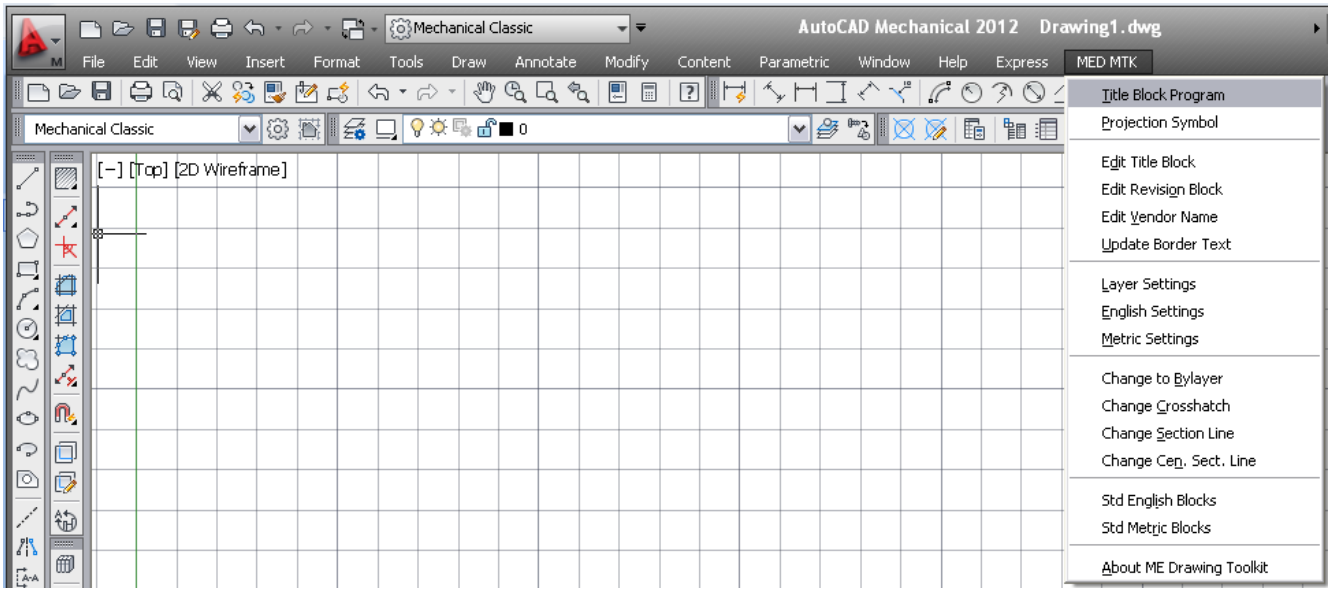
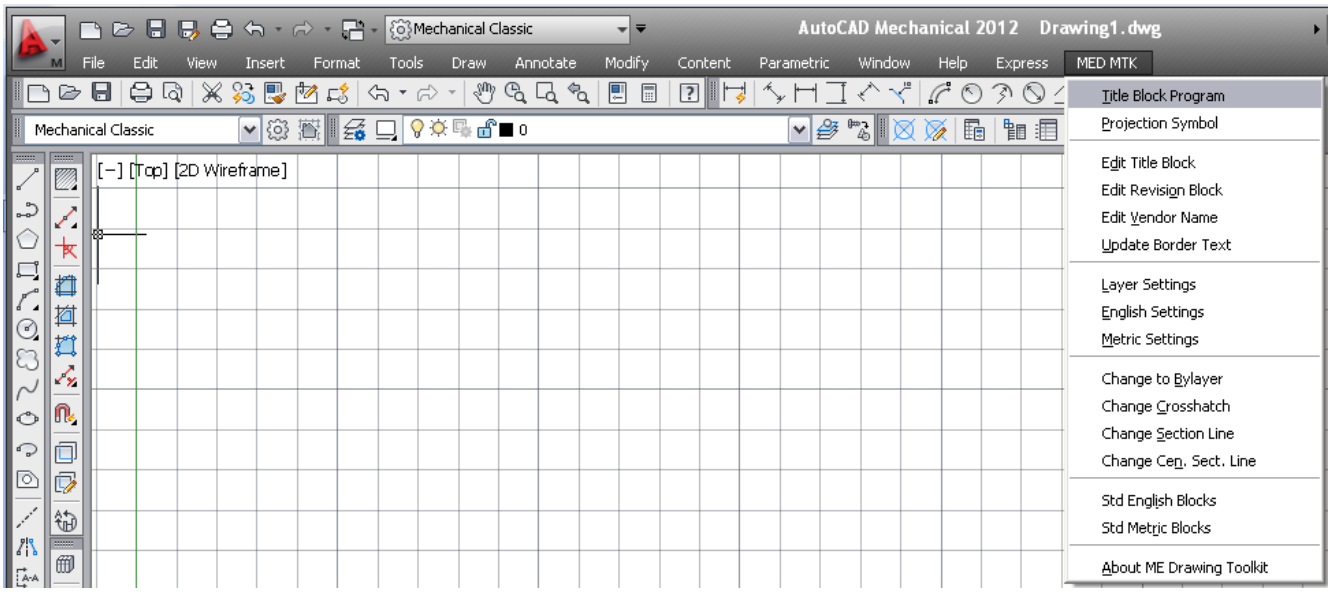
Manufacturing Engineering Drawing Toolkit for AutoCAD

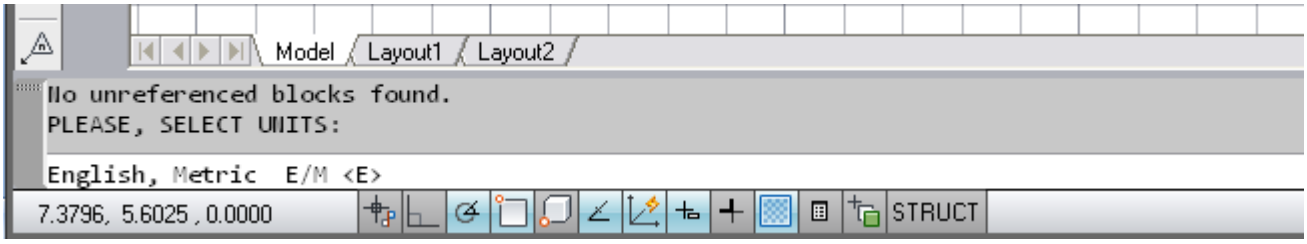
User Interface—Drop down menu options



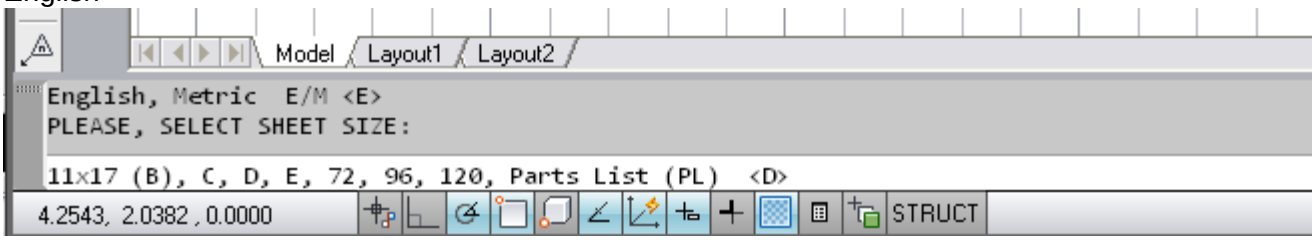
Title Block Program



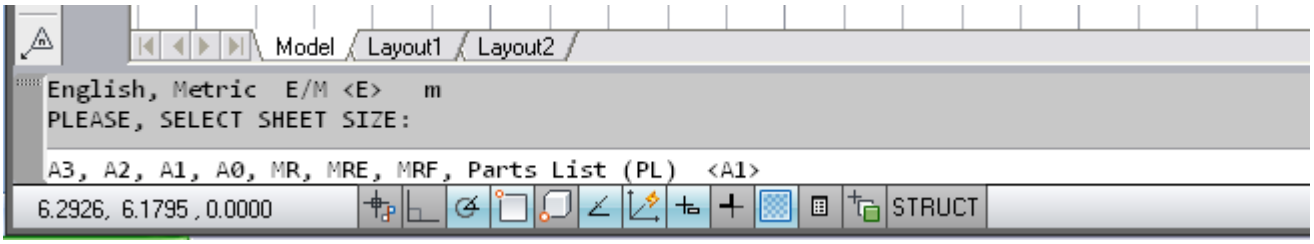
Opens a Command line dialog in the lower left corner for building a drawing sheet
Identify measuring units

