And Then There Were Three...

Part one of a three document series reviewing a selection of common image preflighting errors

Introduction

The intent of this series is to review and provide solutions for a sampling of common problems encountered when using the *Digital Expert™* tool, or systems integrated with *Digital Expert™*, to preflight image files. This document addresses the topic of **Missing Fonts in EPS Files**. Though font problems can be introduced using several different applications, the most popular vector graphics application program, *Adobe Illustrator®*, will be the primary focus here and used as examples for resolving EPS file font issues.

Part One: Solving the Mystery of Missing Fonts in EPS Files

Missing Fonts

Problems will often occur if an EPS file with missing fonts is handed off to another person. That person may not have the same font, or may have a differing font version (different release date) loaded on their computer. The result can be automatic substitution using an entirely different font, which can cause a difference in appearance, and possible text reflow.

Embedding versus Linking versus Outlining... which is best?

Embedding, in terms of EPS files, means to include font information in a file so that its type will display and print correctly if the file is placed into another application. *Here's the catch...* If an EPS file is opened using *Adobe Illustrator®* on a computer that does not have the font installed, the font will be substituted. This is to prevent illegal use of the embedded font. Therefore, embedding is not always problem-free or the best solution.

Linking means to not incorporate the font information directly into the file, but to reference the font file as a separate component outside of the source file. Linking is not recommended because it requires that separate font files travel with the source file.
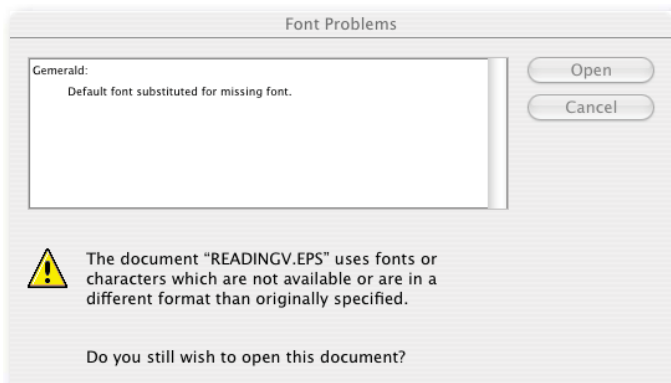
Outlining, in general terms, turns a font into a set of paths... technically making it no longer a font (problem solved!). Outlining fonts typically will not result in a noticeable loss of quality, therefore this is the preferred way to handle fonts prior to saving an EPS file. This technique is described in detail on page (3).
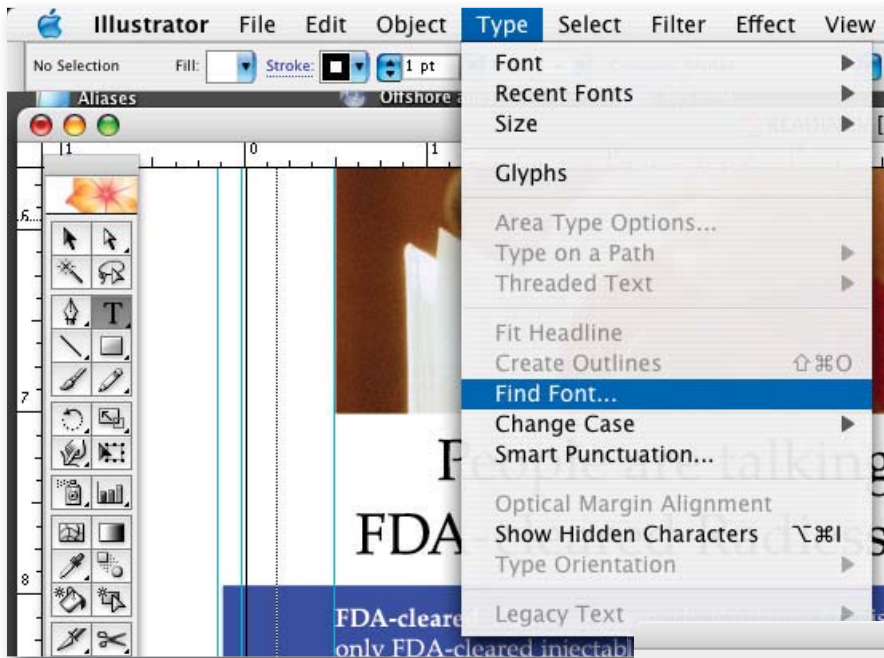
Resolving the Problem

There is a methodical way of determining which font is causing a problem, and there is a series of steps that can be taken to resolve it. Let's assume an *Adobe Illustrator®* EPS file has just been preflighted with the result being a "font not found," "font missing," or similar message. Four steps are necessary:

1) Determine exactly which font is missing in the file.
2) Replace all instances of the missing font with the exact, or similar font.
3) Outline all of the fonts within the document.
4) Resave the file.

