



TOOLKIT for Making Written Material Clear  
and Effective

SECTION 2: Detailed guidelines for writing  
and design

## PART 5

Understanding and using the “Toolkit  
Guidelines for Graphic Design”

### Chapter 6

Guidelines for use of photographs,  
illustrations, and clip art

U.S. Department of Health and Human Services  
Centers for Medicare & Medicaid Services



## TOOLKIT Part 5, Chapter 6

### Guidelines for use of photographs, illustrations, and clip art

Introduction .....	122
Images are powerful .....	123
Where can you get images for your materials? .....	123
List of guidelines covered in this chapter.....	128
Images should relate directly to the material and reinforce its meaning ( <i>guideline 9.1</i> ) .....	130
Images should be clear, uncluttered, and consistent in style ( <i>guideline 9.2</i> ).....	136
Images need to be culturally appropriate ( <i>guideline 9.3</i> ) .....	142
Facial expressions and body language should match the situation ( <i>guideline 9.4</i> ).....	150
Take special care in using symbols ( <i>guideline 9.5</i> ).....	153
Avoid using images with visual humor or caricature ( <i>guideline 9.6</i> ) .....	155
Pay attention to the quality, size, placement, and labeling of images ( <i>guideline 9.7</i> ).....	157
Check for accuracy and pretest with readers ( <i>guideline 9.8</i> ).....	159
Additional tips for choosing and editing clip art .....	161
End notes .....	166

#### List of figures in this chapter:

<i>Figure 5-6-a.</i>	Toolkit guidelines for use of photos, illustrations, and other visuals....	128
<i>Figure 5-6-b.</i>	Choice of an illustration affects the emotional tone of your material ...	131
<i>Figure 5-6-c.</i>	Using images to depict how eye diseases affect vision.....	132
<i>Figure 5-6-d.</i>	For a unified look, keep images consistent in style .....	140
<i>Figure 5-6-e.</i>	Using repetition of design elements to foster unity.....	141
<i>Figure 5-6-f.</i>	Choosing clip art that looks realistic, natural, and respectful.....	161
<i>Figure 5-6-g.</i>	Editing clip art to improve the focus on the main subject .....	164

---

This document is the sixth of eight chapters in Part 5 of the *Toolkit for Making Written Material Clear and Effective*. The Toolkit has 11 parts. It was written for the Centers for Medicare & Medicaid Services (CMS) by Jeanne McGee, McGee & Evers Consulting, Inc. The guidelines and other parts of the Toolkit reflect the views of the writer. CMS offers this Toolkit as practical assistance to help you make your written material clear and effective (not as requirements from CMS).

---



## Introduction

### ***About the Toolkit and its guidelines***

The *Toolkit for Making Written Material Clear and Effective* is an 11-part health literacy resource from the Centers for Medicare & Medicaid Services (CMS). To help you develop or revise your written material, the Toolkit includes detailed guidelines for writing and design. There are 26 guidelines for writing and 46 for graphic design. For the full list, see Toolkit Part 3, *Summary List of the “Toolkit Guidelines for Writing and Design”*.

### ***About this part of the Toolkit***

Part 5 of the Toolkit focuses on the guidelines for graphic design. These guidelines apply to designing various types of written material intended for use in printed formats (see Toolkit Part 1). (For discussion about material that is read on a computer screen, see Toolkit Part 8, *Will your written material be on a website?*)

### ***What is this chapter about?***

This is the sixth of the eight chapters on design in Toolkit Part 5. It explains how to apply the Toolkit Guidelines for photographs, illustrations, and clip art. As with all of the Toolkit chapters on design, this chapter assumes that you have not had formal training in design. For background on things to know about the Toolkit Guidelines for Design, see Toolkit Part 5, Chapter 2, *Guidelines for overall design and page layout*.

### ***What aspects of design are covered in the other chapters?***

The other chapters in Toolkit Part 5 cover the following topics: tips for learning about design and working with design professionals (Chapter 1); overall design and page layout (Chapter 2); fonts (typefaces), size of print, and contrast (Chapter 3); headings, bulleted lists, and text emphasis (Chapter 4); use of color (Chapter 5); tables, charts, and diagrams (Chapter 7); and forms and questionnaires (Chapter 8).



## Images are powerful

Adding images such as photographs, line drawings, and other visual accents is a powerful way to enhance your written materials and help people understand the main messages. These visual elements help attract and hold the attention of your readers and help them recall the information (Houts, Doak, Doak, & Loscalzo, 2006). They can entice less-skilled readers by giving your materials a friendly look and making them appear at first glance to be easy to read. You can use images to help explain important concepts, reinforce your main points, add a touch of warmth and human interest, and show awareness and respect for the culture of your readers.

This chapter begins by discussing sources of photographs, illustrations, and clip art. Then it presents a set of guidelines to help you choose and use images in the most effective ways.



## Where can you get images for your materials?

### *There are many sources for photographs and clip art*

When you need an image for your materials, there are many possible sources that range in price, variety, suitability, and convenience. Here are options to consider:

#### **1** Get images from commercial stock photography companies

Commercial stock photography companies have huge portfolios of photographs “in stock.” Many also have electronic “clip art” illustrations as well. If you can find what you need, stock photographs are quite convenient. The cost can run high, especially if you need a large number of images.

- **Prices and terms differ depending on the company and characteristics of the photograph.** For example, royalty-free sources charge a one-time fee for *non-exclusive* use of the photograph (meaning that other people can “rent” this same photograph). Fees are typically in the range of \$50 to \$200 on up per photo. The cost varies by photograph and other factors, such as resolution. The price difference between a low and very high resolution version of the same photograph can

be huge. For most written materials, you will need low to medium resolution, depending on the size of the finished image.

- **You can browse commercial stock photography sources on the Internet.** Try key word searches for sites that sell stock photographs and for the particular types of photographs or clip art you are seeking. For example, you could try a key word search for “stock photographs” and another key word phrase such as “nursing home” or “multicultural children” or “doctor and patient.”
- **Your graphic designer may have collections of stock photographs** that the design firm has purchased for use by clients. Some have books that show tiny “thumbnail” images of the photos that are available (though books of thumbnails have largely been replaced by online catalogs).
- **It will likely take some searching to find commercial stock photographs that suit your needs.** The commercial stock photography sites cater mainly to advertising and business applications, offering images of people who look like models rather than everyday people. Typical poses include people smiling broadly and looking directly at the camera, people in business suits in upscale offices, and couples in love. In recent years, there has been some progress in expanding the racial and cultural diversity of the people in the photographs. There are also collections of particular types of photographs, such as “health care,” that may reflect the subject matter you need. Nonetheless, when you are searching for commercial stock photographs and clip art, finding the right combination of diversity, pose, and setting will take patience and persistence.

## 2

### Get images from organizations or government agencies

Depending on the type of photo or illustration you need, there may be some free or low-cost sources on the Internet or in your own community, or through your professional organizations.

- **Check on government websites and other websites.** For example, the National Eye Institute offers free downloads of photos at <http://www.nei.nih.gov/photo> (see Figure 5-6-c later in this chapter for examples of photos from this website). There are also collections of photographs on many health-related websites, such as the website for the Centers for Disease Control and Prevention (<http://www.cdc.gov>). You can find many other sources by doing searches on the Internet.
- **Check with community organizations, government agencies, educational institutions, professional associations, and national organizations.** Most of these groups don’t maintain a collection of photos and illustrations for general use, but they may have photos or clip art they are

willing to share if you ask. Perhaps other departments in your organization have photographs and illustrations you could use.

### 3 Seek donations of images and/or design services

Some organizations may be willing to donate photos or illustrations or provide pro bono design services. When organizations donate services or images, it’s a courtesy to acknowledge their help (but get their approval first).

- **Check with local companies and community organizations.** If you are working on materials for a non-profit organization or a local cause, there may be design firms, advertising agencies, photographers, or other organizations willing to donate (or discount) their services, including the use of photos or clip art.
- **Check with art and design schools.** Many of these schools like to use real-life projects for training their students, and the instructor may provide close supervision. Sometimes advanced students need to complete internships; perhaps your project could use the help of an intern.

### 4 Get photos and clip art from software programs or collections

You can get photos and clip art through some computer software or in clip art collections that you buy.

- **Computer software.** Many desktop publishing or word processing programs come with a collection of clip art and photographs, and may offer online collections to registered owners of the software.
- **Collections you can buy.** You can also buy separate collections of clip art on CD ROM that include thousands of images, often in multiple formats. Look for these at an office supply store, bookstore, or online. Before you buy, look through the images carefully to be sure the collection offers images you find suitable for your written material.

## 5 Get images and designs from specialty fonts or books

You can add borders, ethnic patterns, graphic accents, pictures, and similar decorative elements by using specialty fonts or inexpensive books of copyright-free borders and patterns. These resources give you a fun and very affordable way to add visual appeal and cultural imagery to your materials:

- **Often, the books of copyright-free borders and patterns come with electronic images on a companion CD.** We used books of this type as a source for patterns in this Toolkit. You can use a repeating pattern of symbols or other images to create a background texture.
- **Besides using the inexpensive books as a source, you can find interesting and affordable design accents in specialty fonts.** Some are like “dingbat” fonts, with a collection of various shapes and design elements or pictures. Others are devoted to a particular type of image, such as borders or animals.
- **Where to find these resources.** If you are interested in the books of patterns and borders, look for them at libraries, bookstores, or online. For the fonts, check font websites (some are listed in Figure 5-1-a in Toolkit Part 5, Chapter 1, *Tips for learning about design and working with design professionals*).

## 6 Commission or create your own images

For some purposes, creating your own photographs or illustrations may be cheaper, easier, and more effective than using stock photographs or clip art.

- **Creating your own illustrations and photographs is an excellent way to help ensure they are culturally appropriate.** Creating your own images gives you maximum control over features that affect cultural appropriateness, including choice of models, settings, facial expressions, poses, clothing, and colors. If you are producing materials for readers who have come from other countries, it’s helpful to use an artist or photographer who is part of their cultural community. The artist will bring valuable cultural knowledge to the task. If you are doing photographs, consider asking members of the community to be the models (Example Q later in this chapter uses this approach). Members of the community can help you figure out the most effective images to create.



- **Finding an illustrator.** If you need illustrations such as line drawings, ask local art schools to recommend artists who do this type of work. Ask other organizations in your community. Sketch artists at farmers’ markets are another possibility; you can even watch them at work.
- **Choosing an artist or photographer.** Artistic style, skill, and fees can vary enormously among artists and photographers. Be sure to meet with candidate photographers and artists to review their portfolios and discuss the details of your project. Be clear about the final format you need. For example, you might be planning to scan the images that the artist creates, or you might want an electronic image of a particular type.
- **Working with an artist or photographer.** Explain exactly what you are trying to accomplish with the photograph or illustration. Provide as much guidance as you can, such as emphasizing the need to avoid details that could be distracting. It is often wise to start by asking for a single photo or drawing to be sure that instructions are clear and the completed work is satisfactory.
- **Get written permissions.** Generally, you will want to get full and exclusive rights to the work you commission, and be sure that models have signed releases. You will need some legal paperwork; consult an attorney to be sure that everyone’s rights are protected.

