

Preparing Images for the Web

Introduction

The purpose of this paper is to provide basic information around preparing images for use on websites. It is aimed at a reader who has almost no prior experience in doing this.

Image Types

There are three primary types of image that are used:

- JPEG - used for complex images such as photos.
- GIF - have a limited set of colours so are useful for logos and simple graphics. They should not be used for colour photos. They can also support transparency and simple animations.
- PNG - an Indexed PNG is a better alternative to GIF. It supports transparency and more colours. The 'Full Colour' option (select when saving) is an alternative to JPEG and provides higher quality but bigger file-sizes as the compression is non-lossy.

JPEG Images

JPEG images use lossy compression to keep the file-size down. This means that data from the image is lost each time it is saved. The more you compress, the smaller the file-size but the poorer quality the image. When saving a JPEG, to get the best quality, maximise the compression for your target file-size.

Avoid continually resaving JPEG images as each time you save, information will be lost from the image as it is compressed.

JPEG images can store metadata within the image file. This is used to store things like the coordinates of the camera when the photo was taken, the aperture, shutter speed, focal length, timestamp etc. However this is not normally used by mainstream website images.

Image Size

Image sizes used to be highly constrained due to the slower speed of our internet connections. Big images are slow to load. These days it is less of an issue, but you still do not want unnecessarily large images.

Your webpage should load in not much more than 4 seconds, but less is better. So keep your main image to less than 300kb. Try for 100-150kb if possible.

Further Information

Here are a few links that give additional information and examples:

yourhtmlsource.com, scantips.com, r1ch.net, htmlgoodies.com

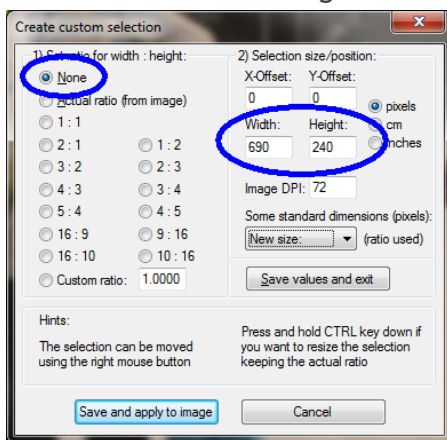
Cropping and Resizing an Image

If you don't have Adobe's Photoshop or another good image manipulation tool then download [Irfanview](#). This tutorial will use it.

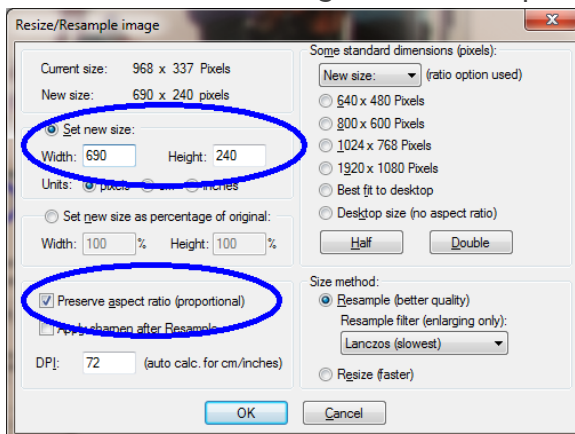
Let's assume that you have an image that is 2000x1200px and you wish to use it on a webpage that requires an image size of 690x240px.

It would be easy if the image had the correct aspect ratio (ratio of width to height), but they don't in this case so we need to crop the image first.

1. Open the original image in Irfanview.
2. Press Shift-C to create a custom crop selection.
3. Enter the width and height that are required then save and apply:



4. Click in the selection rectangle with the right mouse button and drag it so the top-left corner is in the correct position.
5. If the selection rectangle is not big enough, hold down the Ctrl key, left-click the bottom (or right) edge and drag it out until it is the correct size.
6. Fine tune by repeating steps 5 and 6.
7. Press Ctrl-Y to crop.
8. Assuming that you resized the selection rectangle in step 6, you now need to resize the whole image by pressing Ctrl-R.
9. Enter the width and height that are required then click OK:



10. Press S to save.