
Subject: FrameAddSize(Size& sz) really needed?
Posted by [Werner](#) on Sun, 11 Jun 2006 10:35:47 GMT
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I can't see the point in using FrameAddSize(Size& sz).

Sure - the syntactical need for it is obvious because CtrlFrame::FrameAddSize(Size& sz) is a pure virtual function. If you don't define it in your derived class the compiler complains.

But where is the semantical need for it? Calling FrameLayout(Rect& r) calculates the new size of the view but lets the size of the control unchanged. FrameAddSize(Size& sz) is to compute the new size of the control. But this is unchanged, or is it?

This raises the following questions:

In which case is FrameAddSize(Size& sz) called by Ultimate++'s framework?
Or do I need to call it myself? If so: When?

Does it make sense to define and use FrameLayout(Rect& r) without semantically defining FrameAddSize(Size& sz)?

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Werner

Subject: Re: FrameAddSize(Size& sz) really needed?
Posted by [mirek](#) on Sun, 11 Jun 2006 19:07:33 GMT
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Is is required because sometimes you need to get the Size of Ctrl based on its view size.

(If you want to know when, try FindInFiles in uppsrc

Mirek

Subject: Re: FrameAddSize(Size& sz) really needed?
Posted by [Werner](#) on Sun, 11 Jun 2006 20:52:31 GMT
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luzr wrote on Sun, 11 June 2006 21:07Is is required because sometimes you need to get the Size of Ctrl based on its view size.

(If you want to know when, try FindInFiles in uppsrc

Mirek

Well, I once again tried FindInFiles (Indeed, I already did it before posting .) I learned that you always use FrameLayout in combination with FrameAddSize. And in principle I recognize that "sometimes you need to get the Size of Ctrl based on its view size". But I still can't figure out in which cases you do need it. As far as I grasp I should look for a piece of code querying the size of the control. But I don't understand which precise expression to look for .

So I don't know if I need FrameAddSize for my own frames. But of course I can write "FrameAddSize(Size& sz) {}" and just observe what happens .

Werner

Subject: Re: FrameAddSize(Size& sz) really needed?
Posted by [Werner](#) on Mon, 12 Jun 2006 15:20:20 GMT
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Werner wrote on Sun, 11 June 2006 22:52luzr wrote on Sun, 11 June 2006 21:07Is is required because sometimes you need to get the Size of Ctrl based on its view size.

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Well, I once again tried FindInFiles (Indeed, I already did it before posting .) I learned that you always use FrameLayout in combination with FrameAddSize. And in principle I recognize that "sometimes you need to get the Size of Ctrl based on its view size". But I still can't figure out in which cases you do need it. As far as I grasp I should look for a piece of code querying the size of the control. But I don't understand which precise expression to look for .

So I don't know if I need FrameAddSize for my own frames. But of course I can write "FrameAddSize(Size& sz) {}" and just observe what happens .

Werner

Just if somebody read this thread and might be interested in the answers ...

I fiddled about with some frames and I hope to have found the answers. Here they are (If something is wrong I would be happy to get corrected!):

1.
In which case is FrameAddSize(Size& sz) called by Ultimate++'s framework?

Never.

2.

Do I need to call it myself? If so: When?

Not normally. Only if I need to get the size of a ctrl based on the size of its view. So far I couldn't find an example where this is the case.

3.

Does it make sense to define and use `FrameLayout(Rect& r)` without semantically defining `FrameAddSize(Size& sz)`?

Yes, see the answer to question #2. But in any case in my own frame class for syntactical reasons I need to define the `FrameAddSize` function even if it's empty.

4.

Does it make sense to define and use `FrameAddSize(Size& sz)` without semantically defining `FrameLayout(Rect& r)`?

Maybe. But I doubt it very much. In any case I can't imagine a useful example.

All this sounds quite obvious. So, why did I ask these silly questions?

I studied the article "About Frames" in "Browse topics" where `FrameAddSize` is semantically defined in 2 cases. And I still wonder what is the need for this ...

Werner

Subject: Re: `FrameAddSize(Size& sz)` really needed?

Posted by [mirek](#) on Mon, 12 Jun 2006 16:48:19 GMT

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Well, as I said before, it is not needed until some situation expects the right value....

One of such situations is e.g. when creating `TopWindow` with layout

```
MyWin::MyWin()
{
    SetFrame(MyFrame);
    CtrlLayout(*this, "");
}
```

Now try to make `MyFrame` quite thick (e.g. 50 pixels) and do not implement `AddFrameSize`.

Mirek

Subject: Re: FrameAddSize(Size& sz) really needed?
Posted by [Werner](#) on Wed, 14 Jun 2006 13:52:51 GMT
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luzr wrote on Mon, 12 June 2006 18:48 Well, as I said before, it is not needed until some situation expects the right value....

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Mirek

Yes!

CtrlLayout calls AddFrameSize ...

```
template <class T>                                // In TopWindow.h
void CtrlLayout(T& ctrl)
{
    InitLayout(ctrl, ctrl, ctrl, ctrl);
    Size sz = ctrl.AddFrameSize(T::GetLayoutSize());
    ctrl.SetMinSize(sz);
    ctrl.SetRect(sz);
}
```

... and AddFrameSize in turn calls FrameAddSize ...

```
Size Ctrl::AddFrameSize(int cx, int cy) const    // In CtrlPos.cpp
{
    Size sz = Size(cx, cy);
    for(int i = frame.GetCount() - 1; i >= 0; i--)
        frame[i].frame->FrameAddSize(sz);
    return sz;
}
```

Sorry for the inconvenience!

Werner

Subject: Re: FrameAddSize(Size& sz) really needed?

Posted by [mirek](#) on Wed, 14 Jun 2006 15:45:09 GMT

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Werner wrote on Wed, 14 June 2006 09:52luzr wrote on Mon, 12 June 2006 18:48Well, as I said before, it is not needed until some situation expects the right value....

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}
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Sorry for the inconvenience!

Werner

Do not worry, keep digging.

Actually, AddFrameSize is really rarely used and in fact was added years after Frame interface first emerged to provide clean solution to similar corner-cases...

Mirek
