

Memo

To: All CAD Operators
From: Tom Hanley
Date: 5/25/06
Re: Creating a basemap using OCWA data files

How to use the new OCWA topo and aerial image files

The biggest problem everyone seems to be having is that the new OCWA drawings are in a different coordinate system (NAD83) than were previously released (NAD27). In my memo dated 5/1/06, I described a procedure for merging files of different coordinate systems. This procedure is the recommended way the software writers expect us to do it but I have found it to be a bit cumbersome for the casual user. I have taken the time to convert much of the OCWA older files to the newer coordinate system and we now maintain two distinct sets of files. You will find these on the S: drive under OCWA and they will be in NAD83 or NAD27 subdirectories. I have also converted the layers and linetypes for the NAD83 files to our current CAD standards. You can use the OCWA files just as before but stick with one coordinate system. Using NAD27 files in conjunction with NAD83 and vice versa is not recommended. The files are created using different projections and will not match up exactly no matter how you scale and rotate them.

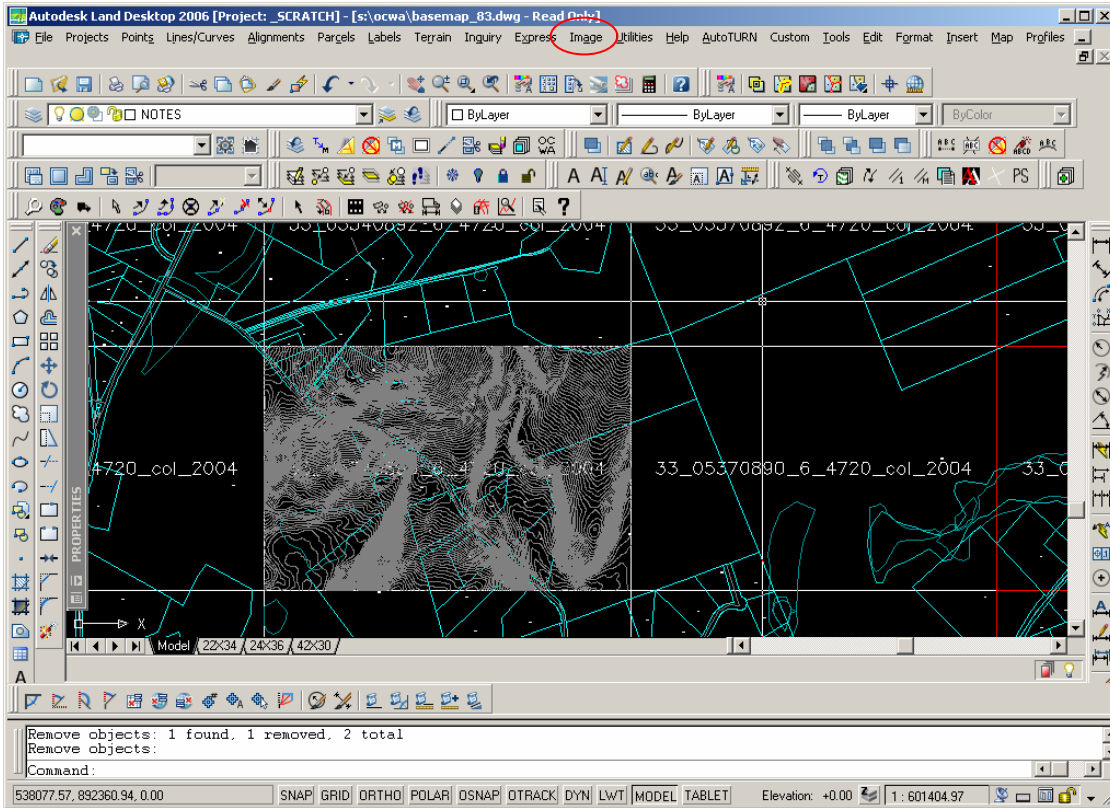
I have created a template to help get you started creating basemaps. You will find it as S:\OCWA\Basemap_83.dwg. It contains Roads, Federal and DEC Wetlands, and the Ortho grid for the new topo and aerial files for the whole county. You can then insert the parcels, soils and any other coverages for your specific area of interest. When you are finished building your map, you can delete the ortho grid completely and you should use the cookie cutter trim utility to remove any lines that are outside the area you need to keep the file size manageable. This is necessary for both network storage considerations and email capability. Remember to setup your location map first before trimming the extents. I have created a combined soils file called *soils_all_83* located in the NAD83 subdirectory under S:\OCWA\soils. This file is very large as well and it is important to clean up what you don't need early on so that your program doesn't bog down so badly. I created this file so that you wouldn't need to look up which file to insert based on the soils grid map but you can still go that route and do things just as before, one tile at a time. One adjustment that must be made in any map that has soil types is the polylines width. That will be based on the drawing scale. The current standard is *drawing scale divided by 25*.

