

## INTRODUCTION

The following is various tips & tricks I have come across. Some are not for public consumption. If you have any questions drop me note.

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Apgar, Eric on MS Mail

System 7 Answerline

## System 7 specific tips:

**Desktop Manager Init** — this Init allows you to use the new Desktop files under System 6. If you need to switch between Systems this can save some time as it avoids the rebuilding of the Desktop file every time you switch Systems! It can be found on the AppleShare Administration Disk in the System Folder. It has been confirmed as "safe" - by the Desktop Manager Engineer. Just put the Init in your System 6 System Folder. DO NOT put the Init in your System 7 System Folder. The Desktop Manager Init is NOT available to give to customers. It is only licensed to user's who have AppleShare already. If a user requests it, you CANNOT ship it to them. They CAN get it by purchasing AppleShare software.

**Saving MS Mail messages.** If you have a certain folder where you always store mail, put the MS Mail DA in that folder and place an alias to it the Apple Menu or wherever you launch MS Mail. When you go to save a message, the folder where MS Mail resides will be the default.

The current version of the HP **Deskwriter driver is not compatible with Virtual Memory** in 24-bit mode. **2 workarounds** from the Net are below.

A. First, make sure that it is an APPLETALK DeskWriter. For the first year of their release, the DeskWriter was only a serial device. There was a second model released about a year later that supported AppleTalk. You can tell by the part number. The original DeskWriter (serial-only) is model number 2278A. The AppleTalk-compatible DeskWriter is model number 2279A. For the original DeskWriter, the only fix is to await revised software from HP. For the Appletalk DeskWriter, hook up your DeskWriter via Appletalk. An 8-pin Mini Din cable (ImageWriter cable) will do fine if the Mac and Printer are the only devices on AppleTalk. Otherwise put the printer on your AppleTalk network (a PhoneNet or LocalTalk connector). Make sure you use the Deskwriter Appletalk printer driver. This driver is compatible with Virtual Memory.

B. It has been reported on the Net that setting your Mac to 32-bit mode will also eliminate the problem.

**Disinfectant 2.4** — the init should go in the root level.

**QuickInit 2.2.3** — the init should go in the root level. QuickFix should be run to make qm 32-bit clean. QuickFix (to make QuickMail 7.0 and 32-bit friendly) is Apple Internal Only. It is not for public consumption.

**ATM 2.0** — this is listed as incompatible with 32-bit addressing!

**Clipboard** — I think the Clipboard file only gets created if necessary. You doesn't always have a clipboard file in the system file.

**Scrapbook & Desktop patterns**— If you have an existing Scrapbook file in your System Folder when you do an installation, the Installer will not replace it with the new file. There are some neat things in the new Scrapbook file, so you will want to combine the two using a utility such as SmartScrap, if you need to keep the contents of the old one. If a user has a custom desktop pattern, the 7.0 patterns are NOT installed the same way 7.0 will not overwrite a custom scrapbook.

**PostScript** — under 6 one could save a PostScript text file by pressing option-f or option-k (?) right after printing. Now it is built into the 7.0 LaserWriter driver as a radio button option! Apparently the PostScript file option in the Print dialog box writes out the PostScript header — under 6 that was the difference between pressing option-f and option-k right after printing (one included the header and one did not). Under 7 the header is always included which can cause problems (BIG files) for the service bureau or whoever is printing. You can make them somewhat smaller by not printing TrueType fonts.

**A/ROSE** - Apple Real-time Operating System Environment. It is *\*not\** for the existing EtherTalk NB card, but rather for any MCP (Macintosh Co-processor Platform) card. These currently include the Serial NB card and the TokenTalk NB card. The new Apple Ethernet NB card is also an MCP card and will require A/ROSE when we ship that card. The System 7.0 installer should only install A/ROSE if it sees an TokenTalk or Serial NB card (or any 3rd party MCP-based cards). A/ROSE is an operating system for MCP cards (which use 68000's) and allow you to write tasks to execute on those cards.

**the Printing Installer Script** — only installs LaserWriter and Personal LW SC software. Use the full installer script for other printers.

