**Consistent Font Size Cross-Browser and Cross-Platform**

Something you may be already noticing, especially if you are working on a Macintosh, is that the point-based font sizes specified in my style sheets so far have NOT produced consistent results cross-browser and cross-platform.

When setting font sizes in style sheets, you MUST use PIXEL-based values if you want consistent appearance. In your style sheets, then, instead of saying **"24pt"** for 24 point font size, you would need to say **"24px"** for 24 PIXEL font size.

Here is an example from the previous section, with the font-size properties set to pixel-based rather than point-based values.

Example (excerpt):

body { background:#FFCCFF; }

p { font-size:16px; color:#660066; font-family:"Arial", "Helvetica",

sans-serif; }

p.callout { font-size:24px; margin-left:1in; margin-right:1in;

font-family:"Times New Roman", "Times", serif; }

p.note { font-size:10px; }

.special { font-style:italic; color:#FF0000; }

Here is the above example [displayed](http://fog.ccsf.edu/~srubin/crossbrowpx.html), in context.

Using pixel-based font sizes DOES provide consistent results across browsers and platforms. If you are a Mac-based developer, the conversion will be easy for you, since point-based and pixel-based fonts are the same size on the Mac (i.e. 12 point = 12 pixel). If you are a PC-based developer, you have a trickier job of font-size conversion.

A point is 1/72 of an inch. A 12 point font, therefore, should be 12/72 of an inch tall (roughly). The Macintosh displays everything at 72 pixels per inch. One point, therefore, is technically one logical pixel tall on the Macintosh, so point-sized-font equals pixel-sized-font on the Mac. The Macintosh was originally designed to be a desktop publishing machine.

On a PC, fonts are displayed by the Windows OS at 96 pixels per inch. A 12 point font, for instance, is 12/72 of an inch, 12/72 of 96 pixels is 16 pixels, therefore a 12 point font is technically 16 pixels tall on the PC. A web browser displays everything at 72 pixels per inch. When a 12 point font on the PC is displayed in a web browser, the pixels are all preserved, so the font becomes 16 pixels tall, or 16/72 of an inch (which is really 16 points). If you want to preserve what you see at "12 point font size" in a web browser on a PC, then, you must set the CSS property font-size to 16px (16 pixels).

The conversion formula for the PC:

point-based-font-size / 72 \* 96 = pixel-based-font-size

Example Conversion for a 30 point font as viewed in a web browser on the PC:

30 / 72 \* 96 = 40px

If you just do all of your design using pixel-based font sizes, you will avoid having to do these conversions.

Something you should be aware of when setting fixed font-size in CSS: users will NOT be able to resize the fonts in their web browser to make them larger; this can be a problem for users whose monitors display small pixels or for users who are visually-challenged. If you are NOT providing alternate style sheets for users (which can be done with JavaScript), you MUST be careful to make your fonts large enough in your CSS declarations!

Note: Users DO have the option of turning off CSS formatting of web pages via their Preferences settings, but most are not aware of this.

Mac Developers Be Aware: Internet Explorer for the Mac converts CSS font-size property values to match the display of its PC counterpart, so **"font-size:12pt;"** will display at 16 pixels tall! This automatic conversion can be a tremendous convenience for cross-platform development work, but it can also be a trap to catch the unwary!