Subject: Re: Looking for general purpose image display.
Posted by davidf on Thu, 15 May 1997 07:00:00 GMT
View Forum Message <> Reply to Message

Dyer Lytle <dlytle@as.arizona.edu> writes:

> I'm about to write a general purpose image display widget in IDL
> similar in functionality to SAOimage. I figure something like
> that may already have been written in IDL so I thought it best to
> query this newsgroup before I re-invent the wheel.
>
> Any leads on a general image display program?

I don't know what SAOimage does, but I do know there is a lot
of code out and about that can help build something like this.
Many of the programs on my web page were designed to show
someone how to build an application like this. (My original goal
was to teach people how to build the poor man's ENVI, if you want
to know the truth.)

Ray Sterner has some great programs on his Johns Hopkins APL
site. Be sure to have a look at XDISPLAY by Phil Williams before you
go messing around with ROI functionality. Phil probably has exactly
what you want. You can find other links to great software on
my web page.

To get off the main subject for a moment, this whole idea
of people writing and sharing generally useful programs with
each other interests me. I have had several conversations
in the past few weeks with "independent" IDL programmers
who manage to make a living (a *meager* living for those
of you who think this life may be for you!) nibbling around
the edges of RSI's business.

About the only thing we have in common is a low tolerance
for office politics and the idea that we can write damn good
IDL programs. Some of these friends of mine stay up half the
night after they put the kids to bed writing IDL programs
because they *like* to! And here is the thing: they could
probably be persuaded to neglect their health and family life
even more if they could just get *paid* for what they do.

Not much. I'm not talking huge goverment salaries here, now. :-)
But a little. Something to make it worthwhile to them.

What I have been thinking about is a sort of IDL Programmers
Clearing House or Cooperative. Something a step or two above
the User Contributed Library that comes with IDL. Maybe with

some kind of enforced programming and documentation standards.
Perhaps with some kind of modest guarantee of support and help
to go along with the programs.

The question, of course, is how do the contributors get paid? I've been
thinking along the lines of a shareware model, where each program
like the image display widget Dyer is talking about would cost on the
order of $25-$30. Would you pay for it? Would you pay more?
Less? Would you steal it and give it away to your colleagues?
Would you pay $200 for the Deluxe version?

I'm curious to know how this would be received in the larger IDL
community. I do think it would make better programs available
to all of us and I think it would help new users get work done
much faster. As we move into the IDL 5.0 world, programs
are going to become a lot more powerful, but they are also
going to require a lot more effort to write. It would be nice
if all of us didn't have to continually reinvent the wheel.

I'd like to hear your thoughts.

Cheers!

David

David Fanning, Ph.D.
Fanning Software Consulting
Customizable IDL Programming Courses
Phone: 970-221-0438 E-Mail: davidf@dfanning.com
Coyote's Guide to IDL Programming: http://www.dfanning.com

Subject: Re: Looking for general purpose image display.
Posted by mgs on Fri, 16 May 1997 07:00:00 GMT
View Forum Message <> Reply to Message

In article <davidf-ya02308000150597205416001@news.frii.com>,
davidf@dfanning.com (David Fanning) wrote:

> About the only thing we have in common is a low tolerance
> for office politics and the idea that we can write damn good
> IDL programs. Some of these friends of mine stay up half the
> night after they put the kids to bed writing IDL programs
> because they *like* to! And here is the thing: they could
> probably be persuaded to neglect their health and family life
> even more if they could just get *paid* for what they do.

Hi David -

I don't remember giving you rights to my life story. A year of 100 hour
work weeks plays havoc with family life (try to remember when you had a
life).

> Not much. I'm not talking huge goverment salaries here, now. :-)
> But a little. Something to make it worthwhile to them.

I'm still trying to settle down after the "Huge Government salary" line.
Going from my meager living last year as a self-employed IDL programmer to
a nice government job only cost me a 50% cut in pay! The ideal life for me
would involve a cabin in Montana (kinda like the Unabomber's) where someone
would slide an envelope of cash under the doorway every month and I'd
blister a modem churning out code for them. If someone wanted to set me up
in a place like the picture on Page 28 of Log Homes Illustrated '97 Annual
Buyer's Directory, I'd blister an ATM line.

> What I have been thinking about is a sort of IDL Programmers
> Clearing House or Cooperative. Something a step or two above
> the User Contributed Library that comes with IDL. Maybe with
> some kind of enforced programming and documentation standards.
> Perhaps with some kind of modest guarantee of support and help
> to go along with the programs.

I think it's a great idea. I wrote a PV-WAVE programming standard at my
last contract. No reason it couldn't be converted over to an IDL standard
that a group could live with. I've also grabbed several User Contributed
programs and used them directly or ported them to PV-WAVE or enhanced them
beyond the original intent. No doubt in my mind I would pay for the
starting point they provided. The tougher part would be to get an employer
to petty cash something along those lines.

> The question, of course, is how do the contributors get paid? I've been
> thinking along the lines of a shareware model, where each program
> like the image display widget Dyer is talking about would cost on the
> order of $25-$30. Would you pay for it? Would you pay more?
> Less? Would you steal it and give it away to your colleagues?
> Would you pay $200 for the Deluxe version?

As you allude to on many occasions in this newsgroup it would be nice to
get paid for your efforts, especially when you take time away from family
and efforts that are paying, to help out a fellow programmer. I used to be
very prolific on this newsgroup, but had to leave the newsgroups alone when
things got too hectic last year with my small business. Your priorities
have to be adjustable. I wrote a few freeware programs for the
comp.unix.shell newsgroup a few years back. Support for freeware can take
quite a bit of time, especially when it's for UNIX.

