

Creating Artwork for Decals



Bob's Photo

Ted Culotta
NERPM
Enfield, Connecticut
2-3 June 2017

Creating Artwork for Decals

If you are reading this somewhere besides the meet at which it was presented, be aware that there is a demonstration component not included in this file.

This file will be posted to:

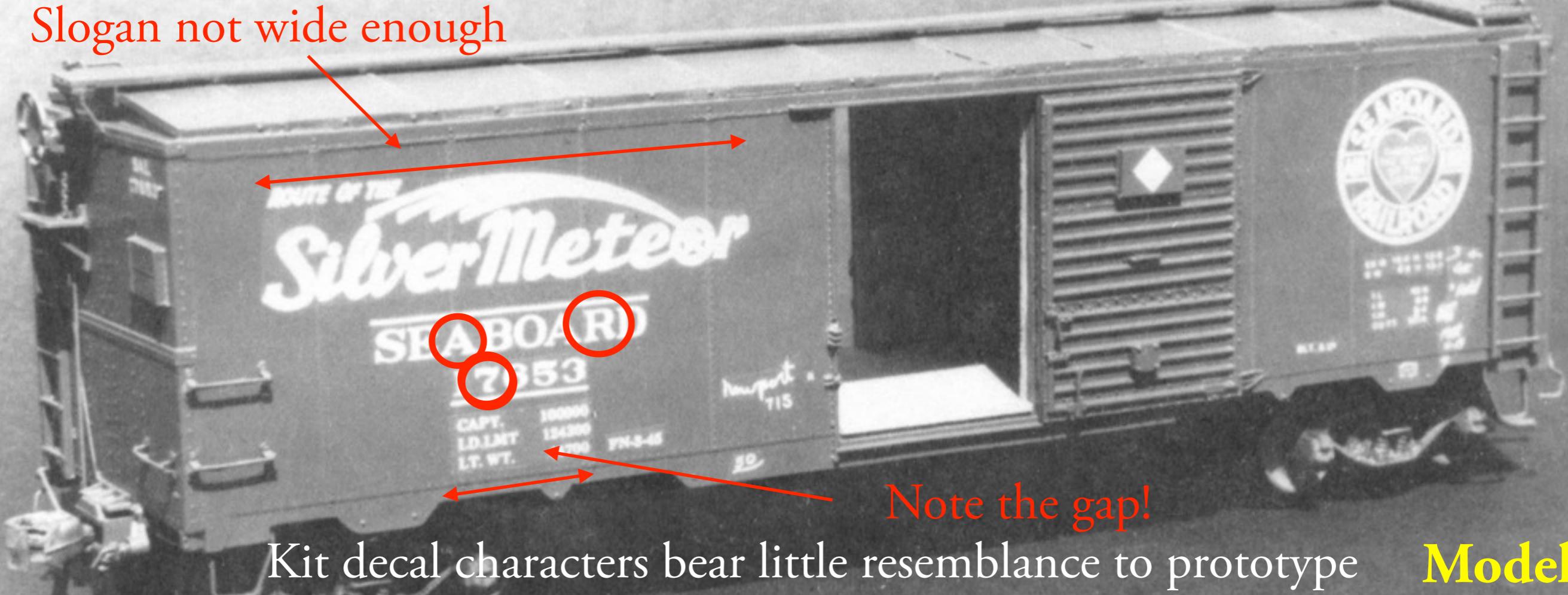
prototopics.blogspot.com

Creating Artwork for Decals

Why go to the trouble of creating artwork and decals when they already exist?

