
Subject: Linking problem

Posted by [busiek](#) on Sun, 20 Feb 2011 14:15:35 GMT

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On Ubuntu Natty (development version of Ubuntu) I have problems with linking. For instance, compiling HelloWorld from examples gives in the end:

Linking...

```
/usr/bin/ld: /home/kubus/upp/out/Draw/GCC.Debug.Debug_full.Gui.Shared/$bl itz.o: undefined  
reference to symbol 'FT_New_Face'
```

```
/usr/bin/ld: note: 'FT_New_Face' is defined in DSO /usr/lib64/libfreetype.so.6 so try adding it to the  
linker command line
```

```
/usr/lib64/libfreetype.so.6: could not read symbols: Invalid operation
```

```
collect2: ld returned 1 exit status
```

I installed upp and theide version 3192-maverick-amd64. I found a similar problem somewhere else:

https://bugzilla.redhat.com/show_bug.cgi?id=677692

Subject: Re: Linking problem

Posted by [dolik.rce](#) on Sun, 20 Feb 2011 22:42:43 GMT

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Hi busiek,

First of all, I can fully confirm this problem. Theide itself fails to build on natty both in i386 and amd64, just tried to build it in launchpad.

The problem is that debian (and hence Ubuntu as well) changed its attitude to indirect linking (see [here](#)). To make U++ work in natty and new debian we will have to revise the packages to explicitly list all the libraries needed without relaying on the indirect linking.

Hopefully it is just a few libs in uppsrc. I will try to do this ASAP. BTW: We are not the only project affected by this - it broke 1400+ packages in natty

Also if you are interested in using upp/theide in natty, I can add natty versions to nightly builds as soon as this problem is resolved.

Best regards,
Honza

Subject: Re: Linking problem
Posted by [mirek](#) on Mon, 21 Feb 2011 08:45:12 GMT
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dolik.rce wrote on Sun, 20 February 2011 17:42busiek wrote on Sun, 20 February 2011 15:15On Ubuntu Natty (development version of Ubuntu) I have problems with linking. For instance, compiling HelloWorld from examples gives in the end:

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Best regards,
Honza

Maybe we could just change that linker option instead?

Mirek

Subject: Re: Linking problem

Posted by [unknown user](#) on Mon, 21 Feb 2011 10:15:54 GMT

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mirek wrote on Mon, 21 February 2011 09:45dolik.rce wrote on Sun, 20 February 2011 17:42busiek wrote on Sun, 20 February 2011 15:15On Ubuntu Natty (development version of Ubuntu) I have problems with linking. For instance, compiling HelloWorld from examples gives in the end:

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Best regards,
Honza

Maybe we could just change that linker option instead?

Mirek

It's simply solved by adding freetype lib to Draw and Xrender to CtrlCore. Honza will test it with build for Ubuntu Natty (11.04) in launchpad before commit to svn.

Andrei

Subject: Re: Linking problem

Posted by [dolik.rce](#) on Mon, 21 Feb 2011 22:55:31 GMT

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mirek wrote on Mon, 21 February 2011 09:45 Maybe we could just change that linker option instead?

Mirek

IMHO setting the library dependencies correctly is a cleaner solution. And safer, according to Debian developers

Honza

Subject: Re: Linking problem

Posted by [mirek](#) on Tue, 22 Feb 2011 09:06:37 GMT

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OK

So what should we add?

Mirek

Subject: Re: Linking problem

Posted by [unknown user](#) on Tue, 22 Feb 2011 09:24:48 GMT

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Hi,

in CtrlCore package:

(when) LINUX = X11 Xrender // Xrender added

in Draw:

(when) LINUX = dl freetype // freetype added

Subject: Re: Linking problem

Posted by [dolik.rce](#) on Fri, 25 Feb 2011 18:20:52 GMT

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Sorry for late response, I was quite busy in my new job...

I installed Natty in VirtualBox (it finally works again with new version) and played a bit with the linking. What I found is that it sometimes complains about missing libraries even when they are specified, for example Xrender. It looks like the --start-group/--end-group commands don't work as supposed. If I understood the ld documentation correctly, it should cause ld to scan all the enclosed archives (object files, libs and archives) repeatedly, until all the symbols are resolved. I think there might be some bug in the toolchain itself or in its setting.

