
Subject: Re: Connecting GPC to IDL
Posted by [KRDean](#) on Fri, 17 Jun 2011 14:15:21 GMT
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On Jun 17, 6:46 am, Haje Korth <hajeko...@gmail.com> wrote:
> Were you able to successfully compile any of the small example
> programs in the IDL external directory?
>
> On Jun 16, 5:21 pm, kBob <krd...@gmail.com> wrote:
>
>
>
>> On Jun 14, 3:44 pm, kBob <krd...@gmail.com> wrote:
>
>>> On Jun 11, 10:07 am, Michael Galloy <mgal...@gmail.com> wrote:
>
>>>> kBob <krd...@gmail.com> wrote:
>>>> > On Jun 10, 7:52 am, Haje Korth <hajeko...@gmail.com> wrote:
>>>> >> Kelly: I have always found using gcc with IDL on Windows to be a
>>>> >> difficult endeavor. Also, the use of make_dll is optional and in the
>>>> >> past has made life more difficult rather than easier. I suggest
>>>> >> grabbing the free edition of Visual Studio Express and creating the
>>>> >> dll this way. Just remember to export the functions you will be
>>>> >> accessing from IDL. This is definitely an advanced topic, so start
>>>> >> with the simple examples in the external directory of the IDL distro.
>>>> >> Haje
>
>>>> >> On Jun 9, 10:35 am, kBob <krd...@gmail.com> wrote:
>
>>>> >>> On Jun 6, 2:11 pm, kBob <krd...@gmail.com> wrote:
>
>>>> >>>> I would like to use the General Polygon Clipper (GPC) thur IDL.
>
>>>> >>>> This is a software package written in C that is available from
>>>> >>>> Manchester that clips polygons.
>
>>>> >>>> Has anyone implement this in IDL, already?
>
>>>> >>>> I assume MAKE_DLL is the way to go.
>
>>>> >>>> Kelly Dean
>>>> >>>> Milliken, CO
>
>>>> >>> I am still looking into this, as time allows.
>
>>>> >>> I ahve reviewed some different ways to implement this, I have
>>>> >>> determine that the following routines can be used :
>

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>>>> >>> LINKIMAGE
>>>> >>> SPAWN
>>>> >>> MAKE_DLL
>>>> >>> CALL_EXTERNAL
>>>> >>> CALL_EXTERNAL/MAKE_DLL
>
>>>> >>> There is a nice example to use CALL_EXTERNAL/MAKE_DLL, but MAKE_DLL is
>>>> >>> giving me problems as I am trying to use the gcc compiler. There is a
>>>> >>> ITTVIS Tech Tip that helps, but another problem appears while dealing
>>>> >>> with the IDL example.
>
>>>> >>> There is a GCP DLL provided thru the MatLab Contrib site. I am playing
>>>> >>> around with this in CALL_EXTERNAL, bypassing the MAKE_DLL.
>
>>>> >>> Sorry, that this is turning into a blog, but I find it helps to scatch
>>>> >>> some notes down once in awhile for future reference.
>
>>>> >>> Kelly Dean
>>>> >>> Milliken, CO- Hide quoted text -
>
>>>> >> - Show quoted text -
>
>>>> > Yes, apparently the ITTVIS example assumes you have Microsoft Visual
>>>> > installed.
>
>>>> > Well, I spent most of the day installing Microsoft Visual C++ 10.0 and
>>>> > regist for the free version.
>
>>>> > So far, here are the problems I am having :
>
>>>> > cl.exe : Solution ?
>>>> > mspdb100.dll pop-up : Solution ?
>>>> > stdio.h 'no such file' : Solution ?
>
>>>> > I am sure the problems are related to path, as all these file are
>>>> > within the new install of MS Visual Studio 10.0.
>
>>>> > Kelly
>
>>>> Make sure to launch IDL from the special command line provided by VS (or
>>>> set your path and possibly other environment variables accordingly).
>
>>>> Mike
>>>> --www.michaelgalloy.com
>>>> Research Mathematician
>>>> Tech-X Corporation- Hide quoted text -
>
>>>> - Show quoted text -

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>
>>> Becoming a little wiser.
>
>>> Visual Studio Command Prompt is looking for "vcvarsall.bat"
>
>>> I did install MinGW. From the MinGW shell prompt I was able to make a
>>> DLL -
>
>>> gcc -Wall -shared gpc.c -o gpc.dll
>
>>> However, this is a 32-bit DLL. The IDL 64-bit version using
>>> CALL_EXTERNAL doesn't like the DLL.
>
>>> Although, the IDL 32-bit version does like the DLL, but IDL promptly
>>> crashes.
>
>>> Progress!
>
>>> Kelly- Hide quoted text -
>
>>> - Show quoted text -
>
>> Still working on it, but starting to lose steam.
>
>> Tried to use gcc from CYGWIN to compile C source code. Failed. Reports
>> from
>> from tech support and other IDL users, avoid doing this.
>
>> Installed Visual C++ (express) as recommended by tech support and
>> other IDL
>> users. Used the Visual Command Prompt, but still unable to make a 32-
>> bit
>> DLL without getting some kind of warning or error.
>
>> Installed MinGW as suggested by tech support and other IDL users. From
>> their
>> experience, they have more success with compiling 3rd party packages
>> with this
>> package. I was able to creating a 32-bit DLL with gcc in the MinGW
>> shell. Used
>> -shared option to gcc to create a DLL. For example :
>
>> gcc -Wall -shared gpc.c -o gpc.dll
>
>> Despite the success of creating a DLL, the 32-bit IDL 6.4 crashes when
>> CALL_EXTERNAL
>> is used to access this sharable library. For sure, I didn't use the
>> compiler properly

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>> to create a sharable DLL.  
>  
>> Found a sharable DLL for the General Polygon Clipper at Mathworks  
>> (circa 2005). Needs  
>> a MatLab library to work. I didn't pursue this much further, as I no  
>> long have MatLab  
>> on my desktop.  
>  
>> New Life! Michael Galloy announced his book is available - Modern IDL.  
>> There is a whole  
>> chapter about this External Development. So, there is lots of new  
>> ideas to try. Even  
>> a Python example. GPC has a Python wrapper.  
>  
>> Kelly- Hide quoted text -  
>  
> - Show quoted text -
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Nope!

I have been working with the ITTVIS example routine SIMPLE_VARS.pro

Common errors are undefine reference, unrecognized commands (CL),
missing libraries (mspdb100.dll), and cannot find <stdio.h>.

Kelly