● Begin by opening an EPS file that is missing a font. Since the EPS file references a non-embedded font, a dialog box is displayed when the file is opened, as in this example:


Font Problems

Gemerald:
    Default font substituted for missing font.

Open
Cancel

⚠ The document "READINGV.EPS" uses fonts or characters which are not available or are in a different format than originally specified.

Do you still wish to open this document?

● After the file has been opened, with the font substituted, select **(Type->Find Font...).**

Fonts that have been substituted will display an asterisk next to their name.

<Gemerald*>

Selecting *System* in this drop-down menu will allow the selection of currently active fonts. The missing font will need to be activated, either with a font management utility or by the Windows/Macintosh system itself, before it will display in the list. Alternately, a different font can be chosen as a substitute if the missing font is not available to you.
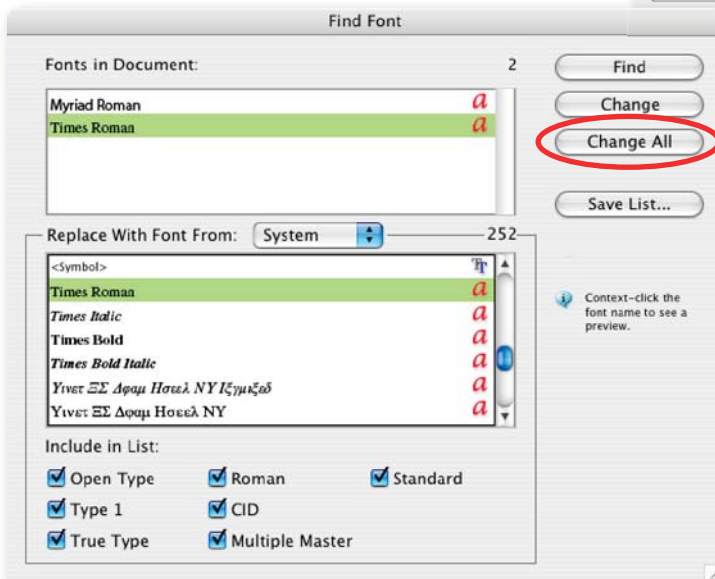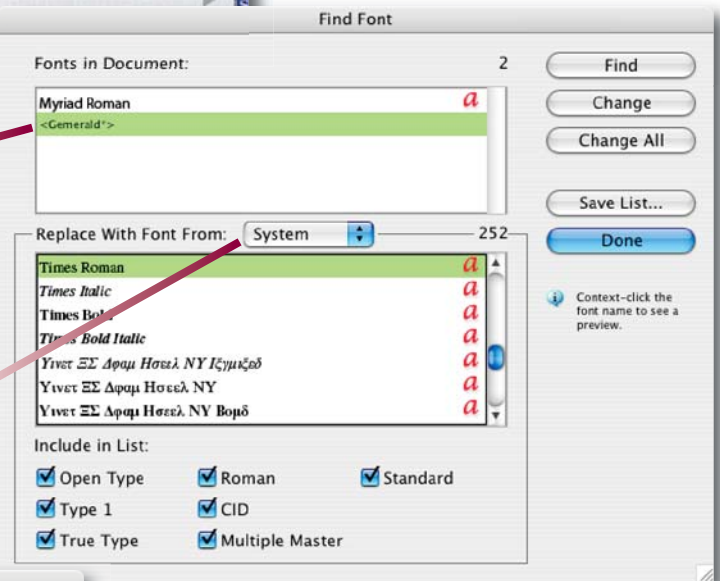
● When the substituted font in the top pane and its replacement in the lower pane are highlighted, select the *Change All* button. This will replace all instances of the missing font with the replacement font.

Now we'll convert all fonts into outlines using Illustrator's **_Create Outlines_** feature.