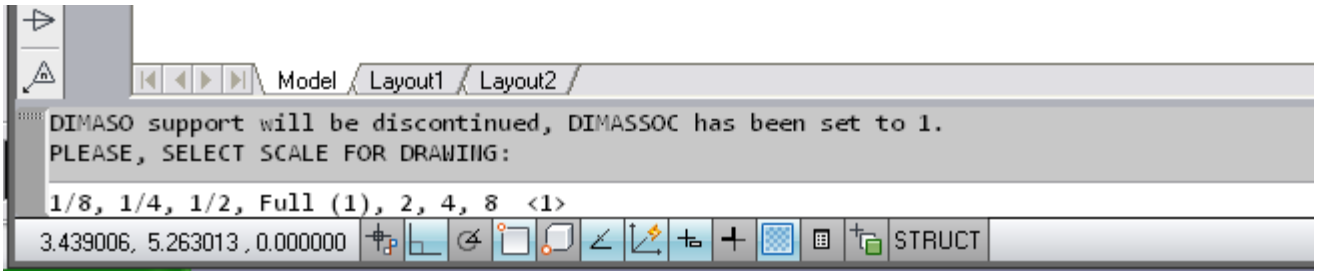


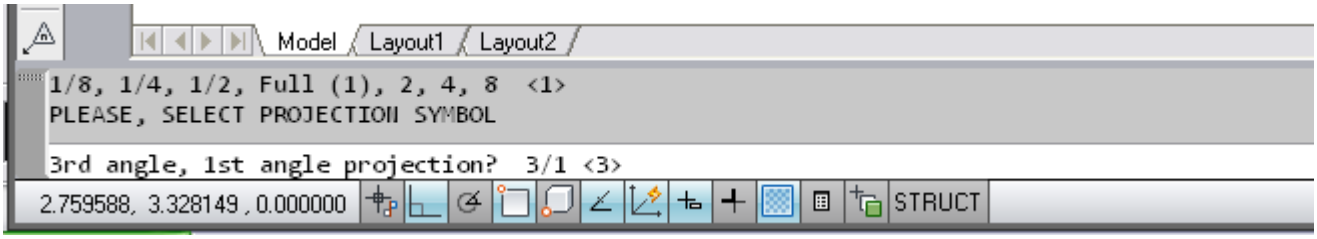
Select Sheet Size
English

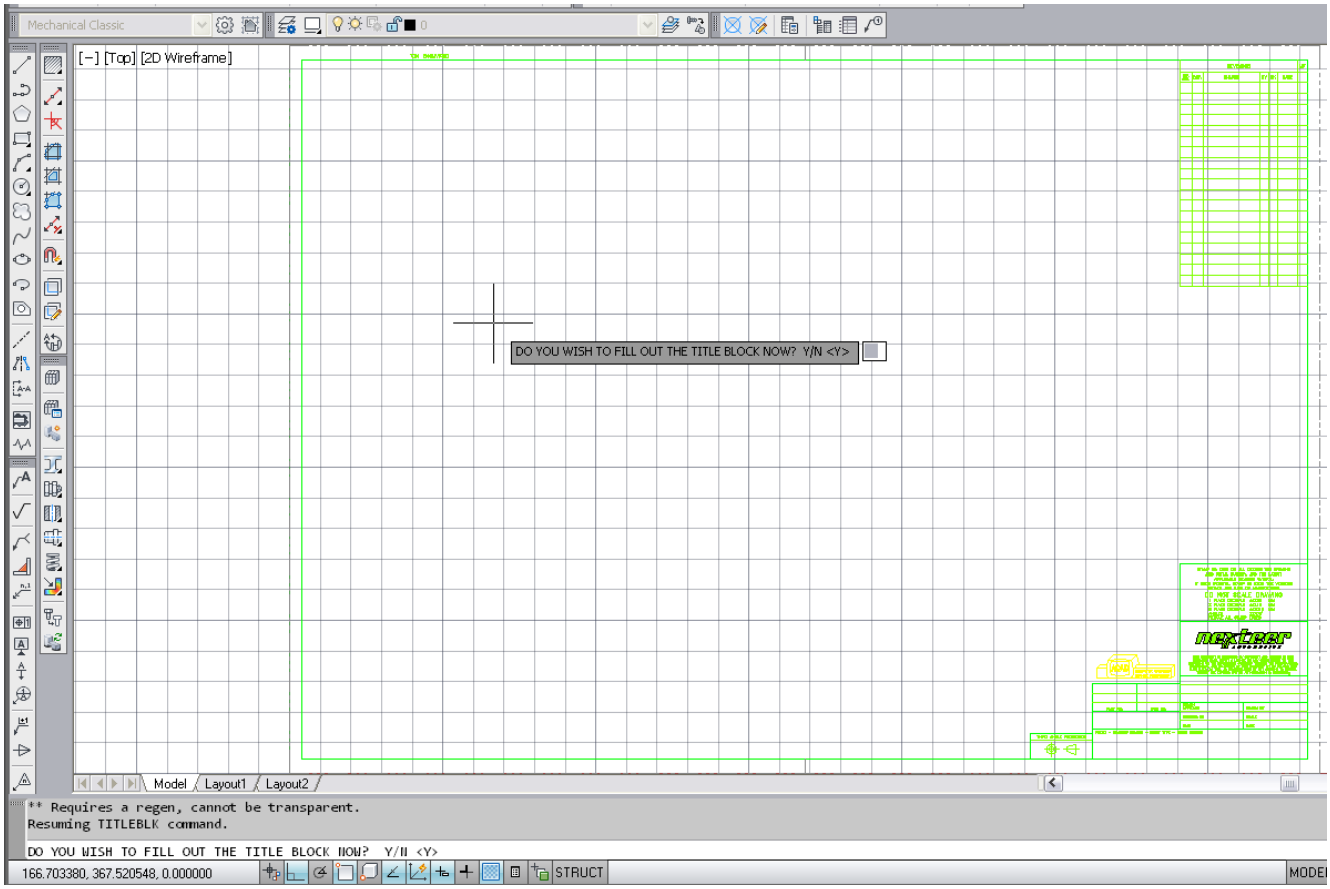


Metric

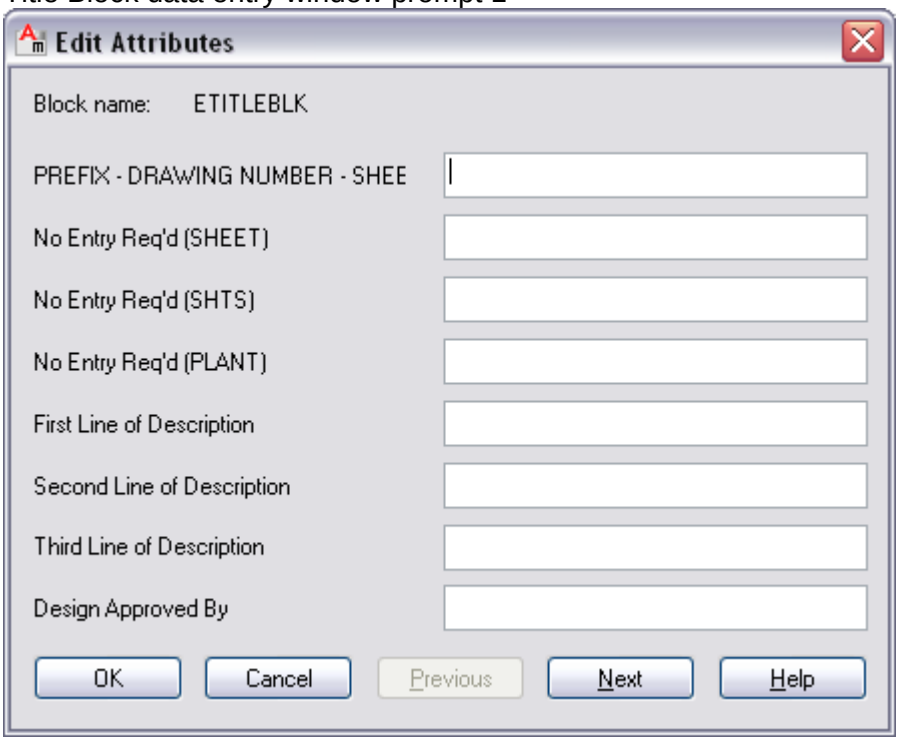







Mechanical Classic
[−] [Top] [2D Wireframe]
DO YOU WISH TO FILL OUT THE TITLE BLOCK NOW? Y/N <Y>
Model
Layout1
Layout2
** Requires a regen, cannot be transparent.
Resuming TITLEBLK command.
