

Bulletin of the Seismological Society of America

Guidelines for Authors Preparation and Submission of Final Artwork

Final artwork must be submitted as electronic files. The following guidelines will help you prepare final artwork. Close adherence to these guidelines will ensure that your article will not be unnecessarily delayed during the publication process.

- **Applications**

Adobe Illustrator and Adobe PhotoShop are preferred programs in which to create artwork, and it is preferred that the images be saved as .eps files. Artwork created in Freehand, Canvas, CorelDraw, or other programs is acceptable **only** if it is saved in the correct format (see **Saving Files**) and at the proper resolution (see **Resolution**).

Graphics created in WordPerfect, Microsoft Word, PowerPoint, or Excel are low-resolution images; they look good on a computer screen, but they are not suitable for professional reproduction. Therefore, Microsoft Word, PowerPoint, and Excel are **not** acceptable applications.

- **Resolution**

The resolution that you use when you create a file determines the usability of the file and the quality of the printed figure. We cannot improve the quality of a file created or scanned at low resolution. Typing a higher resolution value into the application after graphics have been created and saved will not improve quality, and the files will be unusable. —

TIFF or JPEG files must be created or scanned at **between 600 and 900 dpi** for line art (black and white only), **between 266 and 300 dpi** for color and gray-scale images, and **between 500 and 900 dpi** for combination line-art and gray-scale or color images. Graphics submitted with resolutions less than these are not acceptable.

Screen captures (images taken from a computer screen or Web site that are 72–96 dpi) are not acceptable. These types of images are suitable for screen display but are far below the acceptable standards for print reproduction.

- **Labels**

Number figures sequentially and in the order of first reference in the text. Do not include within the figure a title or any text that is included in the figure caption. (Submit captions as a separate, consecutively numbered list embedded in the text of the manuscript. Do not include captions on the figures themselves.)

Keep figure parts consistent in size. Each figure part should contain a label in the upper left corner. The part labels should be of the style (a), (b), (c), (d) and should be in 12-point Helvetica lowercase type.

- **Text within Figures**

Use a standard, readable typeface such as Helvetica or Times Roman and, if possible, use a type size between 10 and 12 points.

Avoid inconsistencies in type font and size within a figure and from one figure to the next. Use the same size type for elements of equal importance. Some variation in size for emphasis may be necessary, but use no more than a 2-point variation.

Units of measurement and abbreviations should be consistent from one figure to the next and between figures and text.

Avoid using light or white text on a dark background.

Avoid small open symbols; they tend to fill in if the figure is reduced. Ensure that superscripts and subscripts are legible.

Proofread all text within a figure to ensure that it is accurate and that spellings and abbreviations are correct.

When submitting EPS files, make sure to have the application program embed all fonts used in the art.

- **Line Weights**

Figures created for reproduction at 100% should have line weights of 0.5 to 1.0 point. Lines thinner than 0.5 point will disappear if a figure is reduced; lines thicker than 1 point will be too heavy in figures that are enlarged. Lines thinner than 0.5 point may not print even if the figure size is not changed. The most successful line art is done with solid black lines on a white background. Key lines or boxes around figures are not necessary and are discouraged.

- **Color**

The colors in published figures may not exactly match the colors in the originals. Regardless of media, format, or application, color files will definitely not match what you see on a computer monitor, which displays RGB color. For printing, RGB files must be converted to CMYK, a process that could change the hue or brightness of some colors.

Whenever possible, submit color figures as CMYK instead of RGB.

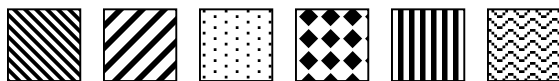
- **Color to Gray Scale**

If you want your color digital file to be printed as gray scale, be aware that elements such as lines in graphs will not be as clearly differentiated in gray scale as they are in color. Also, colors close to the same value on the original (for example, 50% orange and 50% red) may appear to be the same shade of gray when converted. To avoid this, provide art that contains patterns and dotted or dashed lines to depict different elements. Avoid light-colored (such as yellow) text.

- **Patterned Fills**

We prefer that you use black-and-white fill patterns instead of shades of gray. Graphics that use fill patterns are sharper and easier to understand. To fill a bar in a bar graph, for example, use a series of diagonal lines rather than a screen.

Suggested fill patterns



If you use shades of gray, use no more than three shades of gray in increments of at least 20%. Check to ensure that the elements are easily distinguished from each other.

Many patterns are specific to applications they are created in (such as Canvas, CorelDraw and Freehand) and therefore may default or drop out when the figure is printed or saved from one format to another. It is very important that files that include patterns be proofed carefully on hard copy before submission.

Do not use fonts for patterns or elements such as symbols in graphs; make sure these are drawn as art elements instead. Fonts used in this manner often default or drop out during conversion for publication.

- **Maps**

Maps must include geographic coordinates and/or scale.

- **Foldouts**

Foldouts are costly but can be accommodated with permission from the Editor.

- **Cropping**

The files should be cropped to remove nonprinting borders. Any elements not intended for print should be removed.

- **Saving Files**

Save each figure as a separate file. Each file should contain all parts of the figure.

Include the figure number in the file name of each figure; e.g., fig 1.eps, fig 2a-d.eps.

We prefer that you submit EPS vector files (raster formats such as TIFF and JPEG are acceptable but are prone to distortion when scaling).

When saving EPS files, make sure to embed all the fonts.