or projects that provide instructions for how to use a product and/or projects that describe a technical process.

A key concern for technical communicators working on documentation projects is ensuring that the project is “accessible” or usable by everyone regardless of disability. Since technical communicators help users to comprehend and utilize specialized information and products that would otherwise be unclear, they are in the position to empower those who are too often left behind, such as those with disabilities. In this way, accessibility concerns are central concerns for the field of technical communication.

For most documentation projects you do, such as composing instructions or documenting processes, you have an “end user” (or person who’d use the product) in mind. Diligent technical communicators are very good at researching potential users in advance. Doing so allows them to make strategic decisions as they write and design a wide variety of documents. However,

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what can be known about potential audiences is often incomplete, making it important to consider the widest possible range of end users.

For example, let's say you're in a community-based technical communication course and you've been tasked with preparing suitable instructions for local middle school students. The assignment does not specify what process(es) or product(s) you need to document. Instead, you are asked to imagine something useful you could document for this group.

Thinking of a new skill that could be helpful for online and hybrid learning, you decide you want to assist them to learn to use the web conferencing tool Zoom. You start to imagine the average middle school student. This imagination work helps you to make good decisions as you begin to compose your project.

You reason, for instance, that most middle school students won't read above a 5th grade level, so you plan your diction (or word choice) accordingly. You imagine that some middle school students will have limited experiences using computers, so you include instructions on such basic skills as how to start up a computer and how to open a web browser. You figure that some middle school students won't know how to get their audio going, so you explain the steps involved in testing the microphone and connecting to audio on a Mac or PC.

Thinking of these preteens also gives you an insight: perhaps many would like to use headphones instead of computer audio. You go ahead and add instructions for how to do that on a Mac or PC. Another insight occurs to you: maybe they'll be on Chromebooks, tablets, or smart phones. You offer advice for these contingencies in each of your sections. You are careful and specific in your descriptions, noting that Zoom shows up as a blue icon with a camera regardless of the device used for connecting. You choose a fun, splashy color scheme for adolescents and seek out a font that appeals to kids.

Thinking about how they won't want to read anything lengthy, you decide to include lots of screenshots with dialogue bubbles to explain important parts. You're feeling pretty good about your work here. However, even with all this rich, creative thinking and planning, you've left out key parts of the middle school population—those with visual and/or hearing impairments, those with colorblindness, and those with learning disabilities. This is where accessibility in documentation projects becomes very important.

When a documentation project is **accessible**, it is usable by the widest possible group of people. In many ways, accessibility in technical communication is about basic inclusion. In other ways, thinking about accessibility in documentation projects helps you to make better written products for all users.

Let's return to the Zoom documentation project aimed at middle schoolers. When you imagine the widest possible group that could fall into your target audience, you begin to make decisions differently. Your priorities shift, and you look for ways to make sure that you aren't leaving anyone out.

Thinking of a wider range of middle school students leads you to include information on closed captioning options. You also shift the reading level down to account for those whose reading levels aren't quite to the 5th grade level yet. You start to research color decisions that take color blindness into account, and you think through how you might ensure that those with visual impairments will still be able to access the information in screengrabs.

Since technical communicators are in the business of helping users to grasp and use specialized information and products that would otherwise be too confusing or off limits, they are in the position to empower those who are too often left behind. In this way, accessibility concerns are at the heart of what is best about the field of technical communication.

What's more, far from limiting or dampening what can be done in documentation projects, accessibility considerations often lead to more vibrant and useful documents for all users.

In this chapter, you'll learn basic considerations for accessible documentation projects. The chapter will allow you to begin to approach documentation projects with fundamental accessibility in mind. In order to do so, we'll cover topics such as:

- Considering colorblindness,
- Considering dyslexia, and other conditions that alter visual abilities,
- Creating documents that are compatible with assistive devices, and
- Using alternative text for images.

Predictably, programs and tools exist to help technical communicators to create accessible documentation projects. However, it is always best to have a baseline understanding of how and why to approach accessible design in technical communication before using tools and templates.

In this chapter, therefore, you'll hear a bit about common software programs' built-in features for accessibility as well as how to use free online tools to check accessibility. Even more important than learning to use these tools, though, is learning why they are important. This chapter hopes to prove that thinking through accessibility in documentation projects enhances rather than dampens what is possible. Remember, thinking in terms of accessibility most often makes the documentation projects more

usable for all users by virtue of focusing on what might be advantageous to as many users as possible. With that in mind, let's go over some basic information on disability and accessibility. After that, we'll explore some specific considerations to get you started on your journey to creating accessible documentation projects.

DISABILITY AND ACCESSIBILITY EXPLAINED

Before going further with this chapter, it is necessary to take a step back and define two key concepts more carefully: **disability** and **accessibility**.

Disability is often defined in relation to the “Americans with Disabilities Act” or ADA. Signed into law in 1990 by President George H. W. Bush, the ADA made it a law that persons with disabilities be given equal opportunities to participate in mainstream American life. The ADA, in other words, made it a legal obligation to **accommodate** those with disabilities in the creation of built environments—think of elevators, wheelchair ramps, and talking crosswalk signs, and in the creation of documents and other deliverables—think of sign language interpreters that are provided during important speeches or Braille (the system of raised dots for those with visual impairments) on automatic teller machines (ATMs).