● First select everything in the document to make certain no hidden characters are missed **(Select->All)**.
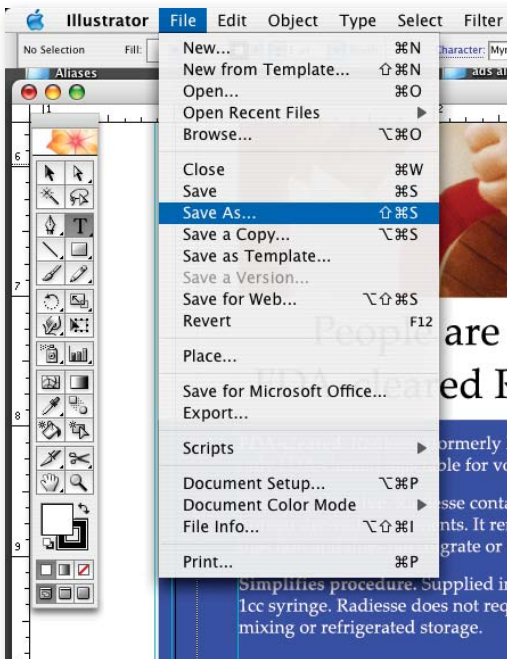
● Select **(Type->Create Outlines)**.
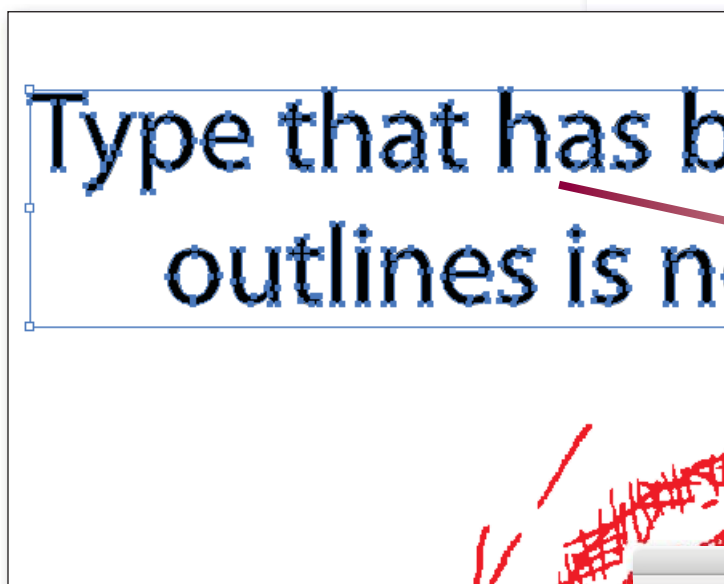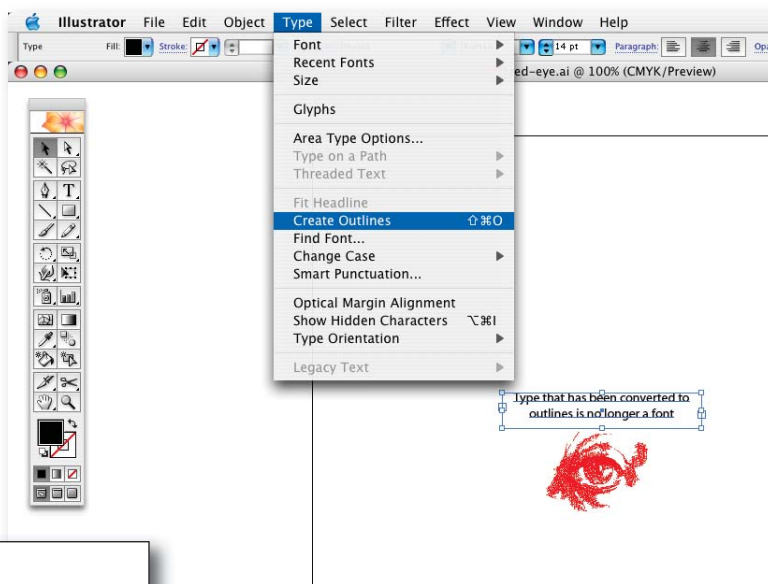
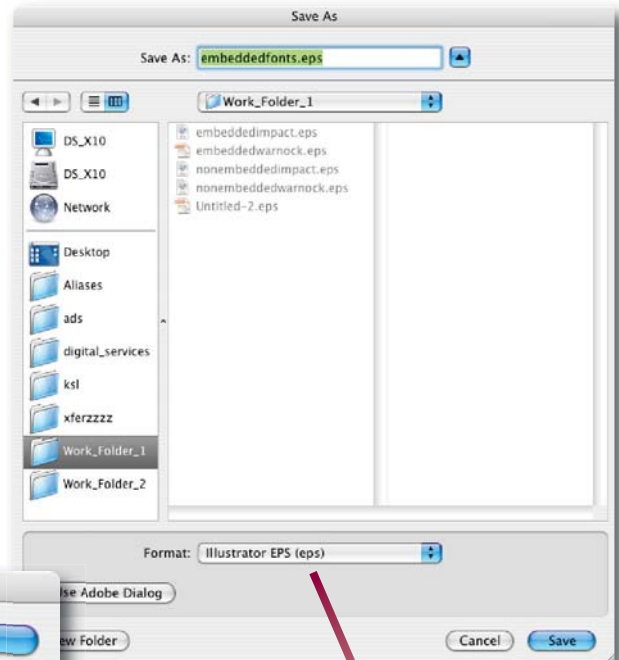Notice there are "nodes" or points surrounding all text characters after they have been outlined.

