Subject: Slow processing of compilation/linking messages
Posted by Novo on Sat, 09 Jan 2016 03:47:53 GMT
View Forum Message <> Reply to Message

I spotted a performance problem with processing of large amount of compilation/linking messages.
Attached archive contains profiling information which I collected using Intel VTune.
I ran Win64 version of TheIDE built from a couple days old source code.

TheIDE.csv - data in csv format.
TheIDE.xlsx - data pasted into Excel.

Please take a look at a line below. It takes 114 second to build a package.
MakeBuild::BuildPackage 114.355s

File Attachments

1) theide.zip, downloaded 494 times

Subject: Re: Slow processing of compilation/linking messages
Posted by mirek on Tue, 12 Jan 2016 11:57:32 GMT
View Forum Message <> Reply to Message

Just to be sure I am reading it right:

I see that our problem is that it spends 30 seconds in ConsoleLine and 20 seconds in ProcessEvents. Is this correct?

BTW, any hint for testcase?

Mirek

Subject: Re: Slow processing of compilation/linking messages
Posted by Novo on Thu, 14 Jan 2016 04:15:23 GMT
View Forum Message <> Reply to Message

mirek wrote on Tue, 12 January 2016 06:57Just to be sure I am reading it right:

I see that our problem is that it spends 30 seconds in ConsoleLine and 20 seconds in ProcessEvents. Is this correct?

BTW, any hint for testcase?

Mirek

It is all about Ide::FindLineError.
Data is taken from the csv file.

Console::Wait 56.2542
Console::Flush 33.9297
Console::AppendOutput 31.305
Console::ToErrors 30.5814
Upp::Callback1<class Upp::String const &>::operator() 30.2399
Upp::Callback1<class Upp::String const &>::Execute 30.236
Upp::Callback1MethodActionArg<struct Ide,void (Ide::*)(class Upp::String const &,bool),class Upp::String const &,bool>::Execute 30.2312
Ide::ConsoleLine 30.2241
Ide::FindLineError 30.1371
IdeContext::GetMethodVars 13.3675
LoadVarFile 13.0497
Upp::LoadFile 10.0679
Upp::FindFile::FindFile 7.20606
Upp::FindFile::Search 7.16549
Upp::NormalizePath 5.89279
Upp::GetCurrentDirectoryA 5.78073
GetCurrentDirectoryW 5.6651

Ide::SetErrorEditor 91.036
Ide::FindLineError 84.486
Upp::FileExists 31.0498
Upp::FindFile::FindFile 30.0988
Upp::FindFile::Search 29.7346
Upp::NormalizePath 20.6142
Upp::GetCurrentDirectoryA 19.9171
GetCurrentDirectoryW 19.2236

PutLinkingEnd 45.8964
Ide::PutLinkingEnd 45.8964
Ide::FindLineError 43.6879
Upp::FileExists 15.7481
Upp::FindFile::FindFile 14.5634
Upp::FindFile::Search 14.4171
Upp::NormalizePath 10.6789
Upp::GetCurrentDirectoryA 10.0785
GetCurrentDirectoryW 9.58546

A test case is simple. You need to compile something that has a lot of error messages.
In my case I tried to compile 32-bit code using 64-bit version of TDM-GCC (by passing -m32) and linking against 64-bit libraries. This is an artificial test case but it highlights the problem.

Thanks.

Subject: Re: Slow processing of compilation/linking messages
Posted by mirek on Thu, 14 Jan 2016 06:48:23 GMT
View Forum Message <> Reply to Message

Thanks, this will be easy to optimize.

Mirek

Subject: Re: Slow processing of compilation/linking messages
Posted by mirek on Mon, 18 Jan 2016 08:59:39 GMT
View Forum Message <> Reply to Message

Should be now optimized. Please check.

Subject: Re: Slow processing of compilation/linking messages
Posted by Novo on Wed, 20 Jan 2016 04:02:01 GMT
View Forum Message <> Reply to Message

mirek wrote on Mon, 18 January 2016 03:59Should be now optimized. Please check.
TheIDE got much faster. Thank you.