Accessibility is related to the idea of **accommodating difference**. When you make moves to alter or arrange a physical space, a written artifact, a multimodal composition, or a real time experience such that those with physical or mental disabilities can participate meaningfully, you are making moves to be accessible.

Importantly, the ADA does not give a list of conditions that are considered disabilities and, instead, defines disability broadly, as “a physical or mental impairment that substantially limits one or more major life activities, a person who has a history or record of such an impairment, or a person who is perceived by others as having such an impairment” (“What Is the Definition of Disability under the ADA? | ADA National Network”). Notice that the ADA’s definition is extremely broad and open to interpretation and is designed to protect the widest group of human persons possible. It also protects a vast variety of aspects of human life, such as transportation, employment, education, health and wellness, housing, and more.

The ADA stipulates that official documents be readable via a screen reader—an assistive device that will read a document to a person with a

visual impairment or other disability, such as dyslexia, that interferes with reading. Predictably, the wide and inclusive definition of disability offered in the ADA makes it difficult to offer precise statistics on how many Americans are disabled. Nonetheless, according to the National Network on Information, Guidance, and Training for the ADA, the number of disabled individuals make up between 12 and 18 percent of the population (“ADA National Network | Information, Guidance and Training on the Americans with Disabilities Act”). Undoubtedly, then, it makes not only legal sense to follow ADA requirements, but it makes good business sense to make rigorous strides to exceed legal requirements in accommodating the needs of this large group.

CONSIDERING COLORBLINDNESS

WHY CONSIDER COLORBLINDNESS?

When color is used to convey important information, people with colorblindness might miss out on that message. For example, if a background color is too close to a font color, a person with colorblindness may not even be able to tell that there is text on the page, let alone be able to read that text.

For technical communicators, the idea that text would be present, yet not readable by some audiences, is highly problematic. If there is vital information given, it’s entirely lost to many audiences. Some design choices simply make it impossible to read and comprehend the content of a document. Considering colorblindness can help you to make thoughtful color and font design decisions, and such concerns are deeply related to your job as a technical communicator—to convey complicated information in a useful and user-friendly way.

Here are some things you can do to work with color in appropriate and effective ways while being inclusive of those with colorblindness and creating better documentation projects:

- Use patterns to create contrast;
- Keep color palette simple, using a maximum of three colors;
- Pay special attention to contrast; and
- Do not rely on color alone to communicate important information.

Using patterns to create contrast is a way to avoid over-relying on color differences to communicate. When color palettes have too many colors and shades, they begin to become more difficult for those with colorblindness to use. A solution is to keep color palettes simple, using no more than three

colors. Equally important is making sure that the colors you are using are not so close to each other in shade that they might simply blend together for some viewers.

An easy way to make sure that your documentation project does not run the risk of having colors blend together in the audience's view is to pay special attention to contrast such that even a black and white version of what you've created will communicate the fact that two different colors are indeed different. In the same way, you want to make sure that color alone is not the means through which important information is conveyed. The following example makes these points clearer.

AN EXAMPLE

Let's say you've just started a new job at a brand-new coffee shop in your town called Campus Coffee. The shop has created a new menu (see Figure 14.1), and as a student in technical communication, you can't help but notice right away how inaccessible the menu is for many users.

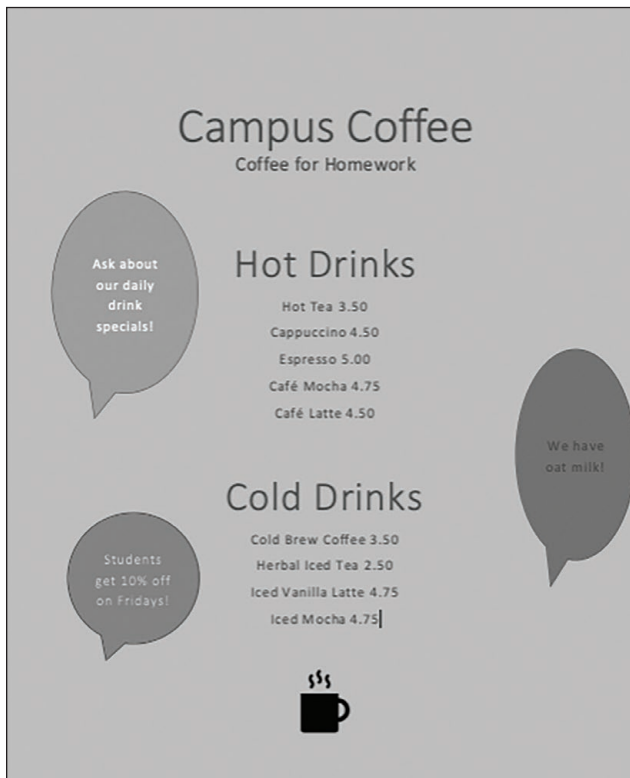


Figure 14.1: Original Coffee Shop Menu

The background color and the font color for menu items are close in shade and tone, and nothing offsets important information other than slight color variation. In fact, as you work through your first shifts, some customers ask you to read or to clarify menu items that are difficult to read. After overhearing your new boss lamenting that she has no time to fix the issues with the menu and that she did her best to make it, you volunteer for the job. Why not, you think? It'll make a nice portfolio piece later on.