**the Shift key** - make sure the caps lock key is not down and check if they have a StartUpScreen. Some 3rd party keyboards don't always work. This is for bypassing the extensions at boot time.

**command-option-esc** - force quit an application! after using you should restart. On a non-ADB keyboard I have heard command-option-tilde works.

**scanning order for init code:** 1) extensions folder 2) control panels folder 3) root level of system folder. In each the order is alphabetical.

**opening an alias to a fileserver** in an open dialog will open that fileserver for you, likewise dragging a file to an alias of a fileserver will copy the file to that fileserver after mounting it.

**ZAP the PRAM** — shift-option-command & control panel under 6.x and option-command-p-r at boot under 7.0.

**Install 1 Disk** — will not be bootable if disk to disk finder copied under 7.0, it will be if disk to disk finder copied under 6.0.x or sector copied (Disk Copy).

**Font/DA Mover** — does not ship with 7.0. 4.1 is available on AppleLink(?) and from dealers. Older versions will not open under 7.0!

**LaserWriter Font Utility 7.0** — is on the More Tidbits disk and can now turn off the laserwriter test page (Utilities : Start Page Options...).

**Word Finder Thesaurus work around** — install the DA into the app (word or macwrite) with the Font/DA Mover and it will work.

**Option Key** — hold it down and switch to another application and the finder will hide the current application.

**Network Install with PUK?** — (Whether or not we should be telling people this is another issue.) Yes, it can be done. There is only one version of the Installer and it can do a Network Install. The way to do it is - create a folder (Net Install) and drag all disk images needed for the install (all disks except for disk Tools) to the Net Install folder, and then drag the Installer and the Install script out to the top level of the Net Install folder. You can also run the printing installer over the network by opening the printing folder and running the printing installer script.

**Out of Memory in the Finder?** — sometimes the Finder runs out of memory in System 7. To edit the amount of RAM allocated to the System 7 Finder, boot up under System 6.0.7 and then Get Info the 7.0 Finder.

**Screen dump to Imagewriter?** — Under 6.0.X Command-Shift-4 dumped the screen to an ImageWriter. This is not in 7.0 and cutting and pasting the FKEY resource does not work. Workaround? — FlashIt (ShareWare) or some other screen capture utility.

Or for a 2-step workaround do Command-Shift-3 and then print from TeachText.

**Disk First Aid** — it seems like 50% of my 800 calls involve Disk First Aid and it usually finds damage and repairs it. But, this doesn't always fix the problem. If the caller's problem persists after Disk First Aid fixes something, I recommend a clean install. Also if Disk First Aid can not repair the problem, confirm they are booting from Disk Tools and running DFA that is on the floppy. If they really can not repair they must re-initialize unless some 3rd party program comes out that can fix the damage.

With **Apple HD SC Setup** you can see some information about the HD driver. Click Partitions and then click Custom and then click Details.

**Radius Rom Version** — For those of you wanting to find out your ROM version number, open the cdev (II display, SE/30 Display, ...) and click on the apple at the top of the Tear-Off Menu icon. It should pop up a dialog and underneath is 2 lines of boxes; one box for each slot in your machine. The top line identifies the video card with a FOP, TPD GS/C depending on the card type and the box underneath gives the version number of the ROM.

**Removable & virtual memory** — I distributed a note about a program that can modify the memory control panel to work with removable media. Since then I have come across another wor around that does not involve modifying any system software. If you spin up a removable after booting your system and then mount the removable with something like SCSI probe, the Macintosh will think the removable is a real hard drive and do virtual memory on it.

**Thunder 7 & DAs** — open Microsoft Mail or any DA thru Suitcase, load it into Thunder's list with the Thunder control panel and then revert to your original setup and Thunder will work with the DA.

**When printing a screen dump** from TeachText only print the first page or turn the page setup to Landscape — this avoids the unnecessary second page!

With DiskTop one can **launch older versions of the Font/DA Mover** under System 7. But beware, older versions may not work with TrueType fonts.

