Subject: [BUG - FIXED] TabDlg crashes the application
Posted by victorb on Mon, 19 Mar 2007 18:00:09 GMT
View Forum Message <> Reply to Message

There is a bug in TabDlg making applications crash.

My config is as follow:
- 2007.1 rc3,
- WinXP SP2,
- MinGW.

There is no issue as long as build in DEBUG mode but as soon as you switch to OPTIMAL mode the appli crashes when TabDlg is opened.

I have first noticed this bug with my own application but you can reproduce it with the reference code "TabDlg".

I am going to start investigate this and post if I can find a solution.

Victor

Subject: Re: [BUG] TabDlg crashes the application
Posted by victorb on Mon, 19 Mar 2007 19:17:20 GMT
View Forum Message <> Reply to Message

It seems to be something wrong with ChPaint() in void TabCtrl::PaintTabs(Draw& w)...

Subject: Re: [BUG] TabDlg crashes the application
Posted by victorb on Mon, 19 Mar 2007 19:27:07 GMT
View Forum Message <> Reply to Message

I trace it down to

```
Value sChOp(Draw& w, const Rect& r, const Value& v, int op)
{
 Value q;
 for(int i = sChps().GetCount() - 1; i >= 0; i--) {
  q = (*sChps()[i])(w, r, v, op);
  if(!IsNull(q))
   break;
 }
 return q;
```

}

No more time for today... We'll see tomorrow!

Subject: Re: [BUG] TabDlg crashes the application
Posted by victorb on Mon, 19 Mar 2007 22:50:37 GMT
View Forum Message <> Reply to Message

I finally found the issue in TabCtrl.cpp around l. 180

```
ChPaint(w, r,
 (tab.GetCount() == 1 ? style->both : i == 0 ? style->first :
  i == tab.GetCount() - 1 ? style->last : style->normal)
 [(!IsEnabled() || !t.enabled ? CTRL_DISABLED :
   phase?CTRL_PRESSED:
    i == hot?CTRL_HOT:CTRL_NORMAL)]
);
```

I don't know why but the compiler seems to dislike this writting... it could be fixed by rewritting the code as

```
int idx;
ChPaint(w, r,
 (tab.GetCount() == 1 ? style->both : i == 0 ? style->first :
  i == tab.GetCount() - 1 ? style->last : style->normal)
 [idx = (!IsEnabled() || !t.enabled ? CTRL_DISABLED :
   phase?CTRL_PRESSED:
    i == hot?CTRL_HOT:CTRL_NORMAL)]
```

Is it a compiler issue ? I am using 3.4.2 (delivered with Upp) could someone give it a try with an other version ?

Thanks,
Victor

Subject: Re: [BUG] TabDlg crashes the application
Posted by mirek on Mon, 19 Mar 2007 23:25:20 GMT
View Forum Message <> Reply to Message

Thanks. I will investigate tomorrow...

Mirek

Subject: Re: [BUG] TabDlg crashes the application
Posted by victorb on Tue, 20 Mar 2007 12:57:46 GMT
View Forum Message <> Reply to Message

I have updated to GCC4.1.2 today and the issue has disappeared.

It seems to confirm a compiler bug.

One *interesting* thing: the executable size has increased from 1.7M to 2.6M!

Subject: Re: [BUG] TabDlg crashes the application
Posted by mirek on Tue, 20 Mar 2007 14:05:39 GMT
View Forum Message <> Reply to Message

Are you (or was) using ld or uld?

Check the ld.exe in your mingw/bin. If it is >300KB, it is ld (mingw supplied linker), if it is smaller it is uld. uld is shipped with U++-mingw release. Using uld can have impact on executable size.

Mirek

Subject: Re: [BUG] TabDlg crashes the application
Posted by mirek on Tue, 20 Mar 2007 14:12:09 GMT
View Forum Message <> Reply to Message

Well, I have patched the code anyway....

Mirek

Subject: Re: [BUG] TabDlg crashes the application
Posted by victorb on Tue, 20 Mar 2007 15:25:50 GMT
View Forum Message <> Reply to Message

I was not aware about uld. Thanks for the tip.

My app has now decreased back to 1.8MB (slightly bigger than with U++ delivered MinGW)