### ***About the images we use as examples in this Toolkit***

In this chapter and the others on design, we use a number of photographs and pieces of clip art to make particular points about design. Our examples include excerpts from published materials, adaptations of published materials, and many examples created specifically for this Toolkit.

**Many of the images in this Toolkit are copyright protected.** Please remember that the examples of photographs and illustrations included in this chapter and elsewhere in this Toolkit are for illustration only. Whatever the source, if you are interested in using images that appear in already published material, contact the original source to get permission.

In this chapter, some of the photographs and examples of clip art were downloaded from Microsoft Clips Online, a resource that is included in Microsoft Office software. If you want to use these or other images from Microsoft Clips Online, you will need to be a registered owner of the Microsoft Office Software and download them yourself. For example, if you are using PowerPoint, select “insert” then “clip art”. Look for a link to “Clip art on Office Online” that appears at the bottom of the menu for inserting clip art. Select this link to reach the website where you can search for and download photographs and clip art. Please note that the use of these images from Microsoft Office Online is governed by a legal agreement that appears before you begin downloading clips you have selected.





## List of guidelines covered in this chapter

This chapter discusses the guidelines for use of photos and illustrations listed below in Figure 5-6-a. (For a list of all of the Toolkit Guidelines for Writing and Design, see Toolkit Part 3, *Summary List of the “Toolkit Guidelines for Writing and Design”*.)

### Figure

5-6-a. Toolkit guidelines for use of photos, illustrations, and other visuals.



**Use photos, illustrations, symbols, and other visuals that relate directly to the information in the material and reinforce your key messages.** Images have great impact, so select them carefully and use them to highlight key points. Instead of using images to decorate the pages, choose images that reflect the subject matter of your materials. Try to show only the behaviors you want to encourage. Avoid using images that are too abstract or hard for readers to understand, such as parts of the body shown in isolation, cross-sections, and highly magnified images.



**Use images that are clear, uncluttered, and consistent in style.** For greatest appeal and impact on your readers, keep the images clear and simple, with good contrast that emphasizes the main subject. Avoid using photographs or illustrations with cluttered backgrounds or distracting detail (or edit them to remove the clutter). For a unified look, choose images that are compatible in style and color.



**Use photos, illustrations, symbols, and other visuals that are culturally appropriate for your intended readers.** Choose images of people and activities that are contemporary and representative of the intended audience in their demographics, physical appearance, behavior, and cultural elements. Check to be sure that the images you use are free from unwanted connotations or problematic cultural significance.



**When images include people, make sure that their poses, facial expressions, and body language are appropriate to the situation and appealing to the intended audience.** Poses that show people engaged in doing something may be more effective than stock photographs of people smiling directly at the camera. If there is more than one person in the image, poses that show the people relating to each other tend to have more impact.



**Be very cautious about using symbols or icons to represent concepts or to serve as markers to guide readers through the material.** Symbols and icons can be ambiguous or confusing to your readers. Using symbols as shortcuts can hinder more than help by giving less-skilled readers something additional to notice, learn, and remember. If you use symbols or other visual means of marking or representing topics, check to be sure that your readers understand the meaning you intend and find the use of symbols helpful.



**Avoid using cartoons, “cute” or humorous images, and caricatures, because these kinds of images may bewilder, confuse, or offend some of your readers.** Since humor does not translate well across cultures, attempts at humor may puzzle or confuse some readers. Humor based on irony is especially problematic, because readers who take it literally will completely misinterpret what you mean. In addition, individuals differ in what they may find amusing. When you are choosing images, avoid those with strange camera angles, exaggerated features, or a “cute” look. Distorted or coy images distract readers by drawing too much attention, and people may find them unappealing or culturally offensive.



**Pay careful attention to the total number, quality, size, placement, and labeling of the images you use.** For best impact, limit the number of images you use. Use images of high quality that will reproduce well, and make each one large enough for good impact. Keep images close to the text they reinforce. Place images in positions that fit with the natural progression of reading so that they do not cause your readers to overlook parts of the text.



**Check for accuracy, if applicable, and pretest the images with your intended readers.** If your images include technical or medical subject matter, verify that the details are correct. Check on the appeal, cultural appropriateness, and comprehension of the images by getting feedback directly from members of the intended audience.

Source: Created for this Toolkit. For more about development of the guidelines, see Toolkit Part 3, *Summary List of the “Toolkit Guidelines for Writing and Design”*.



## Images should relate directly to the material and reinforce its meaning



Use photos, illustrations, symbols, and other visuals that relate directly to the information in the material and reinforce your key messages.

Images have great impact, so select them carefully and use them to highlight key points. Instead of using images to decorate the pages, choose images that reflect the subject matter of your material. Try to show only the behaviors you want to encourage. Avoid using images that are too abstract or hard for readers to understand, such as parts of the body shown in isolation, cross-sections, and highly magnified images.

### ***Search for images that clearly convey your topic***

People who have low literacy skills are easily distracted from the task of reading. They also have to work harder than skilled readers to learn and integrate new information (Doak, Doak, & Root, 1996).

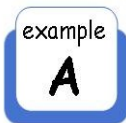
To help less-skilled readers understand and use your written material, choose photographs and illustrations that relate directly to the topic and reinforce the meaning of your words. Here are some tips:

- **Avoid images that are purely decorative.** To help keep less-skilled readers on track, avoid decorating the pages with designs or images of people and activities that lack a direct connection to the specific topic of the material.
- **Show the specific behaviors you discuss.** For example, if your text asks the reader to write something down, show an image of a person writing something down—not a face smiling into the camera. If you are explaining Medicare beneficiary rights and responsibilities, a picture of an older person reading a flyer is better than a picture of an older couple walking hand in hand on the beach. If your material is about taking children to the doctor for preventive care, show a scene at the doctor’s office, not a group of children on a playground. In a brochure to publicize a telephone help line, show images of people talking on the phone.

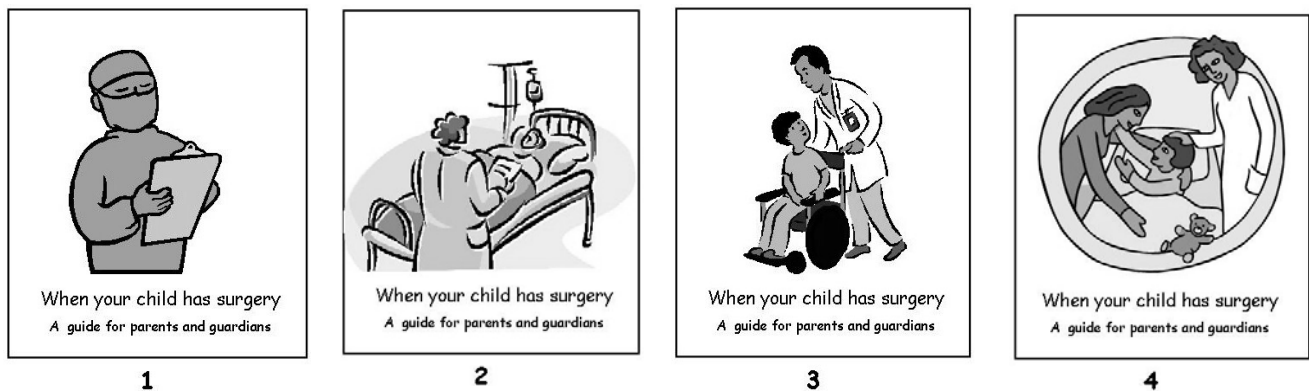
- **Consider the tone you want to establish and reinforce.** Figure 5-6-b below shows an example.

Figure

5-6-b. Choice of an illustration affects the emotional tone of your material.



This example shows four options for illustrating the cover of a booklet for parents and guardians of children who are hospitalized. The title of the booklet is the same for each one. Each illustration reflects the subject matter of the booklet, which is good. But notice how much they differ in the emotion they convey. For parents and guardians who are concerned about a child’s upcoming hospitalization, which illustration establishes the best tone?



Source: Created as an example for this Toolkit.

### ***Using captions to reinforce an image***

When you draw your reader’s eye with an image, you create a powerful opportunity to help them understand the material. Readers tend to stop and read a caption because of its brevity and its position right near an image. Take advantage of this teachable moment by adding a caption. Captions strengthen the relationship between visuals and key messages (Doak et al., 1996; see this source for more about using captions).

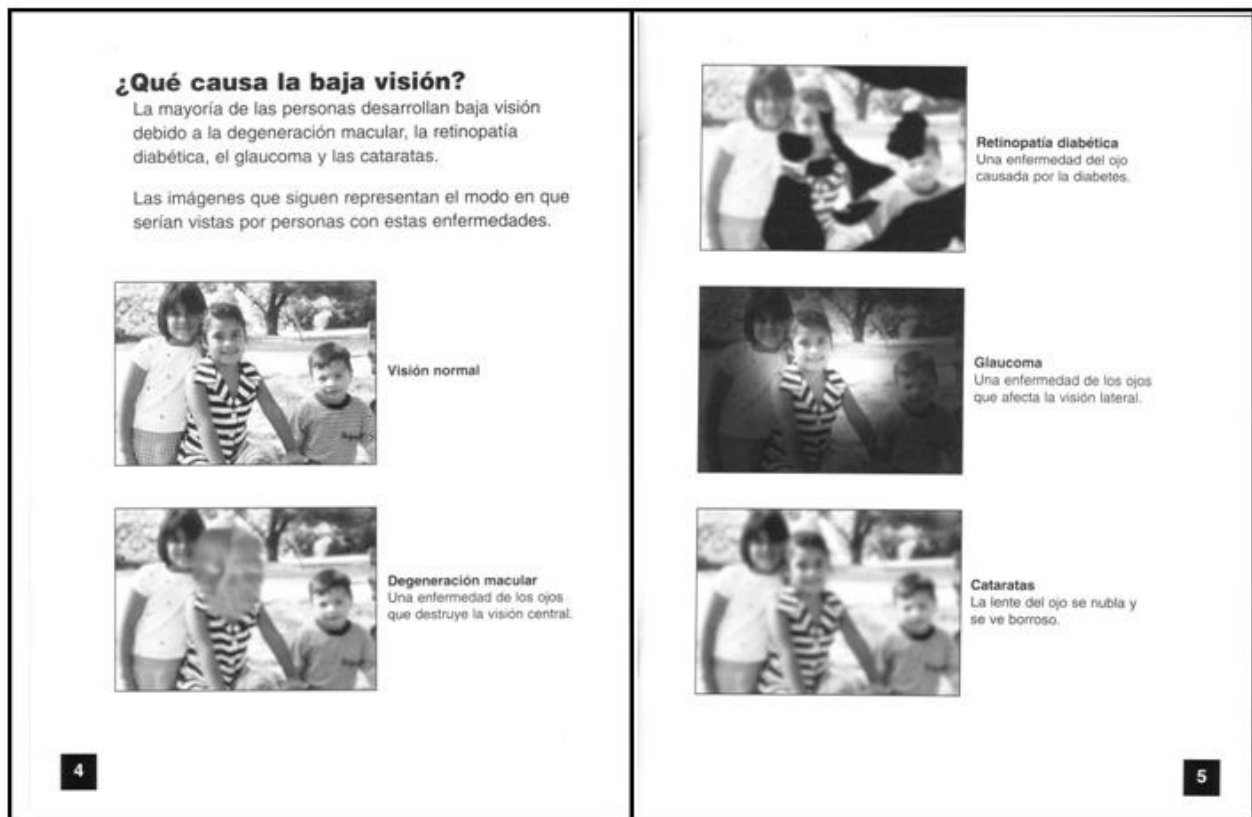
Figure 5-6-c below shows an example of using images and captions to good advantage.