You want to use a consistent font, but you choose a simple pattern of hyphens to offset headings such that readers can easily see where cold drinks begin and hot beverages end. After doing some research, you choose a color palette that fits the overall motif of the coffee shop (warm browns and creams) yet offers you some ways to create more contrast. You go with three colors: cream, medium coffee brown, and deep teal.

You decide that it will enhance your design to use the teal for the headings, yet you rely on the line of hyphens to do the work of communicating the important information that a new section of the menu has started. Taking these small steps leads to a design you are quite proud of (see Figure 14.2).

Campus Coffee	
<i>Coffee for Homework</i>	
Hot Drinks	

Hot Tea.	3.50
Cappuccino	4.50
Espresso	5.00
Café Mocha	4.75
Café Latte	4.50
Cold Drinks	

Cold Brew Coffee.	3.50
Herbal Iced Tea	2.50
Iced Vanilla Latte	4.75
Iced Mocha	4.75
Add-Ons	

Almond Milk	.50
Oat Milk	.50

**ASK ABOUT
OUR DAILY
SPECIALS!!**

**STUDENTS
GET 10%
OFF EVERY
FRIDAY!**

Figure 14.2: Revised Coffee Shop Menu

Not only are colorblind guests better served, but the menu looks better and is more usable.

HOW YOU CAN APPLY CONSIDERING COLORBLINDNESS TO YOUR SCHOOLWORK, INTERNSHIPS, JOBS

When you are creating documentation projects for your schoolwork, internships, and jobs, professors, internship providers, and employers will expect you to create documents that are clean and readable. In fact, today, making sure that those with colorblindness can access your documents is a baseline expectation. Like many practices related to accessibility, the advice given for how to account for colorblindness as noted—using patterns to create contrast; keeping the color palette simple; paying special attention to contrast; and avoiding using color alone to communicate important information—makes more visually pleasing and usable designs for all users. Interestingly, there are many types of colorblindness.

For an example, see the Colblindor (<https://www.color-blindness.com>) free color blindness simulator where you can choose from a number of options to see an image the way a person with a specific form of color blindness might. In all variations, the advice offered previously is helpful. When you approach your next documentation project, think: patterns for contrast, no more than three colors, and don't use color to communicate vital information. Taking these easy bits of advice to heart will go a long way in making your documentation projects more accessible.

CONSIDERING DYSLEXIA AND OTHER CONDITIONS THAT ALTER VISUAL ABILITIES

WHY CONSIDER DYSLEXIA, AND OTHER CONDITIONS THAT ALTER VISUAL ABILITIES?

Learning disabilities that make the part of the brain that processes language work differently can lead to issues and problems deciphering documentation. Dyslexia is a condition that makes it difficult to learn to read and write words, letters, and symbols, yet it does not affect overall intelligence. Dyslexia can interfere with language and the ability to read, write, and speak. While a difficult-to-read font may require some additional concentration for many readers, those with certain conditions, such as dyslexia, may find the document impossible to read if the font is too difficult to decipher. For example, those with dyslexia find serif fonts more difficult to read—especially when the letters are close together. A study by researchers

Luz Rello and Ricardo Baeza-Yates found that *Arial italics* is especially difficult for those with dyslexia to read while fonts like **Verdana** are easier for those with dyslexia to read. For technical communicators, having words that are not readable by some audiences is a real concern, and readers with dyslexia may simply not be able to read text due to its font style. Here are some things you can do to:

- Choose fonts that work better for those with dyslexia (such as Verdana)
- Ensure that the text can easily be changed to a more readable font by the user (Zhu et al.).
- Avoid font styles that are known to be difficult for those with dyslexia to read (such as *Arial Italics* or other italics and serif fonts)

Choosing fonts that are easier for the user to manipulate (to change the size or look) can be a way to ensure that most users will be able to access the content of your documentation projects. While some fonts, such as Verdana, are known to be highly readable by those with dyslexia, other fonts, such as EasyReading™, have been developed specifically with dyslexic readers in mind. Even if you don't want to use a font designed for a specific disability, you can choose fonts that are easier for any user to read.

AN EXAMPLE

As part of a community-based technical communication course focused on the health sciences, you've been tasked with creating a brochure for a local free clinic such that a nearby high school that serves socioeconomically disadvantaged teenagers can be made aware of available services. The client has asked for paper flyers such that they can be placed on a bulletin board with other student-focused information just outside the school's cafeteria. Knowing that you will not be able to offer readers a version of the flyer where they will be able to easily manipulate the font (change it to a font that they find more readable), and thinking about users with dyslexia for whom some fonts work better than others, you create your flyer using Verdana fonts, you avoid italics, and you also include the website URL on the flyer (see Figure 14.3).