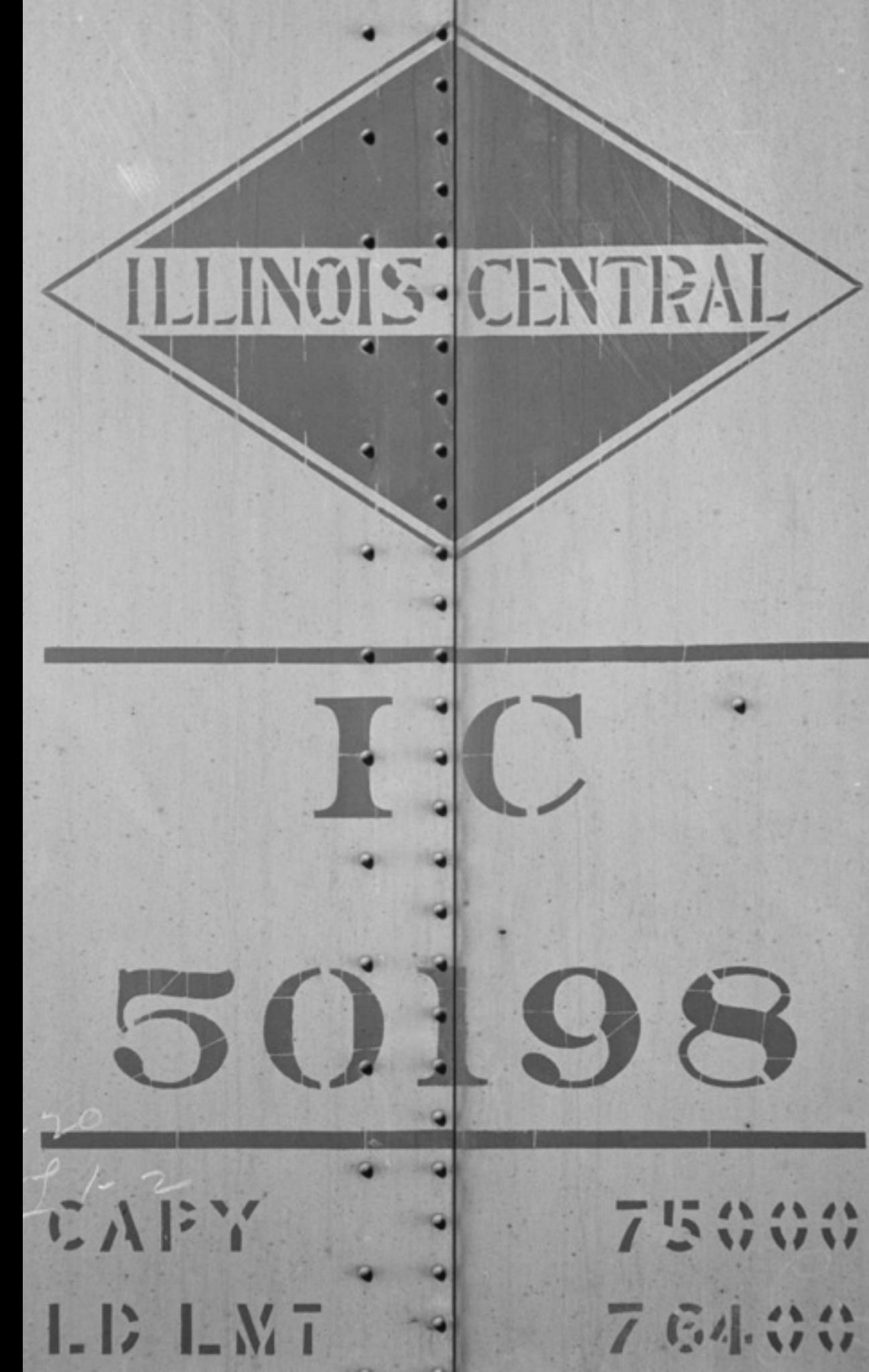
For me (your reasons may vary), after building several resin kits, I noticed that the distinctive characters used on the prototypes were markedly different from the lettering included in the kits, including style, size, spacing, etc. It struck me as odd that we worry about counting rivets, yet something as noticeable and distinctive as lettering was an afterthought. One of my first experiences was the Sunshine Seaboard Air Line 1932 ARA box car...

Slogan not wide enough



Kit decal characters bear little resemblance to prototype **Model**





ILLINOIS CENTRAL

IC
50198

20
1-2
COPY

LD LMT

75000
76400

Variety!

Each railroad had its own unique characters. Railroads didn't use "off-the-shelf" fonts (they did not exist except for printing and typography). The characters were used to create stencils that were overlaid on the car side (or locomotive, caboose, tender, etc.) to be used for the application of paint.

Variety!

2

2

2

2

2

2

NH

L&N

PRR

NP

MEC

PM

2

2

2

2

2

MILW

RF&P

NYCS

ATSF

Southern

2

2

2

2

2

2

B&O

Soo

SP

CNW

TNR*

AGP**

Variety!

2

2

2

2

2

2

NH

L&N

PRR

NP

MEC

PM

2

2

2

2

2

MILW

RF&P

NYCS

ATSF

Southern

2

2

2

2

2

2

B&O

Soo

SP

CNW

TNR*

AGP**

* Times New Roman

** Adobe Garamond Pro

Creating Artwork for Decals

Getting started - what is needed?

- Software
- Training
- Reference Material
- Printing

Creating Artwork for Decals

Getting started - what is needed?

- **Software**

- Bézier
 - Adobe Illustrator
 - Corel Draw
 - CAD (many CAD programs can draw using Bézier curves or *paths*)
- Raster
 - Photoshop
 - Simple paint and draw applications (these are usually not Bézier apps due to the computer horsepower and complexity needed to run them)
- Training
- Reference Material
- Printing

Bézier vs. Raster

Bézier curves are used to create and model smooth curves that can be scaled to any degree with no degradation. Raster graphics are comprised of bits/pixels that degrade as they are scaled upwards. As such, they are not ideal for instances where drawing detail is paramount.



Vector (Bézier curves)

vs. **Raster (pixels)**

Creating Artwork for Decals

Getting started - what is needed?

- Software
- **Training**
 - Community colleges (student software discount!)
 - Arts centers
 - Community learning classes
 - Self (such as Adobe's *Classroom in a Book* series, *For Dummies* series, Peach Pit press, [lynda.com](https://www.lynda.com), etc.)
- Reference Material
- Printing

Creating Artwork for Decals

Getting started - what is needed?