Using the file OCWA_2004_ORTHO_GRID.dwg

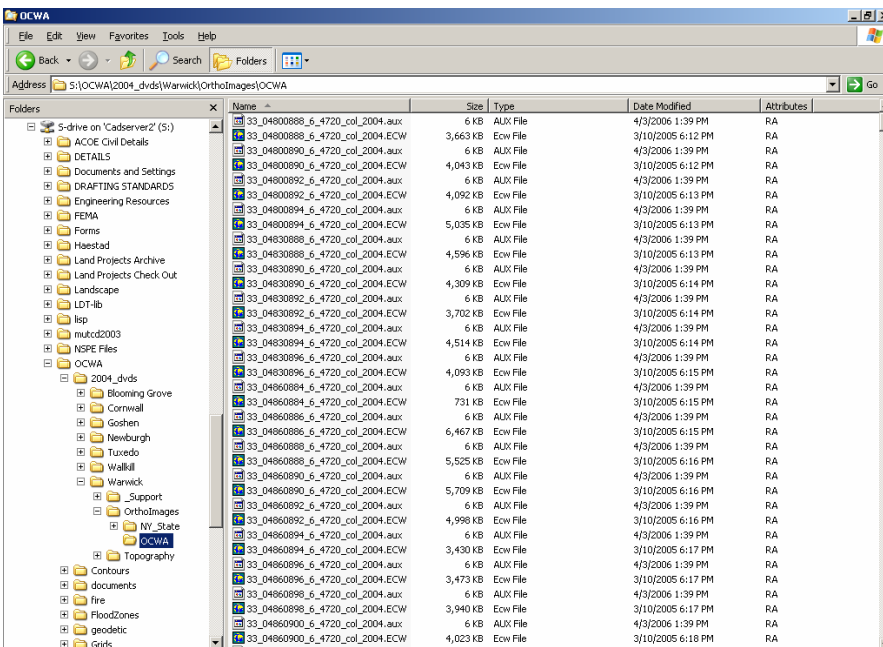
This file is the key to figuring out what tile you will need to insert to get both topo and aerial imagery. I have already included it in the basemap template but you can insert it separately from the S:\OCWA\2004_dvds subdirectory. The topo is inserted using the regular AutoCAD insert command. The images are a little more tricky but not difficult. You will need to use *AutoCAD Raster Design* to insert them correctly. You can also do this using *AutoCAD Map* but that procedure is not covered in this document.

Inserting Aerial Imagery tiles

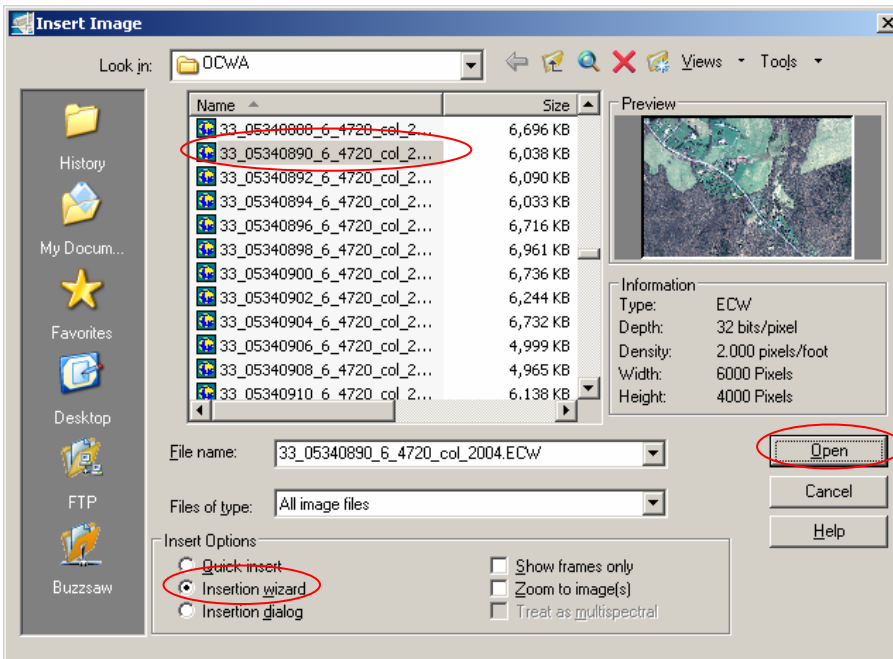
Find *IMAGE* in your AutoCAD menus. If you don't have it there, let me know and I'll set you up.



