Thread affinity of user interface objects, part 4: GDI objects and other notes on affinity

devblogs.microsoft.com/oldnewthing/20051013-11

October 13, 2005

Raymond Chen

GDI objects are much simpler. As a general rule, they all have process affinity: They can be used by any thread in the process that created them. If you use a GDI object from multiple threads, it is your responsibility to coordinate the object's use.

Note that the window manager and GDI as a general rule keep their respective objects thread-safe. When I say that it is your responsibility to coordinate an object's use from multiple threads, I mean that you have to coordinate among your own threads if you're going to modify the object from one thread and read from it on another or modify it from two threads. For example, if one thread enumerates a menu while another is modifying it, the one doing the enumeration will get inconsistent results. Similarly, if two threads both try to change a menu item at the same time, the last writer will win.

Next time, we wrap up with a discussion of clean-up.

Raymond Chen

Follow