The only library that is really missing is freetype, which should be added to Draw.upp exactly as Andrei said above. The rest of the problems can be resolved by simply rearranging the -l options at the end of the command line, which should be quite easy to do in the code, but I am not sure if that is an universal solution...

I will look into it more deeply during the weekend. It turns out it is not as trivial problem as it seemed at the beginning

Honza

Subject: Re: Linking problem

Posted by [dolik.rce](#) on Sat, 26 Feb 2011 21:33:14 GMT

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Hi,

I've got more news... It seems that the linking command line on natty is somehow wrong ordered. It lists libraries BEFORE the archives files with code that uses them, which in conjunction with the wrong behavior of grouping causes most of the trouble. See attached file for details and comparison to the command line produced on my Arch Linux.

So far I have no idea why the order is different on natty than on my system. The builder code is the same on both, and I didn't found any reason (yet) that could make a difference... Any hints? If I reorder the libraries manually (just putting the -l options after .a files from the same package), it links perfectly normal.

Also, the XRender in CtrlCore is not necessary, it just doubles the -lXRender on the command line. That is not harmful of course, just a minor "beauty issue"

Honza

File Attachments

1) [linking.txt](#), downloaded 369 times

Subject: Re: Linking problem
Posted by [mirek](#) on Sun, 27 Feb 2011 08:42:12 GMT
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I am a little bit confused - what project is this? Looks like ide, but what is rdppm.o?

And what exactly CLANG means?

Subject: Re: Linking problem
Posted by [chickenk](#) on Sun, 27 Feb 2011 09:46:42 GMT
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dolik.rce wrote on Sat, 26 February 2011 22:33Hi,
I've got more news... It seems that the linking command line on natty is somehow wrong ordered.
It lists libraries BEFORE the archives files with code that uses them, which in conjunction with the
wrong behavior of grouping causes most of the trouble.

For information, I got linking problems as well when linking libraries with '-l<library>' linker options
instead of '<path/to/library.a>' with my upp-waf build system.

Here is how I solved this (I enclosed static libraries between --whole-archive and
--no-whole-archive), the --start-group and --end-group did not work for me either.

regards
Lionel

Subject: Re: Linking problem
Posted by [unknown user](#) on Sun, 27 Feb 2011 11:37:23 GMT
[View Forum Message](#) <> [Reply to Message](#)

mirek wrote on Sun, 27 February 2011 09:42I am a little bit confused - what project is this? Looks
like ide, but what is rdppm.o?

And what exactly CLANG means?
rdppm.o is as result of compiling jpg plugin files.

CLANG appears because it was compiled with CLANG compiler, on Arch Linux.

Andrei

Subject: Re: Linking problem
Posted by [dolik.rce](#) on Sun, 27 Feb 2011 11:57:10 GMT
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mirek wrote on Sun, 27 February 2011 09:42I am a little bit confused - what project is this? Looks like ide, but what is rdppm.o?

And what exactly CLANG means?

Yes, it is the linking of ide. File rdppm.o comes from plugin/jpeg/lib/rdppm.c, but I have no idea how it got in the linking command line... It should have been inside jpg.a :-/

Sorry for the CLANG, it's a build method using clang as compiler. It shouldn't really matter as it uses GCCBuilder in the very same way as gcc. What could matter is that I compared debug and optimal build in the last post... So to be sure I tried again, this time with equal settings and to my great surprise, now both linking commands look the same (apart from file types) as on natty. I wonder why is there different ordering for debug builds, does it have some important reason?

Anyway, it still holds that putting the libraries (-lxyz) after archives (xyz.a) fixes the problem...

About the --(no-)whole-archive option: It might solve the issue as well, but it could also introduce some overhead by linking unnecessary objects... I'm not 100% sure, but we sure can try that too

Honza

File Attachments

- 1) [arch](#), downloaded 410 times
 - 2) [natty](#), downloaded 461 times
-

Subject: Re: Linking problem

Posted by [chickenk](#) on Sun, 27 Feb 2011 12:20:27 GMT

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Yes the --whole-archive introduces a bit of overhead but could be reduced by using -ffunction-sections, -fdata-sections for compiler and --gc-sections for linker... And I did not find a better solution yet.

If you happen to find a clean solution with --start-group/--end-group, I'd be more than happy to know and test!