As discussed in the latest (June 1991) MacUser, Minor\*Repairs 1.01 is a free, public-domain utility from 1stAid Software that **rebuilds the Mac desktop file WITHOUT losing comments** from the Get Info dialog boxes. It's a handy alternative to Widgets (CE Software) and the FileSaver/Format Recover combination of the Norton Utilities that perform essentially the same task. PowerUsers may still prefer the ResEdit approach to rebuilding the desktop, however, which was discussed in some detail in the March (pg 231) and November (pg 279) 1990 issues of MacUser.

**System 7.0 will NOT show you the total size of your disk partition** because it is showing you “user available” space. The big files that “take away” space are the directory, catalog file and extents file. For example - my Mac partition is set at almost 82 Megs but the finder reports 68.9 in disk and 9.8 available which adds up to 78.7 Megs — over 3 Megs “missing.”

**Finder Speed Tip:** turn off the colored windows using the Color control panel (set the Window Color to B&W). This speeds things up considerably. Apparently the extra expense of drawing the color scroll bar and various other window pieces is what causes the slowdown.

Turn off calculate folder sizes from the views control panel if it is on. Also, AfterDark 2.0.t is classified as mostly compatible, the mostly means that it usually won't cause crashes, but it does slow things down.

If you need to find out **exactly how much memory an application is taking**, turn on Balloon Help and point at the thermometer in "About This Macintosh."

The **Macintosh II EtherTalk® NB Card** (M0410LL/A) is compatible with the EtherTalk software that is included with System 7. Those who wish to use this card with System 7 should install the Software included with System 7 and **NOT** the software that came originally with the product.

The **Apple Ethernet LC Card** (M0443LL/A) and the soon to be released **Apple Ethernet NB card** (M0417LL/A) are completely compatible with System 7, provided the users install the software that comes with those products. The EtherTalk software included with System 7 is currently **NOT** compatible with those cards.

## How to change Finder Menus

**Disclaimer:** all of the below assumes that you know how to use ResEdit. If you don't, please don't attempt this, as it might damage your Finder. Which reminds me: it is always a wise idea to keep a backup of your original Finder (just in case something goes wrong...).

### Method 1:

If want to change or add a command key to a menu item, you have to poke around until you find the text of the menu item's name (e.g. "Empty Trash") and then change the byte that is three bytes before the first letter of the item's name to the command key.

Maybe an example would be more clear--to be able to use Command-T to "Empty Trash", open fmnu #1255 (ResEdit opens fmnu's as generic resources), and change byte number 2C to "T" or \$54. Byte number 2C is three bytes before the "E" in "Empty Trash" at byte number 2F.

Like most things with ResEdit, this isn't for the faint of heart, and for all I know it may have some disastrous consequences. But it's worked for me, and I haven't noticed any side effects.

### Method 2:

Note: I have heard that there are some ResEdit templates up on American Online.

The new Finder for System 7.0 has indeed been completely rewritten (in C++) and this is the very reason why none of the old ways to customize the Finder with ResEdit work anymore.

There are, however, a couple of things you can actually do with ResEdit in the new Finder, too. The menus are stored in resources of type 'fmnu' (they include quite a bit more information than would fit in the regular 'MENU' resource type) and here is how you can edit them: Use ResEdit (preferably 2.1, but it should also work with older versions) to **modify the ResEdit Preferences file** (in the Preferences folder inside your System Folder) by adding a new resource of type 'TMPL'. Create 15 new fields in the list and enter the following values for "Label" and "Type":

Label	Type	Comment
Visible	DWRD	1=Menu is visible in Menubar; 0=invisible
Item Count	DWRD	the number of items in the menu plus 1
???	DWRD	???
Menu Number	DWRD	the resource ID of the 'fmnu'
???	DWRD	???
???	DWRD	???
Title	ESTR	title of menu (padded to an even length)
*****	LSTB	begin of item list
AppleEvent	TNAM	corresponding AppleEvent for this item
???	DBYT	???
???	DBYT	???
Cmd Key	CHAR	keyboard equivalent of command
???	DBYT	???
Item Text	ESTR	text of item
*****	LSTE	end of item list

Please note, that a "???" indicates, that I simply don't know what these fields contain (maybe they will one day be documented by Apple). Once you've entered this list, close the 'TMPL' resource you've just created and change it's name to 'fmnu' (using the "Get Resource Info" command). Finally close and save the preferences file. You are now

ready to edit the Finder's menus!