Figure

5-6-c. Using images to depict how eye diseases affect vision.

example  
B

This example shows two pages from the Spanish version of a large print booklet by the Eye Institute about problems of low vision. These pages use photographs of the same scene to show how several eye diseases cause different types of problems with vision. The series of photos shows how the group of children would appear to a person with normal vision. Then it shows how having macular degeneration, diabetic retinopathy, glaucoma, and cataracts would affect the view of this same scene. For a topic like this, showing pictures is far more effective than using words to describe how eye diseases affect vision.



Source: National Eye Institute (NEI), National Institutes of Health (NIH). *¡Ojo con su visión! Sepa qué hacer si tiene baja visión.* Pub No. EY-229. In English: *Watch Out for Your Vision! What You Should Know About Low Vision.* NEI is located on the NIH campus, 31 Center Drive, Bethesda, MD 20892-2510. To order these publications, call (301) 496-5248, or order online at <http://catalog.nei.nih.gov/c-96-low-vision.aspx>.

### ***Assume that some readers will look at the images and not read the text***

When you select images for your materials, remember that some readers will pay more attention to the images than to what you say about them in the text. This has important implications for how you select images:

- **Try to show the more important things in your images.** Images have great impact, so don't waste them or mislead your readers by depicting something minor. Use the power of the image to emphasize what's important. Later in this chapter, Guideline 9.7 suggests that you can get the greatest impact from your images by using fewer of them, choosing each one carefully, and making each one relatively large.
- **Choose your images so that readers won't be confused or misled if the images are all they look at.** For example, for people with asthma, there are different types of inhalers that need to be used in different ways. In written material that tells how to use an inhaler, it could be problematic to show a picture of only one type.
- **Check to see if the details of a photo or illustration are consistent with healthy behaviors you want to encourage, even if these behaviors are not the topic of your material.** For example, if you show people riding bicycles, are they wearing helmets? In stock photographs, they often don't.

### ***To avoid possible confusion, try to show only the correct way to do something***

Some materials use photographs or illustrations to demonstrate both the right and wrong way to do something, such as the right and wrong way to position a seatbelt.

- **Generally, it's best to show only “the right way.”** Add a caption that reinforces this point. If you show readers the wrong way as well as the right way, you run the risk of confusing them. Readers tend to skim, and they may not realize when you are showing them something they should *not* do.
- **If you do show a wrong way to do something, label it very clearly and test it with readers.** In some situations, it may be important to show people things they shouldn't do, and explain the reasons why. If you do need to show both a right and wrong way, label each one very clearly and test to be sure that people understand. If you show a wrong way to do something, don't rely just on a symbol such as a big “X” across the wrong way, or a circle with a slash through it. Your readers may not be familiar with these symbols or they may misinterpret them. Symbols to designate something as wrong or forbidden differ by culture and country.



### ***Avoid images that are too abstract or hard for readers to understand***

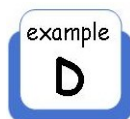
When you are choosing images to reinforce the content of your material, avoid using images that may be hard for people to understand or interpret. Here are some tips on making sure that readers will find the images clear and helpful:

- **Avoid showing parts of the body in isolation.** When you show an arm or foot or other body part out of context, it is disorienting to your readers, especially to less-skilled readers. Images that show an isolated body part can even be disturbing. For example, an ad with an image of a baby’s feet sticking out from under the covers was very bothersome to some people. They were worried that something was wrong with the baby because they couldn’t see the rest of it. (You can see this photo in *Why Bad Ads Happen to Good Causes* (Goodman, 2002), a publication you can download at <http://www.agoodmanonline.com/red.html>.)

So avoid using the types of images shown below:

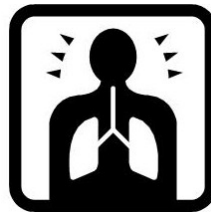
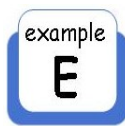


To make it easier on your readers and avoid misunderstandings, select photos and illustrations that show enough context so that the image is easy to understand. Here’s an example:





- **Avoid images that have highly stylized parts of the body, cross-sections, or cutaway images of the body.** When you are already familiar with the subject matter of an image, it can be easy to forget how bewildering a stylized image, cross-section, or cutaway image of the body can be. Health care professionals are accustomed to interpreting images of this sort, and may be unaware of how puzzling and difficult they can be for a reader. If you can, avoid using such images in your written material. At best, they put too great a cognitive burden on your reader, and at worst, they can give your reader a wrong or misleading impression. If it is essential to show cross-sections or other illustrations of body parts, take extra care in selecting and explaining the images, and test them with readers to verify comprehension (see Toolkit Part 6, *How to collect and use feedback from readers*). When you are choosing or creating the images, keep them as realistic as possible. Avoid using stylized or caricatured images such as the example below:



- **Avoid images that show an enlarged version of something that is tiny.** For example, suppose that you are writing about dust mites as a trigger for asthma. Since dust mites are much too tiny to see, you would have to use a greatly enlarged image to show what they look like. This would probably not be a good idea. First, people tend to be concrete and literal about interpreting images, and it is hard for many people to relate to a greatly magnified image of something that is invisible. Second, the image itself would be potentially disturbing, since it would resemble a monster insect from a horror show.
- **If you show a group of images, try to maintain realistic proportions for each part of the group.** When things are out of proportion, an image gives misleading cues. These misleading cues put an extra – and unnecessary – burden on the reader to figure out what the image is about.

## Images should be clear, uncluttered, and consistent in style

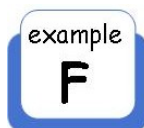


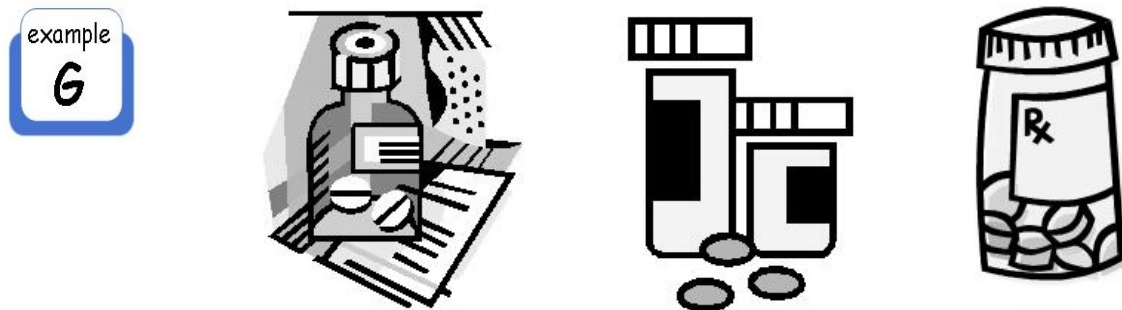
Use images that are clear, uncluttered, and consistent in style.

For greatest appeal and impact on your readers, keep the images clear and simple, with good contrast that emphasizes the main subject. Avoid using photographs or illustrations with cluttered backgrounds or distracting detail (or edit them to remove the clutter). For a unified look, choose images that are compatible in style and color.

### ***Choose images that are clear and simple***

For greatest impact, keep your photos and illustrations simple and consistent in style, free of clutter and distracting detail. Readers shouldn't have to pause or study an image to figure it out. When images are clear and simple, it takes less effort to understand them and they are less likely to be misinterpreted. What about the images shown below—which ones do you find easier to understand at a glance?





Minimizing distraction and clutter in an image is especially important for less-skilled readers because it helps them connect the image with the key messages. There are several ways to get images that are clear, simple, and recognizable at a glance:

- **You can use simple line drawings.** To help keep images clear and simple, specialists in low literacy materials often recommend using simple line drawings (Doak et al., 1996; Houts et al., 2006; Root & Stableford, 1998).
- **You can select photos and illustrations that are clear and uncluttered.** Obviously, it’s quickest and easiest to pick uncluttered images in the first place, but this is not always possible.
- **You can commission or create your own images that are clear and simple.** Since it can be hard to find suitable images for your materials, you may want to consider commissioning or creating your own line drawing or photographs. If so, you can emphasize the need for simple images that are free of clutter and distracting details.
- **You can crop (trim) the background of images to remove unwanted details or clutter.** Cropping alone can improve many images enormously.
- **You can edit the image directly to reduce or remove unwanted clutter.** It’s relatively easy to alter the look of digital photographs by using graphic design software or photo editing programs. You can also make simple improvements to many types of clip art (see tips on editing clip art later in this chapter). Here are two examples of de-cluttering of clip art:

example  
**H**

**Original image**



**Too much is going on in this image**

The phone distracts from the ambulance. It is disproportionately large and looks odd next to the ambulance. Its receiver is in an odd position, as if it had been dropped.

The tree adds distraction and clutter. Its rounded lollipop shape is too stylized to be instantly recognizable as a tree and it fights with the hospital for the reader’s attention.

**Edited image**



**Simplifying the image helps focus attention on the ambulance and hospital**

Removing the phone and the tree simplifies this image. Darkening the lines around the siren on top of the ambulance makes the siren more prominent, helping to identify the vehicle as an ambulance.

example  
**I**

**Original image**



**An odd and stylized pose with a distracting background**

The figure is abstract and distorted. Proportions of figure and fruit platter are way off. The pattern in the background and the shadow from the figure add clutter.

