Shortcuts and Solutions (Hot Tip Harry AutoCAD Tutorial)

Harry's top tip helps you manage xref block layers.

May 1, 2008 By: <u>Bill Kramer</u>

Harry peered into the window with a smile on his face. As he slipped in the envelope with this month's top tips, he said, "I've got some great shortcuts and a few solutions for those pesky xrefs." And with that, he was gone - off searching for more tips to make AutoCAD work better. Let's take a look at this month's eclectic collection.

Tip 2285: Automatic XLines

Automatic XLines by Jon Jonas simplifies the creation of a horizontal or vertical construction line (xline) at selected points. Load the LISP code and type XHH at the Command prompt to create a horizontal construction line at a selected point. You can use XVV in the same way to create a vertical construction line. This nifty little tip makes horizontal and vertical construction lines a breeze. Nice job, Jon!

Tip 2286: Reset Path for Xref Blocks

Reset Path for Xref Blocks comes to us from frequent contributor Leonid Nemirovsky. This routine solves a relatively common problem for those who use externally referenced blocks - path changes. When you encounter a problem with lost xref blocks, copy all the external files into one folder that is part of the AutoCAD search path. Then load the LISP code and type XrefRel at the Command prompt. The rest is automatic, as the routine ripples down the blocks table and looks for externally referenced blocks. When found, it rebinds them to the drawing using the new folder location. It's a very useful routine when accepting drawings from outside sources.

Tip 2287: Convert Text to Standard Notes

Ravi Prakash sent in the Convert Text to Standard Notes utility, which includes LISP code for a series of simple functions that change existing text objects into standard drawing notes. Some simple fabrication notes are provided as examples in the code, and they can be adjusted to your over page (age the SetO assignments of

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Important note: Be sure your submission contains all elements required for it to run independently in AutoCAD. Tips that are missing functions or other necessary elements will not be considered.

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E-mail those tips and tricks to <u>harry@cadalyst.com</u>.

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adjusted to your own needs (see the SetQ assignments at the beginning of the code). The basic operation is to load the code and then type N1 (or N2, N3, ...) for the various notes. (Six are supplied in the tip.) When the command functions run, they ask you to select an existing text object in the drawing. The text data is then updated from the standard note text for the given N function and variable assignment. This tip is simple yet useful. Thanks for sharing, Ravi!

Tip 2288: DIMLFAC Quick Setting

DIMLFAC Quick Setting, submitted by Matt Sibum, is a very fast way to set the DIMLFAC system variable (linear dimension scale factor) when using nonassociative dimensions in a viewport. After loading the LISP code, type DF at the Command line. The macro prompts you to select a viewport, from which it grabs the height of the viewport in both paper space and model space units. The model space height is divided by the paper space height to produce a new scale factor for linear dimensioning in the viewport. This quick utility can be a significant time saver when dimensioning detail views.

Tip 2289: Layer Creator

Layer Creator from Timothy Spangler is a comprehensive application for managing a variable layer standards set. This utility lets you select from a library of predefined layer tables (maintained as ASCII text files) to quickly set up the layers, linetypes, and similar relationships in a drawing. Included is a TXT file that describes how to set up or edit any of the layer files. To use this utility, place the files in a path searched by AutoCAD and load the LISP code. Type LC at the AutoCAD Command prompt to launch the dialog box and select the layer setup you need. Nice programming!

Tip 2290: Tangent Arc Generators

Submitted by Rogelio Bravo, Tangent Arc Generators is a small set of utilities for generating arcs tangent to other objects. The tip includes four LISP files and one DCL file. Copy these files into a folder searched by AutoCAD and then load the ARCTOD.LSP file. Type Arctod at the AutoCAD Command line to activate the dialog box, where you can select from the arc generator options. Bravo, Bravo!

Tip 2291: Xref Block Layer Cleanup

This month's top tip, Xref Block Layer Cleanup from Michael Kolomiyets, is a reactorbased solution for handling layers from xref blocks. This routine runs behind the scenes after it is loaded through the use of reactors. The goal is to add the letters "xref-" plus the block name to the start of all layers created through the inclusion of an externally referenced block. When the xref block is removed from the drawing, all the layers containing the letters "xref-" plus the block name at the beginning are removed



from the drawing. This very elegant solution helps keep your layers straight and demonstrates the raw power of reactors in Visual LISP. Great job, Michael. This utility is a great example of reactorbased programming that is useful too!

Got some code you want to share? Harry is always looking for new AutoCAD tricks and tips to share. The global programmer community depends on your support. Until next month, keep on programmin'.

Join the Hot Tip Harry Challenge

Harry needs your tips! Do you have an original routine written in VBA, Visual LISP, or even ObjectARX for AutoCAD customization? Send it in, with all the source code, to <u>harry@cadalyst.com</u>. Your tip may be needed by others now, so don't delay!

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