Heap Auditor - A Utility to Monitor the GDI,User & Global Heaps

Prerequisites:
Windows 3.1 and the toolhelp .dll library that comes with the standard Windows installation.

Function:
Display various statistics about the GDI, User and Global heaps. In particular, programmers can use the statistics to check for 'orphaned' objects in the GDI local segment.

Installation:
Copy audit.exe to any directory you wish, and launch whenever you're ready to use it. The toolhelp .dll library must be available in the path or Windows directory for audit to function.

The Display:
Audit displays two lines of general information at the top of the window in recessed boxes, and up to 10 lines of data below. The exact display depends upon the menu selections made from the menu bar:

GDI-LH - display info for the GDI local heap. Basically you'll see 9 lines of data giving the count of various kinds of GDI objects stored on the local heap. The display is updated
only when you reselect the menu item or select another.

User-LH - display info for User local heap objects. Unfortunately, only works when run under the Debug **user** binaries (available with the SDK).

MemMgr - Display info about the Windows memory manager. Works only in 386 enhanced mode. You get quite a bit of info about available, free and locked memory pages.

Using Audit
Programmers will find Audit helpful in diagnosing memory leaks. A couple of approaches are:

* run audit, and count the number of GDI objects, fire up your program, exercise it a bit, and shut down. Now update the audit display - if there are more GDI objects than before, your code is probably creating but not deleting them. Also check the % GDI and %User free resources which will decline as more objects are orphaned.

* use audit to monitor the total free memory available. This is an inexact science, but if the global memory continues to drop significantly everytime you run your program, look for unfreed allocations.

Disclaimer
You use audit entirely at your own risk. Only you can determine its suitability for your task and environment. I do hope you find it useful.

Author:
Doug Overmyer

Comments, Problems:
Drop me a note at CIS:71021,2535 or IP:overmyer@netcom.com