**Edited image**



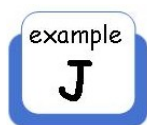
**Clear image with simple lines and good contrast**

With the figure and patterned background gone, the focus is clearly on the fruit. Removing the color from the platter increased the contrast and makes the pieces of fruit easier to see.

### ***“Cutouts” can add clarity and drama to your images***

The background is a vital part of some images because it has cues that establish the setting or reinforce the meaning of the image. But when the background details don’t matter, or when they are distracting or unwanted, removing the background can add clarity and drama to your images. Removing the background can work well with either clip art or photos:

- **Clip art cutouts.** Some clip art already comes as a cutout, so there’s no background to remove. But when clip art does include a background, it’s often easy to remove it by simple editing. As shown in example J below, removing it can help a lot.



**Original image**



**Background is cluttered and distracting**

The countertop and cabinets diminish the contrast, making it hard to see what she’s doing.

**Edited image**



**A cleaner and more compelling image**

The chair back and table edge are enough to establish the setting. Removing the rest of the background greatly improves the contrast and focuses attention on the pill bottle she is holding.

- **Photo cutouts.** When graphic designers remove the background of a photo, they call it creating a “clipping path.” In this Toolkit, we call it creating a “photo cutout.” Later in this chapter, examples R and U show photo cutouts.

### ***For a unified look, keep images consistent in style***

When you use more than one photo or illustration in your material, try to stick with a similar style for all of the images you use. Keeping your images similar in style lends unity and increases the impact of each individual image.

Style variations are especially apparent in clip art. Combining different styles of clip art in the same piece is aesthetically discordant and unappealing. It distracts readers from the subject matter of the images by



drawing undue attention to changes in how they are drawn. Suppose, for example, that you needed to select images of health care situations. Compare the examples of clip art shown in Figure 5-6-d below.

**Figure**

5-6-d. For a unified look, keep images consistent in style.

example

**K**

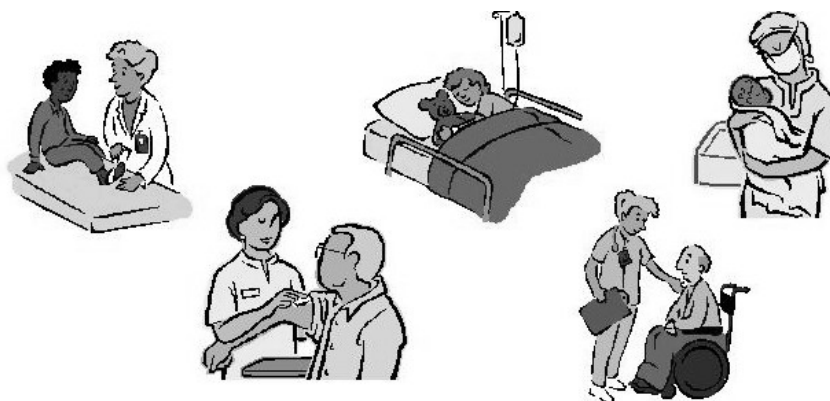
The healthcare related images shown below illustrate a wide range of variations in style. Combining such different styles in the same material would be discordant and distracting.



example

**L**

Compared to the images in Example K above, these images shown below look better together because each image in is done in a relatively similar style. Sticking with a single style of clip art helps readers focus on the subject matter of your written material, undistracted by changes in the style of the images.

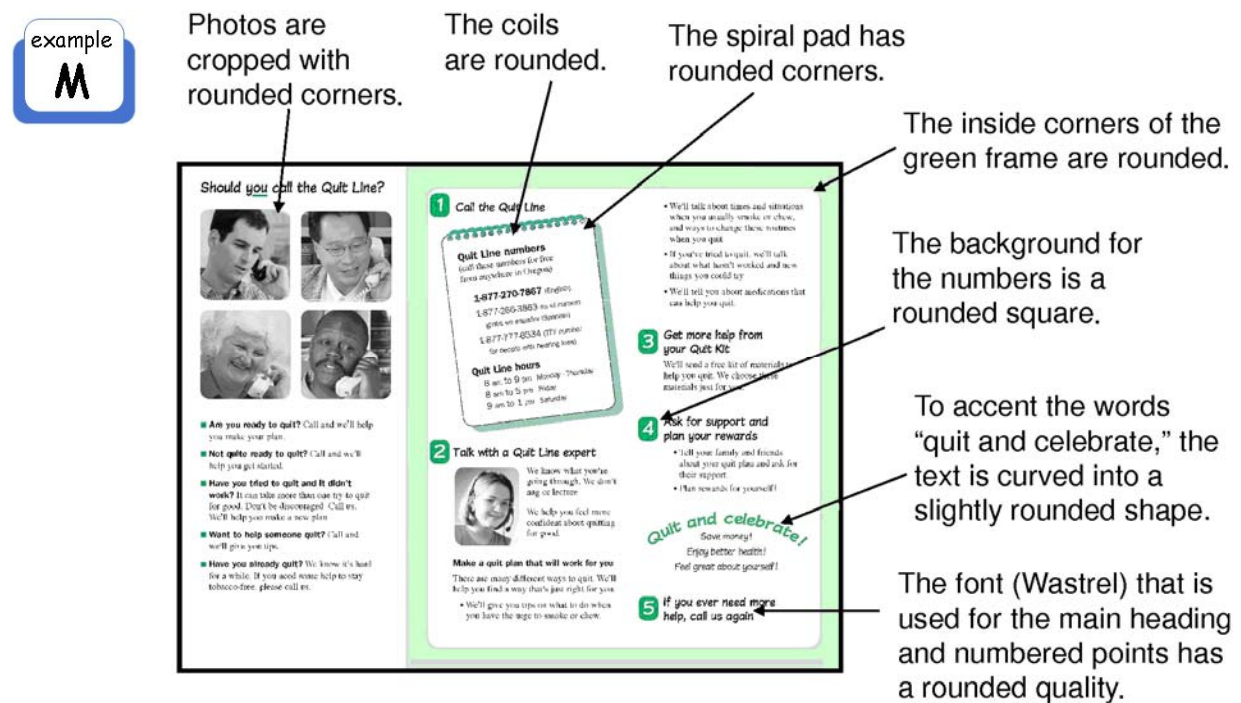


Source: Clip art collected for use as an example in this Toolkit.

Here are some additional tips for creating consistency in style:

- **Use a color palette.** If you are using full color in your materials, pick a small group of colors that look good in combination (a color palette) and use these as your dominant colors. Using a color palette will help unify the images, encouraging readers to focus on your messages rather than how the colors keep changing. Although we can’t show you examples in color in this Toolkit (because this Toolkit uses only black and one accent color), the color combinations in clip art may not fit the color palette you have chosen, or they may be too loud. If so, it may be easy to change the colors, depending on how the clip art has been constructed. We discuss how to edit clip art in a later section of this chapter.
- **Crop (trim) photos in similar ways when they are presented in a group.** For an example, see Figure 5-6-e below.
- **Foster unity of design by repeating key design elements throughout the material.** Repetition of design elements is a basic design principle. Figure 5-6-e below shows an example of using repetition of rounded design elements to unify the overall design.

**Figure** 5-6-e. Using repetition of design elements to foster unity.





Source: The material shown in this Figure was created for this Toolkit as part of the tri-fold brochure featured in Toolkit Part 10, “*Before and after*” example: *Using this Toolkit’s guidelines to revise a brochure*”. It is based on a brochure produced by the State of Oregon and is adapted with permission for use in this Toolkit. When the brochure is fully opened, you see the three panels that are shown above. For details, see Toolkit Part 10.



## Images need to be culturally appropriate



Use photos, illustrations, symbols, and other visuals that are culturally appropriate for your intended readers.

Choose images of people and activities that are contemporary and representative of the intended audience in their demographics, physical appearance, behavior, and cultural elements. Check to be sure that the images you use are free from unwanted connotations or problematic cultural significance.

Throughout this Toolkit, we emphasize the importance of making it easy for your intended readers to relate to your written material. Guideline 9.3 shown above applies this basic point to the images you use. As you think about what makes an image culturally appropriate, remember that your goal is get readers to see themselves and the way they live reflected in the written material. This helps attract and hold their attention, and encourages them to read on.

In this Toolkit, we suggest two ways of helping your readers see themselves in your written material and feel comfortable with what it says and the images it includes. These two basic approaches are shown below.

**Two complementary ways to make written material culturally appropriate**

**1** Add or emphasize cultural elements that are tailored specifically for your readers.

**2** Remove or de-emphasize any elements that might be cultural barriers to some or all of your readers.

**To make the images in your written material culturally appropriate, use *both* of these strategies.** These are just two different ways to accomplish the same goal of helping your readers sense that it was written for them.

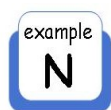
- **The first way *adds culturally appropriate elements to your images.*** To attract your readers, you can use images that are *culturally adapted*. This means using images that show people, activities, and settings that reflect the everyday lives of your readers. When your intended readers have a lot in common, it is easier to tailor the material to reflect their demographics, behaviors, and cultural background. Making your images culturally appropriate is a powerful way to show your readers that the materials are intended for them.
- **The second way *removes potential cultural barriers from your materials.*** To *avoid losing* readers, and to make your materials culturally acceptable to a *broader range* of readers, you can remove barriers by using images that are *relatively neutral* in visual elements that are related to culture. Essentially, this means avoiding, removing, or subduing any features in the images that might be cultural barriers or distractions to your readers. For example, you would avoid showing behaviors and settings that are not part of their experiences or lifestyles. You would also avoid images that show extremes or outmoded fashion in hairstyles, clothing, and objects. And of course, you would take special care to avoid showing anything that might be culturally offensive.

The rest of this section gives tips and examples that illustrate ways to apply these strategies to your written material.

