
Subject: Numerical Recipes

Posted by [Dave Klassen](#) on Wed, 17 Sep 1997 07:00:00 GMT

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I've been looking for a nice easy way to maximize a fairly complex function using IDL. I know that there are many Numerical Recipes routines built into IDL, but not the one I need. I've used the NR routine called AMOEBA before to minimize a chi-squared function and now I'd like to try to use it to maximize a correlation function.

I was wondering if there were some repository of IDL translations of the NR routines that are *not* built in. I'd really like to avoid translating the FORTRAN code I have if possible.

Thanks!

--

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Subject: Re: Numerical Recipes

Posted by [David Foster](#) on Wed, 17 Sep 1997 07:00:00 GMT

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Dave Klassen wrote:

>

> I've been looking for a nice easy way to maximize a fairly complex
> function using IDL. I know that there are many Numerical Recipes
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> avoid translating the FORTRAN code I have if possible.

>

This might not appeal to you, but one alternative would be to modify the Fortran code slightly so you can call it from IDL using CALL_EXTERNAL. I don't think you would want to translate the NR routines to IDL, as there would be a significant performance cost for most of them.

Dave

--

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~~~~~

Subject: Re: Numerical Recipes
Posted by [Wayne Landsman](#) on Thu, 18 Sep 1997 07:00:00 GMT
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Dave Klassen wrote:

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- > routines built into IDL, but not the one I need. I've used the
- > NR routine called AMOEBA before to minimize a chi-squared
- > function and now I'd like to try to use it to maximize a
- > correlation function.

AMOEBA *is* part of IDL V5.0 (and written in the IDL language). Looking at the code, there doesn't seem to be any reason why it wouldn't work in earlier versions of IDL, once you changed the square bracket subscripts to parentheses.

- > I was wondering if there were some repository of IDL translations
- > of the NR routines that are *not* built in. I'd really like to
- > avoid translating the FORTRAN code I have if possible.

Twelve additional NR routines are available in
<http://idlastro.gsfc.nasa.gov/ftp/pro/math/>

Wayne Landsman landsman@mpb.gsfc.nasa.gov