● We can double-check that the outlining technique worked by navigating back to the **_Find Font_** window. The top pane, normally listing available fonts in the document, should now be empty.
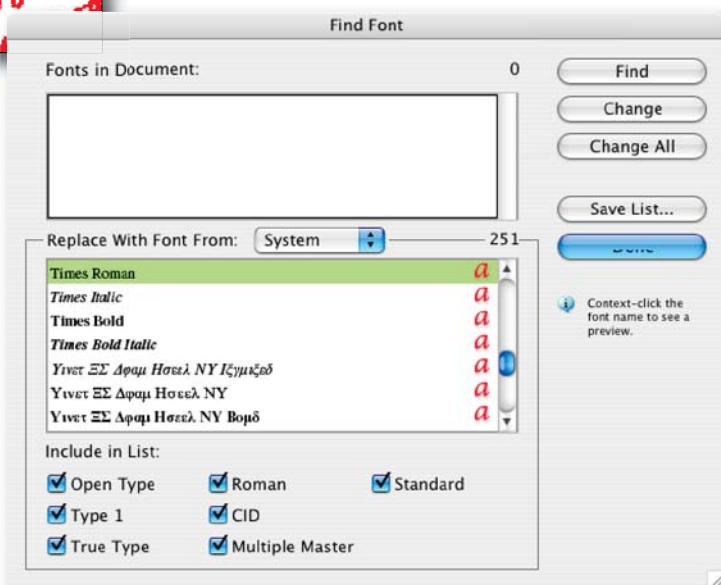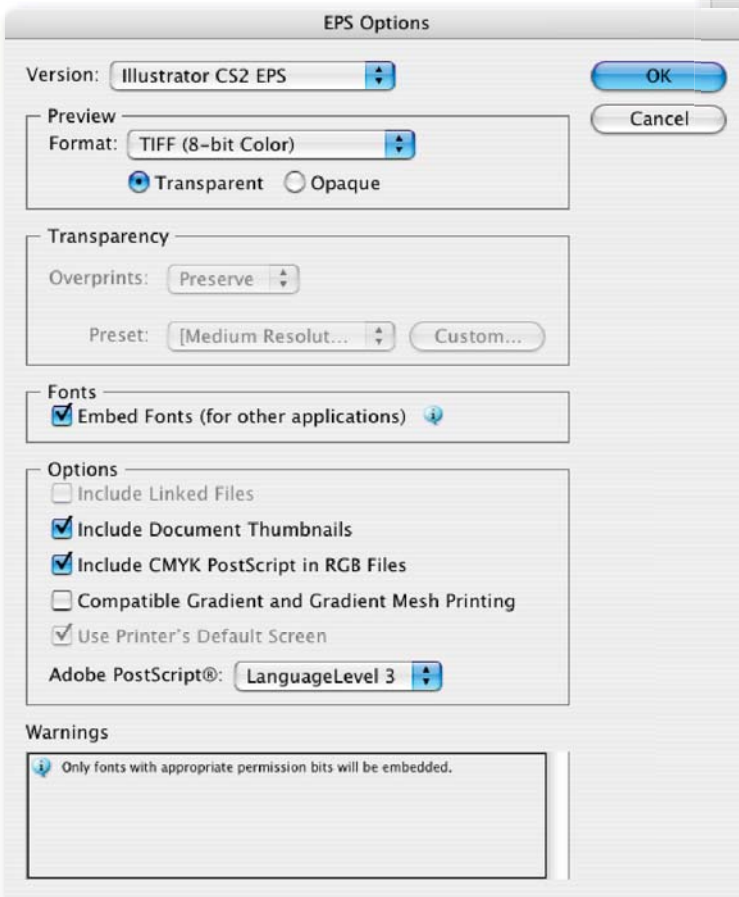
Time to resave the document... now font-problem-free!