- Software
- Training
- **Reference Material**
 - Photos
 - Drawings
 - Sketches/Tracings
- Printing

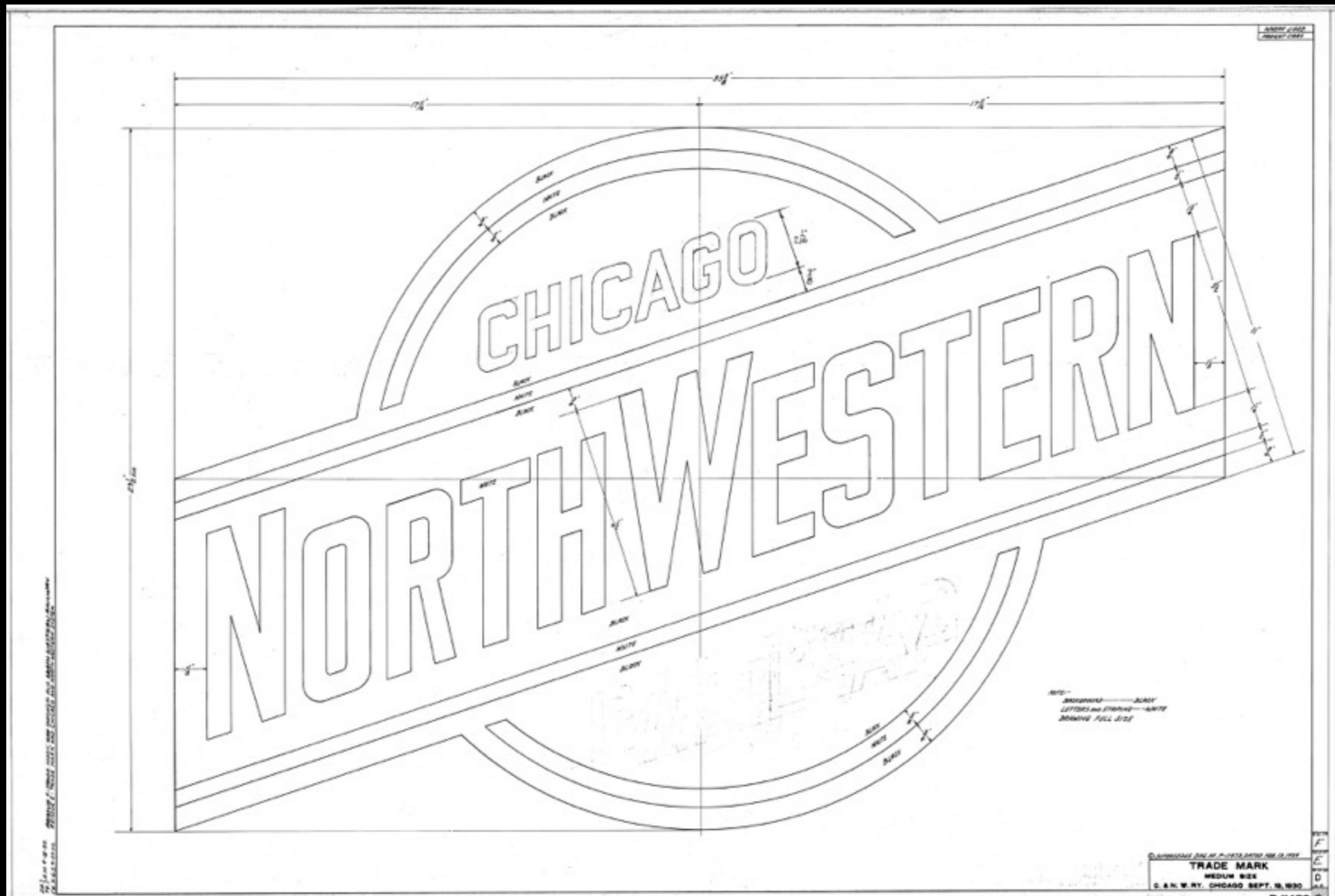
Photos

Ideally, should be large, crystal clear, with even lighting. Builder's photos are ideal. Darkroom prints are better than digital prints.



Drawings

Drawings of characters or emblems are, as one would expect, highly valuable



Tracings

This is where I was going to show you the pencil tracing from the number plate of a New Haven I-4 4-6-2, made by laying a sheet of paper on the actual cast steel number plate and rubbing a pencil to record the actual shape of the raised characters. Alas, I can't lay my hands on that tracing so you'll have to imagine what it would look like. Here's a photo of an I-4 number plate to help you....



Creating Artwork for Decals

Getting started - what is needed?

- Software
- Training
- Reference Material
- **Printing**
 - Quantity
 - Quality
 - Cost (directly related to the two previous bullets)
 - Providers

Creating Artwork for Decals

Getting started - what is needed?

