Demo Script for Modelview Professional

Key Message:

Pentium (R) Pro processor accelerates 3-D modeling and engineering application, catapulting today's applications to new levels of performance, as well as enabling a new set of high-end applications with new levels of quality.

Supporting Message:

Modelview allows designers to go beyond wireframe modeling, and artists to go beyond primitive realism. Modelview allows realistic 3-D object creation, with sophisticated lighting, shading, texturing, and manipulation of 3-D objects and environments. All of this creation happening blazingly fast with the Pentium (R) Pro processor offering the user benefits in combination of savings of time and higher quality content.

Setup:

You will need the 32-bit version of WinZip to extract this demo. An evaluation copy may be downloaded from http://www.winzip.com on the Internet.

Install Modelview from modelv.ins directory.

The serial number required to install ModelView is 002 473 21 000 665.

Strongly Recommend: OpenGL acceleration (e.g., Intergraph GLZ, GLI or Accelgraphics AG300, AG500)

Running the Demo:

- Bring up Viewfinder in the ModelView program group.
- Select "trumpet1.dgn" file in the /ppro_ws2/modelv.ins/trumpet directory. Hit the check mark to signal "OK".

Here emphasize how in the near past only wireframe models could be built and viewed due

to technology performance limitations. But now with the performance of Pentium Pro processor, we can add shading to our model making it more realistic.

- Select "Display Shaded image in Viewfinder Window" icon. It's the 2nd icon from top, under the icon that looks like it has a group of wireframe building blocks on it (cube, cone, sphere, etc.)
 - Select Pattern Off. (On and off can be toggled by floating the cursor in left and right part of the icon.)
- Select "Edit Material Table" icon, the one above the Exit icon (with an exit door).
 - Select "Browse" for Palette File; select "ppro.pal" in \ppro_ws2\modelv.ins\palettes.
 - Select "vellow.reflect" in the Material name.
 - Select "all" under both Element Levels and Element Color.

- Select "trumpet1.dgn" in the Files section.
- Select "Create/Edit definition".
 - Here you can change base color and other properties of the material like:

diffuse,

specular, finish, reflect, amb reflect, transmit, refract, and pattern weight.

- A pattern is already defined, an image of the Pentium Pro processor, and you

can

make it more or less apparent using the slider of the pattern weight property.

- Hit "OK" when done.
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- Close Material Editor.
- Turn Pattern On using the "Display Shaded image in Viewfinder Window" icon.

You'll see the material with all our defined properties wrap around our trumpet object. Emphasize quickness and complexity of computations involved here.

- To create a simple animation:

We'll create a simple animation, moving our view of the trumpet half circle from the front to

the back.

- Move the view cone (in the top right window) directly in front of the trumpet, so we're looking into the trumpet's mouth.
- Select "Create/Modify keyframe list"
 - Select "1" as Frame #.
 - Select "d1" as File name. (File name can be anything.)
 - Click OK.
- Move the view 1/4 circle counter-clockwise using cone in right window again.
 - Select "Create/Modify keyframe list"
 - Select "10" as Frame #.
 - Select "d10" as File name. (File name can be anything.)
 - Click OK.
- Move the view 1/4 circle counter-clockwise using cone in right window again.
 - Select "Create/Modify keyframe list"
 - Select "20" as Frame #.
 - Select "d20" as File name. (File name can be anything.)
 - Click OK.
- Move the view 1/4 circle counter-clockwise using cone in right window again.
 - Select "Create/Modify keyframe list"
 - Select "30" as Frame #.
 - Select "d30" as File name. (File name can be anything.)
 - Click OK.
- Move the view 1/4 circle counter-clockwise using cone in right window again.
 - Select "Create/Modify keyframe list"
 - Select "40" as Frame #.
 - Select "d40" as File name. (File name can be anything.)
 - Click OK.
- To play the animation, press "Play frames forward" triangular icon. (You can also use "step frame forward" and

"go to frame #" to move through the animation.)

Emphasize here that a real-time rendering of the animation is happening. This is not a simple 2-D .avi file but a 3-D model through which we have defined a path. Each frame

is

rendered real-time. The artist or engineer has the luxury to experiment with different animations before selecting a final, ray traced animation which is more time consuming. This was a privelage not available in the past, but is with the level of performance delivered

by the Pentium Pro processor.

- If you wish to raytrace render any view in Viewfinder, you can do so using the raytrace render icon, 2 below the "Display Shaded image in Viewfinder Window" icon.