
Subject: Automatic structure definition..

Posted by [steinhh](#) on Sun, 22 Nov 1998 08:00:00 GMT

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I see that IDL v 5 adds one feature that I've longed for
- automatic structure definition (automatic search for
and execution of a <structure_name>__define procedure
whenever a {<structure_name>} statement is referring
to an as yet undefined structure).

But one question: Why haven't the "builtin" structures
been built in by this method? If I do e.g.:

```
IDL> help,{widget_draw}
% Attempt to call undefined procedure/function: 'WIDGET_DRAW__DEFINE'.
% Structure type not defined: WIDGET_DRAW.
% Execution halted at: $MAIN$
```

It would make life so much simpler if RSI were to supply
such routines..... please?

Regards,

Stein Vidar

Subject: Re: Automatic Structure Definition

Posted by [Martin Schultz](#) on Wed, 16 Jun 1999 07:00:00 GMT

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Daniel Peduzzi wrote:

>

> As it turns out, the problem was that I had a capital letter in my filename containing
> the structure definition procedure. Renaming it from abc_Struct__define.pro to
> abc_struct__define.pro remedied the problem, even though all references still
> contained the capital "S".

unix is case sensitive in filenames, whereas IDL is case-insensitive in
procedure names (unfortunately so ?) Perhaps it would be nice if IDL
would first try to look for a file name in exactly the spelling given
and if that fails try to locate a file in all lower case. But that might
add too much confusion ?

Martin

--

I agree...adopting a lower-case convention is the way to go.

I was just feeling a little foolish that I'd spent so much time tracking down something which, as you clearly illustrated above, is a reasonable implementation on UNIX systems. I just wish the docs had contained some sort of warning.

I guess I shouldn't feel TOO foolish, though, since this passage is copied verbatim from the V.5 "Building IDL Applications" documentation (note the capital letters):

"When IDL encounters a reference to an undefined named structure, it will automatically search the directories specified in !PATH for a procedure named Name__DEFINE, where Name is the actual name of the structure."

It was unclear to me that the above refers only to the name of the structure definition procedure, and that there shouldn't be, in this case, a consistency between the procedure name and the filename which contains it.

Like you said...lesson learned!

Dan Peduzzi
peduzzi@mediaone.net

Subject: Re: Automatic Structure Definition
Posted by [J.D. Smith](#) on Wed, 16 Jun 1999 07:00:00 GMT
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"R.Bauer" wrote:

>
> Daniel Peduzzi wrote:
>
>> I recently spent quite a bit of time wondering why my automatic structure
>> definition files could not be seen by IDL. All attempts to instantiate the structure
>> in my calling program resulted in the error "attempt to call undefined procedure/function".
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>> contained the capital "S".
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>> Has anybody else experienced this problem? Or perhaps it is not a problem
>> at all, and I missed the explanation? This requirement is definitely not explained
>> in the "Automatic Structure Definition" section.
>>
>> Dan Peduzzi

>> peduzzi@mediaone.net
>
> This a problem using idl on unix.
> IDL on windows did not distinguish lower or upper cases.
>
> R.Bauer

It's the only reasonable solution though, since IDL is case-insensitive and unix file systems are case-sensitive. How is IDL to know which file to use? Either it adopts a given convention (e.g., all lower-case), or it searches for all upper-lower permutations of the given name, which, for abc_Struct__define.pro, includes 262144 possibilities. (Or it becomes case-sensitive, which is a whole different kettle of fish).

A lesson learned: always use lower case for naming files containing IDL routines under unix.

JD

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Subject: Re: Automatic Structure Definition
Posted by [R.Bauer](#) on Wed, 16 Jun 1999 07:00:00 GMT
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