Subject: Re: opinions needed on IDL, PV-WAVE
Posted by davidf on Wed, 03 Dec 1997 08:00:00 GMT
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Jason Fritz (j.p.fritz@ieee.org) writes:

> How difficult is it for someone to learn either
> of these 4GLs to develop stand alone apss with nice
> GUIs?

Uh, do you mean *with* or *without* my new IDL book?

Seriously, it you really mean "stand alone" applications,
then neither IDL or PV-Wave is going to do you any good.
Both require a license to run. MatLab is the only one of
the three that can generate stand-alone C code, although
I hear that it is not always such great code and there are
some limitations.

I personally think IDL is the cat's meow. At least *most*
of the time. :-)

Cheers,

David

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Coyote's Guide to IDL Programming: http://www.dfanning.com/

Subject: Re: opinions needed on IDL, PV-WAVE
Posted by davidf on Thu, 04 Dec 1997 08:00:00 GMT
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Janko Hauser (jhauser@ifm.uni-kiel.de) provides good advice
and a different perspective when he writes:

> There is a way to see this from another angle. If you want a
> programming enviroment for RAD with a strong numerical and OO and GUI
> and internet background then there is the possibility to use a truly
> OO language with many extensions for all these fields. Python with the
> Numerical extension, TK , Pil (image handling and transformation,
> Opengl, VTK.

Yes, but who wants to learn another (four!?) programming
languages. :-(

Let's just say I ain't that much of a geek.

Cheers,

David

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Subject: Re: opinions needed on IDL, PV-WAVE
Posted by Janko Hauser on Thu, 04 Dec 1997 08:00:00 GMT
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and internet background then there is the possibility to use a truly
OO language with many extensions for all these fields. Python with the
Numerical extension, TK , Pil (image handling and transformation,
Opengl, VTK.

I really can't say much about the OO in IDL or Matlab, but Python does
all this in a very nice way, and for the most parts also efficient.

He, to bring a little bit of an objective view in this :-), there is
also a similar development in the perl camp, but I prefer python for
...

You have no runtime costs, you can deliver the same application on a
very broad spectrum of OS's and architectures and you can use many
different packages from all fields of computing.

Just to give here another view, don't want to start a war.

__Janko

PS: mail me for more information or look at www.python.org

Subject: Re: opinions needed on IDL, PV-WAVE

David Fanning, Ph.D., writes:
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> the three that can generate stand-alone C code, although
> I hear that it is not always such great code and there are
> some limitations.
A couple of additional comments to this point:
The RSI folks have been known to compile an application into an stand-alone executable. However, this is probably not relevant to your goal, since this is a very expensive process. There is a run-time IDL and PV-Wave. As David mentions, it must be licensed on each machine, but one can negotiate fairly reasonable licensing fees for such. So, if 'stand-alone' simply means several people are going to use it in-house, all three packages would probably be o.k.; but if you have numerous users spread around, it could get annoying to deal with the licensing overhead.

Concerning compiling Matlab: There are two levels of compilation available, one that needs Matlab to be running (and puts us then in the same situation w.r.t licensing as with IDL and PV-Wave), and the second that truly generates stand-alone code. Under this latter option, graphics aren't available, and only a subset of the Matlab functionality is available. Thus this won't necessarily meet your needs for generating stand-alone code.

You mention using the net - both IDL and PV-Wave have developed some nice tools in this direction - see their respective WWW sites.

Someday, one of the companies is going to provide a friendlier migration path, where one can develop code in a 4-GL language and be able to easily convert it to a stand-alone application, thus gaining the best of both worlds. I think there's a big market that would be very interested in such a product.

> I personally think IDL is the cat's meow. At least *most*
> of the time. :-)

If object-oriented programming is of concern, I would probably second that, since the RSI folks are making great strides forward in this area now. Otherwise, there are many consideration between the three packages, that aren't easy to summarize. It would be great if someone had time to take on a FAQ on this theme (IDL vs. PV-Wave vs MATLAB). It's a common theme here (perhaps this will someday become the comp.lang.idl-pvwave-matlab newsgroup!).

So, David, where's The Book??? :-)

Best wishes,

David Ritscher

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