Taking these simple steps has ensured that any students with dyslexia will be able to benefit from learning more about the clinic's services. Your design is clean and easy to read; a wide variety of students at the high school will be able to get the information they need from reading it on the bulletin board.

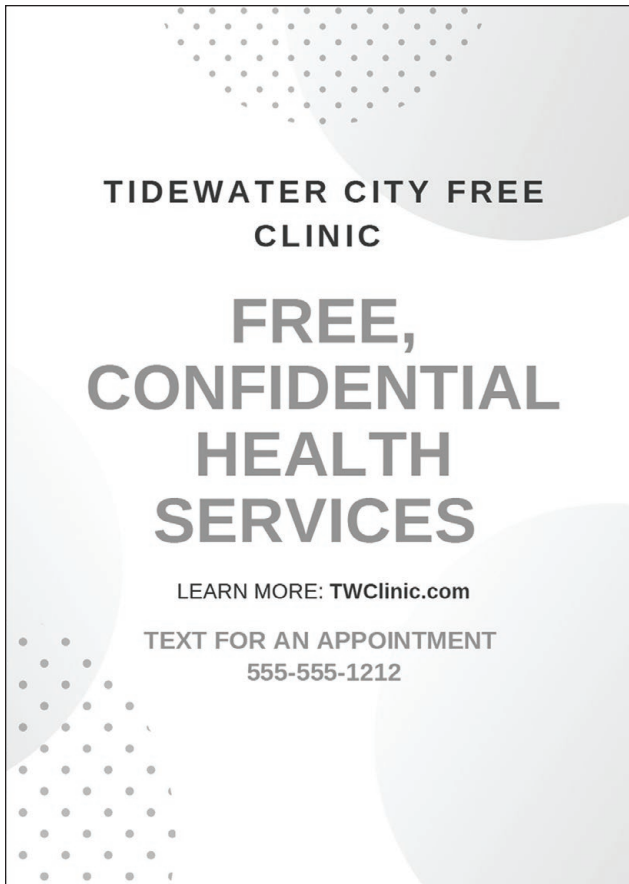


Figure 14.3: Flyer for Health Clinic

HOW YOU CAN APPLY CONSIDERATIONS OF DYSLEXIA TO YOUR SCHOOLWORK, INTERNSHIPS, JOBS

All of the documentation projects you work on for your schoolwork, internships, and jobs, will require you to tend to everyday communication considerations, such as audience, purpose, occasion, and exigence (or reason you are creating the document). As we learned in the section on considering colorblindness, many clients now expect you to consider disability and difference as a default when you are creating documentation projects.

Creating documents that are clean and readable by the widest group of people, including those with dyslexia for whom some fonts and styles are more difficult to read, can also be beneficial to everyone. Showing your professors, internship providers, and employers your sensitivity to

difference by including accessibility considerations in your decision-making conveys to them that you are user-centered and serious about the widest group of users. Like many practices related to accessibility, the advice given for how to account for dyslexia as discussed earlier—choosing fonts that are especially readable; making digital documents revisable so that fonts can be changed or enlarged when needed; avoiding serif fonts and italics—makes more usable designs for all users.

CREATING DOCUMENTS THAT ARE COMPATIBLE WITH ASSISTIVE DEVICES

WHAT IS AN ASSISTIVE DEVICE?

Assistive device is a broad term for any device that helps a user to perform a task that would otherwise be inaccessible. Have you ever broken or sprained a leg or ankle and required crutches? If so, you've already used an assistive device. According to the World Health Organization, "assistive devices are external devices that are designed, made, or adapted to assist a person to perform a particular task" (Khasnabis et al.).

Thinking of accessible documentation projects in technical communication, assistive devices become important when considering how visually impaired or blind users will interact with your documents, yet as the previous section makes clear, if a person with dyslexia encounters a text that is in a font that is difficult for them to read, assistive devices may also be useful. Even if a person has no documented disability, cognitive styles differ, and some people simply prefer hearing to reading. There are a wide range of reasons to wish to use an assistive device, and there are also a wide range of text-to-speech assistive technologies ranging from free and simple web-based applications to sophisticated and complex cameras that will pick up and read a wide range of text.

Fortunately, if you are working on a basic documentation project in Microsoft Word, Google docs, or Adobe Pro, these programs have built-in features to help you to make sure your document will be readable via text-to-speech assistive technologies. For example, Microsoft Word and other products in the Microsoft Office suite of products have a number of built-in accessibility features. In fact, you can use preset "styles" to be reassured that the headings and subheadings you use will be readable via a screen reader. In the same way, Google Docs will automatically format documents with titles, headings, subheadings, and lists to make the work of accessible documentation projects creations easier. WIX and Canva have accessible templates for creators to use as do Adobe products. Rather than

overviewing all that is out there—because there is a lot—the hope of mentioning these built-in features is that you will be inspired to seek out (and easily find) useful accessibility features in common programs.