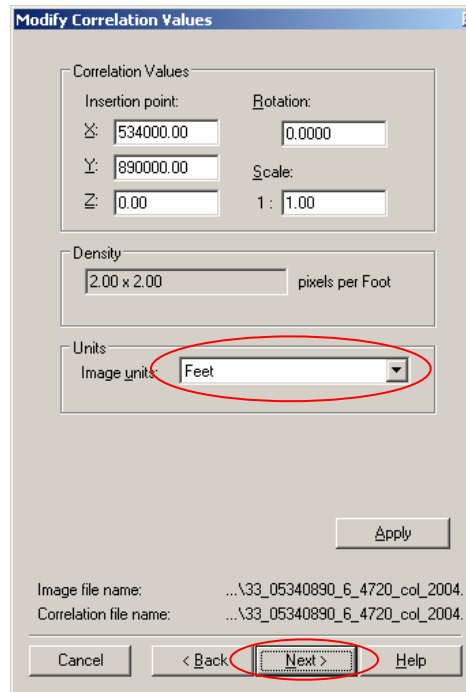
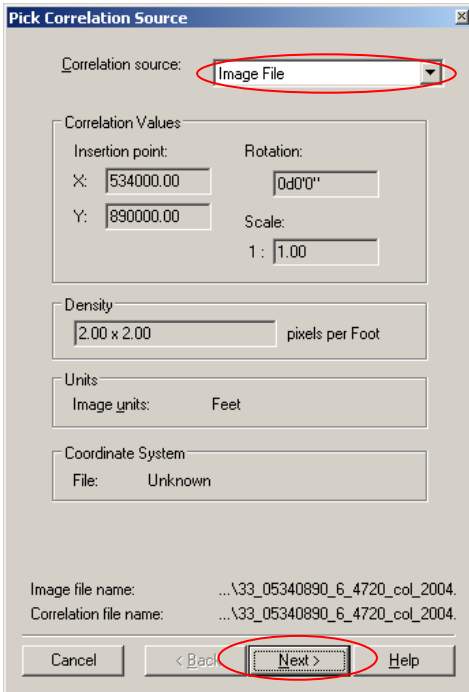
Click on *INSERT* on the *IMAGE* menu and navigate to the S:\OCWA\2004_dvds\sometown_orthoimages\OCWA directory

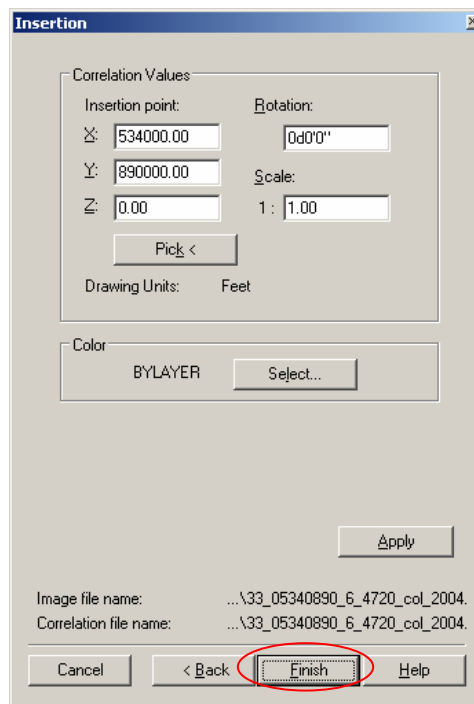
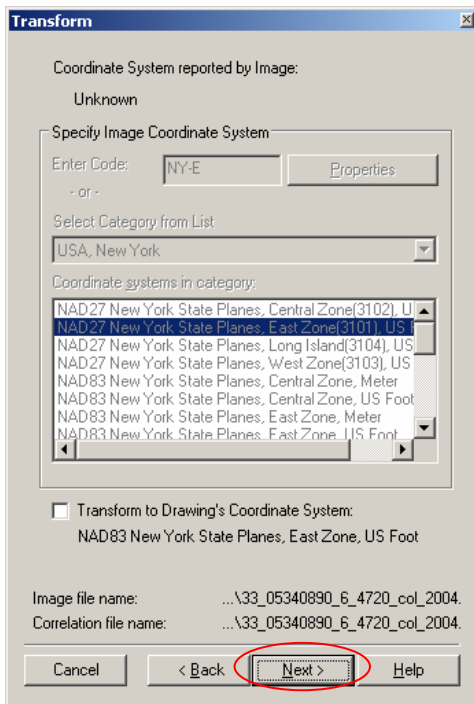


Highlight the image tile and make sure the *Insert Wizard* is picked in the *Insert Options* section then click *Open*.



Several dialog boxes will come up and you will mostly accept the defaults but just check certain options are set. They are circled in the following examples.





Your image should appear aligned with the ortho grid in your basemap. These image files add about 4 MB for each tile. This file size cannot be compressed so insert only what you really need and remove what is no longer needed.

Please contact me if you have any questions concerning this procedure or need further clarification.

Thank You,

Tom Hanley