> I'm curious to know how this would be received in the larger IDL
> community. I do think it would make better programs available
> to all of us and I think it would help new users get work done
> much faster. As we move into the IDL 5.0 world, programs
> are going to become a lot more powerful, but they are also
> going to require a lot more effort to write. It would be nice
> if all of us didn't have to continually reinvent the wheel.

Exactly. OOP means less work after a long time, but more work in the
initial planning stages and certainly when a language changes to support a
new model. There will be a lot of new programs/modules showing up as the
interest in OOP for IDL increases.

Maybe this is an opportunity to mention that Ray Sterner has passed the IDL
FAQ on to me. I'll be updating and posting it some time next week. It will
also have a new home on my web site temporarily and perhaps a government
site in the very near future.

> David

Regards,

--
Mike Schienle   Interactive Visuals
mgs@sd.cybernex.net   http://ww2.sd.cybernex.net/~mgs/

Subject: Re: Looking for general purpose image display.
Posted by Paul.Tildesley on Fri, 16 May 1997 07:00:00 GMT
View Forum Message <> Reply to Message

I very much like David Fannings suggestion of an IDL programmers cooperative
writing shareware code. I know that I would pay for good routines (and David's
routines are good). The only comment that I would make, being part of a
Government research organisation, is that it would be great if there was an
easy way to pay, for example by credit card. I think that more people will
pay for shareware if it is easy to do so.

Regards,

Paul.

Paul Tildesley/CSIRO Division of Marine Research/Paul.Tildesley@marine.csiro.au

---

Subject: Re: Looking for general purpose image display.

Dyer Lytle wrote:
>
> Hi all,
>
> I'm about to write a general purpose image display widget in IDL
> similar in functionality to SAOimage. I figure something like
> that may already have been written in IDL so I thought it best to
> query this newsgroup before I re-invent the wheel.
>
> Any leads on a general image display program?
>
> Many thanks,
>
> -Dyer
>
> --
> -----------------------------
> Dyer Lytle
> dlytle@as.arizona.edu
> http://tigger.as.arizona.edu/~dlytle
> HST NICMOS Project
> Steward Observatory
> University of Arizona
> -----------------------------

I simply use the following:


```
PRO Sao, image, verbose=verbose

  On_Error, 2                 ; return to the caller of the
function

  IF ( N_params() NE 1 ) THEN message, 'Syntax - sao, image, [/verbose]'

  imsize = size(image)
  IF ((imsize(0) GT 2) OR (imsize(0) EQ 0)) THEN BEGIN
    message, 'Image does not have the correct dimension'
  ENDIF

  IF (imsize(0) EQ 1) THEN BEGIN
    image = reform(image,sqrt(imsize(1)),sqrt(imsize(1)))
  ENDIF

  options=''
  IF n_elements(verbose) NE 0 THEN BEGIN
```

```
  options=options+' +v'
  back=''
ENDIF ELSE BEGIN
  options=options+' -v'
  back=' &'
ENDELSE

 writefits, 'saotmp.fits', image
 spawn, '(saoimage'+options+' -ll -zero -fits saotmp.fits; rm -f
saotmp.fits 2>/dev/null)'+back

END
```

--
Michel Tallon   CRAL, Observatoire de Lyon
mtallon@obs.univ-lyon1.fr   69561 Saint-Genis-Laval cedex
http://www-obs.univ-lyon1.fr/   France

Subject: Re: Looking for general purpose image display.
Posted by Lucio Chiappetti on Tue, 20 May 1997 07:00:00 GMT
View Forum Message <> Reply to Message

On Thu, 15 May 1997, Dyer Lytle wrote:

> I'm about to write a general purpose image display widget in IDL
> similar in functionality to SAOimage. I figure something like

 Why do you want to do that ? SAOimage is perfectly fine as it is,
 and is a standalone, free tool. Does not require licenses, is quite
 small and precompiled ...

> query this newsgroup before I re-invent the wheel.

 Although I quite like reinventing wheels :-) particularly when it
 involves inventing new stainless steel wheels for cars, or small
 plastic wheels for trolleys instead of wooden ox-cart wheels, if you
 follow my metaphor, I do not see much the case here :

 I actually use essentially three families of programs :

  - my own Fortran programs for "production" analysis, and also for
    some quick look display of data (a little Xlib-based set, mainly
    plots, although can do images as well)

  - although I have my image display capabilities, I prefer SAOimage for
    quick look display of images

_ I use IDL (as a language, with little pieces of code I keep in
  scratchpad files, not necessarily always full-fledged .pro files)
  mainly for :

  - testing preliminary algorithms before doing the final coding
    in Fortran

  - doing "one off" massaging to data

  - doing publication-quality plots (this includes plotting images
    in more-or-less fancy ways which would be too costly to reprogram,
    like contour or isometric plots ; it also includes some greyscale
    or colour display of images in ps files, although I'm quite
    unsatisfied of the way IDL handles this)

Of course this does not mean YOU may not have valid reasons of your own to do
what you plan.

-- ---------------
Lucio Chiappetti - IFCTR/CNR - via Bassini 15 - I-20133 Milano (Italy)
-- ---------------
Fuscim donca de Miragn   E tornem a sta scio' in Bregn
Che i fachign e i cortesagn   Magl' insema no stagn begn
Drizza la', compa' Tapogn   (Rabisch, II 41, 96-99)
-- ---------------
For more info : http://www.ifctr.mi.cnr.it/~lucio/personal.html
-- ---------------