

Demo Script for Photoshop

Setup

This demo may be run on a multiprocessor system and will show the benefits of MP while running various Photoshop filters. To do this, you can bring up Performance Monitor from Administrative tools in Program Manager to view processor time.

This demo should be run on a system with a graphics card with fast raster capabilities. We have often used the ATI Pro Turbo PCI card.

DEMO1

Key Message:

PENTIUM (R) PRO processor provides the performance to make the manipulation of large true color images fast.

Running the Demo:

italics typeface - these are notes to the demo person, i.e., not an action or soundbyte.

Actions:

These first actions should be done before the customer arrives since they take some time. Photoshop may then be left on screen or minimized.

- Double click on the Photoshop icon to launch Photoshop.
- Open the following files from the \PPRO_WS2\photoshp.ins\DEMOS\demo1 directory: EAGLE.TGA, FLAG.TGA, LIBER.TGA, and NYC.TGA. Hit [CTRL] and [+] keys simultaneously for each image window to get a zoom of 1:1 if this is not already the case.
- Move any tool palettes to the bottom of the screen as necessary. Don't close them.
- If you have a multiprocessor system, bring up the Windows NT Performance Monitor. Add a counter for the processor time for each CPU. Change the chart options to display a histogram, and set the window to always be on top. Minimize or downsize the Performance Monitor.

SoundByte:

- Photoshop is one of the most popular, powerful and performance hungry applications in use in the imaging and pre-press market. It is often used on large images which can take quite some time to process, but PENTIUM (R) PRO processor makes it a much quicker proposition to do this. What we are going to do is to create a composite image out of several images.

Actions:

These steps should be practiced until they become natural and quick. It takes a little while to get to the point that you can do this without thinking to much about it, and if you are able to do that it will look much smoother and better. It will look effortless to create something very unique and interesting out of many unrelated images.

Also, to get an idea of what the end result will look like, see the image in FINALIMG.PSD.

WARNING: Opening PSD file formats of demo files on this CD may cause Photoshop to crash. Avoid using .psd formats for all other demo images. This is why we are using .tga formats for the other images. For finalimg, .tga was not available at time of publishing.

- Double click on the "Magic Wand" tool (2nd from top on left side of the toolbar). In the Magic Wand options window, set the tolerance to 20.
- Click on the sky in NYC.TGA to select it.
- Select menu item Select->Inverse.

- Click on the move tool (next to magic wand; four arrow button).
- Drag the selected city skyline on top of the bottom part of the flag image.
- In the layers window in the lower right you will see a "Floating Selection". Double click on this and click OK in the window that pops up. This has created a new layer in the FLAG.TGA image.
- Bring up the EAGLE.TGA image.
- Select the magic wand and set the tolerance to 60.
- Click on the background behind the eagle. Part of the background will be selected. Now, while holding down the shift key, select the remaining pieces of the background.
- Select menu item Select->Inverse.
- Select the move tool and drag the eagle to the FLAG.TGA image near the statue of liberty.
- In the layers window, make another new layer out of the new floating selection.
- Still in the layers window, drag your new layer item between the other two layers. This will change the stacking order of the layers and put the eagle behind the skyline.
- Bring up the LIBER.TGA image.
- Select the magic wand and set the tolerance to 15.
- Click on the background behind the Statue of Liberty. Make sure the entire background is selected by holding down Shift key and adding selections as necessary.
- Select menu item Select->Inverse.
- Select the move tool and drag the statue to the FLAG.TGA image on the left side.
- In the layers window, make another new layer out of the new floating selection and make sure it is the top layer.
- Still in the layers window, make sure the new statue layer is selected and change the opacity slider to 50%.

SoundByte:

Note how I was able to quickly combine all of these images together without any delay at all and create a new, more artistic image. The PENTIUM (R) PRO processor allows these manipulations to take place as quickly as the artist can think of them. It can make Photoshop into a real-time artists tool. But what about the often slow filters of Photoshop?