DO YOU WISH TO FILL OUT THE TITLE BLOCK NOW? Y/N <Y>
166.703380, 367.520548, 0.000000
STRUCT
MODEL

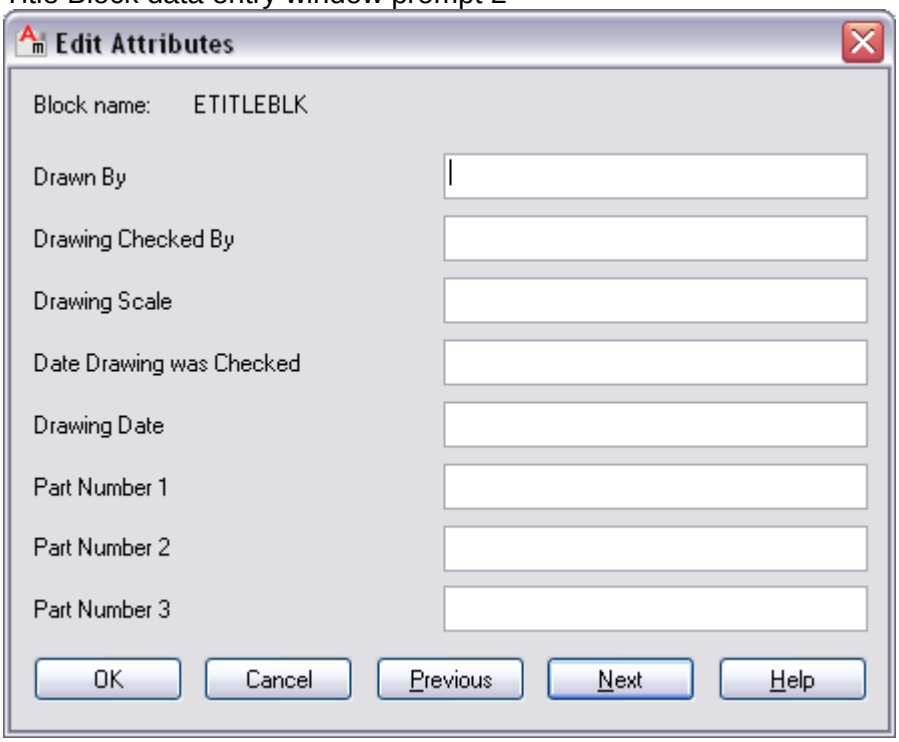
Title Block data entry window prompt 1



(ETITLEBLK for English MTITLEBLK for Metric)

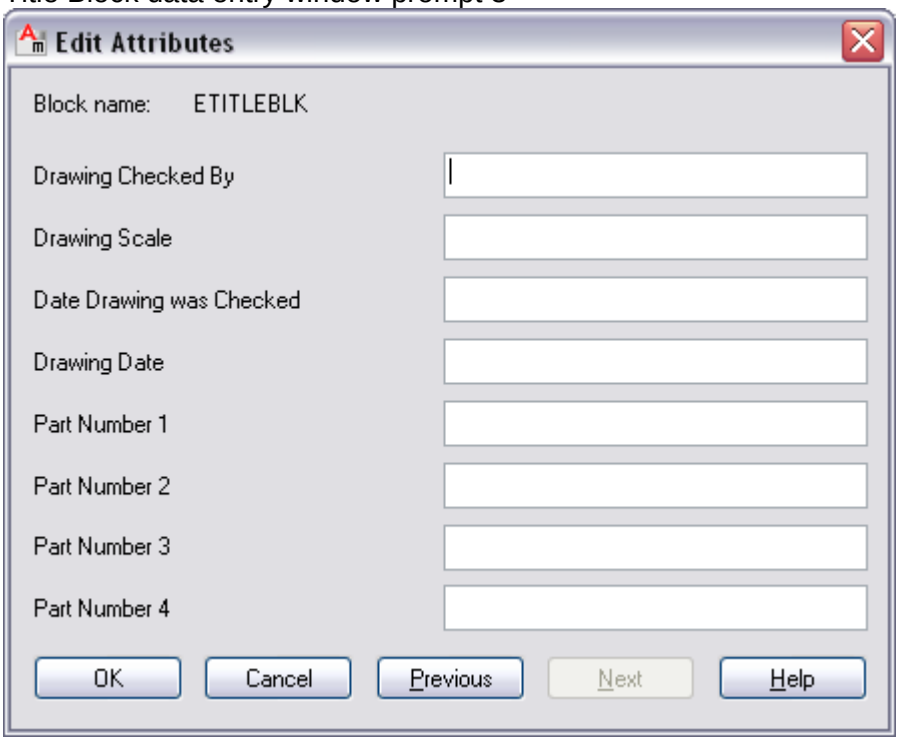
No data entry is required for SHEET, SHTS, and PLANT. These are placeholders to facilitate alignment of the of legacy Delphi title block data to the Nexteer title block.