- Software
- Training
- Reference Material
- **Printing**
 - Quantity
 - Quality
 - Cost (directly related to the two previous bullets)
 - Providers
 - **Print at home** (inkjet or laser)
 - **Commercial Printers**
 - Cartograf
 - Canuck Model Products
 - Microscale
 - Rail Graphics

Prepping to Draw

- Scan - at highest resolution possible (may require multiple images). If you have an image already skip to next step
- Square up (Perspective Crop)
- Save image
- Open image in Illustrator (or your drawing app)
- Set up as template using layers
- Create drawing layer
- Draw

From this....

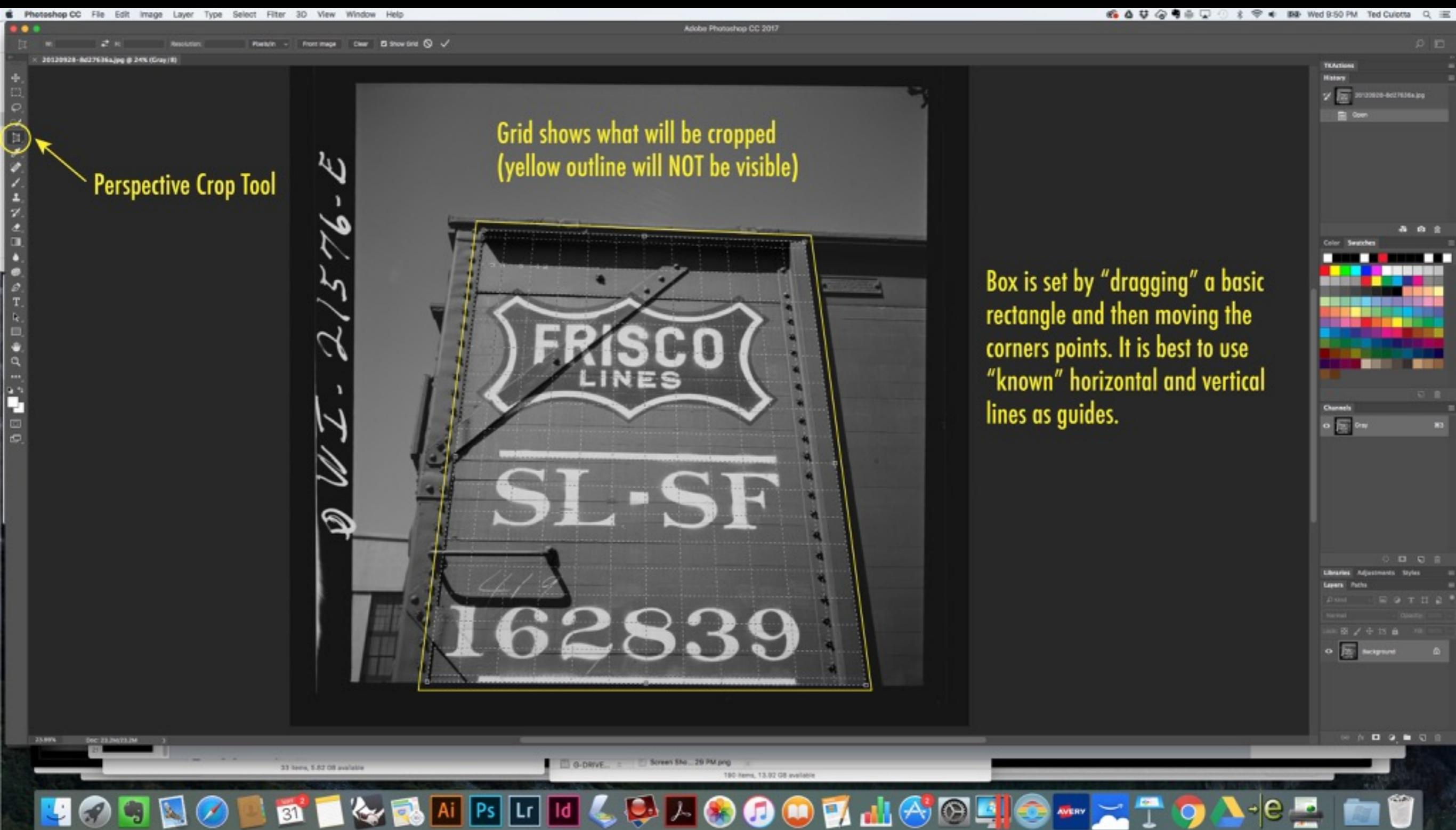


© WIT-21576-E

To this.....