Lionel

Subject: Re: Linking problem

Posted by [mirek](#) on Fri, 04 Mar 2011 08:59:17 GMT

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Well, not sure it will help, but I have changed the builder so that it now puts .a first, -l last...

Subject: Re: Linking problem

Posted by [dolik.rce](#) on Sat, 05 Mar 2011 18:42:46 GMT

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mirek wrote on Fri, 04 March 2011 09:59 Well, not sure it will help, but I have changed the builder so that it now puts .a first, -l last...

It seems to work all right now. I tested linking theide both in optimal and debug mode and it links and works.

Now I just have to make similar changes to the makefile so we can build packages for natty...

Honza

Subject: Re: Linking problem

Posted by [trader](#) on Sat, 12 Mar 2011 18:42:03 GMT

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Im using Ubuntu 10.10 Maverick and install U++ from Stable PPA.

I got this same error.

What can I do? Install U++ from Nightly PPA?

```
----- CtrlLib ( GUI GCC DEBUG SHARED DEBUG_FULL BLITZ LINUX POSIX ) ( 1 / 9)
----- CtrlCore ( GUI GCC DEBUG SHARED DEBUG_FULL BLITZ LINUX POSIX ) ( 2 / 9)
----- PdfDraw ( GUI GCC DEBUG SHARED DEBUG_FULL BLITZ LINUX POSIX ) ( 3 / 9)
----- Draw ( GUI GCC DEBUG SHARED DEBUG_FULL BLITZ LINUX POSIX ) ( 4 / 9)
----- plugin/bmp ( GUI GCC DEBUG SHARED DEBUG_FULL BLITZ LINUX POSIX ) ( 5 / 9)
----- RichText ( GUI GCC DEBUG SHARED DEBUG_FULL BLITZ LINUX POSIX ) ( 6 / 9)
----- Core ( GUI GCC DEBUG SHARED DEBUG_FULL BLITZ LINUX POSIX ) ( 7 / 9)
----- plugin/png ( GUI GCC DEBUG SHARED DEBUG_FULL BLITZ LINUX POSIX ) ( 8 / 9)
----- HelloWorld ( GUI MAIN GCC DEBUG SHARED DEBUG_FULL BLITZ LINUX POSIX ) ( 9 / 9)
```

Linking...

```
/usr/bin/ld: /home/john/Tmp/upp/out/Draw/GCC.Debug.Debug_full.Gui.Shared/ $blitz.o: undefined
reference to symbol 'FT_New_Face'
```

```
/usr/bin/ld: note: 'FT_New_Face' is defined in DSO //usr/lib/libfreetype.so.6 so try adding it to the
linker command line
```

```
//usr/lib/libfreetype.so.6: could not read symbols: Invalid operation
```

```
collect2: ld returned 1 exit status
```

There were errors. (0:00.76)

Subject: Re: Linking problem

Posted by [dolik.rce](#) on Sat, 12 Mar 2011 20:01:03 GMT

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trader wrote on Sat, 12 March 2011 19:42lm using Ubuntu 10.10 Maverick and install U++ from Stable PPA.

I got this same error.

What can I do? Install U++ from Nightly PPA?

Hi trader

Yes, the simplest solution is to get newer version from nightly PPA. Alternatively you could download sources and build theide for yourself (it's not difficult, but still a tad more complicated than just using the nightly deb).

Just out of curiosity: Did this problem appear just recently? After some update perhaps? Because I didn't notice any problem in Maverick, but it is sure possible that the toolchain was updated.

Best regards,
Honza

Subject: Re: Linking problem

Posted by [busiek](#) on Mon, 14 Mar 2011 16:30:56 GMT

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I am using natty nightly builds and the problem persists. My current version is 3274-natty-amd64.

Subject: Re: Linking problem

Posted by [dolik.rce](#) on Mon, 14 Mar 2011 19:46:34 GMT

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busiek wrote on Mon, 14 March 2011 17:30I am using natty nightly builds and the problem persists. My current version is 3274-natty-amd64.

Hi busiek,

I'm sorry, but I can't reproduce the problem. Does it happen for all applications, or just some? I used XmlView from uppsrc for testing and linking works fine for me in Debug+Blitz, Optimal and Optimal+Blitz modes. I tested with 3274-natty-i386 so the only possible reason I can see right now is that there are some differences between the toolchains for the two architectures. I will try to setup Natty on amd64 machine tomorrow (I don't have any at home).