***Use images that reflect your readers’ culture and traditions***

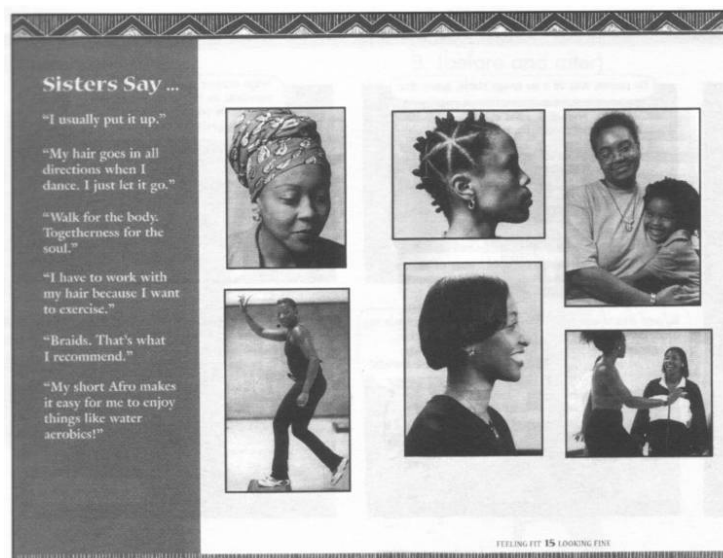
Your readers will respond more positively when your written material shows familiar images that reflect their cultural customs and traditions. This includes the foods they generally eat and type of clothing they wear, as well as settings, activities, and objects that are common in their everyday lives. Here are a few examples:

- **Familiar foods.** Materials that discuss diet need to use examples of the types of food their readers eat. For example, a booklet for Hispanics/Latinos who have diabetes shows three types of tortillas in its illustrations about portion size for foods (Health Promotion Council). If material telling how to limit sodium in foods will be used by Asian Americans, it needs to discuss ingredients such as soy sauce. Of course, these food examples may be just as relevant for other race-ethnic groups, since Americans of all backgrounds enjoy Latin and Asian foods.
- **Familiar settings.** Showing familiar settings such as grocery stores, playgrounds, and in-home scenes helps make your print materials more comfortable and appealing to your intended readers.
- **Story telling.** Stories are compelling to all readers (Goodman, 2003; Osborne, 2004; Rudd & Comings, 1994; Wheatley, 2002). For some groups, such as Native American or Hispanic groups, stories are a primary means of sharing information. Using images that depict story telling or that illustrate a story being told would be ways to make material culturally appropriate for these groups.
- **You can use patterns and symbols to suggest cultural diversity,** either alone or in combination with other visual elements such as photos and illustrations. Here is an example:



The example below is an excerpt from a booklet called *Hair Care Tips for Sisters on the Move*. It was written by and for African American women to encourage physical activity (Sisters Together Coalition, Boston, MA. Available at <http://www.hsph.harvard.edu/healthliteracy/files/sisters.pdf>). Notice the band of pattern across the top of the pages that is suggestive of African motifs.

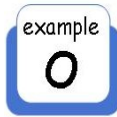
Source:  
Used with  
permission,  
Rima Rudd,  
Harvard  
School of  
Public  
Health.



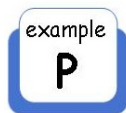
### ***Use images that show people who are similar to the intended audience in their demographics and physical appearance***

When you use images of people who resemble the age, gender, race, and ethnicity of your intended audience, it’s easier for people to relate to your materials.

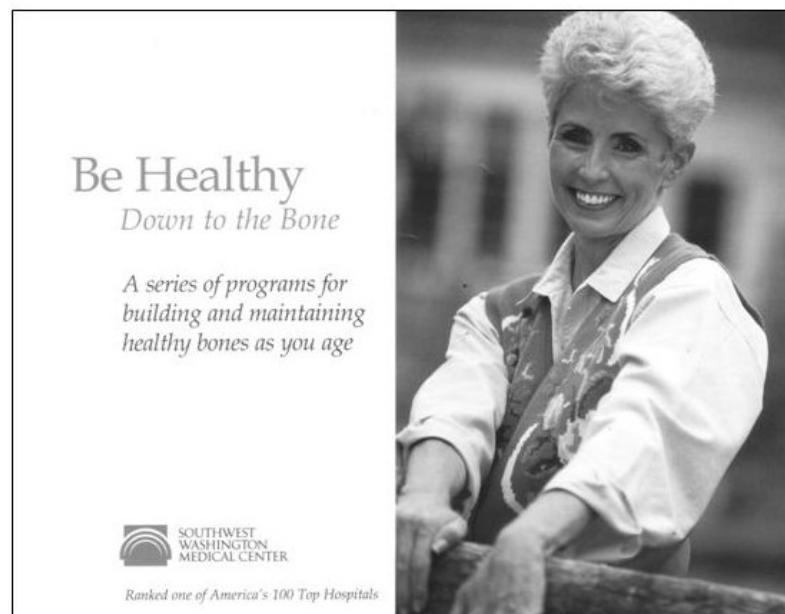
- **In terms of age and gender**, this means, for example, that Medicare materials should generally show men and women in their sixties, seventies, and older. Of course, pictures that show an older adult with a child or grandchild can also be effective, depending on the topic and purpose of the material.
- **In terms of race and ethnicity**, it depends on the racial and ethnic diversity among members of your intended audience. When there is a great deal of racial and ethnic diversity among members of your intended audience, *it can be a challenge to produce print materials that respect this diversity by showing its full range.*
  - **One approach is to choose images that reflect a broad range of diversity.** There are several ways to do this:
    - You can use images of groups of people that show diversity among the individuals in the group. For example, an image might show a group of older people in a retirement center that includes people of different races.
    - Another way is to use images of individuals, but pick them to reflect racial and ethnic diversity. This approach is illustrated in Example M earlier in this chapter. It shows an excerpt from a brochure that includes separate pictures of four people, each of whom is talking on the telephone. The photos were chosen to include men and women of different races and ages as a way of indicating that the tobacco quit line serves everyone in the state.
  - **Another approach is to select images of people who are hard to classify in terms of race and ethnicity, to make it easier for a broader range of your intended readers to identify with them.** If your written material is brief, there may be room for only one or two photographs or illustrations (especially if you follow Guideline 9.7 about limiting the number of images for greater impact). In situations like this, it can be effective to select images of people whose appearance defies easy racial-ethnic identification, suggesting, perhaps, a mix of racial-ethnic family background. This makes it easier for people of different racial-ethnic backgrounds to identify with the image. Here are two examples:



If your audience is racially and ethnically diverse, and the number of images you can use is very limited, silhouettes are an option to consider.



This example shows a stock photo on the cover of a brochure about osteoporosis written for a diverse audience of women in the mid-to-older age range. The photo is suitable for the intended readers because the model has a friendly look and her age and ethnicity are open to different interpretations. The pattern on her vest adds visual interest and a hint of ethnicity, but it is hard to classify in terms of a single cultural background.



Source: Used with permission of Southwest Washington Medical Center.

- **Try to choose images with people who look like ordinary people rather than glamorous models.** As we mentioned near the beginning of this chapter, it can be challenging (and sometimes expensive) to find the type of images you need in stock photographs. Sometimes it works better to create culturally appropriate images by taking your own photographs, as shown in Example Q below. Whatever the source of your images, look for natural poses that show people doing the kinds of things your materials discuss and the kinds of things your readers do.



The examples below show sample pages of a booklet on safety for babies produced by Multi-Cultural Educational Services (1998). The content has been translated into multiple languages. For ease and economy of distributing the booklets, each version includes translated text in three languages.



This page shows text in Bosnian, Arabic, and Somali.



This page, from a different version of the booklet, shows the same text in Hmong, Laotian, and Vietnamese.

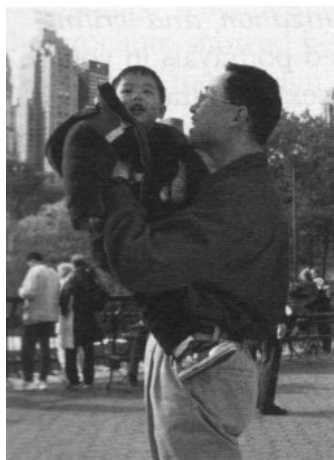
Notice how the photo for each booklet has been chosen for the intended readers. Though this example shows only one photo from each booklet, the other pages of each booklet include photos that represent all three language groups for the booklet. These photos feature images of local children and their families; they were taken specifically for use in these booklets.

Source: Charles and Pam LaRue, Multi-Cultural Educational Services, Coon Rapids, Minnesota. Used with permission. (See full references at end of chapter.)



***To make materials culturally appropriate to a highly diverse audience, choose images that are more culturally neutral***

For any audience, you will want to avoid or remove features in your images that might be cultural barriers to your readers. When your intended readers differ greatly in lifestyles, attitudes, experiences, geographic location, heritage, languages, socioeconomic status, and demographics, choosing images that are more culturally neutral for your readers can be a good approach. Sometimes you can remove part of an image to make it more culturally neutral, as shown in Example R below.



This stock photograph shows a father and child in a big city setting.



Turning this photo into a “cutout” removes the big city background. Now it will be easier for readers to relate to this photo, regardless of where they live.

When you are considering an image for your written material, check it carefully. Do your best to avoid using images of experiences or lifestyles that are not typical for your readers and images that may have problematic cultural meaning. Here are some tips:

- **Watch for objects in photos that make them look dated or reduce their appeal to some of your readers.** Think of it in terms of keeping your “props” up to date so that you don’t distract your readers. For example, pictures of people using the early large-size versions of cell phones will draw undue attention to the phone itself and make your picture look dated. The appearance of computers has changed a lot in recent years, so using an old photo of a computer may make your written material look older than it is.



- **Consider the impact of hairstyles, clothing, and accessories such as eyeglasses:**
  - Taste in clothing, hairstyle, and accessories can be wide-ranging if your audience is diverse. To make your materials appeal to a broad range of readers, it helps to choose images where people’s hairstyles, clothing, and accessories are relatively neutral and unobtrusive. Fashion changes quickly, so sticking to plain, simple, classic styles that don’t draw attention will help keep your materials from looking dated.
  - It’s wise to avoid using images that have patterns and prints that are prominent enough to distract from people’s faces and what they are doing.
- **Take special care to avoid stereotyping.** Throughout this Toolkit, we emphasize the need to avoid stereotyped portrayals in your written material. This advice about avoiding stereotypes applies to images just as much as it does to the words you use. For example:
  - Be alert to avoid potentially sexist portrayals, such as choosing photos for Medicare materials that show a man who looks like he is in his sixties or seventies with a woman who looks like a glamorous model who is decades younger.
  - Figure 4-3-i in Toolkit Part 4, Chapter 3, *Guidelines for writing style*, gives guidelines for writing about people with disabilities, including preferred terminology that gives a positive portrayal. The need for positive portrayal extends to images as well. It is respectful of diversity to include images of people with disabilities in your written material; these should be positive and active images.
  - For more about the issue of avoiding stereotyping, see the website called *The Provider’s Guide to Quality & Culture* at <http://erc.msh.org/qualityandculture>.

### ***As usual, the ultimate test is your readers’ reactions***

To be sure that the images in your written material are culturally appropriate, it’s crucial to test them with your intended readers. It’s especially helpful to get your readers involved at an early stage. People who represent your intended audience are the best advisors to help you decide which details should be added to make the material more culturally appropriate. They will also help you identify which details are likely to pose barriers to some or most readers.

You may find that some features of the photos and illustrations matter a lot to your readers, and others not at all. It depends on the particular type of audience as well. For example, if you are writing for teenagers, you may find that the band of cultural acceptance for hairstyle and clothing variations is quite narrow and subject to rapid change.