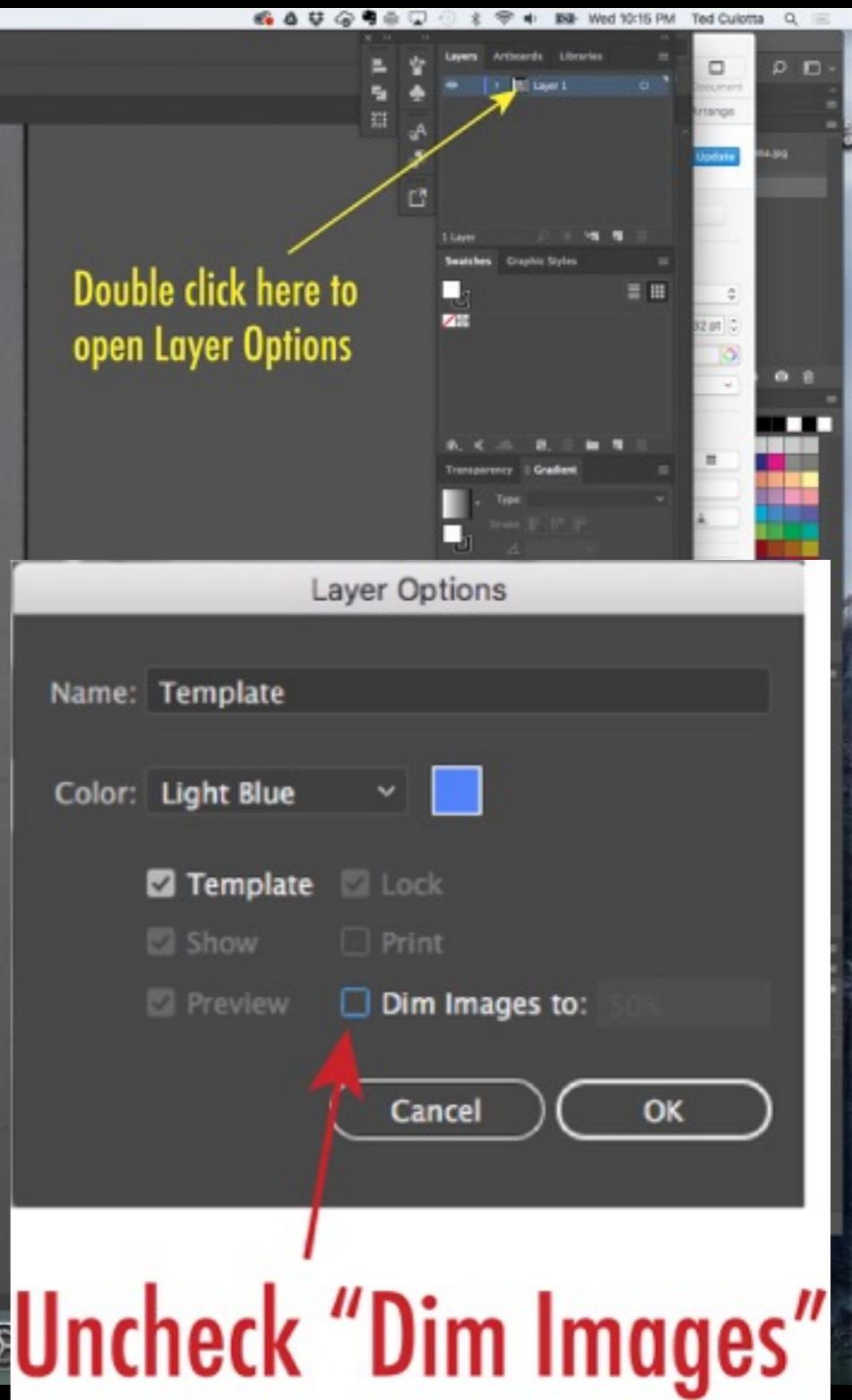
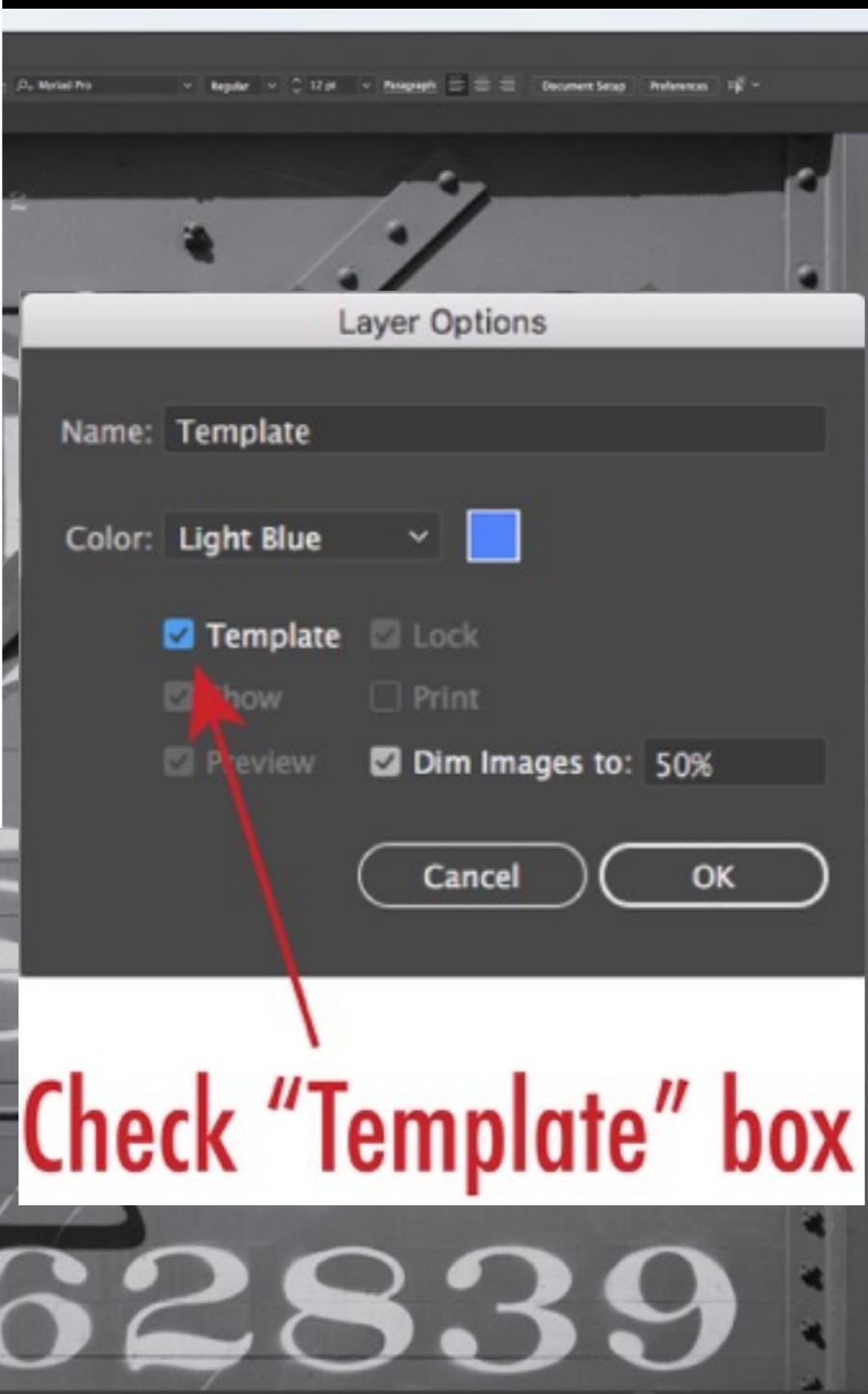
