Subject: Re: linux XF86 X visuals, IDL 16-bit blues
Posted by George McCabe on Thu, 27 Jan 2000 08:00:00 GMT

liam,

it works. unix and X are so powerful. your help is greatly appreciated.

since my :1 display is meant for IDL, i wrote a few commands in a shell
script for starting the 8 bit Xserver, IDL, and other programs which make
for a nice development environment.

xterm -display :1 -e idl &

...

it's a good solution. thanks again, george

--
George McCabe (Raytheon ITSS)
NASA / Goddard Space Flight Center / Code 693 / Greenbelt, MD
voice: (301)286-8283, fax: (301)286-0212
george.mccabe@gsfc.nasa.gov

Subject: Re: linux XF86 X visuals, IDL 16-bit blues
Posted by Liam E. Gumley on Thu, 27 Jan 2000 08:00:00 GMT

George McCabe wrote:

> there have been quite a few posts to do with IDL and the X device.
> thanks to (especially dave fanning and liam gumley) i'm beginning to
> understand IDL's use of X, but not enough to be able to configure it
> (satisfactorally) in linux6.
>
> my video hardware (laptop) supports 64K colors. the linux Xserver
> installs with the TrueColor, depth 16 visual. as i've been told ,IDL
> just won't work with 16 bit visuals, but RSINC is unable to tell me how
> to add IDL compatible visuals to X. is there any XF86 expertise here.
> i would be happy limiting IDL to 8 bits but i don't want to run the
> whole system with only 256 colors.

George,

I think the best approach is to start a second X session in 8-bit mode.
Here is some advice I received from our local Linux guru:

---begin quote---

Okay, here's the simple 2-minute recipe for starting a second X session, using a different window manager, without exiting your original session..

Assuming 'fvwm95' is the window manager you want to use for your second X: In your .Xclients, you add near the top

```
if [ $DISPLAY == :1 ]; then
   exec fvwm95
fi
```

This causes startx to branch into the alternate window manager for :1, to prevent gnome or KDE palette-sucking (as well as to prevent two simultaneous desktops from clobbering each others' settings).

You'll probably want to use FVWM2 or FVWM95, which can be found at contrib.redhat.com as RPMS. (I recommend grabbing the Source RPM and using rpm --rebuild to make proper binaries for your OS version. The binary RPM will land in /usr/src/redhat/RPMS/i386.) It shouldn't be a problem to have two simultaneous FVWM sessions, since it's not really a 'desktop environment' level of complexity (i.e. it doesn't maintain its own configuration files).

Then, provided that your XF86Config file indicates properly that your hardware is capable of 8 bit modes, you should be able to

```
startx -- :1 -bpp 8
```

from anywhere, including xterms in :0. X should merrily startup on the second virtual graphics console. You can then swap between the two X's with CTRL-ALT-F7 (:0) and CTRL-ALT-F8 (:1) .

When you're done, you can dump out of the second X by properly exiting that window manager, or by using ctrl-alt-backspace to kill it.
---end quote---

Please let me know if you have to modify the recipe.

Cheers,
Liam.

--
Liam E. Gumley
Space Science and Engineering Center, University of Wisconsin-Madison
http://cimss.ssec.wisc.edu/~gumley

Subject: Re: linux XF86 X visuals, IDL 16-bit blues
Posted by Liam E. Gumley on Fri, 28 Jan 2000 08:00:00 GMT
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John-David T. Smith <jdsmith@astro.cornell.edu> wrote in message
news:3892266F.910D10B6@astro.cornell.edu...
> XF86 4.0, due out "real soon now", will support multiple resolutions
within a
> sigle X session (called overlays), so that you can run an 8-bit IDL inside
a
> higher bit-depth environments, as you have been able to do with Solaris,
SGI
> machines, and commercial X-servers for quite a long time.

I sincerely hope that XFree86 version 4.0 offers some performance
improvements over the current version. I'm running Redhat 6.1 on a 500 Mhz
Pentium III, 512 MB RAM, and a Viper V550 (TNT 32MB), and the X server
performance is just woeful. I can't even grab a window and drag it around
the screen smoothly. I'm pretty sure it's not the hardware because we've
tried it on two separate boxes, each with different CPU and graphics
hardware (but the same version of Redhat and XFree86), and seen the same
results. This is particularly annoying in IDL, because animation is just
about impossible. As a result, we're testing AcceleratedX.

Cheers,
Liam.
http://cimss.ssec.wisc.edu/~gumley

Subject: Re: linux XF86 X visuals, IDL 16-bit blues
Posted by John-David T. Smith on Fri, 28 Jan 2000 08:00:00 GMT
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George McCabe wrote:
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> whole system with only 256 colors.

>
> assistance is appreciated, thanx, george mccabe

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JD

--
J.D. Smith |*| WORK: (607) 255-5842
Cornell University Dept. of Astronomy |*| (607) 255-6263
304 Space Sciences Bldg. |*| FAX: (607) 255-5875
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Subject: Re: linux XF86 X visuals, IDL 16-bit blues
Posted by Bernard Puc on Mon, 31 Jan 2000 08:00:00 GMT
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Liam Gumley wrote:
>

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> hardware (but the same version of Redhat and XFree86), and seen the same
> results. This is particularly annoying in IDL, because animation is just
> about impossible. As a result, we're testing AcceleratedX.

My linux machine runs Red Hat 6.1 and XFree86, Pentium III, 384MB RAM, Matrox G200 w/16MB graphics card. I've always felt that the graphics were incredibly fast. I can, at the least, drag a window smoothly around the screen with ease. I suspect it could be a combination of configuration and chipset support in XFree86. BTW, my system was purchased from a Linux vendor and came with Linux installed and X configured.

--
Bernard Puc   AETC, INC.
bpuc@va.aetc.com   1225 Jefferson Davis Highway #800
(703) 413-0500   Arlington, VA 22202

Subject: Re: linux XF86 X visuals, IDL 16-bit blues
Posted by John-David T. Smith on Tue, 01 Feb 2000 08:00:00 GMT
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Liam Gumley wrote:
>
> John-David T. Smith <jdsmith@astro.cornell.edu> wrote in message
> news:3892266F.910D10B6@astro.cornell.edu...
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> hardware (but the same version of Redhat and XFree86), and seen the same
> results. This is particularly annoying in IDL, because animation is just
> about impossible. As a result, we're testing AcceleratedX.

AccelX makes some big claims on the web site, but I've only experienced crashes
when trying to get it to run... Let us know how you fare. You might try a
"graphics_test3" before and after.

JD

--
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