It can be easy to miss the significance of visual cues that may be problematic to your readers. By testing images with members of the intended audience, you maintain the good will of multicultural communities and avoid the delay and expense of needing to revise materials to make them culturally acceptable.

- When a brochure intended for Detroit’s large Arab-American population was tested in a focus group, someone spoke up and said that the brochure was unacceptable for distribution in the community. When asked why, the person replied that a photo of a woman in the brochure showed her naked forearm, which could be offensive to members of the Muslim Orthodox community. The photo was fixed before publication (personal communication, Donald Himes, 1999).
- If you are creating material for American Indians, be sure to check carefully with Indian communities before using any tribe-related images.



## Facial expressions and body language should match the situation



When images include people, make sure that their facial expressions and poses are appropriate to the situation and appealing to the intended audience.

Poses that show people engaged in doing something may be more effective than stock photographs of people smiling directly at the camera. If there is more than one person in the image, poses that show the people relating to each other tend to have more impact.

Many factors, large and small, add up to the overall effectiveness of a photo or other image. Subtleties of facial expression and body language in the images you use can have a big impact on your readers. As you are selecting images for your print material, pay attention to the small details. Here are some tips for choosing appropriate poses and expressions:

### ***Reinforce the messages in your material***

Select images with poses and moods that are compatible with the content of your material. Take advantage of power of the image to reinforce your key messages and encourage your readers to take action. Here are some tips:

- **In general, look for photos that show people actually doing something that is related to the content of your written material**, rather than just looking into the camera. When you choose images that show relevant behaviors, you strengthen the connection between the image and your content. For example, the photos below both show people who are totally focused on what they are doing – rather than looking into the camera.



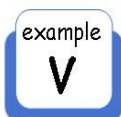
- **Create visual interest and drama by depicting relationships.** When you show more than one person in a photo or illustration, the impact is often more powerful if you show the people relating directly to one another. Images of people doing things and relating to each other will draw your reader in by creating a mood and suggesting that there might be a story to be told. In Example T below, compare the photo that shows a couple looking into the camera with the one that shows a couple orienting toward each other rather than the camera.



- **Remember that smiles are not always appropriate.** If you look through a collection of stock photos, you’ll notice that many or most of the photos show people who are smiling. Smiling images tend to dominate because stock photos are oriented toward advertising, and smiling shots are a popular way to convey an upbeat mood in ads and help sell products. But you are creating information materials, not commercial ads, and smiles may not be appropriate for your subject matter. For example, if your flyer is about calling to report Medicare fraud or abuse, you would not want to use a photo of an older person talking on the phone and smiling, because a smile would not suit this situation. Suppose that the material is about the importance of getting treatment for clinical depression. While you wouldn’t want the photos to be too downbeat, you also would not want to fill it with images of people smiling.
- **Choose poses that look realistic and natural.** When you are choosing photos or other images, eliminate those with awkward poses or details that undermine the credibility or overall quality of the image. Here are some examples:



Notice how the composition and camera angle makes this pose look awkward. Cropping to remove the plain background and distracting detail on the doorknob would focus more attention on the subject, but it wouldn’t fix the basic problem with the pose, camera angle, and shadow on the wall.



This woman looks uncomfortable holding the clipboard so far from her body. Also, she’s wearing her stethoscope dangling down in front. Clinicians usually drape it around their neck.

- **Test your images with members of your intended audience for cultural acceptance of expressions and other aspects of body language.** For example, an image that shows one person touching another on the arm might appear to be friendly and supportive to people from some cultures and inappropriate to people from other cultures.

### ***What about using images that are intense or potentially disturbing?***

You have many choices about what to show in your images. Some images are easy to rule out, because they foster a tone that is not supportive. Here is an example:



Why show a picture that looks like a doctor who is scolding a patient?

Usually, it works best to favor the upbeat image over one that might be distressing or disturbing to your readers. For example, if the flyer is about calming a colicky baby, an image of a person cuddling a baby in a rocking chair is a lot more soothing and encouraging than a close-up of a baby screaming. On the other hand, for some topics and some readers, it may be quite effective and more appropriate to show an image that is not upbeat. Whenever you are thinking of using an intense or potentially disturbing image, be sure to test it first with members of your intended audience.

## **Take special care in using symbols**



Be very cautious about using symbols or icons to represent concepts or to serve as markers to guide readers through the material.

Symbols and icons can be ambiguous or confusing to your readers. Using symbols as shortcuts can hinder more than help by giving less-skilled readers something additional to notice, learn, and remember. If you use symbols or other visual means of marking or representing topics, check to be sure that your readers understand the meaning you intend and find the use of symbols helpful.

Sometimes, people who develop written material want to use visual images or abstractions to symbolize important concepts, to highlight particular content, or to serve as navigation devices to guide readers through the material. The intent is to be helpful, and sometimes it is, especially when your readers are already familiar with the symbol and its meaning.

However, if you are creating written material for culturally diverse audiences that include people with low literacy skills, consider whether it is wise to use symbols:

- **Very few symbols are truly self-explanatory: people typically need to be taught what a symbol is supposed to mean.** If you are the one who chooses or creates the symbol or icon, you know what you want it to mean, and you assume that it will have this same meaning to others. But others have only the symbol to go on – they lack your background knowledge and intentions. Here is an example:



What is this?

Do you recognize the bottom part as being a tooth? If so, think about the taken-for-granted knowledge you drew upon to know this. This symbol is a stylized convention that includes the root of the tooth, a part we seldom ever see. And yet you knew it was a tooth, because you have learned that this type of symbol means “tooth.” If you were not already familiar with this symbol, it might be baffling to you.

What is the top part of the symbol? Knowing that it’s a tooth at the bottom gives you a clue; you know the top part is not an umbrella keeping off the rain. So, what is it? Is it the inside of an open mouth? Is the dark part the back of the throat? If so, why is that big tooth out front?

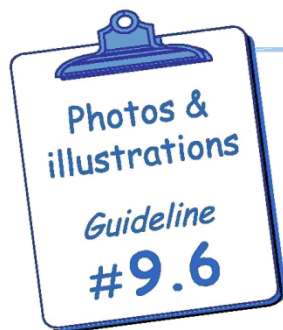
- **The meaning of symbols and icons tends to transfer poorly across languages and cultures.** You might think that visual symbols could be a “universal” language, but most are quite culture-bound. Once you know what a symbol means, it can be hard to appreciate how bewildering it might be had you never seen it before.
- **Testing suggests that readers can easily misinterpret symbols.** The author and colleagues have tested various symbols in feedback sessions with readers. Results have shown big differences among people in how they interpret the meaning of the symbols. It’s not unusual for people to interpret a symbol in ways that are radically different from their intended meaning, especially if



you show them only the symbol and one of the accompanying texts. It is not surprising that readers might misinterpret symbols, because symbols are often trying to encapsulate a complex and dynamic process with just a few simple lines.

If you want to use a symbol in your written material, develop the symbol with care and teach readers what it means by incorporating an explanation into the written material. Use feedback sessions to verify that readers understand the symbol as you intend and that it helps them understand and use the written material.

## Avoid using images with visual humor or caricature



Avoid using cartoons, “cute” or humorous images, and caricatures, because these kinds of images may bewilder, confuse, or offend some of your readers.

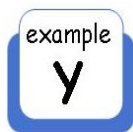
Since humor does not translate well across cultures, attempts at humor may puzzle or confuse some readers. Humor based on irony is especially problematic, because readers who take it literally will misinterpret what you mean. In addition, individuals differ in what they may find amusing. When you are choosing images, avoid those with strange camera angles, exaggerated features, or a “cute” look. Distorted or coy images distract readers by drawing too much attention, and people may find them unappealing or culturally offensive.

This Guideline recommends against incorporating cartoons or other visual humor in your written materials. The desire to lighten up your material with a touch of humor is understandable, but there are some good reasons to be cautious, especially if your written material is for audiences that are culturally diverse and include people with low literacy skills.

- **Cultural differences in humor can leave people bewildered or confused.** Humor is deeply embedded in culture, and may not transfer well across cultural groups. Humor is likely to be misunderstood by people who lack the cultural background presumed by a cartoon or joke or other injection of humor into materials.



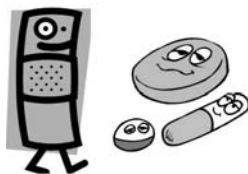
- **Many people react negatively to cartoon-like or caricatured images.** Images that are excessively stylized or “cute” can be confusing or unappealing to members of your audience. Besides the potential for misunderstanding, there is potential to offend. Here are examples of the type of caricatured poses and “cute” cartoon-like images to avoid:



Avoid using faces with extreme or distorted expressions such as this example.



Using this type of coy image of a heart with a bandage on it will not enhance your written material. It will be a burden on your readers to figure out what it is supposed to mean. Some may interpret this image as trivializing a serious matter (what good is a band-aid when you have a heart problem?).



Putting little faces on pills and bandages doesn't set quite the right tone for discussions of medical care.

- **People differ in what they may find amusing.** Even within groups that share the same languages, values, and experiences, individuals differ in what they consider to be amusing. Differences can be profound across cultures.
- **Some may miss the irony and interpret humor literally.** When people don't get a joke that is based on irony, they may misunderstand the point and take *exactly the opposite meaning* from what you intend.

Given all of these reasons for caution, it seems advisable to avoid cartoons and other applications of humor in your materials. There are many other more effective ways to establish a warm and friendly tone. For suggestions and examples, see Toolkit Part 4, Chapter 4, *Guidelines for engaging, motivating, and supporting your readers*.

## Pay attention to quality, size, labeling, and placement of images



Pay careful attention to the total number, quality, size, placement, and labeling of the images you use.

For best impact, limit the number of images you use. Use images of high quality that will reproduce well, and make each one large enough for good impact. Place images in positions that fit with the natural progression of reading so that they do not cause your readers to overlook parts of the text. Keep images close to the text they reinforce.

### ***For best impact, use a small number of carefully-chosen images***

While using uncluttered images is especially helpful for a low literacy audience, it’s a good idea for all readers. The *keep it simple* principle applies to the total *number* of images you use, as well as the simplicity of each image:

- **A few relatively large images have more impact than many small ones.** Instead of sprinkling a layout with several small pieces of clip art on each page, keep it to just one or two carefully-chosen image on each page, and make each one large enough for good impact. It will be more appealing. Even just one or two photos can have positive impact on the tone of a booklet.
- **Using “cutout” photos that have no background will increase the contrast and add drama.**
- **Be selective and use fewer images that all seem to belong together.** You don’t have to fill all of the available space with images. Often, it is more effective to use fewer images and increase the amount of white space in the written material.