Title Block data entry window prompt 2



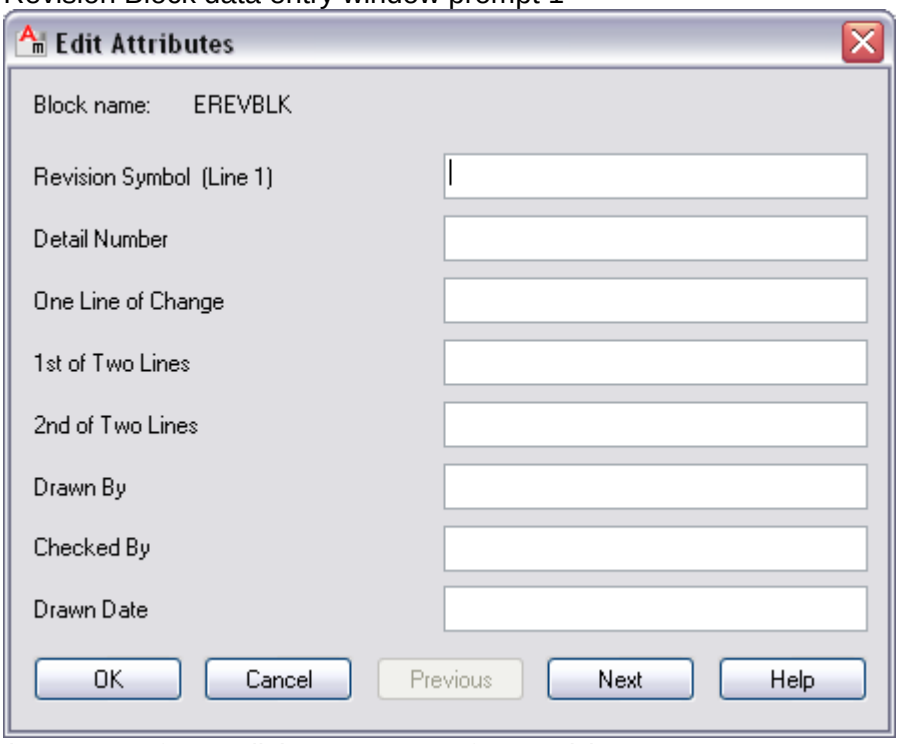
(ETITLEBLK for English MTITLEBLK for Metric)

Title Block data entry window prompt 3



(ETITLEBLK for English MTITLEBLK for Metric)

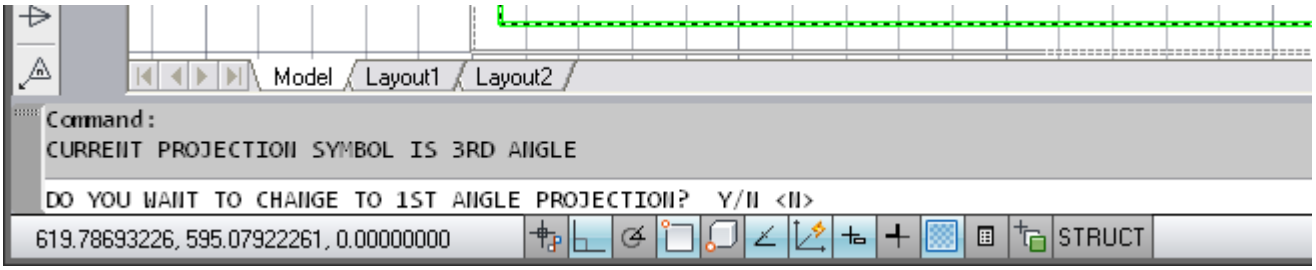
Revision Block data entry window prompt 1

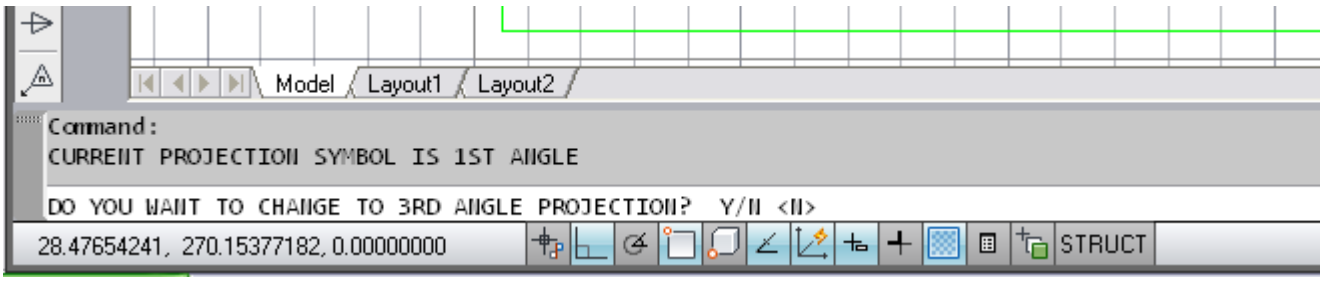


(EREVBLK for English MREVBLK for Metric)

Projection Symbol

This function swaps the projection symbol in a ME Drawing Title Block sheet between First and Third Angle Projection.

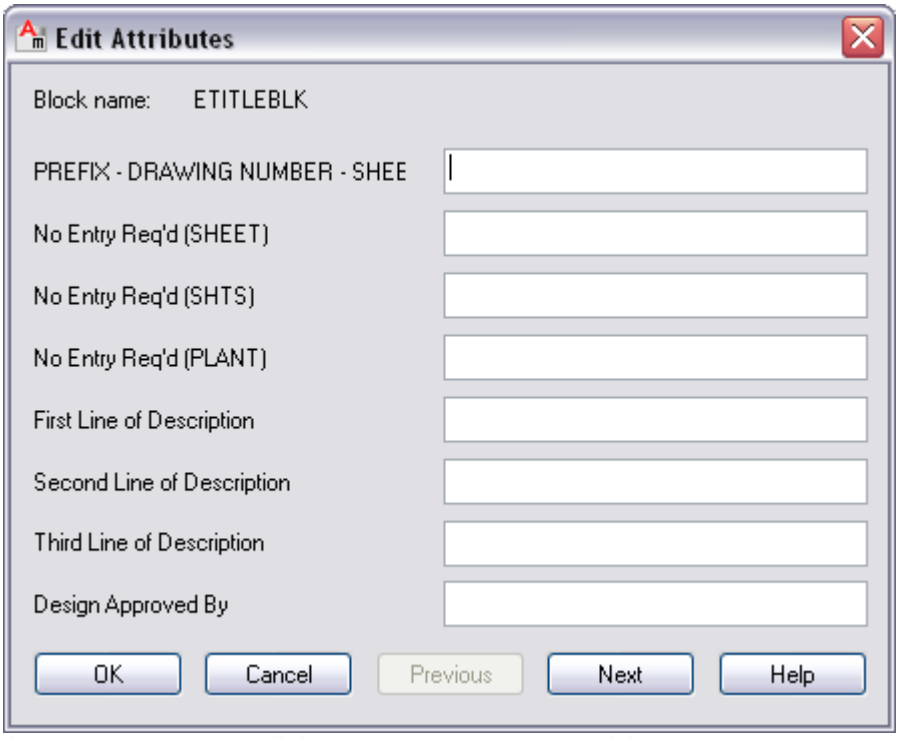




Edit Title Block

This function allows modification of title block parameters on drawing templates created with the AutoCAD ME Drawing Toolkit.

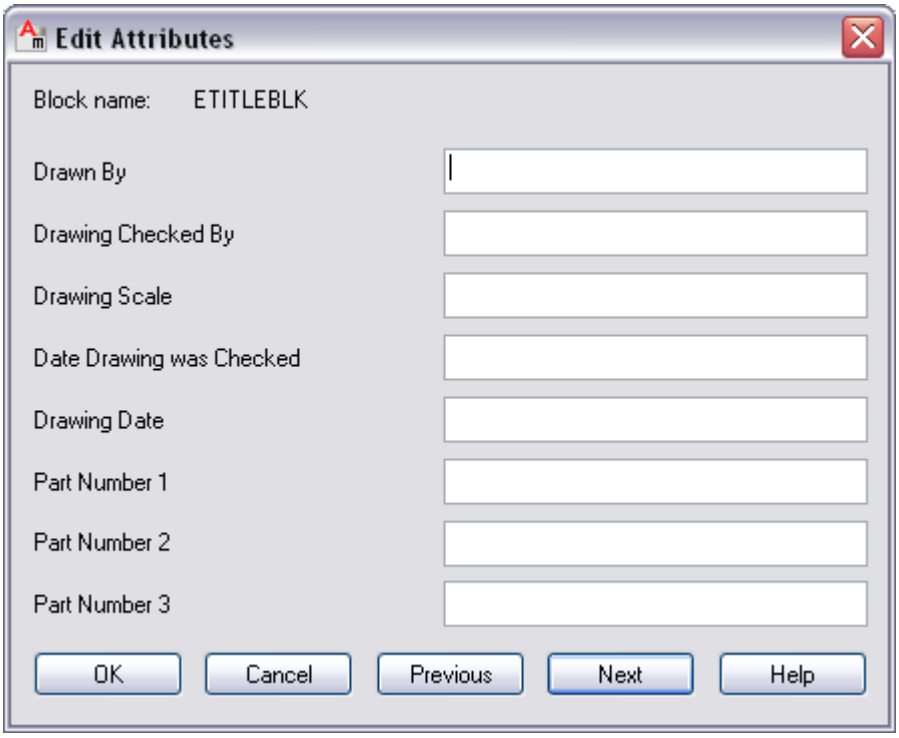
Edit Title Block--Screen 1 of 3



(ETITLEBLK for English MTITLEBLK for Metric)