If you are using a new program, it is worth exploring the accessibility features and templates they make available. Also noteworthy are the accessibility checkers that are now built into many programs. There is a wealth of free online tools at your disposal should you wish to check the accessibility of your documentation project. See, for example, WAVE or “web accessibility evaluation tool” at webaim.org where you can enter any URL and get a report on how accessible or inaccessible a site is.

Even without thinking about built-in accessibility features, there are some steps you can take to make sure common assistive devices can read your electronically delivered documentation:

- Use backend properties (also called “metadata” or information about a document that identify it) to tag your document with vital information for readers;
- Arrange information in a logical way;
- Make strategic arrangement decisions, using headings, lists, and meaningful hyperlinks; and
- Don’t get fancy with symbols and punctuation.

One way to make your documentation project easier for a user with a visual impairment to navigate is to use backend properties or metadata—information about a document that can identify key information about that document—to deliver vital contextual information to the reader.

While some properties may be automatically generated at the backend of common programs, many also allow a user to add or edit information. For example, while Microsoft Word will automatically add the author and title, you can add a subject and keywords to enhance the usability of your document for those using screen-to-text assistive devices. Such moves give readers more context through which to make sense of your documents. As well, you can make strategic arrangement decisions, using headings, lists, and meaningful hyperlinks to improve the organization and logic of your documentation project.

Ask yourself: What are the major elements you wish to cover? Consider these worthy of their own headings. Have a big chunk of instructions to get through? Using a list will break up that information into a user-friendly flow. Want to point to a website? Describe and name the website, using a hyperlink in place of the link so that readers won’t have to stumble over what will sound like gibberish to them. Such moves make your writing better organized for

the reader. Finally, many text-to-speech assistive devices and programs either stumble through or simply ignore certain punctuation marks and symbols. While most will pause at periods or commas, for example many will not read a plus mark such that if you were to include something like “ $4 + 4 = 8$ ”, the reader would say “448.” It’s best to spell such things out. Taking these steps are baseline ways that you can make sure that your documentation projects are accessible to those who rely on text-to-speech assistive devices.

AN EXAMPLE

Imagine your internship provider, a local nonprofit focused on downtown revitalization, has asked you to take notes on how they run their annual fundraiser. Recognizing that they’ll soon be hiring new staff and saying goodbye to two senior staffers, they want to document how they’ve done things in the past such that future leadership teams and interns will have a better idea of the steps, stages, timelines, activities, and roles that will most likely lead to a successful event.

You decide to use Microsoft Word to create a draft of this documentation. You interview the existing team, asking them to work backwards from closing out the event to all the stages and steps that went into getting them there. You go into the document properties to adjust the metadata. The screenshot in Figure 14.4 shows what you see when you go into the property summary in Word, which you can access by selecting “File,” and then “Properties” from the dropdown menu.

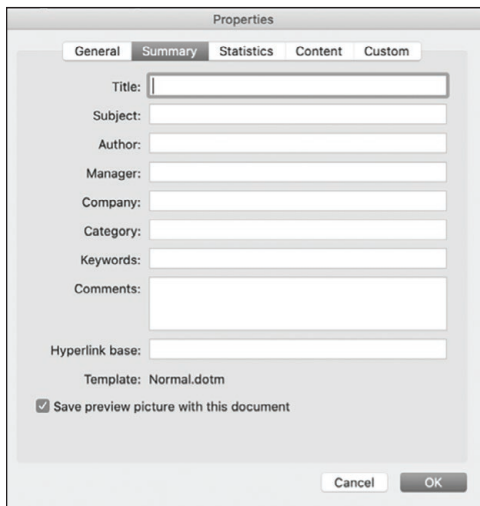


Figure 14.4: Properties Menu in MS Word

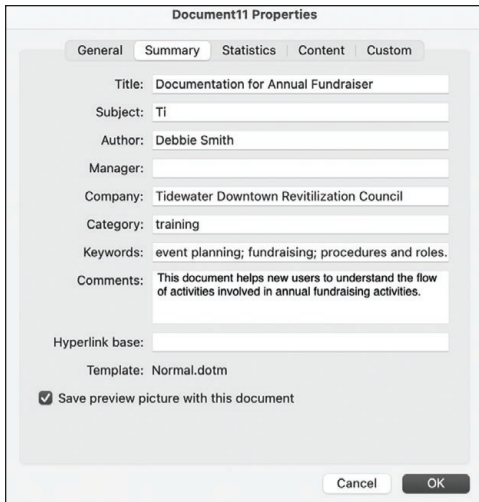


Figure 14.5: Filled In Properties Menu in MS Word

You change the author's name to your internship coordinator's name. You add a specific title, such as "Documentation for Annual Fundraiser"; keywords such as: event planning; fundraising; procedures and roles. You fill in the comments with more contextual information for users. You add "training" for the category (see Figure 14.5).

Such moves make your document easier not only for text-to-speech readers, but also for any user to get important summative information about your document.