## ***Effective placement of images***

Here are a few ideas to consider for effective use of photographs, illustrations, and other visual elements:

- **To help set a friendly tone, place an image or two near the beginning of the material**, where readers will see them right away.
- **Place photos and illustrations strategically where they will help guide readers smoothly through all of the material.** Images are like a magnet for the eyes. To avoid distracting your readers and causing them to skip over parts of the text, place images in positions that fit with and reinforce a reader’s natural progression through the page. For more about this, see the discussion and examples of “reading gravity” in Figure 5-2-c in Toolkit Part 5, Chapter 2, *Guidelines for overall design and page layout*.
- **Keep images close to the text they reinforce.** This helps readers make the connection between image and text. Use images to draw attention to the most important messages.
- **In longer documents, consider using images to fill in an empty page at the end of a section or help signal the start of a new section.** For example, an easy-to-read book for pregnant women called *Baby Basics* marks the beginning of each section with a full-page colorful collage of small squares that mixes images, a quotation, and solid blocks of color (What to Expect Foundation).

## ***Choose high-quality images with a professional look***

Keeping your images simple, closely linked to the content of your materials, and large enough for good impact all contribute to an overall look of quality in your materials. Technical details of production also affect how good the images will look in the final printed piece. To learn more about the technical details of getting your materials printed, see *Getting it Printed: How to Work with Printers & Graphic Imaging Services to Assure Quality, Stay on Schedule & Control Costs*, Fourth edition (Kenly & Beach, 2004).

Choose photos and clip art with a high quality professional look. Look for good proportions, good composition, and good contrast. Here are some tips:

- **To make sure they reproduce well when the material is printed, choose images that are clear and show high contrast:**
  - Photos should look sharp, with good contrast that emphasizes the main subject. Avoid photos that are too dark (or use photo editing to improve the appearance).

- Clip art should have the appearance of being drawn with a sure, skilled hand. Look for clean lines with a minimum of distracting details or embellishment. It should have sufficient “weight” to reproduce well, but not such heavy lines that it looks harsh. Avoid using clip art that is pale or uses light sketchy lines, because it will not reproduce well.
- **Good contrast is especially vital for images that will be printed in a small size.** You don’t want readers squinting to see what the photo is about. Smaller photos may look better with closer cropping.
- **For best impact, consider whether cropping (trimming), editing, and minor touchups might improve your images.** Unfortunately, some photos and clip art come already cropped in ways that detract from the quality and impact of the image. Try to avoid using these images that are cropped in odd ways.
- **When you put a group of images together, it’s important to maintain a consistent style of cropping and consistent proportions for all of them.** Images of people that are grouped together have better unity and impact if you keep all of the faces approximately the same size.



## Check for accuracy and pretest with readers



Check for accuracy, if applicable, and pretest the images with your intended readers.

If your images include technical or medical subject matter, check to be sure that the details are correct. Check on appeal, cultural appropriateness, and comprehension of the images by getting feedback directly from members of the intended audience.

### ***Check images for accuracy***

If applicable, make sure that photos and illustrations are clinically accurate and technically correct. It’s wise to have clinicians or other subject matter experts review the images to be sure they are appropriate. Keeping images up to date can be a challenge if you are addressing areas that are experiencing rapid changes in clinical advances or best practices. For example, if you are writing about healthy diets, you

would want to stay up to date on the latest revisions of the Food Pyramid (visit <http://www.mypyramid.gov>).

### ***Pretest images with your intended readers***

When you choose images for your materials, *you* know what they are supposed to mean. But will your readers interpret them in the same way? It’s wise to double check by getting readers’ reactions to photographs and illustrations (for methods to use, see Toolkit Part 6, *How to collect and use feedback from readers*). Here are some reasons why it’s important to get readers’ reactions to the images you plan to use in your written material:

- **Readers can interpret an image in a way that’s very different from what you want or expect.** For example, an early draft of a flyer used a photo of an empty hospital bed to show that a patient had been discharged and was back at home recuperating. But during pre-testing, people interpreted the image in a different way and reacted negatively to it: they figured that an empty bed meant someone had died. The image was replaced with something more suitable (personal communication, Letitia English).
- **Images can be ambiguous.** For example, a brochure on asthma includes a drawing of a person with hands on a window that is halfway open. You can’t tell from the drawing alone whether the person is opening or closing the window. Closing the window is appropriate if the purpose is to reduce exposure to air pollution outside that will irritate the lungs. But opening it is appropriate if the goal is to reduce exposure to air quality problems inside the home, such as second-hand smoke or smoke from a grease fire on the stove. Of course, the text would tell people about the image, but some people may not read the text. In general, *it’s better to choose images that do not rely upon an explanation in the text.*
- **Images may trigger unwanted associations.** For example, selecting appropriate images for tobacco cessation programs can be very challenging. A crushed-out cigarette seems like an appropriate image for a brochure about quitting, but a focus group discussion showed that seeing this image made some smokers want a cigarette (personal communication, Mary Hunter 2004).
- **Images that show instructions may be incomplete or hard to follow.** For example, if you are using illustrations to explain a complex or dynamic process, be sure to break it down into a series of steps so that the process will be clear to readers.

## Additional tips for choosing and editing clip art

Clip art is a popular way to add visual interest to low literacy written material. It’s readily available and easy to insert into material. Best of all, it is inexpensive and often it is free. This chapter has already covered the basics of what to look for in photographs and clip art, and has used clip art examples to illustrate some of the guidelines. But to help you use clip art in the most effective ways, this section gives additional examples. Since it can be hard to find just what you need, we also discuss how you can make simple edits to improve clip art.

### *More examples of what to look for in clip art*

In Figure 5-6-f below, we show a series of examples of pharmacy-related clip art. The commentary for these examples applies a number of the guidelines that were presented in earlier sections of this chapter.

Figure

5-6-f. Choosing clip art that looks realistic, natural, and respectful.

example  
**Z**



**Caricature of a pharmacist.** This image is distorted and makes the pharmacist look unprofessional. It sets an inappropriate tone and could be interpreted by some readers as disrespectful.

example  
**AA**



**Problematic facial expression.** This pharmacist looks stern or skeptical.



example  
BB



**An excessively stylized portrayal of pharmacist and patient.** The bodies are greatly distorted and the faces are literally blank. Most readers do not like images of people that have no eyes, nose, or mouth. Also, the “Rx” on the bottle is the only clue that this is a pharmacy situation. It is a weak clue because it relies on people to know what is meant by “Rx” and because the heavy lines and poor contrast keep the bottle from standing out.

example  
CC

**The images of pharmacist and patient shown below are most suitable than the ones shown above.** In the images below, the poses look natural and suggest that the pharmacist is talking the time to talk with the patient.



**Each could be improved by editing.** In both illustrations, the contrast could be increased to make the pill bottles stand out more clearly. The hairstyle of the pharmacist on the right looks dated, but this could probably be fixed by editing.

Source: Commentary created for this Toolkit.

### ***Using editing to improve clip art***

It’s often possible to make some big improvements in clip art by doing simple edits. For example, you might be able to fix a problem just by changing the colors or deleting a cluttered background. Depending on how the clip art has been constructed, you may be able to do other types of edits that make the clip art much more suitable for your written material.

Graphic designers have the skills, experience, and software that are needed to edit clip art. But you may be able to do a good deal of editing yourself, without the help of a professional designer. If you are experienced in using photo editing programs such as Adobe Photoshop, software that comes with a scanner, or presentation programs such as Microsoft PowerPoint, you may be surprised at how easy it is for you to improve clip art on your own. Even if you lack access to these types of programs or you lack the skills or inclination to use them, the discussion in this section will introduce you to easy ways to use editing to make improvements in clip art (with a little help from others).

Since this section discusses ways to edit clip art yourself, the comments below and the examples that follow focus on things that can be done using features that are available in presentation software and simple photo editing programs. (If you were a professional designer, you would do the editing in other ways using more sophisticated software.) We can’t give specific instructions for editing because the details of features, menus, and commands differ so much depending on which program you use. Our goal is simply to give you a sense of the improvements that you might be able to make, and encourage you to explore and experiment with the editing capabilities available in the programs you use. You will need to consult your online help and other software instructions for the details of how to do the editing.

To help get you started, here are a few things to know about editing of clip art:

- **The ease of editing clip art depends on how it is constructed and the format it is in.** When clip art is constructed so that each part is a separate unit, it will be relatively easy for you to use presentation or photo editing software to make certain kinds of changes. For example, suppose that a piece of clip art shows a man wearing a necktie, and you want to remove the necktie to make the image more culturally appropriate. If the necktie is a separate component part of the clip art, it might be quick and easy for you to “ungroup” the image into its component parts (see below), select just the necktie component, and delete it. But if all of the lines in the clip art are constructed as a single unit, including the lines that make up the necktie, removing the necktie will be challenging and time consuming, and probably not worth the effort.
- **Adjusting color, contrast, and brightness.** Check your software for features that make it easy for you to adjust the brightness and contrast of a clip art image and “recolor” it. For example, if you are working in Microsoft PowerPoint, try right-clicking on the image, and then select “format picture” from the menu that appears. “Format picture” offers a number of options that make it easy to do such things as change a color image into grayscale or resize the image. The “recolor” option shows you all the colors that appear in the clip art and lets you change them one by one.
- **“Ungrouping” an image to break it into its component parts.** To do certain types of edits, you may need to “ungroup” the image. “Ungrouping breaks an image into its component parts, so that you can edit each part separately. Depending on your software, there may be several ways to do this; you may need to consult the manual and do a bit of searching. For example, there may be options under a draw menu that will let you convert it to a “drawing object.”

Examples that follow used “ungrouping” as part of the editing that was done to improve the images. The first, in Figure 5-6-g below, is a “before” and “after” example that shows how you can use editing to remove distracting details and focus the reader’s attention on the main theme of the image.

**Figure**

5-6-g. Editing clip art to improve the focus on the main subject.



**What’s wrong?**

This picture is about resting with your leg up when you are recovering from injury or surgery. But notice how easy it is to miss the bandage or cast on her leg.