Honza

Subject: Re: Linking problem

Posted by [busiek](#) on Tue, 15 Mar 2011 09:08:57 GMT

I tested it with HelloWorld, but with XmiView the result is the same. It seems that it does not work for any application.

```
----- CtrlLib ( GUI GCC DEBUG SHARED DEBUG_FULL BLITZ LINUX POSIX ) ( 1 / 9 )
----- CtrlCore ( GUI GCC DEBUG SHARED DEBUG_FULL BLITZ LINUX POSIX ) ( 2 / 9 )
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----- RichText ( GUI GCC DEBUG SHARED DEBUG_FULL BLITZ LINUX POSIX ) ( 6 / 9 )
----- Core ( GUI GCC DEBUG SHARED DEBUG_FULL BLITZ LINUX POSIX ) ( 7 / 9 )
----- plugin/png ( GUI GCC DEBUG SHARED DEBUG_FULL BLITZ LINUX POSIX ) ( 8 / 9 )
----- XmiView ( GUI MAIN GCC DEBUG SHARED DEBUG_FULL BLITZ LINUX POSIX ) ( 9 / 9 )
```

main.cpp

XmlView: 1 file(s) built in (0:04.32), 4326 msecs / file, duration = 4360 msecs, parallelization 0%

Linking...

/usr/bin/ld: /home/kubus/upp/out/examples/Draw/GCC.Debug.Debug_full.Gui.Shared/\$blitz.o:

undefined reference to symbol 'FT_New_Face'

/usr/bin/ld: note: 'FT_New_Face' is defined in DSO /usr/lib64/libfreetype.so.6 so try adding it to the linker command line

/usr/lib64/libfreetype.so.6: could not read symbols: Invalid operation

collect2: ld returned 1 exit status

There were errors. (0:08.86)

Subject: Re: Linking problem

Posted by [dolik.rce](#) on Tue, 15 Mar 2011 10:02:18 GMT

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Busiek, could you please post the verbose output here? Just turn on "Be verbose" in Setup menu and build the application once more. It will show the complete linking command line, which might be quite helpful.

Also, I found that my computer at work is also i686, so I don't have anywhere to test the amd64
Any volunteers out there?