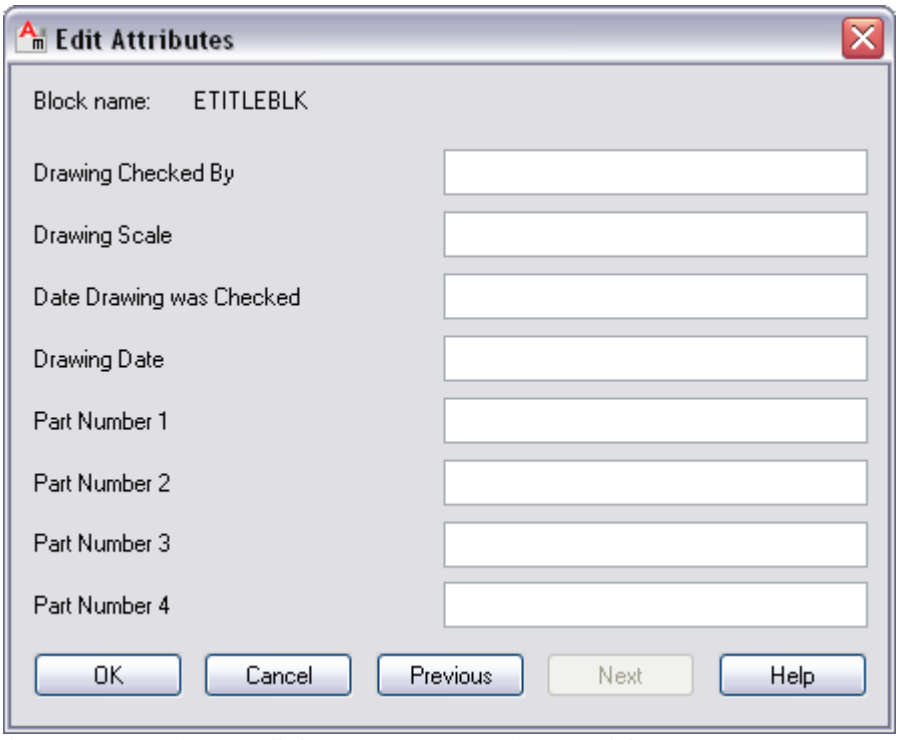
No data entry is required for SHEET, SHTS, and PLANT. These are placeholders to facilitate alignment of the of legacy Delphi title block data to the Nexteer title block.

Edit Title Block--Screen 2 of 3



(ETITLEBLK for English MTITLEBLK for Metric)

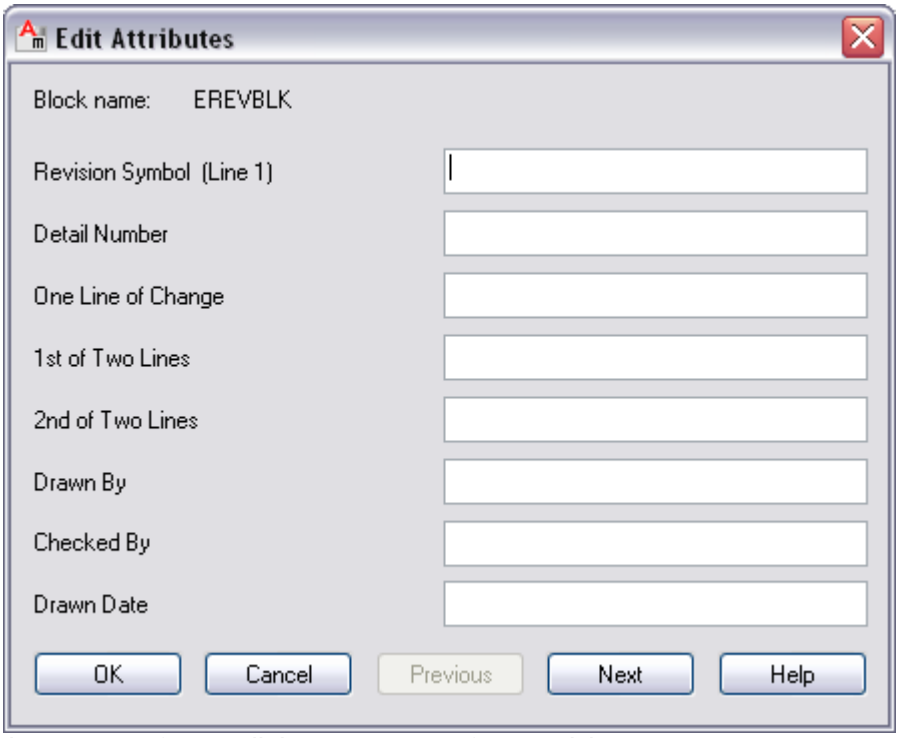
Edit Title Block--Screen 3 of 3



(ETITLEBLK for English MTITLEBLK for Metric)

Edit Revision Block

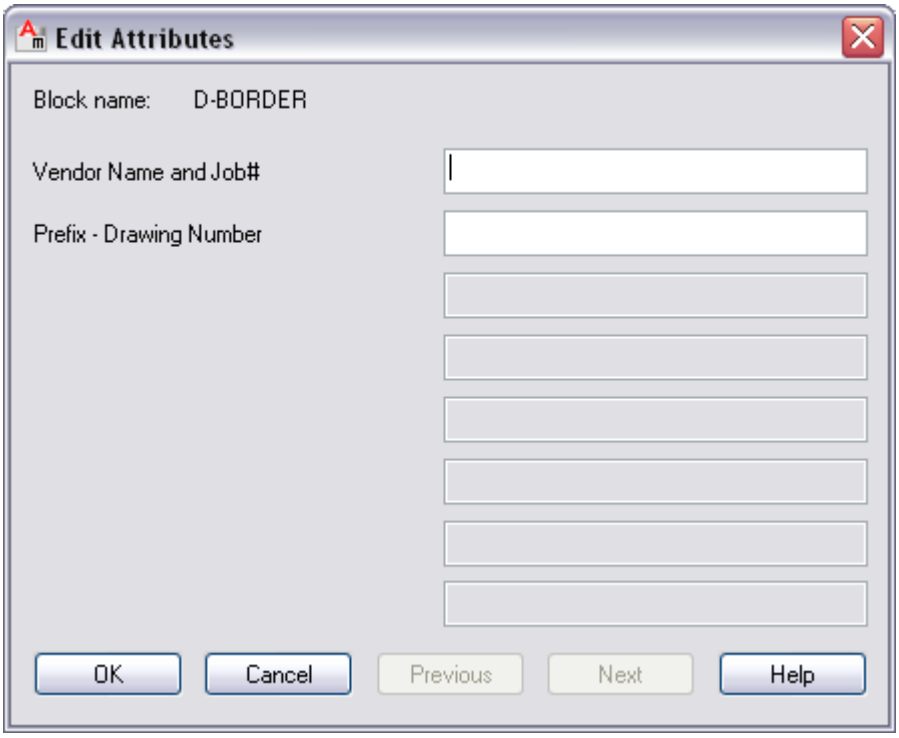
This function allows modification of revision block parameters on drawing templates created with the AutoCAD ME Drawing Toolkit.