Actions:

- Bring up the Performance Monitor
- In the layers window, select the flag layer (should be the background).
- Select the menu item Filter->Blur->Radial Blur.
- Set the blur method to "Zoom" and the amount to 20.
- Click OK and watch the Performance Monitor.

SoundByte:

Notice how the Performance Monitor shows both (all) CPUs fully utilized during the filter operation. Not only does the performance of a single PENTIUM (R) PRO processor make Photoshop fast, but for the slower operations in Photoshop which are threaded, the PENTIUM (R) PRO processor's multiprocessing capabilities can significantly increase the performance.

DEMO 2

Key Message:

PENTIUM (R) PRO PROCESSOR provides high-performance necessary for exciting CPU-intensive multimedia applications like Photoshop, saving time and money for professional artists and affording them to be more creative and productive.

Supporting Message:

PENTIUM PRO PROCESSOR runs the most CPU-intensive functions so quickly, it will keep

even

the most impatient Photoshop user happy! With the performance of a PENTIUM PRO PROCESSOR, image modifications can be done so quickly it affords a user to experience a wide gamut of possibilities within seconds.

Result: more choice, better selection, better final product.

Running the Demo:

italics - note to the demoer, i.e., not an action or soundbyte.

Notes: Although this demo is not automated, it would make a good candidate for a self-running looping demo. Microsoft Test can be used to automate the demo.

Actions:

- Open Photoshop, maximize it.

SoundByte:

In this part, we apply special effects to our image to show how quickly some of the most interesting and performance demanding functions execute, allowing an artist to be even more creative and productive than ever before. Or the time saved can be used to increase the quality of the artist's final product. Emphasis here is on quickness; see Supporting Message.

Actions:

- Open fish.tga or butterfl.bmp. (Look in \ppro_ws2\photoshp.ins\demos\demo2.)
- Maximize it.

- Image/Image Size

- Enter a value of 10 or 11 for width to increase the size of the picture.
- Click OK.

- Image/Map/Invert (CTRL-I)

- Undo (CTRL-Z)

- Image/Map/Equalize (CTRL-E)

- Undo (CTRL-Z)

-Image/Adjust/Curves (CTRL-M)

- Using mouse move the linear curve by clicking and dragging any point on the curve to new positions without letting go of the mouse button. Then click on 2-3 different points on this curve. Each click will add a point on curve. Each point can now be independently moved almost anywhere on the grid to change the shape of the curve.
-Click cancel to exit curves without affecting changes.

-Image/Adjust/Hue-Saturation (CTRL-U)

- Change Hue to a couple of different values using the slider.
- Change Saturation to a couple of different values using the slider.
- Click cancel to exit Hue-Saturation without affecting changes.

- Click on Magic Wand with tolerance of about 50. Use mouse/magic wand to click in middle of fish or butterfly. (Double-click on magic wand tool to get options to select tolerance.)

-Image/Adjust/Variations

- Make sure Midtones is selected.
- Make sure maximum coarse value is selected.
- Click twice on "More Red" selection.
- Click OK.

-Deselect fish or butterfly by clicking magic wand on selected area.

- Select/All

SoundByte:

The filters which we will apply to our entire picture are especially CPU-intensive. These typically take a very long time to execute, about twice as long on a Pentium (R) processor based system, but we see here they execute in a matter of seconds. Many complex calculations for each pixel in

the image are being done at a rate that makes it very desirable for even the most impatient user using a Pentium processor system today.

-Filter/Sharpen/Unsharp Mask

- Increase Amount to about 250%.

- Click OK.

-Toggle undo/do by CTRL-Z to show sharpened effect.

-Filter/Render/Lighting Effects

- Using the mouse move one of the points on the circumference of the elliptical path, changing the scope of area the light covers. Make it smaller and circular.

- Change Style of light to Blueomni.

- Click OK.

-Filter/Render/Difference Clouds

-File/Close (CTRL-W)

-Click "No" to not save the result.