Honza

Subject: Re: Linking problem

Posted by [busiek](#) on Tue, 15 Mar 2011 13:08:09 GMT

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The same with verbose turned on.

```
----- CtrlLib ( GUI GCC DEBUG SHARED DEBUG_FULL BLITZ LINUX POSIX ) ( 1 / 9 )
```

```
cd /home/kubus/upp/uppsrc/CtrlLib
```

```
/home/kubus/upp/uppsrc/CtrlLib/XPTheme.dli(1) : blocks BLITZ of
```

```

/home/kubus/upp/uppsrc/CtrlLib/ChWin32.cpp
----- CtrlCore ( GUI GCC DEBUG SHARED DEBUG_FULL BLITZ LINUX POSIX ) ( 2 / 9 )
cd /home/kubus/upp/uppsrc/CtrlCore
----- PdfDraw ( GUI GCC DEBUG SHARED DEBUG_FULL BLITZ LINUX POSIX ) ( 3 / 9 )
cd /home/kubus/upp/uppsrc/PdfDraw
----- Draw ( GUI GCC DEBUG SHARED DEBUG_FULL BLITZ LINUX POSIX ) ( 4 / 9 )
cd /home/kubus/upp/uppsrc/Draw
----- plugin/bmp ( GUI GCC DEBUG SHARED DEBUG_FULL BLITZ LINUX POSIX ) ( 5 / 9 )
cd /home/kubus/upp/uppsrc/plugin/bmp
----- RichText ( GUI GCC DEBUG SHARED DEBUG_FULL BLITZ LINUX POSIX ) ( 6 / 9 )
cd /home/kubus/upp/uppsrc/RichText
----- Core ( GUI GCC DEBUG SHARED DEBUG_FULL BLITZ LINUX POSIX ) ( 7 / 9 )
cd /home/kubus/upp/uppsrc/Core
/home/kubus/upp/uppsrc/Core/HeapImp.h(1) : blocks BLITZ of
/home/kubus/upp/uppsrc/Core/heaputil.cpp
/home/kubus/upp/uppsrc/Core/HeapImp.h(1) : blocks BLITZ of
/home/kubus/upp/uppsrc/Core/lheap.cpp
/home/kubus/upp/uppsrc/Core/HeapImp.h(1) : blocks BLITZ of
/home/kubus/upp/uppsrc/Core/heap.cpp
/home/kubus/upp/uppsrc/Core/HeapImp.h(1) : blocks BLITZ of
/home/kubus/upp/uppsrc/Core/heapdbg.cpp
/home/kubus/upp/uppsrc/Core/CharSet.i(1) : blocks BLITZ of
/home/kubus/upp/uppsrc/Core/CharSet.cpp
----- plugin/png ( GUI GCC DEBUG SHARED DEBUG_FULL BLITZ LINUX POSIX ) ( 8 / 9 )
cd /home/kubus/upp/uppsrc/plugin/png
----- XmlView ( GUI MAIN GCC DEBUG SHARED DEBUG_FULL BLITZ LINUX POSIX ) ( 9 / 9 )
cd /home/kubus/upp/examples/XmlView
Linking...
g++-4.5 -o "/home/kubus/upp/out/examples/GCC.Debug.Debug_full.Gui.Shared/XmlView" -ggdb
-L"/usr/X11R6/lib" -L"/usr/lib64" -Wl,-O,2 "/home/kubus/upp/out/examples/XmlView/GCC.D
ebug.Debug_full.Gui.Main.Shared/main.o"
"/home/kubus/upp/out/examples/CtrlLib/GCC.Debug.Debug_full.Gui.Shared/CtrlLib.o"
"/home/kubus/upp/out/examples/CtrlLib/GCC.Debug.De
bug_full.Gui.Shared/$blitz.o"
"/home/kubus/upp/out/examples/CtrlLib/GCC.Debug.Debug_full.Gui.Shared/ChWin32.o"
"/home/kubus/upp/out/examples/CtrlCore/GCC.Debug.Debug_full.
Gui.Shared/CtrlCore.o"
"/home/kubus/upp/out/examples/CtrlCore/GCC.Debug.Debug_full.Gui.Shared/$blitz.o"
"/home/kubus/upp/out/examples/PdfDraw/GCC.Debug.Debug_full.Gui.Shar
ed/PdfReport.o"
"/home/kubus/upp/out/examples/PdfDraw/GCC.Debug.Debug_full.Gui.Shared/$blitz.o"
"/home/kubus/upp/out/examples/Draw/GCC.Debug.Debug_full.Gui.Shared/$blitz.o
" "/home/kubus/upp/out/examples/plugin/bmp/GCC.Debug.Debug_full.Gui.Shared/BmpReg.o"
"/home/kubus/upp/out/examples/plugin/bmp/GCC.Debug.Debug_full.Gui.Shared/$blitz.o" "/h
ome/kubus/upp/out/examples/RichText/GCC.Debug.Debug_full.Gui.Shared/RichImage.o"
"/home/kubus/upp/out/examples/RichText/GCC.Debug.Debug_full.Gui.Shared/$blitz.o" "/home/ku
bus/upp/out/examples/Core/GCC.Debug.Debug_full.Gui.Shared/$blitz.o"
"/home/kubus/upp/out/examples/Core/GCC.Debug.Debug_full.Gui.Shared/OL_Set.o"

