



FILE FORMATS

What are file formats? Well, they are different image file types. Image editing software can read and manipulate only a specified set of different file formats. Each format is identified by a three letter file extension (the bit that comes after the dot) so fred.tif indicates a tiff file and barney.jpg indicates a jpeg file.

Some formats like tiffs and jpegs are pretty universal and can be read or opened in most image editing software. Other formats are specific to certain software. Photoshop has its own format, which is identified by the .psd extension. So, wilma.psd is a photoshop specific file.

Your image editing software knows how to save a variety of different file formats, holding, if you like, a template for each one. When you come to save an image your software needs to know what format you want it to end up in, so it can apply the right set of instructions. Software like Elements or PaintShop Pro can use many different file formats and can convert easily from one to another.

Compression

Graphic files (pictures) are notoriously BIG – they take up a lot of space on your hard disk and can take a long time when they are processed or manipulated in some way. So over the years methods have been developed which make the file size smaller without, hopefully, reducing the quality of the image too much. This is called compression and refers to how much the size of the file is reduced (the amount of hard disk it takes up), when it's saved.

Jpegs & tiffs

Jpeg stands for Joint Photographic Experts Group – yes, showing off This is a **lossy** format ie some of the picture information is lost each time the file is saved so the quality is slightly degraded. There are various levels of compression used – the highest level (ie most compression) gives the smallest file size but the lowest quality of image. The other thing to remember with jpeg files is that they don't retain individual layer information. So, if you want to be able to edit your layers later then this isn't a good choice of file format.

Tiff stands for Tagged Image File Format - yes, showing off again! These files on the other hand are termed **lossless**, ie no information is discarded when the file is saved. The files are bigger than jpgs but the layer information is kept.

Images from digital cameras

Digital cameras often give you the option of saving your pictures in different formats - tiff, jpg and raw being the most common. Some also offer the manufacturer's own format but this is usually only readable by the software that comes with the camera. If it's available I save my pictures in tiff format or, failing that, in high resolution jpg. If I've taken a jpg then I would convert it to tiff using File > Save As, and selecting TIFF in the dropdown Format list, as soon as I've downloaded it to my computer. All the manipulations then take place on the tiff version and no picture information is discarded.

My personal preference then is to use tiff or psd format for storing and working on images. I would then convert to jpg if I'm going to use the image on a web site or I'm going to send the image by email. Horses for courses.