
Subject: Re: General widget programming questions
Posted by [davidf](#) on Fri, 12 Jan 2001 17:46:37 GMT
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Pavel A. Romashkin (pavel.romashkin@noaa.gov) writes:

- > P.S. Let's just say I am not advanced enough. David, you'll have to
- > expand your widget and object sections do move me forward and develop
- > the need in direct calls to event handlers :-)

One of the places I frequently use direct calls to event handlers is in my compound widget objects. As you know, most events in compound widgets are handled by an internal event handler. But occasionally you want to send the internal event (after extensive remodelling, usually) to some other event handler.

Normally, the internal event handler is associated with the top-level base of the compound widget (identified in the event handler as `event.handler`, by the way, NOT `event.top`). One way to send events on is to write the internal event handler as a function. You get the internal event into the function, re-arrange it, maybe add some fields to it, etc. and pass it along as the result of the function, where it merrily makes its way up the widget hierarchy.

This works great so long as the user doesn't want to assign an event handler procedure or function to the compound widget. (See any RSI-supplied compound widget, for example.) It doesn't work so great when you would like to re-direct the event somewhere else.

Since I want my compound widget to look and feel as much as possible like a simple widget, I usually define `Event_Pro` and `Event_Func` keywords for them. What I do, then, in the event handler method function (remember, I always write these as objects these days) is, when I am finished processing the event, and have the new event packaged up the way I want it, is call the specified event handler procedure or function directly. (I use `Call_Procedure` or `Call_Function`, of course, but you get the idea.)

If I *do* make the call directly, I turn the event structure into a 0 and return that as the result of the method function. The event is "swallowed". If the user hasn't specified an event handler, then I just return

the event structure as the result of the method function, and
the event bubbles up the hierarchy. This way I can have
my cake and eat it too. :-)

Cheers,

David

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