```

```

/home/kubus/upp/out/examples/Core/GCC.Debug.Debug_full.Gui.Shared/heaputil.o"
/home/kubus/upp/out/examples/Core/GCC.Debug.Debug_full.Gui.Shared/lheap.o"
/home/kubus/upp/out/examples/Core/GCC.Debug.Debug_full.Gui.Shared/heapdbg.o"
/home/kubus/upp/out/examples/Core/GCC.Debug.Debug_full.Gui.Shared/CharSet.o"
/home/kubus/upp/out/examples/plugin/png/GCC.Debug.Debug_full.Gui.Shared/pngreg.o"
/home/kubus/upp/out/examples/plugin/png/GCC.Debug.Debug_full.Gui.Shared/pnglib.o"
/home/kubus/upp/out/examples/plugin/png/GCC.Debug.Debug_full.Gui.Shared/pngupp.o"
-Wl,--start-group -lgtk-x11-2.0 -lgdk-x11-2.0 -latk-1.0 -lgdk_pixbuf-2.0 -
lIm -lpangocairo-1.0 -lfontconfig -lXext -lXrender -lXinerama -lXi -lXrandr -lXcursor -lXfixes
-lpango-1.0 -lcairo -lX11 -lgobject-2.0 -lgmodule-2.0 -lglib-2.0 -lX11 -ldl -
lXft -lnotify -ldl -lfontconfig -lpthread -ldl -lz -lpng -Wl,--end-group
/usr/bin/ld: /home/kubus/upp/out/examples/Draw/GCC.Debug.Debug_full.Gui.Shared/$blitz.o:
undefined reference to symbol 'FT_New_Face'
/usr/bin/ld: note: 'FT_New_Face' is defined in DSO /usr/lib64/libfreetype.so.6 so try adding it to the
linker command line
/usr/lib64/libfreetype.so.6: could not read symbols: Invalid operation
collect2: ld returned 1 exit status
g++-4.5 -o "/home/kubus/upp/out/examples/GCC.Debug.Debug_full.Gui.Shared/XmlView" -g -gdb
-L"/usr/X11R6/lib" -L"/usr/lib64" -Wl,-O,2 "/home/kubus/upp/out/examples/XmlView/GCC.D
ebug.Debug_full.Gui.Main.Shared/main.o"
/home/kubus/upp/out/examples/CtrlLib/GCC.Debug.Debug_full.Gui.Shared/CtrlLib.o"
/home/kubus/upp/out/examples/CtrlLib/GCC.Debug.Debug_full.Gui.Shared/$blitz.o"
/home/kubus/upp/out/examples/CtrlLib/GCC.Debug.Debug_full.Gui.Shared/ChWin32.o"
/home/kubus/upp/out/examples/CtrlCore/GCC.Debug.Debug_full.Gui.Shared/CtrlCore.o"
/home/kubus/upp/out/examples/CtrlCore/GCC.Debug.Debug_full.Gui.Shared/$blitz.o"
/home/kubus/upp/out/examples/PdfDraw/GCC.Debug.Debug_full.Gui.Shared/PdfReport.o"
/home/kubus/upp/out/examples/PdfDraw/GCC.Debug.Debug_full.Gui.Shared/$blitz.o"
/home/kubus/upp/out/examples/Draw/GCC.Debug.Debug_full.Gui.Shared/$blitz.o"
" "/home/kubus/upp/out/examples/plugin/bmp/GCC.Debug.Debug_full.Gui.Shared/BmpReg.o"
/home/kubus/upp/out/examples/plugin/bmp/GCC.Debug.Debug_full.Gui.Shared/$blitz.o" "/h
ome/kubus/upp/out/examples/RichText/GCC.Debug.Debug_full.Gui.Shared/RichImage.o"
/home/kubus/upp/out/examples/RichText/GCC.Debug.Debug_full.Gui.Shared/$blitz.o" "/home/ku
bus/upp/out/examples/Core/GCC.Debug.Debug_full.Gui.Shared/$blitz.o"
/home/kubus/upp/out/examples/Core/GCC.Debug.Debug_full.Gui.Shared/OL_Set.o"
/home/kubus/upp/out/examples/Core/GCC.Debug.Debug_full.Gui.Shared/heaputil.o"
/home/kubus/upp/out/examples/Core/GCC.Debug.Debug_full.Gui.Shared/lheap.o"
/home/kubus/upp/out/examples/Core/GCC.Debug.Debug_full.Gui.Shared/heapdbg.o"