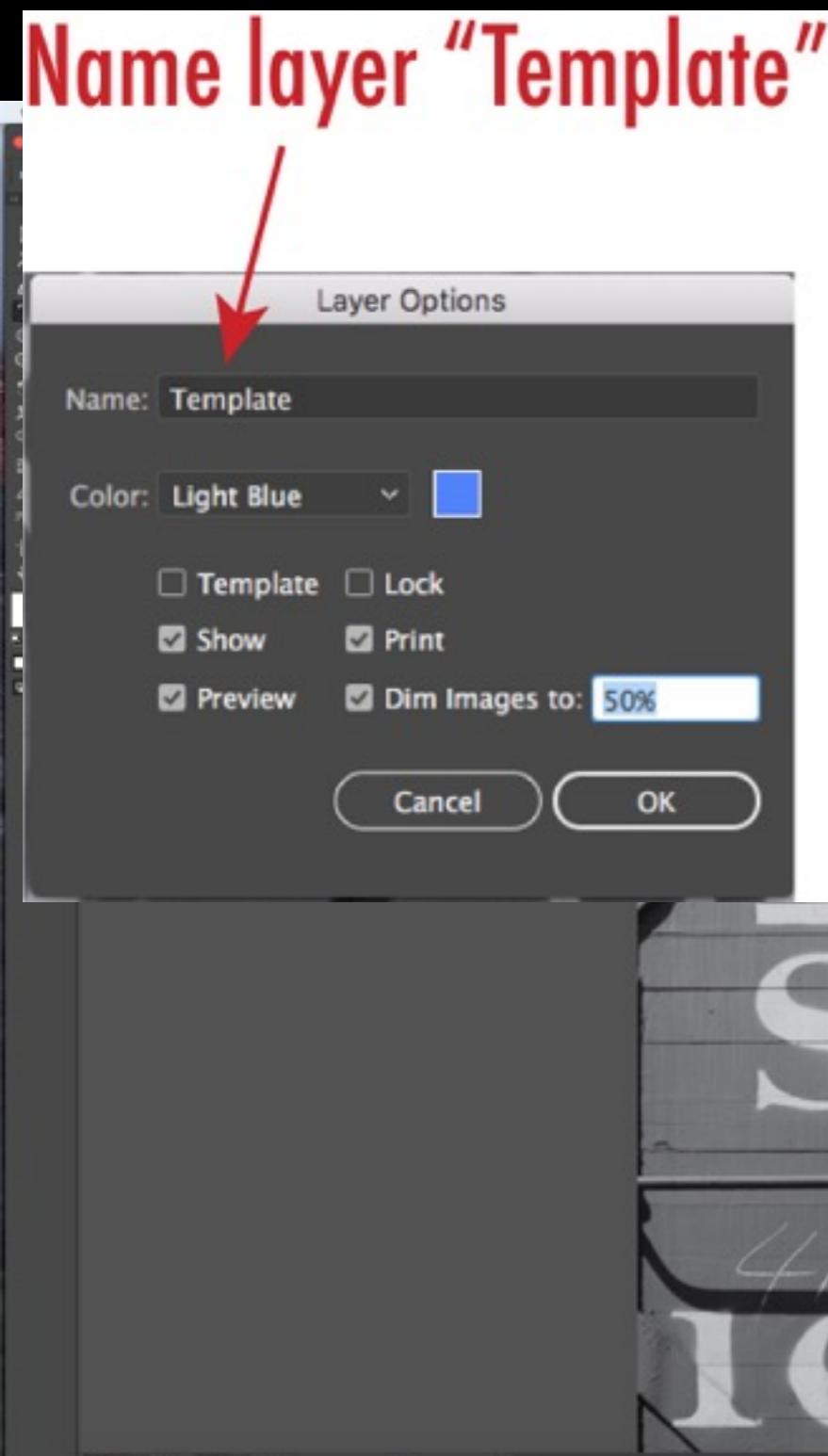
Perspective Crop Tool in Photoshop