There is, however, one tricky thing to actually do this: you have to create a duplicate of the Finder, edit the copy, and finally replace it in the System Folder and reboot.

While the above technique will actually give you the same freedom of customization that you already had in the 6.0.x days, there is lots more you can do with the new 'fmnu' resources:

1) The 'fmnu' resource type is NOT position-dependent anymore! This means that you can actually completely REARRANGE the menus in the Finder. All you need to do is make sure that you copy all the information stored in the various fields of an item to it's new destination (copy/paste can be a lot of help here!). You can even create your own menu and move commands from other menus to the new one!

2) If you find yourself getting annoyed by the fact that you always have to go through a lengthy duplicate/edit-the-copy/replace/reboot sequence to try out a new variation, the following might be a tip for you: you can actually add a "Quit" command to the Finder! Here is how: Open the 2nd 'fmnu' resource in the Finder (for the File menu) and add 2 to the number of menu items (Item Count); Copy a separation line and append it to the end of the menu; Create another new item at the end of the menu; For this last item put 'quit' in the AppleEvent field, -127 in the next field (the one labeled ???), and finally "Quit" in the item text field. What this actually does is tell the Finder to send a "quit" AppleEvent to itself every time you choose that command from the menu. If you now want to customize the Finder, life is suddenly easy: just launch ResEdit; switch to the Finder; Quit from the Finder (doesn't that sound weird?!); edit the Finder from within ResEdit; Quit from ResEdit (once you quit the last running application the Mac will relaunch the Finder); voila - you are back in the Finder and didn't even have to reboot in order to see your newly customized Finder.

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**When using on-board video, the IIsi and IICI don't use separate VRAM, but some of the DRAM that is part of the standard system memory.** The Macintosh LC does have separate VRAM on it's motherboard. As a default on the IICI and IIsi, 320K of DRAM is reserved for 8-bit color. Switching back to black and white mode (with the Options dialog box in the Monitors Control Panel) gives a user about 264K of DRAM for System and Application use.

There has been a lot of talk about **poor performance when operating Macintosh IIsi's and IICI's in the 8 bit mode** (256 colors or grays). Just when most of us were about to accept the fact that our machines are 70% slower when running in this mode, Kurt Behnke posted the following message:

>> The explanation is that the video RAM sits in the 1 M RAM bank A

>> (fixed on the board), that is very busy (the more colours the busier).  
>> Hence access to this part of memory is very slow.  
>> The solution is actually very easy: Adjust the RAM CACHE to  
>> 768 K. As a consequence bank A is all video and RAM cache. Then  
>> the performance with 256 colours is (almost) as good as in Black  
>> and White.

I tried it on a Mac IIsi (5 Meg, System 7) and it made a big difference: the CPU benchmarks increased by 70%! and the actual redrawing speed by 30 to 35%. However, I don't think it is necessary to waste as much memory as originally suggested. I ran benchmarks using a RAM cache of 768,512,384,256, and 128k, and found that the **optimum tradeoff between speed and "wasted" memory is 384k**. The CPU benchmark obtained using this cache size was 1.5% less than the one obtained when 784k were used, but you save 384k of RAM. Using a 256k cache causes my Mac to perform as slow as before.

My recommendation is to get a bench marking program from the network (like MacSpeed, shareware) and try different cache sizes to find out what size provides the best performance on your machine.

## **Other tips:**

**Hypercard 2.1 Lite** — the Hypercard that ships is made to look like it only supports the first two user-levels. Just go to the last card of the Home Stack (command-4), bring up the message box (command-m) and type Magic and press return.

**changing your mail notification sound:** 1) using soundedit, save the desired sound into the MS Mail file (NOT the DA) 2) open MS Mail with ResEdit 3) delete the chime resource in the snd resource 4) rename the new resource chime in get resource info under file.