```

```

/home/kubus/upp/out/examples/Core/GCC.Debug.Debug_full.Gui.
Shared/CharSet.o"
/home/kubus/upp/out/examples/plugin/png/GCC.Debug.Debug_full.Gui.Shared/pngreg.o"
/home/kubus/upp/out/examples/plugin/png/GCC.Debug.Debug_full.Gui.Shar
ed/pnglib.o"
/home/kubus/upp/out/examples/plugin/png/GCC.Debug.Debug_full.Gui.Shared/pngupp.o"
-Wl,--start-group -lgtk-x11-2.0 -lgdk-x11-2.0 -latk-1.0 -lgdk_pixbuf-2.0 -
lm -lpangocairo-1.0 -lfontconfig -lXext -lXrender -lXinerama -lXi -lXrandr -lXcursor -lXfixes
-lpango-1.0 -lcairo -lX11 -lgobject-2.0 -lgmodule-2.0 -lglib-2.0 -lX11 -ldl -
lXft -lnotify -ldl -lfontconfig -lpthread -ldl -lz -lpng -Wl,--end-group
Error executing g++-4.5 -o
/home/kubus/upp/out/examples/GCC.Debug.Debug_full.Gui.Shared/XmlView" -ggdb
-L"/usr/X11R6/lib" -L"/usr/lib64" -Wl,-O,2 "/home/kubus/upp/out/exampl
es/XmlView/GCC.Debug.Debug_full.Gui.Main.Shared/main.o"
/home/kubus/upp/out/examples/CtrlLib/GCC.Debug.Debug_full.Gui.Shared/CtrlLib.o"
/home/kubus/upp/out/examples/Ctrl
Lib/GCC.Debug.Debug_full.Gui.Shared/$blitz.o"
/home/kubus/upp/out/examples/CtrlLib/GCC.Debug.Debug_full.Gui.Shared/ChWin32.o"
/home/kubus/upp/out/examples/CtrlCore/GCC.D
ebug.Debug_full.Gui.Shared/CtrlCore.o"
/home/kubus/upp/out/examples/CtrlCore/GCC.Debug.Debug_full.Gui.Shared/$blitz.o"
/home/kubus/upp/out/examples/PdfDraw/GCC.Debug.Deb
ug_full.Gui.Shared/PdfReport.o"
/home/kubus/upp/out/examples/PdfDraw/GCC.Debug.Debug_full.Gui.Shared/$blitz.o"
/home/kubus/upp/out/examples/Draw/GCC.Debug.Debug_full.Gui
.Shared/$blitz.o"
/home/kubus/upp/out/examples/plugin/bmp/GCC.Debug.Debug_full.Gui.Shared/BmpReg.o"
/home/kubus/upp/out/examples/plugin/bmp/GCC.Debug.Debug_full.Gui.Shar
ed/$blitz.o"
/home/kubus/upp/out/examples/RichText/GCC.Debug.Debug_full.Gui.Shared/RichImage.o"
/home/kubus/upp/out/examples/RichText/GCC.Debug.Debug_full.Gui.Shared/$bl
itz.o" "/home/kubus/upp/out/examples/Core/GCC.Debug.Debug_full.Gui.Shared/$blitz.o"
/home/kubus/upp/out/examples/Core/GCC.Debug.Debug_full.Gui.Shared/OL_Set.o" "/home/kub
us/upp/out/examples/Core/GCC.Debug.Debug_full.Gui.Shared/heaputil.o"
/home/kubus/upp/out/examples/Core/GCC.Debug.Debug_full.Gui.Shared/lheap.o"
/home/kubus/upp/out/examp
les/Core/GCC.Debug.Debug_full.Gui.Shared/heap.o"
/home/kubus/upp/out/examples/Core/GCC.Debug.Debug_full.Gui.Shared/heapdbg.o"
/home/kubus/upp/out/examples/Core/GCC.Debug
.Debug_full.Gui.Shared/CharSet.o"
/home/kubus/upp/out/examples/plugin/png/GCC.Debug.Debug_full.Gui.Shared/pngreg.o"
/home/kubus/upp/out/examples/plugin/png/GCC.Debug.Deb
ug_full.Gui.Shared/pnglib.o"
/home/kubus/upp/out/examples/plugin/png/GCC.Debug.Debug_full.Gui.Shared/pngupp.o"
-Wl,--start-group -lgtk-x11-2.0 -lgdk-x11-2.0 -latk-1.0 -l
gdk_pixbuf-2.0 -lm -lpangocairo-1.0 -lfontconfig -lXext -lXrender -lXinerama -lXi -lXrandr -lXcursor
-lXfixes -lpango-1.0 -lcairo -lX11 -lgobject-2.0 -lgmodule-2.0 -lglib-
2.0 -lX11 -ldl -lXft -lnotify -ldl -lfontconfig -lpthread -ldl -lz -lpng -Wl,--end-group

```

Exitcode: 1

There were errors. (0:05.42)

Subject: Re: Linking problem

Posted by [chickenk](#) on Tue, 15 Mar 2011 14:25:29 GMT

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Indeed, '-lfontconfig' is not appended to your linker command-line and with the new DSO policy in Ubuntu, this cannot work.