Next, you think about a logical way to arrange all of the information you gathered. You decide that you'll arrange the information you gathered primarily via the categories: introduction and overview; roles and responsibilities; timelines; contacts; and frequently asked questions. This logical way of organizing the information you gathered allows you to create clear headings for each of these sections. In the roles and responsibilities section, you use a list to delineate each role and to share the responsibilities that go along with those roles. In the timeline section, you spell out key time-related information rather than relying on symbols or punctuation. In the contacts section, you create a "frequent donors" list where you use hyperlinks to share local business's websites where relevant. Your documentation project is now on its way to being more compatible with text-to-speech assistive technology. Again, fortunately, the software and other tools that you'll likely use for many of your documentation projects will have built in accessibility features such that doing the work of making your projects accessible will be relatively painless.

HOW YOU CAN APPLY THIS TO YOUR SCHOOLWORK, INTERNSHIPS, JOBS

When you approach documentation projects in your classes, in your internships or, eventually, in your jobs, knowing the basic logics behind how to create documentation projects that are compatible with assistive devices such as text-to-speech readers will allow you to create projects that are accessible to those with visual impairment—a population that is, according to the National Institute of Health, growing.

What's more, with the boom in popularity of audio media in things like podcasts and audio books, it's likely that even those without auditory disabilities might eventually consider using text-to-speech technologies to consume everyday documents. Either way, those tasked with creating the latest versions of popular composing tools have given a lot of time and energy to helping content creators to ensure that their documents are readable via such devices. When you approach your next documentation project, use backend properties; arrange information in a logical way; use headings, lists, and meaningful hyperlinks; and don't get fancy with symbols and punctuation. Just as in other areas of consideration for creating accessible documentation projects, taking these basic steps to ensure compatibility between your work and text-to-speech readers arguably improve the logic, look, and feel of your projects for any user.

USING ALTERNATIVE TEXT FOR IMAGES

WHAT IS ALTERNATIVE TEXT FOR IMAGES?

One aspect of making your documentation projects more accessible that falls under making your documents compatible with text-to-speech assistive devices and more usable for visually impaired users can be a bit trickier—using alternative text for images or “alt text.” For that reason, the topic deserves its own section.

Images make powerful statements. Think about how popular memes are. They are able to communicate visual information in ways that entertain and delight users. Take, for example, the funny cat meme in Figure 14.6.

The text is an important part of the joke, yet the fact that the cat is hovering over the shoulder of a statue reading a stone book without any pages, and the fact that the cat looks as if he were reading the book, is what makes it funny. Without alt text, though, the entire message is lost to users with visual challenges.



Figures 14.6 and 14.7: Cat Memes 1 and 2

Have you ever walked into a room of friends just after the punch line to the joke has been delivered? Everyone’s laughing and giving each other knowing looks. How did it make you feel? This same feeling of being left out is exactly what it feels like for those with visual impairments to find that they are missing out on vital information. Technical communicators developed the idea to add text under or attached to an image such that those with visual impairments can be “in on the joke” for things like memes. For documentation projects, the aim is not always laughter, yet the same principles apply—as a producer of content, you want to make sure that all users are in the know.

Alternative text or alt text is exactly what it sounds like it is: it’s text that is used as an alternative for an image. Alt text, therefore, refers to descriptive text that replaces the image used in a project—usually a web page, and that’s where the term originates—such that those with visual impairments can still benefit from images. In word processing programs such as Microsoft Word, alt text will automatically supply suggested alt text when you add an image to a document, yet these autogenerated alt text descriptions are not always precise or even accurate. Therefore, your job as a technical communicator calls on you to 1) figure out how to insert alt text in a document; and 2) compose compelling alt text such that you are satisfied that those who do not see the image will nonetheless get the message it is meant to convey.

Here are some things you can do to write vibrant alternative text for images:

- Use the “show, don’t tell” principle.
- See if your alt text can pass “the yellow test.”
- Gauge the purpose and aim of the image in relation to the project.

You may already be familiar with the mandate to “show, don’t tell” from other genres of writing, especially creative genres. At its base, this recommendation asks you to avoid bland descriptions that lack vividness and specificity in favor of rich descriptions that allow readers to see what is in the image. It asks you to do the more difficult work of providing a snapshot of a concept or larger significance for readers. The same rule of thumb can be helpful when you are attempting to write great alt text. Show readers what’s in that image by describing its details rather than just telling them in a basic way what the picture contains.

Thinking of our cat meme, for example, when you insert that image in a program like Microsoft Word, you’ll get an alt text suggestion that says: “A cat sitting on top of a grass covered field.” As you know from seeing the previous image, that is not the information someone would need to understand the intent of the image. That alt text tells the reader what is there, yet it doesn’t use description to show the reader why that matters. I have, therefore, right clicked to add: “A cat looking over the shoulder of a stone statue of a girl with a book with the message: ‘For the love of God, turn the page. You are like the slowest reader ever.’”

