

ToyViewer *Ver.1.2 (Nov. 1995)*

How to display other image formats

You can set ToyViewer.app to display any image format if there is a filter program to ppm. To do so, definition file "`~/toyviewerrc`" or "`~/Library/ToyViewer/.toyviewerrc`" have to be presented. Format of the file is below:

`<ext> <path> <args> ...`

Where, `<ext>` is an extension of image files, `<path>` is a full path name of the filter program, and `<args>` are arguments for the program. One of `<args>` should be ``$'`, which is replaced by the image file name. If the first character of path is ``~'`, it is extended to the home directory. If ``@'`, it is extended to the application directory (`.../ToyViewer.app`). Lines beginning with ``#'` are comments. The following are examples.

```
jfif @/jpeg $
g3   /usr/local/pbmplus/g3topbm -reversebits $
qwe  ~/Unix/bin/qwe2ppm $ -
```

Specification of this file is prior to pre-definition of ToyViewer.app. For example, if you write specification for extension ``gif'`, gif files are opened

using the specification.

Besides, if filter service programs such as ImageViewer.app, OmniImageFilter, or McFilter are installed, other image formats (e.g., rle, xbm, sun raster, ...) can be read.

Image files treated by service programs, or specified in the definition file are opened using open panel (select "File / Open " menu) or by command-dragging the icon onto the tile of ToyViewer.app.

Format of TIFF Compression

When an image is saved in tiff, three formats of compression can be applied; No compression, LZW, or JPEG. However JPEG can achieve high compression, quality of the image is decayed. In general, high quality prevents good compression, and good compression spoils quality. The parameter of JPEG can be set by the save panel. Though compression ratio of LZW is inferior to JPEG, quality of the image is saved.

Color Reduction

When an image with more than 256 colors is saved as gif, color reduction is done.

ToyViewer.app uses *Median Cut Algorithm* by Paul Heckbert for color reduction. This is also used in ppmquant (by Jef Poskanzer). However, in

many cases, ToyViewer.app generates clearer image than ppmquant.

When an image with more than 256 colors is saved as bmp, you can select color reduction or full color.

Display All Window

Clicking "Windows / Display All Windows" of the menu, all windows are displayed in front one after another. Click the menu again to interrupt.

Dragging

Alt-Dragging selects a square area. Shift-Dragging steps 4 pixels at one time.

Size and position of selected area are displayed in the textfield of each window. You can set the origin of the coordinate at lower left corner or at upper left corner of the image with the preference.

Clipping and Copy

You can `copy' a part of the image selected by dragging as a tiff image. However, resolution and number of colors of the image depend on the environment.

Clipped image keeps same quality as original.

Clipping of EPS

Clipping an EPS image, only parameters of `BoundingBox' of the image are modified. So, all information out of the frame is still in the image file.