After looking at CtrlCore.upp, it seems we don't explicitly insert freetype for linux platforms (I suppose we expect it to be injected by another dependency, but the new policy avoids just that).

IMHO it's a bug in CtrlCore.upp and you should try by replacing the line `library(LINUX) "X11 Xrender";` by the line `library(LINUX) "X11 Xrender freetype";` and tell us if it works better...

But the main problem is that we might have plenty of there DSO issues and it should be time getting rid of them. I bet plenty of work on dependencies is needed.

My 2 cents, I'm not using Ubuntu anyway.

EDIT: my bad, freetype lib was added to Draw/Draw.upp at revision r3239 and since CtrlCore depends on Draw, it should work perfectly. Can you check that Draw/Draw.upp includes the line below? `library(LINUX) "dl freetype";`

Lionel

Subject: Re: Linking problem

Posted by [busiek](#) on Tue, 15 Mar 2011 15:55:46 GMT

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chickenk wrote on Tue, 15 March 2011 15:25

EDIT: my bad, freetype lib was added to Draw/Draw.upp at revision r3239 and since CtrlCore depends on Draw, it should work perfectly. Can you check that Draw/Draw.upp includes the line below? `library(LINUX) "dl freetype";`

Lionel

No, in `~/upp/uppsrc/Draw/Draw.upp` there is

`library(LINUX) dl;`

After changing it as you suggested, compilation succeeded.

Subject: Re: Linking problem
Posted by [dolik.rce](#) on Tue, 15 Mar 2011 16:12:09 GMT
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Yes, that is the correct solution

Here is a small explanation as for why happened: As of now if you update U++ through your package manager, only the sources in /usr/share/upp are updated. Your local copy in your /home stays the same and you have to manually copy the /usr/share/upp into your home directory after each update.

So even though you were using theide in version 3274, the sources were actually older and didn't contain the changes in Draw.upp where freetype was added.

I know that this is quite stupid behavior and I reported it almost a year ago and even proposed and prepared a solution. But nobody really complained so far and nobody was interested in the fix, so I am the only one using it right now... I hope this will drag some attention to it again

Honza

Subject: Re: Linking problem
Posted by [trader](#) on Wed, 16 Mar 2011 21:28:58 GMT
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[quote title=dolik.rce wrote on Sat, 12 March 2011 17:01]trader wrote on Sat, 12 March 2011 19:42Im using Ubuntu 10.10 Maverick and install U++ from Stable PPA.

Just out of curiosity: Did this problem appear just recently? After some update perhaps? Because I didn't notice any problem in Maverick, but it is sure possible that the toolchain was updated.

Honza

Honza, I install U++ recently and I start get this error.

I will install Nightly PPA, but I prefer Stable.

Tks

Subject: Re: Linking problem
Posted by [dolik.rce](#) on Thu, 17 Mar 2011 10:35:09 GMT
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trader wrote on Wed, 16 March 2011 22:28Honza, I install U++ recently and I start get this error.

I will install Nightly PPA, but I prefer Stable.

Tks

Note that the most stable version of U++ is usually the latest. The stable releases only point IMHO is that they are not updated that often.

If you want to just surpass this one problem, you can leave the stable PPA set up on your system and just manually install the packages from nightly builds. Their version numbers are higher, so they will supersede the last stable, but as soon as next stable version comes out it will be installed and you are back into the stable releases automatically. The nightly debs can be downloaded directly e.g. from here: <http://ppa.launchpad.net/dolik-rce/upp-nightly/ubuntu/pool/main/u/upp/>.

Honza

Subject: Re: Linking problem

Posted by [luluxiu](#) on Fri, 01 Jul 2011 01:41:30 GMT

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I have found is that it sometimes complain about the lack of library, specify such Xrender. It looks like --start-group/--end-group command not working as hoped....

File Attachments

1) [undecided.gif](#), downloaded 408 times