(EREVBLK for English MREVBLK for Metric)

Edit Vendor Name

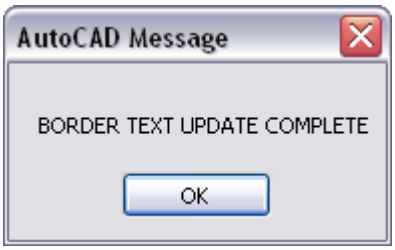
This function allows modification of drawing border parameters on drawing templates created with the AutoCAD ME Drawing Toolkit.



(Variable BORDER depending on sheet size; D-size shown:D-BORDER)

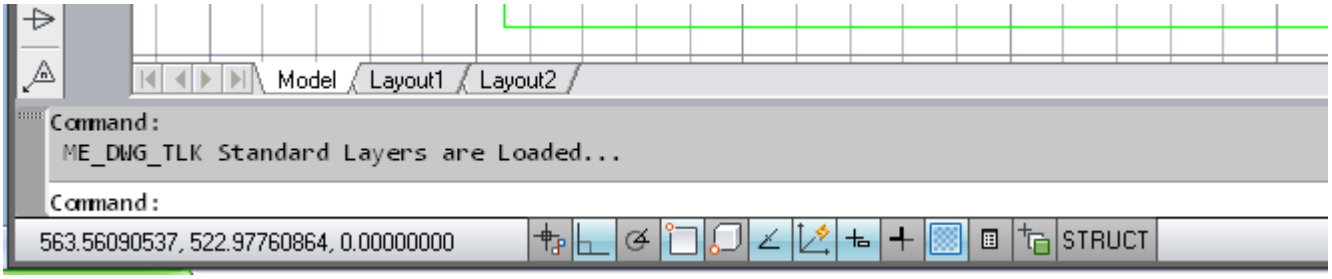
Update Border Text

This function refreshes arguments of the drawing border parameters on drawing templates created with the AutoCAD ME Drawing Toolkit. Upon completion the pop-up window below is shown.



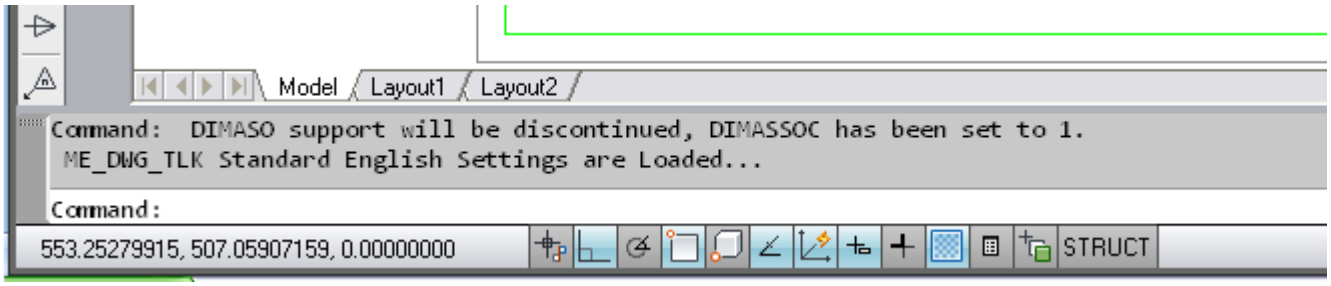
Layer Settings (See Appendix)

The Layer Settings function loads the defined standard layers, colors, linetypes detailed in the AutoCAD Manufacturing Engineering Standards document.



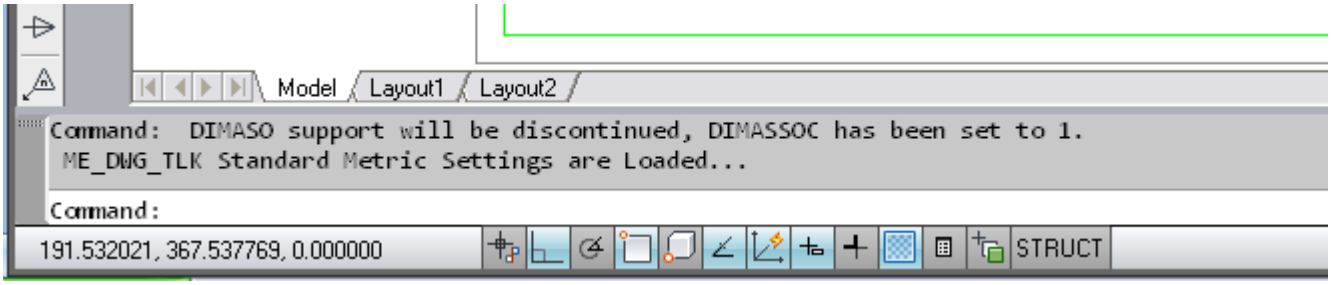
English Settings (See Appendix)

The English Settings function loads variables for the defined standard English settings detailed in the AutoCAD Manufacturing Engineering Standards document.



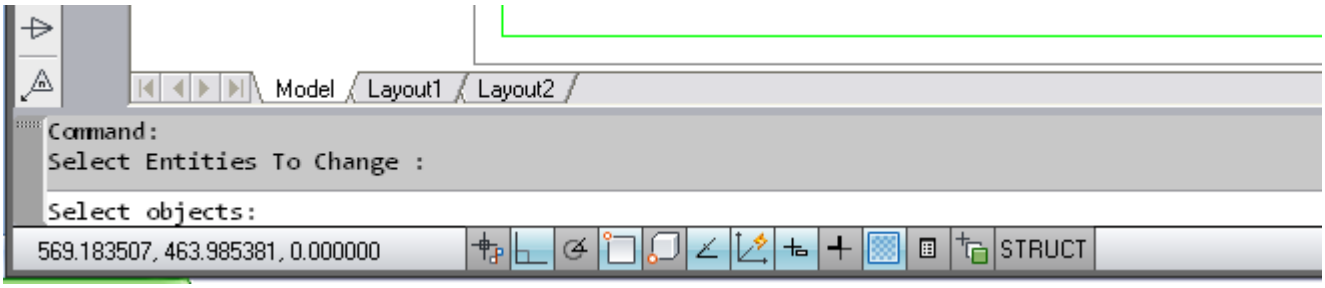
Metric Settings (See Appendix)

The Metric Settings function loads variables for the defined standard Metric settings detailed in the AutoCAD Manufacturing Engineering Standards document.



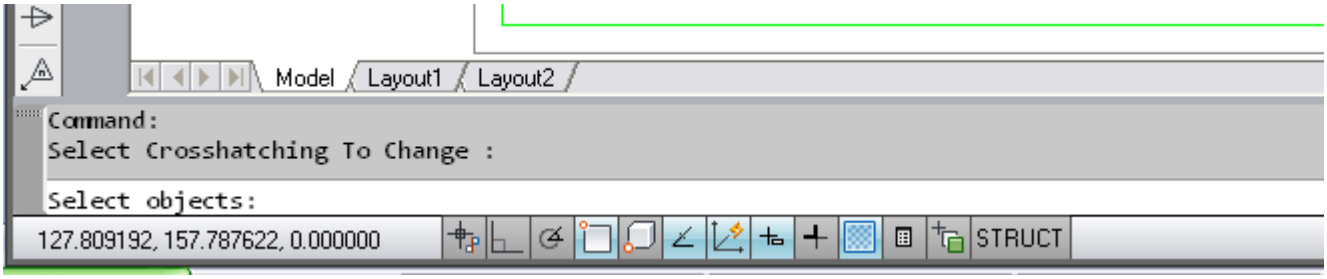
Change to Bylayer

This function changes properties of selected objects to bylayer.