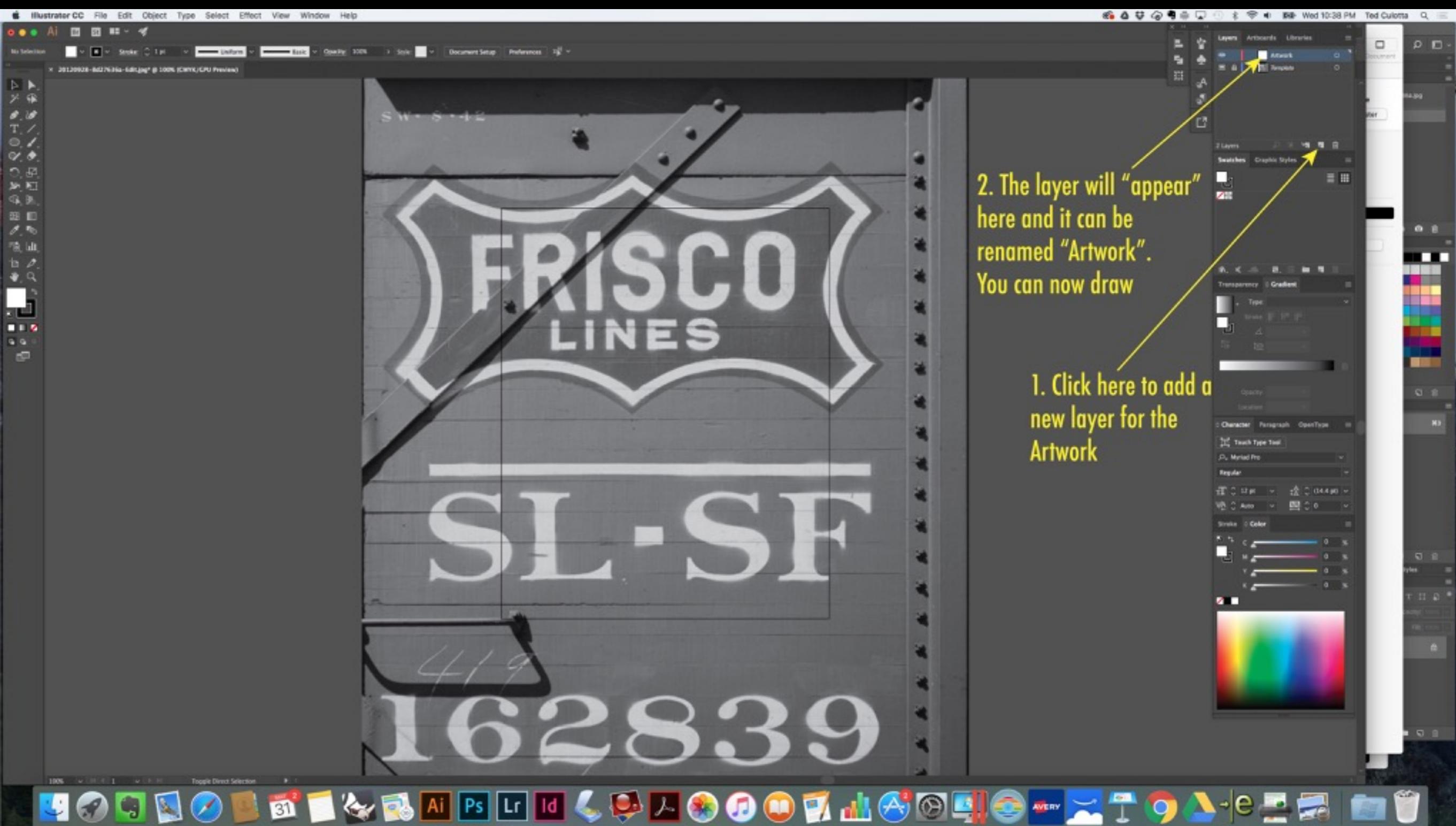
Set Layer Options in Illustrator



Set Layer Options in Illustrator



Create Artwork Layer in Illustrator

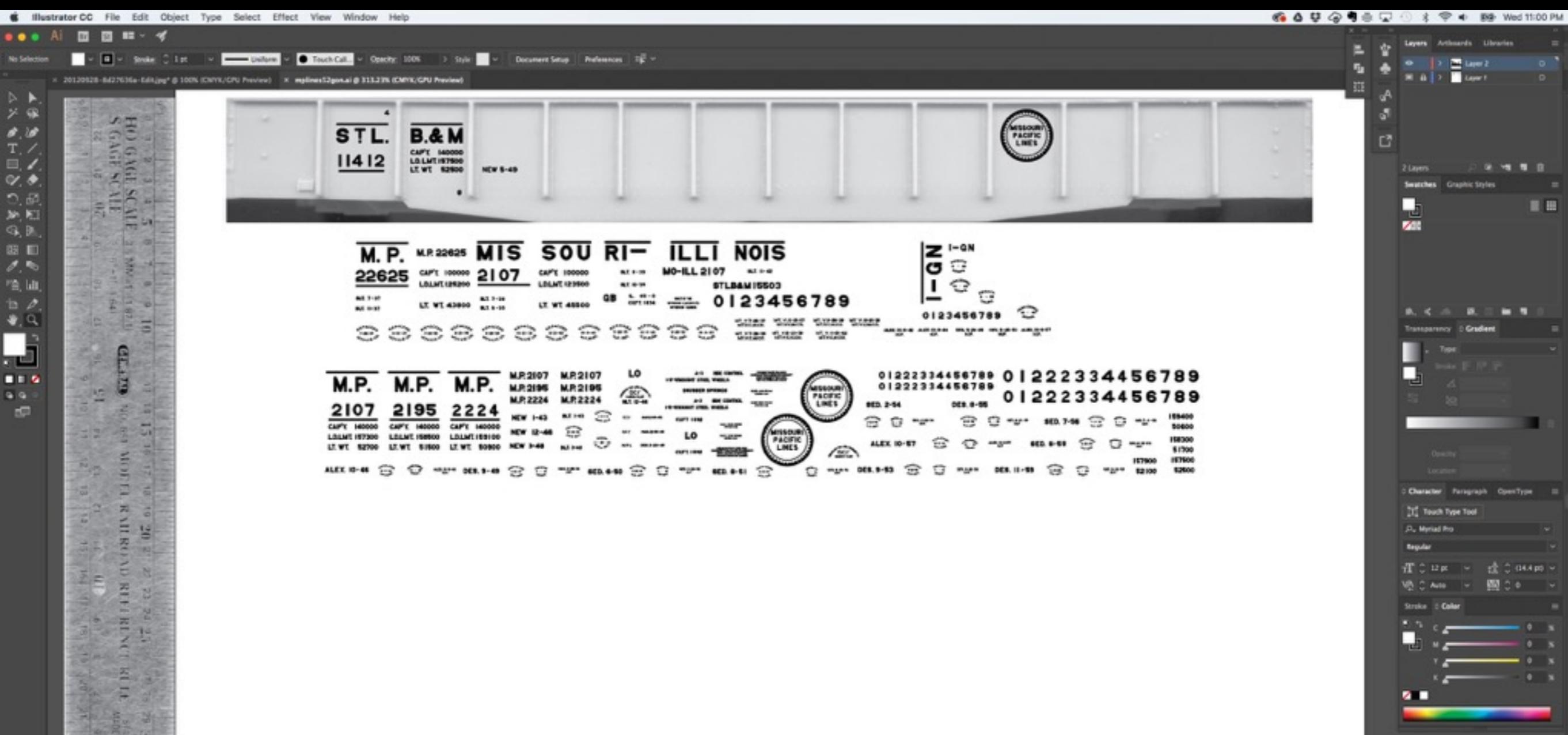


Tools to Learn in Illustrator

- Selection (V)
- Direct Selection (A)
- Pen (P)
- Type (T)
- Knife
- Fill (X)
- Align
- Zoom (Z)
- Ellipse (L)
- Rectangle (M)
- Shift key
- Alt-Shift keys
- Object → Transform:
 - Rotate
 - Reflect
 - Scale
- Type → Create Outlines
- Group/Ungroup
- Object → Arrange: Front, Forward, Backward, Back
- Object → Compound Path → Make
- *DO NOT* use Stroke unless you are certain you know what you are doing.
It doesn't scale like other artwork.

Tools to Learn in Illustrator

Scan model and scale ruler to aid in layout of lettering (as seen below, placed in the Template layer, on a work in progress)





It's very satisfying and gratifying to see a model you've built that has the lettering in the correct places, in the correct sizes, in the correct styles, and knowing that you made it.

Creating Artwork for Decals

This file will be posted to:

prototopics.blogspot.com

Tools to Learn in Illustrator



Go forth and make
cool stuff like this