● Select **(File->Save As...).**

● Choose **Format:** *Illustrator EPS*
from the drop-down dialog box.


● Set the *EPS Options* window criteria similarly
to this screenshot example. For *Version*,
select the one that corresponds with the
Illustrator® version being used.

Another option... Exporting to TIFF

Exporting to a TIFF file will effectively resolve any font problems because all vector information will be changed into raster. In other words, whereas objects were previously drawn by vector commands (resolution independent), they are now described by pixels (resolution dependent). Retaining vector information as vector is usually the best way to keep quality high, but for those times when converting to a TIFF file is necessary, the following guidelines are provided.

● Select **(File->Export...)**.
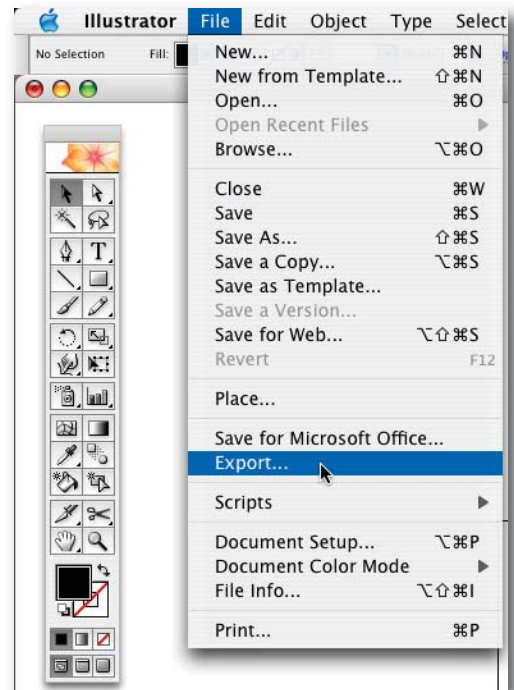
● Select *TIFF* from the *Export* drop-down menu.

● Set the *TIFF Options* window according to the example screenshot. Note that if the document contains only lineart, the resolution value should be set at **1200 dpi**. If the document contains a combination of lineart and images, then the resolution should be set at **600 dpi**. Set the Color Model as **Grayscale** if desired output is for black and white only.
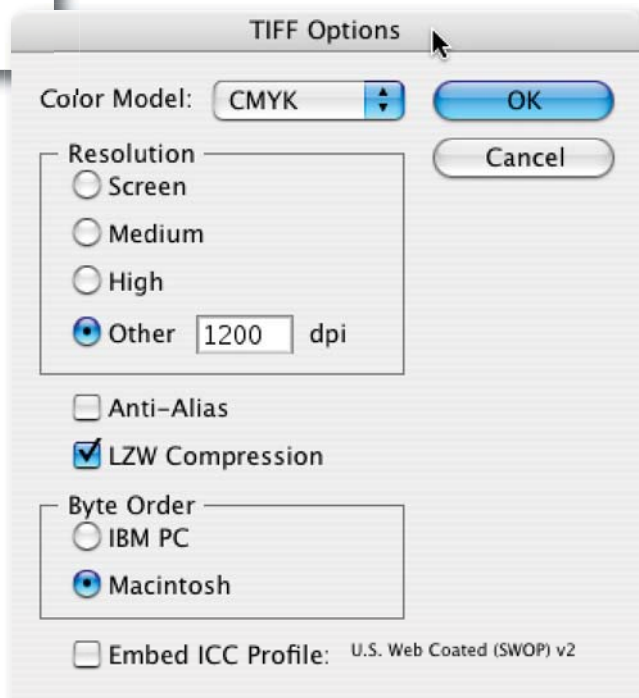
Summary

Adobe Illustrator® *CS2* running on the *Macintosh OS X* platform was used to generate the example screenshots for this tutorial. Other versions of *Illustrator*® may contain menus that slightly differ, however, all critical parameters and options used herein are available in previous versions.

Feedback

This document is designed as reference material to assist in remedying digital file problems encountered using the *Digital Expert*™ tool, but the goal is also to develop solutions and techniques that can work well within a broad range of online and print-production workflows. Therefore, we welcome your suggestions if you feel there is something that can be improved upon, and welcome any questions you may have concerning the data contained within.

Please address any feedback to: dxconnectpro@dartmouthjournals.com