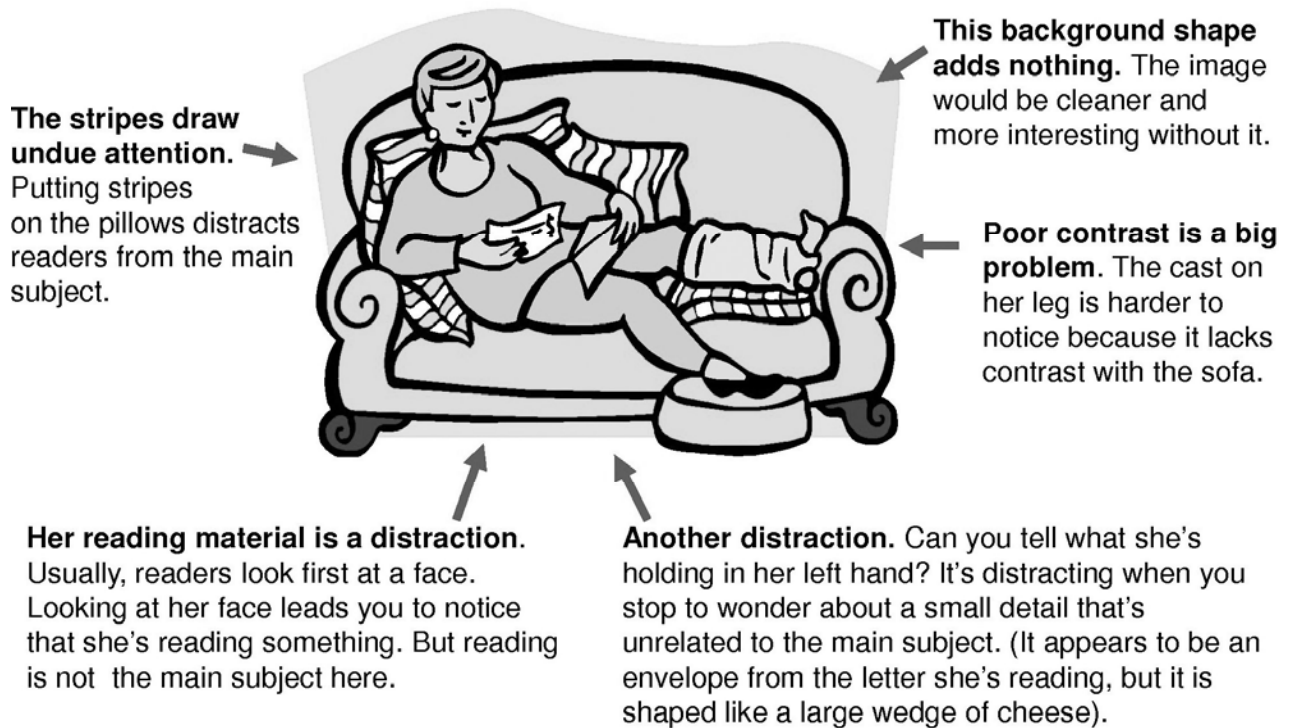
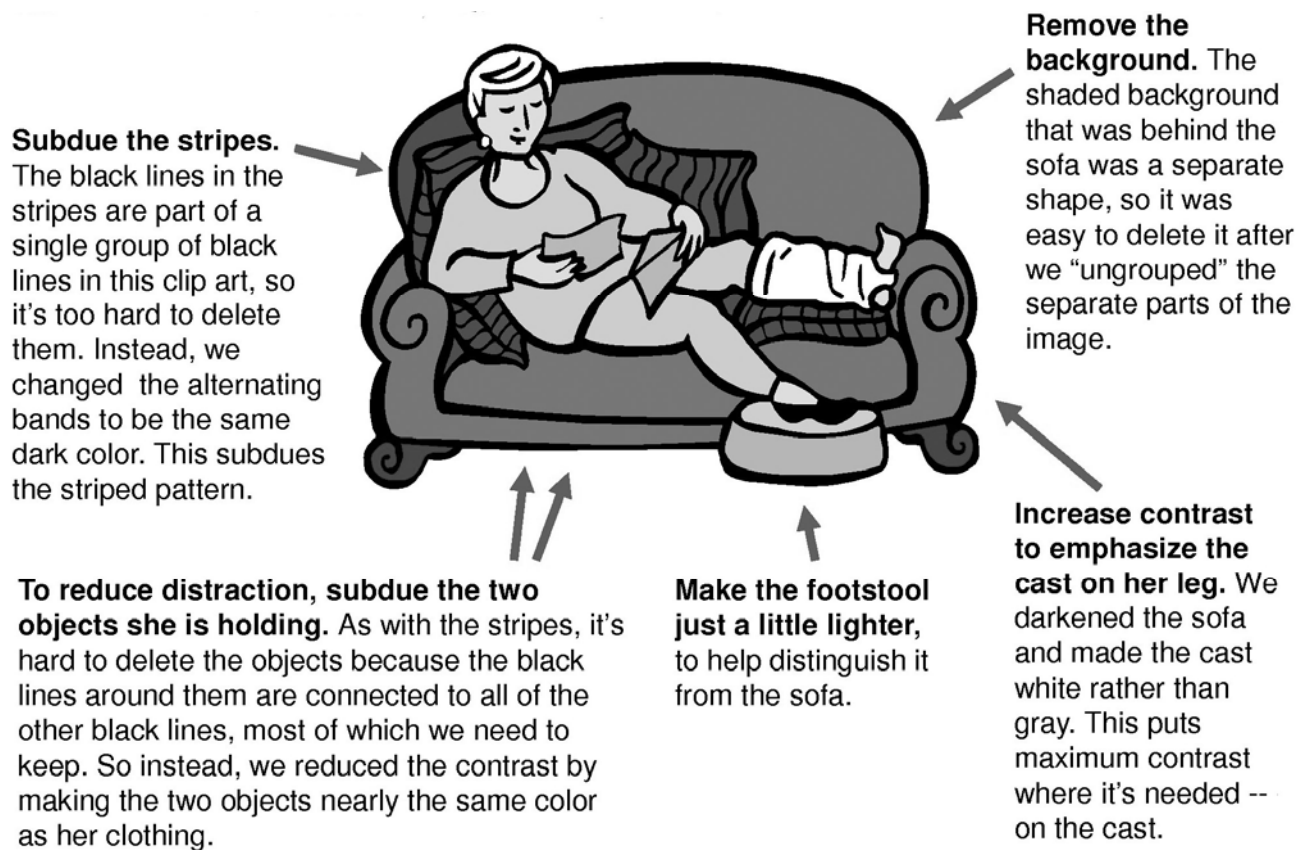


Figure 5-6-g., continued.



### How can we fix it?

For the edits shown below, we used the “ungroup” command to disaggregate the image, and then edited different parts of it separately.



**Subdue the stripes.** The black lines in the stripes are part of a single group of black lines in this clip art, so it's too hard to delete them. Instead, we changed the alternating bands to be the same dark color. This subdues the striped pattern.

**To reduce distraction, subdue the two objects she is holding.** As with the stripes, it's hard to delete the objects because the black lines around them are connected to all of the other black lines, most of which we need to keep. So instead, we reduced the contrast by making the two objects nearly the same color as her clothing.

**Make the footstool just a little lighter,** to help distinguish it from the sofa.

**Remove the background.** The shaded background that was behind the sofa was a separate shape, so it was easy to delete it after we “ungrouped” the separate parts of the image.

**Increase contrast to emphasize the cast on her leg.** We darkened the sofa and made the cast white rather than gray. This puts maximum contrast where it's needed -- on the cast.



Source: Created for this Toolkit.



## End notes

### **References cited in this chapter**

Doak, Cecilia C., Leonard G. Doak, and Jane H. Root

- 1996 *Teaching patients with low literacy skills*. Second edition. Philadelphia: Lippincott. (Now out of print, this publication is available to read and download at no charge at the following website: <http://www.hsph.harvard.edu/healthliteracy/resources/doak-book/>.)

Goodman, Andy

- 2002 *Why bad ads happen to good causes*. Available for download only from Andy Goodman. See <http://www.agoodmanonline.com/red.html>.

Goodman, Andy

- 2003 *Storytelling as best practice*. Available from A Goodman, 444 North Larchmont Blvd., Suite 102, Los Angeles, CA 90004. See <http://www.agoodmanonline.com/red.html>.

Health Promotion Council

260 South Broad Street, Philadelphia, PA 19102. Telephone (215) 731-6150. Visit online at <http://www.hpcpa.org/>.

Houts, Peter S., Cecilia C. Doak, Leonard G. Doak, and Matthew J. Loscalzo

- 2006 The role of pictures in improving health communication: A review of research on attention, comprehension, recall, and adherence. *Patient Education and Counseling*, 61 (2), 173–190.

Kenly, Eric and Mark Beach

- 2004 *Getting it printed: How to work with printers & graphic imaging services to assure quality, stay on schedule & control costs*. Fourth edition. Revised by Eric Kenly. Cincinnati, OH: How Design Books.

Multi-Cultural Educational Services

- 1998 *Safety for Babies and Children*. Multi-Cultural Educational Services, 832 104th Lane NW, Coon Rapids, MN 55433. Phone (763) 767-7786, e-mail Charles and Pam LaRue at [larue@mcedservices.com](mailto:larue@mcedservices.com), website <http://www.mcedservices.com/safety.html>.

Osborne, Helen

- 2004 *Health literacy from A to Z: Practical ways to communicate your health message*. Sudbury, MA: Jones and Bartlett (see also <http://www.healthliteracy.com>).

*The provider’s guide to quality & culture*

This website is “designed to assist healthcare organizations throughout the US in providing high-quality, culturally competent services to multi-ethnic populations.”  
<http://erc.msh.org/qualityandculture> (accessed September 8, 2006).

Root, Jane and Sue Stableford

1998 *Write it easy-to-read: A guide to creating plain English materials (especially for the Medicaid market)*. Health Literacy Center, University of New England, Biddeford, Maine. Visit <http://www.healthliteracyinstitute.net/>.

Rudd, Rima and John P. Comings

1994 Learner developed materials: An empowering product. *Health Education Quarterly*, 21 (3), 313-327.

The What to Expect Foundation

*Baby basics: Your month by month guide to a healthy pregnancy*. The What to Expect Foundation, 211 West 80th Street, Lower Level, New York, NY 10024. (212) 712-9764.  
[http://www.whattoexpect.org/baby\\_basics](http://www.whattoexpect.org/baby_basics).

Wheatley, Margaret

2002 The power of conversation: All social change begins with a conversation. From Margaret J. Wheatley, *Turning to one another: Simple conversations to restore hope to the future*. San Francisco, CA: Berrett-Koehler Publishers, Inc. Visit <http://turningtooneanother.net/>.

## **Suggested resources**

These resources have good examples and many suggestions for effective editing. If you are adept with a digital camera and want to create your own custom photographs to use in written material, the book on portraits may be helpful.

Joinson, Simon

2002 *Portraits: The digital photographer’s handbook*. Rockport Publishers. A Rotovision Book.  
<http://www.rotovision.com>. Distributed in the U.S. by Creative Publishing international, 400 First Avenue North, Suite 300, Minneapolis, MN 55401, 1-800-328-0590.

McWade, John

2004 *Before & after page design*. Berkeley, CA: Peachpit Press.

McWade, John

2005 *Before & after graphics for business*. Berkeley, CA: Peachpit Press.



To view, save, or print all or parts of this Toolkit from your personal computer, visit <http://www.cms.gov> and select Outreach & Education.

CMS Product No. 11476  
September 2010