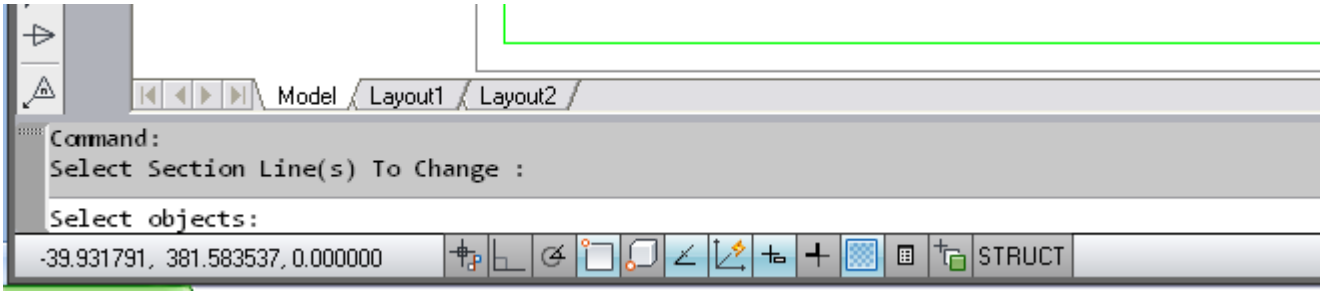
Change Crosshatch

This function changes properties of selected objects crosshatching.



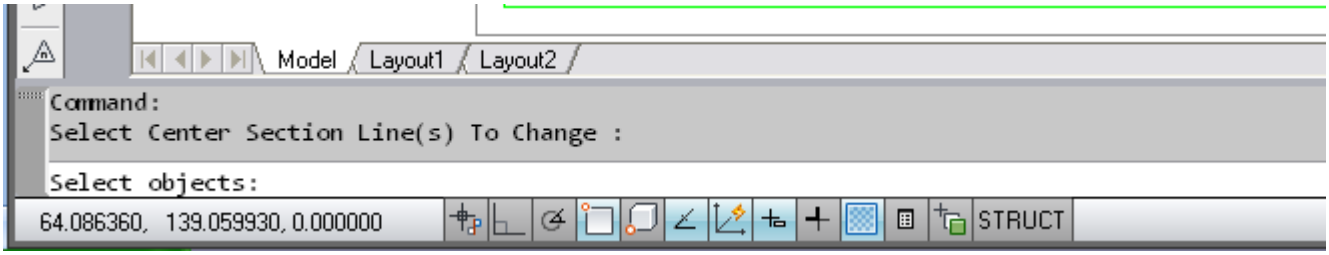
Change Section Line

This function changes properties of selected section lines(s).



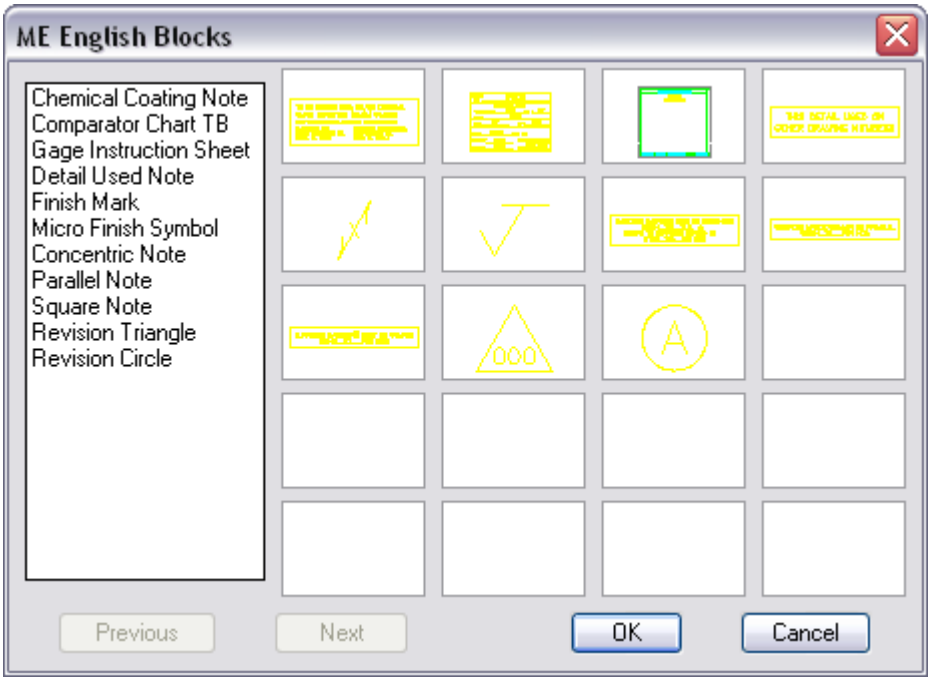
Change Cen. Sect. Line

This function changes properties of selected center section line.



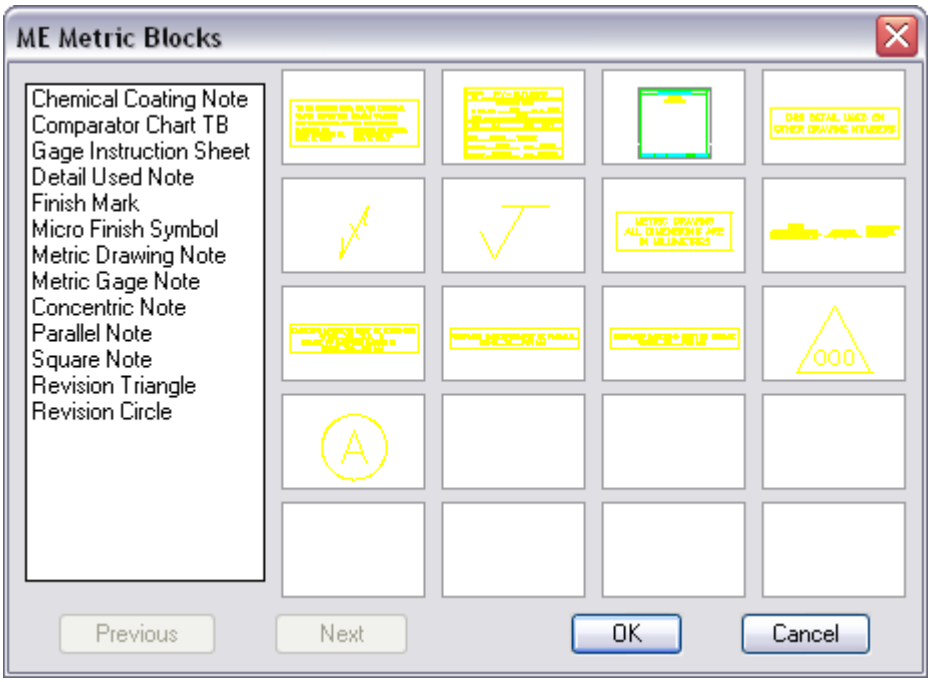
Standard English Blocks

The menu allows insertion of selected standardized defined English drawing blocks.



Standard Metric Blocks

The menu allows insertion of selected standardized defined Metric drawing blocks.