Another way to punch up your alt text descriptions is to see if your alt text could pass what Lee Gutkind calls “the yellow test.” *Broad Street Magazine* explains that the yellow test involves using a yellow highlighter to indicate parts of a narrative where something is actually happening. The idea is that by making writing dynamic and action-oriented, it is more vivid, and readers are better engaged. Take, for example, the meme of a cat on a bed. If I insert this image, I get the suggested alt text: “A cat lying on a bed.” I’ve used the yellow test to compose this replacement: “A kitten wedges its back against a human, looks into the camera, and raises its paws as if it were about to pounce. Text reads: ‘I big scary monster raaaar’” (see Figure 14.7).

You can see how trying to make the description action-oriented also does the work of making it more accurate.

Finally, a good rule of thumb when writing alt text is to consider the purpose of the image in relation to the project. Decisions on tone and word choice can often be aligned with your purpose. If your topic is serious, a formal tone is warranted. If your tone is playful or lighthearted, a lighter, fun tone is needed.

AN EXAMPLE

Imagine a local bridal gown seamstress has asked your technical communication class to partner with her this semester. She wants to sell patterns she’s created of custom gowns she’s designed from clients’ mood boards as

well as plans for alterations she's made to heirloom dresses to make them more modern and better fitting. Her target audience is fashion students and aspiring or even amateur seamstresses who'd like to make her gowns or who'd like to do similar work.

After collecting images from your client's personal files and scanning samples of the physical patterns she's created, you work with your classmates and professor to create a website that documents the processes used to create each custom gown. You carefully design alt text to insert under each image such that visually impaired users will have a better idea of what they might expect if they were to follow the patterns for these dresses.

For one of the gowns, you've chosen this image from the client photos the seamstress is allowing your class to use (see Figure 14.8). When you insert the image on WordPress, a plugin generates the alt text: "A person posing for a picture." However, you want to add something more descriptive. Making use of the "show, don't tell" principle, you say, "a woman stands with one hand on her hip . . ." Thinking of the yellow test, you add, "she's staring straight ahead with a lifted chin, confidently." Thinking back on your purpose—to inspire seamstresses and fashion design students to make these dresses, you add "a woman in an intricate lace, sweetheart neckline, sleeveless bridal gown . . ." Notice how the new alt text in this exercise will do a far better job of conveying the visual information the original photo is meant to communicate to potential audiences.



Figure 14.8: Wedding Dress Image

HOW YOU CAN APPLY THIS TO YOUR SCHOOLWORK, INTERNSHIPS, JOBS

When a documentation project would be truly remiss to leave out images or when an image will communicate powerful information, you will want to use them. You don't want to make it impossible for those with visual impairment to know what is on the page. Moreover, the very idea of creating alternative text or alt text dovetails beautifully with the work of a technical communicator. The same interpretative and productive skillsets that technical communicators rely on to render complex or specialized information useful and usable to non-expert audiences can come in handy when preparing appropriate and specific alternative text. In both cases, the writer must attempt to do important transformational work.

Most every documentation project will include some images, whether they are photographs, screengrabs, charts, tables, or diagrams. In all cases, these images must be interpreted for those who cannot see them—even in cases where it is possible that the data in a table will be readable via an assistive device.

Alt text is not only a matter of courtesy. Big companies, such as Target, have gotten into trouble for not providing sufficient alt text for images (Baker). Using alt text is a baseline consideration for compliance with disability standards that come out of a number of significant deliberative bodies, such as the United Nations (Ma). Thus, in your internships and jobs, you will be expected to be familiar with and to use alt text—particularly in web-based compositions. Increasingly, too, professors are expecting to see alt text used effectively in projects, and alt text is expected in video documentation projects.

When you approach your next documentation project, think: what images have I used, and do I include alt text? Am I using the “show, don't tell” principle to make my writing richly descriptive? Am I using the yellow test to make my writing dynamic and lively? And, perhaps most importantly, does my writing fit my purpose and tone?

CONCLUSION

As I hope this chapter has demonstrated, knowing a few basic tenets of how to approach accessibility in documentation projects is important as you decide how and when to use templates, styles, and checker tools as well as in determining their strengths and weaknesses. In the end, making documentation accessible is important as it allows all users to be included and gives them access to technical knowledge and skills.

