

U++ - Bug #2067

C4927 warnings in Core with latest MSVC

09/13/2020 01:05 PM - Zbigniew Rebacz

| | | | |
|--|-----------------|------------------------|------------|
| Status: | Approved | Start date: | 09/13/2020 |
| Priority: | High | Due date: | |
| Assignee: | Miroslav Fidler | % Done: | 0% |
| Category: | Core | Estimated time: | 0.00 hour |
| Target version: | Release 2020.2 | Spent time: | 0.00 hour |
| Description | | | |
| It seems that compiling Core with latest MSVC produces a lot of warnings that have C4927. Screenshot with warnings attached. | | | |
| Would be nice to fix for 2020.1. | | | |

History

#1 - 09/13/2020 03:31 PM - Miroslav Fidler

Yeah, that is because MSVC is broken. Lucky that we have clang...

Mirek

#2 - 09/16/2020 04:11 PM - Miroslav Fidler

- Assignee changed from Miroslav Fidler to Zbigniew Rebacz

Have you managed to fix this?

#3 - 09/16/2020 11:06 PM - Zbigniew Rebacz

- Assignee changed from Zbigniew Rebacz to Miroslav Fidler

As we discuss we will keep it like it is and our recommendation is to do not use latest MSVC versions. If it will not be fixed in reasonable amount of time, we will remove all MSVC related code from TheIDE and we will base only open source solution such as clang ;) Open source compilers can be modify, so bugs like this can be fix easily ;)

Now to be serious. Maybe we should add explicit keyword to char* conversion operator of StringBuffer:

```
explicit operator char*()    { return Begin(); }
```

This will make this warnings errors... Explicit casting will solve the issue in all cases:

```
static_cast<String>(sb);
```

errors are fixed.

You should returning this whole situation and maybe we should apply explicit keywords in our code to avoid such situation.

Reference:
- https://google.github.io/styleguide/cppguide.html#Implicit_Conversions

Maybe from the usability point of view this change is heave, because each time you need to type casting operator. However from the code security point of view it is improvement.

#4 - 09/17/2020 09:43 AM - Miroslav Fidler
- Status changed from New to In Progress
- Assignee changed from Miroslav Fidler to Zbigniew Rebacz

Well, that is not very helpful. I hoped that you fix it with String(r) solution and send me the diff or whatever so that I can decide whether it is worth it.

As for that explicit nonsense, do you plan to fix C++ std:: library too? What about boost?

#5 - 09/17/2020 08:53 PM - Zbigniew Rebacz

I will try to generate patch in the weekend.

#6 - 09/22/2020 07:22 PM - Zbigniew Rebacz
- File StringBufferPatch.diff added

#7 - 09/23/2020 11:38 AM - Miroslav Fidler
- Status changed from In Progress to Ready for QA

Thank you. I have decided to go with it, so please check that trunk now works... (if it does, close the task).

#8 - 09/23/2020 07:54 PM - Zbigniew Rebacz
- Status changed from Ready for QA to Approved

#9 - 09/23/2020 09:06 PM - Zbigniew Rebacz
- File Skylark.diff added
- Status changed from Approved to In Progress
- Assignee changed from Zbigniew Rebacz to Miroslav Fidler

Two warnings in Skylark package would be good to fix...

#10 - 09/25/2020 12:29 AM - Zbigniew Rebacz
- Status changed from In Progress to Approved

| Files | | | |
|------------------------|-----------|------------|-----------------|
| C4927.png | 178 KB | 09/13/2020 | Zbigniew Rebacz |
| StringBufferPatch.diff | 23.8 KB | 09/22/2020 | Zbigniew Rebacz |
| Skylark.diff | 671 Bytes | 09/23/2020 | Zbigniew Rebacz |