About ME Drawing Toolkit

Displays the loaded version of the ME Drawing Toolkit

APPENDIX

AutoCAD Default Layer Settings (**Layer Settings**)

```
(defun setlayers ()
   (setq cdeo (getvar "CMDECHO"))
   (setvar "cmdecho" 0)
   (command "._layer" "_C" "7" "0"
         "M" "HID" "C" "6" "HID" "LT" "HIDDEN" "HID"
         "M" "CEN" "C" "4" "CEN" "LT" "CENTER" "CEN"
         "M" "CUT" "C" "135" "CUT" "LT" "PHANTOM" "CUT"
         "M" "CCUT" "C" "135" "CCUT" "LT" "CENTER" "CCUT"
         "M" "DIMS" "C" "2" "DIMS" "LT" "CONTINUOUS" "DIMS"
         "M" "HATCH" "C" "5" "HATCH" "LT" "CONTINUOUS" "HATCH"
         "M" "OBJ_BRK" "C" "1" "OBJ_BRK" "LT" "CONTINUOUS" "OBJ_BRK"
         "M" "DIM_BRK" "C" "2" "DIM_BRK" "LT" "CONTINUOUS" "DIM_BRK"
         "M" "REF" "C" "202" "REF" "LT" "PHANTOM" "REF"
         "M" "PART" "C" "12" "PART" "LT" "PHANTOM2" "PART"
         "M" "PART2" "C" "30" "PART2" "LT" "PHANTOM2" "PART2"
         "M" "PART3" "C" "190" "PART3" "LT" "PHANTOM2" "PART3"
         "M" "VIEW_BNDS" "C" "253" "VIEW_BNDS" "LT" "PHANTOM" "VIEW_BNDS"
         "M" "BORDER" "C" "90" "BORDER" "LT" "CONTINUOUS" "BORDER"
         "M" "CONTROLS" "C" "7" "CONTROLS" "LT" "CONTINUOUS" "CONTROLS"
         "M" "BORDER_TXT" "C" "130" "BORDER_TXT" "LT" "CONTINUOUS" "BORDER_TXT"
         "M" "OBJ" "C" "3" "OBJ" "LT" "CONTINUOUS" "OBJ" "")
   (setvar "cmdecho" cdeo)
   (princ)
)
```

AutoCAD Default English Parameters (**English Settings**)

```
(defun setenglish ()
   (setq cdeo (getvar "CMDECHO"))
   (setvar "cmdecho" 0)
   (setvar "aunits" 1)
   (setvar "auprec" 2)
   (setvar "blipmode" 0)
   (setvar "cecolor" "bylayer")
   (setvar "celtype" "bylayer")
   (setvar "chamfera" 0.125)
   (setvar "chamferb" 0.125)
   (setvar "cmlscale" 0.5)
   (setvar "coords" 1)
   (setvar "dimalt" 0)
   (setvar "dimaltd" 2)
   (setvar "dimaltf" 25.4)
   (setvar "dimaso" 1)
;;; 2002 vars
;;;    (setvar "dimassoc" 1)
;;;    (setvar "dimlwd" -1)
;;;    (setvar "dimlwe" -1)
;;; 2002 vars
   (setvar "dimasz" 0.125)
   (setvar "dimcen" 0.0625)
```

```
    (setvar "dimclrd" 256)
    (setvar "dimclre" 256)
    (setvar "dimclrt" 256)
    (setvar "dimdli" 0.25)
    (setvar "dimexe" 0.09375)
    (setvar "dimexo" 0.0625)
    (setvar "dimgap" 0.0625)
    (setvar "dimlfac" 1.000)
    (setvar "dimrnd" 0.0000)
    (setvar "dimsho" 1)
    (setvar "dimtad" 0)
    (setvar "dimtih" 1)
    (setvar "dimtoh" 1)
    (setvar "dimtxt" 0.125)
    (setvar "dimtzin" 4)
    (setvar "dimunit" 2)
    (setvar "dimzin" 4)
    (setvar "dragmode" 2)
    (setvar "donutid" 0.0)
    (setvar "donutod" 0.125)
    (setvar "expert" 4)
    (setvar "fillmode" 1)
    (setvar "filletrad" 0.125)
    (setvar "gridmode" 0)
;   (setvar "gridunit" '(1.0 1.0))
    (setvar "highlight" 1)
    (setvar "insbase" '(0.0 0.0 0.0))
    (setvar "limcheck" 0)
    (setvar "lunits" 2)
    (setvar "luprec" 8)
    (setvar "menuecho" 1)
    (setvar "measureinit" 0)
    (setvar "measurement" 0)
    (setvar "mirrtext" 0)
    (setvar "orthomode" 1)
    (setvar "qtextmode" 0)
    (setvar "regenmode" 1)
    (setvar "sketchinc" 0.1000)
    (setvar "snapbase" '(0 0))
    (setvar "snapmode" 0)
    (setvar "snapstyl" 0)
    (setvar "snapunit" '(0.125 0.125))
    (setvar "ucsicon" 0)
    (setvar "unitmode" 0)
    (command "._viewres" "_Y" "2000")
    (command "._style" "standard" "simplex" "" "" "" "" "" "")
    (setvar "cmdecho" cdeo)
    (princ)
)
```

AutoCAD Default Metric Parameters (**Metric Settings**)

```
(defun setmetric ()
   (setq cdeo (getvar "CMDECHO"))
   (setvar "cmdecho" 0)
   (setvar "aunits" 1)
   (setvar "auprec" 2)
   (setvar "blipmode" 0)
   (setvar "cecolor" "bylayer")
   (setvar "celtype" "bylayer")
   (setvar "chamfera" 3.000)
   (setvar "chamferb" 3.000)
   (setvar "cmlscale" 12.5)
   (setvar "coords" 1)
   (setvar "dimalt" 0)
   (setvar "dimaltd" 2)
   (setq altf (/ 1.0 25.4))
   (setvar "dimaltf" altf)
   (setvar "dimaso" 1)
;;; 2002 vars
;;;    (setvar "dimassoc" 1)
;;;    (setvar "dimlwd" -1)
;;;    (setvar "dimlwe" -1)
;;; 2002 vars
   (setvar "dimasz" 3.000)
   (setvar "dimcen" 1.500)
   (setvar "dimclrd" 256)
   (setvar "dimclre" 256)
   (setvar "dimclrt" 256)
   (setvar "dimdli" 6.000)
   (setvar "dimexe" 2.000)
   (setvar "dimexo" 1.500)
   (setvar "dimgap" 1.500)
   (setvar "dimlfac" 1.000)
   (setvar "dimrnd" 0.0000)
   (setvar "dimsho" 1)
   (setvar "dimtad" 0)
   (setvar "dimtih" 1)
   (setvar "dimtoh" 1)
   (setvar "dimtxt" 3.000)
   (setvar "dimtzin" 0)
   (setvar "dimunit" 2)
   (setvar "dimzin" 0)
   (setvar "dragmode" 2)
   (setvar "donutid" 0.0)
   (setvar "donutod" 3.000)
   (setvar "expert" 4)
   (setvar "fillmode" 1)
   (setvar "filletrad" 3.000)
   (setvar "gridmode" 0)
;    (setvar "gridunit" '(25 25))
   (setvar "highlight" 1)
   (setvar "insbase" '(0.0 0.0 0.0))
```

```
    (setvar "limcheck" 0)
    (setvar "lunits" 2)
    (setvar "luprec" 6)
    (setvar "menuecho" 1)
    (setvar "measureinit" 1)
    (setvar "measurement" 1)
    (setvar "mirrtext" 0)
    (setvar "orthomode" 1)
    (setvar "qtextmode" 0)
    (setvar "regenmode" 1)
    (setvar "sketchinc" 1.000)
    (setvar "snapbase" '(0 0))
    (setvar "snapmode" 0)
    (setvar "snapstyl" 0)
    (setvar "snapunit" '(3.0 3.0))
    (setvar "ucsicon" 0)
    (setvar "unitmode" 0)
    (command "._viewres" "_Y" "2000")
    (command "._style" "standard" "simplex" "" "" "" "" "" "")
    (setvar "cmdecho" cdeo)
    (princ)
)
```