WORKS CITED

- “ADA National Network | Information, Guidance and Training on the Americans with Disabilities Act.” <https://adata.org/>.
- Bachmann, Christina, and Lauro Mengheri. “Dyslexia and Fonts: Is a Specific Font Useful?” *Brain Sciences*, vol. 8, no. 5, May 2018. *PubMed Central*, <https://doi.org/10.3390/brainsci8050089>.
- “Coblis Color Blindness Simulator.” *Colblindor*, <https://www.color-blindness.com/coblis-color-blindness-simulator/>.
- Collinge, Robyn. “How to Design for Color Blindness.” *GetFeedback*, 17 Jan. 2017. <https://www.getfeedback.com/resources/ux/how-to-design-for-color-blindness/>.
- Davlin, Ann. “Color Combinations from Hell – Death Sentence for Your Designs.” *DesignWebKit*, 2019, <https://designwebkit.com/web-and-trends/color-combinations-hell-death-sentence-designs/>.
- Department of Health and Human Services Office of Communications. “What are some types of assistive devices and how are they used?” *NIH*, 24 Oct. 2018. <https://www.nichd.nih.gov/health/topics/rehabtech/conditioninfo/device>.
- Khasnabis, Chapal, et al. “Assistive Devices.” *Community-Based Rehabilitation: CBR Guidelines*. Geneva: World Health Organization, 2010. <https://www.ncbi.nlm.nih.gov/books/NBK310951/>.
- “Lee Gutkind’s ‘The Yellow Test’ and Other Advice.” *BroadStreetMag*, 30 Apr. 2014. <https://tinyurl.com/mu5m6tpz>.
- Ma, Melody. “A Brief History of Alt Text.” *Medium*. 17 May 2018, <https://medium.com/@melodyma/a-brief-history-of-alt-text-12cff05a59ff>.
- Rello, Luz and Ricardo Baeza-Yates. “Good Fonts for Dyslexia.” *Proceedings of the 15th International ACM SIGACCESS Conference on Computers and Accessibility*. Association for Computing Machinery, 21 Oct. 2013, pp. 1-8. <https://doi.org/10.1145/2513383.2513447>.
- “Visual Impairment, Blindness Cases in U.S. Expected To Double by 2050.” *National Institutes of Health (NIH)*. 19 May 2016, <https://www.nih.gov/news-events/news-releases/visual-impairment-blindness-cases-us-expected-double-2050>.
- What Is the Definition of Disability under the ADA? | ADA National Network.* <https://adata.org/faq/what-definition-disability-under-ada>.
- Zhu, Xinru, et al. “Analysis of Typefaces Designed for Readers with Developmental Dyslexia.” *Document Analysis Systems*, edited by Xiang Bai et al., Springer International Publishing, 2020, pp. 529–43. *Springer Link*, https://doi.org/10.1007/978-3-030-57058-3_37.

TEACHER RESOURCES

OVERVIEW AND TEACHING STRATEGIES

Designing documentation projects with accessibility in mind requires a sensitivity to difference and the ability to imagine the widest audience possible, including considerations of visual, cognitive, and aural disabilities. As this chapter shows, there are simple, thoughtful steps you can take to ensure that documentation projects are as accessible as possible. These steps include the following.

CONSIDERING COLORBLINDNESS

- Use patterns to create contrast.
- Keep color palette simple, using a maximum of three colors.
- Pay special attention to contrast.
- Do not rely on color alone to communicate important information.

CONSIDERING DYSLEXIA AND OTHER CONDITIONS THAT ALTER VISUAL ABILITIES

- Choose fonts that work better for those with dyslexia (such as Verdana).
- Ensure that the text can easily be changed to a more readable font by the user (Zhu et al.).
- Avoid font styles that are known to be difficult for those with dyslexia to read (such as Arial Italics or other italics and serif fonts).

CREATING DOCUMENTS THAT ARE COMPATIBLE WITH ASSISTIVE DEVICES

Use backend properties (also called “metadata” or information about a document) to tag your document with vital information for readers.

- Arrange information in a logical way.
- Make strategic arrangement decisions, using headings, lists, and meaningful hyperlinks.
- Don’t get fancy with symbols and punctuation.

USING ALTERNATIVE TEXT FOR IMAGES

- Use the “show, don’t tell” principle.
- See if your alt text can pass “the yellow test.”
- Gauge the purpose and aim of the image in relation to the project.

Gaining mastery of the basics requires students to learn the fundamental idea that creating compelling documentation projects means taking steps to accommodate the widest range of end users they can imagine. Such an approach is more inclusive, but it also makes good business sense given the rather large percentage of the population that has disabilities.

The accessibility framework described here emphasizes that rather than limiting or stifling the work of a technical communicator, though, decision-making with accessibility in mind often opens up creativity and enhances the overall quality of a documentation project. What's more, focusing on issues of accessibility is important work as the projects a technical communicator creates have the capacity to empower those who are too often left behind.

DISCUSSION QUESTIONS

To help students explore the ideas in this entry, consider having them address—as individuals, in small groups, or as an overall class—the following questions:

1. Thinking of a recent document you created for a specific audience, purpose, and occasion, list the ways you managed to consider accessibility and the ways you would revise your composing process now that you've read this chapter.
2. How might the recommendations found in this chapter change how you approach your documentation projects?
3. What do you want to know more about in terms of accessibility? Scan the Web Accessibility Initiative "W3C Accessibility Standards Overview" page at <https://www.w3.org/WAI/standards-guidelines/>. Which topics would you like to learn more about?
4. Choose any of the main sections of this chapter and find an example of a text that does not adhere to the recommendations. Redesign the document to be more accessible.
5. This chapter makes a clear claim that considering accessibility leads to more innovative and accomplished documentation projects. To what extent do you agree or disagree with this idea, and why or why not?

Exploring these topics can help students contemplate and deliberate over how to apply the ideas presented in the chapter within the context of their own documentation projects in school and beyond.