

# About Recover98®-EXPRESS

## Introduction

Recover98-EXPRESS is a simple to use "Raw Undelete" for Windows 95/98. Recover98-EXPRESS allows the user to recover files which have been deleted from the system, even if they were removed from The Recycle Bin or deleted from The Command Prompt. By scanning the drive and retrieving deleted file names Recover98-EXPRESS can build a Virtual File System containing deleted files on the disk. The deleted files are displayed in a File Manager type window with their original paths preserved; this makes finding deleted files fast and simple.

Recover98-EXPRESS can recover files, regardless of how long ago the files were deleted, as long as the files have not been overwritten by the file system.

## System Requirements

Recover98-EXPRESS requires a system running Windows 95 or Windows 98 and at least 16 Megs of RAM. A mouse is required.

## License Agreement

Recover98 and Recover98-EXPRESS are Registered Trademarks of LC Technology International, Inc. 1999 All Rights Reserved

Copyright Advanced Utilities GmbH 1999, All Rights Reserved

Windows is a Trademark of Microsoft Corporation, Redmond, Washington, USA

READ THE TERMS AND CONDITIONS OF THIS LICENSE AGREEMENT CAREFULLY. THE PROGRAM IS COPYRIGHTED AND LICENSED (NOT SOLD). BY OPENING THE PACKAGE CONTAINING THE PROGRAM, YOU ARE ACCEPTING AND AGREEING TO THE TERMS OF THIS LICENSE AGREEMENT. IF YOU ARE NOT WILLING TO BE BOUND BY THE TERMS OF THIS LICENSE AGREEMENT, YOU SHOULD PROMPTLY RETURN THE PACKAGE IN UNOPENED FORM, AND YOU WILL RECEIVE A REFUND OF YOUR MONEY. THIS LICENSE AGREEMENT REPRESENTS THE ENTIRE AGREEMENT CONCERNING THE PROGRAM BETWEEN YOU AND LC Technology International Inc. (REFERRED TO AS "LICENSOR"), AND IT SUPERSEDES ANY PRIOR PROPOSAL, REPRESENTATION, OR UNDERSTANDING BETWEEN THE PARTIES.

1. **License Grant.** Licensor hereby grants to you, and you accept, a nonexclusive license to use the Program Diskettes and the computer programs contained therein in machine-readable, object code form only (collectively referred to as the "Work"), and the accompanying User Documentation, only as authorized in this License Agreement. The Work may be used only on a single computer owned, leased, or otherwise controlled to you; or in the event of the inoperability of that computer, on a backup computer selected by you. Neither concurrent use on two or more computers nor use in a local area network or other network is permitted without separate authorization and the payment of other license fees. You agree that you will not assign, sublicense, transfer, pledge, lease, rent, or share your rights under this License Agreement. You agree that you may not reverse assemble, reverse compile, or otherwise translate the Work.

Upon loading the Work into your computer, you may retain the Program Diskettes for backup purposes. In addition, you may make one copy of the Work on a second set of diskettes (or on cassette tape) for the purpose of backup in the event the Program Diskettes are damaged or destroyed. You may make one copy of the User's Manual for backup purposes. Any such copies of the Work or the User's Manual shall include Licensor's copyright and other proprietary notices. Except as authorized under this paragraph, no copies of the Program or any portions thereof may be made by you or any person under your authority or control.

2. **Licensor's Rights.** You acknowledge and agree that the Work and the User's Manual are proprietary products of Licensor protected under U.S. copyright law. You further acknowledge and

agree that all rights, title, and interest in and to the Program, including associated intellectual property rights, are and shall remain with Licensor. This License Agreement does not convey to you an interest in or to the Program, but only a limited right of use revocable in accordance with the terms of this License Agreement.

3. **License Fees.** The license fees paid by you are paid in consideration of the licenses granted under this License Agreement.

4. **Term.** This License Agreement is effective upon your opening of this package and shall continue until terminated. You may terminate this License Agreement at any time by returning the Program and all copies thereof and extracts there from to Licensor. Licensor may terminate this License Agreement upon the breach by you of any term hereof. Upon such termination by Licensor, you agree to return to Licensor the Program and all copies and portions thereof.

5. **Limited Warranty.** Licensor warrants, for your benefit alone, for a period of 90 days from the date of commencement of this License Agreement (referred to as the "Warranty Period") that the Program Diskettes in which the Work is contained are free from defects in material and workmanship. Licensor further warrants, for your benefit alone, that during the Warranty Period the Program shall operate substantially in accordance with the functional specifications in the User's Manual. If during the Warranty Period, a defect in the Program appears, you may return the Program to Licensor for either replacement or, if so elected by Licensor, refund of amounts paid by you under this License Agreement. You agree that the foregoing constitutes your sole and exclusive remedy for breach by Licensor of any warranties made under this Agreement. EXCEPT FOR THE WARRANTIES SET FORTH ABOVE, THE PROGRAM, AND THE SOFTWARE CONTAINED THEREIN, ARE LICENSED "AS IS," AND LICENSOR DISCLAIMS ANY AND ALL OTHER WARRANTIES, WHETHER EXPRESS OR IMPLIED, INCLUDING, WITHOUT LIMITATION, ANY IMPLIED WARRANTIES OR MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE.

6. **Limitation of Liability.** Licensor's cumulative liability to you or any other party for any loss or damages resulting from any claims, demands, or actions arising out of or relating to this Agreement shall not exceed the license fee paid to Licensor for the use of the Program. In no event shall Licensor be liable for any indirect, incidental, consequential, special, or exemplary damages or lost profits, even if Licensor has been advised of the possibility of such damages. SOME STATES DO NOT ALLOW THE LIMITATION OR EXCLUSION OF LIABILITY FOR INCIDENTAL OR CONSEQUENTIAL DAMAGES, SO THE ABOVE LIMITATION OR EXCLUSION MAY NOT APPLY TO YOU.

7. **Trademark.** "Recover98 EXPRESS" is a trademark of Licensor. No right, license, or interest to such trademark is granted hereunder, and you agree that no such right, license, or interest shall be asserted by you with respect to such trademark.

8. **Governing Law.** The License Agreement shall be construed and governed in accordance with the laws of the State of Florida.

9. **Costs of Litigation.** If any action is brought by either party to this License Agreement against the other party regarding the subject matter hereof, the prevailing party shall be entitled to recover, in addition to any other relief granted, reasonable attorney fees and expenses of litigation.

Recover98 and Recover98-EXPRESS are Registered Trademarks of LC Technology International, Inc.  
1999 All Rights Reserved

Copyright Advanced Utilities GmbH 1999, All Rights Reserved

{button Print,Print()} Print The License







## Installation

Recover98-EXPRESS is supplied on a CD-ROM, which should Autorun when inserted into the CD-ROM Drive of the machine (if Autorun is enabled). If the CD fails to Autorun, open Windows Explorer and DOUBL CLICK the CD-ROM Drive Icon.

You will have the choices:

Run Recover98-EXPRESS from the CD-ROM  
Install Recover98-EXPRESS

**If the deleted files you wish to retrieve are on this machine, DO NOT INSTALL RECOVER98-EXPRESS, run the program from the CD and recover the files first to avoid overwriting the deleted files during the installation.**

Once you have recovered the files you desire, Install Recover98-EXPRESS. It is recommended that you use the default settings of the installer, but Recover98-EXPRESS will run from any directory on the system or from a Floppy Disk in emergency situations.

The Recover98-EXPRESS.exe file can be copied to a floppy and executed on the machine if necessary, but it is licensed only for use on one machine.

{button Print,Print()} Print This Topic

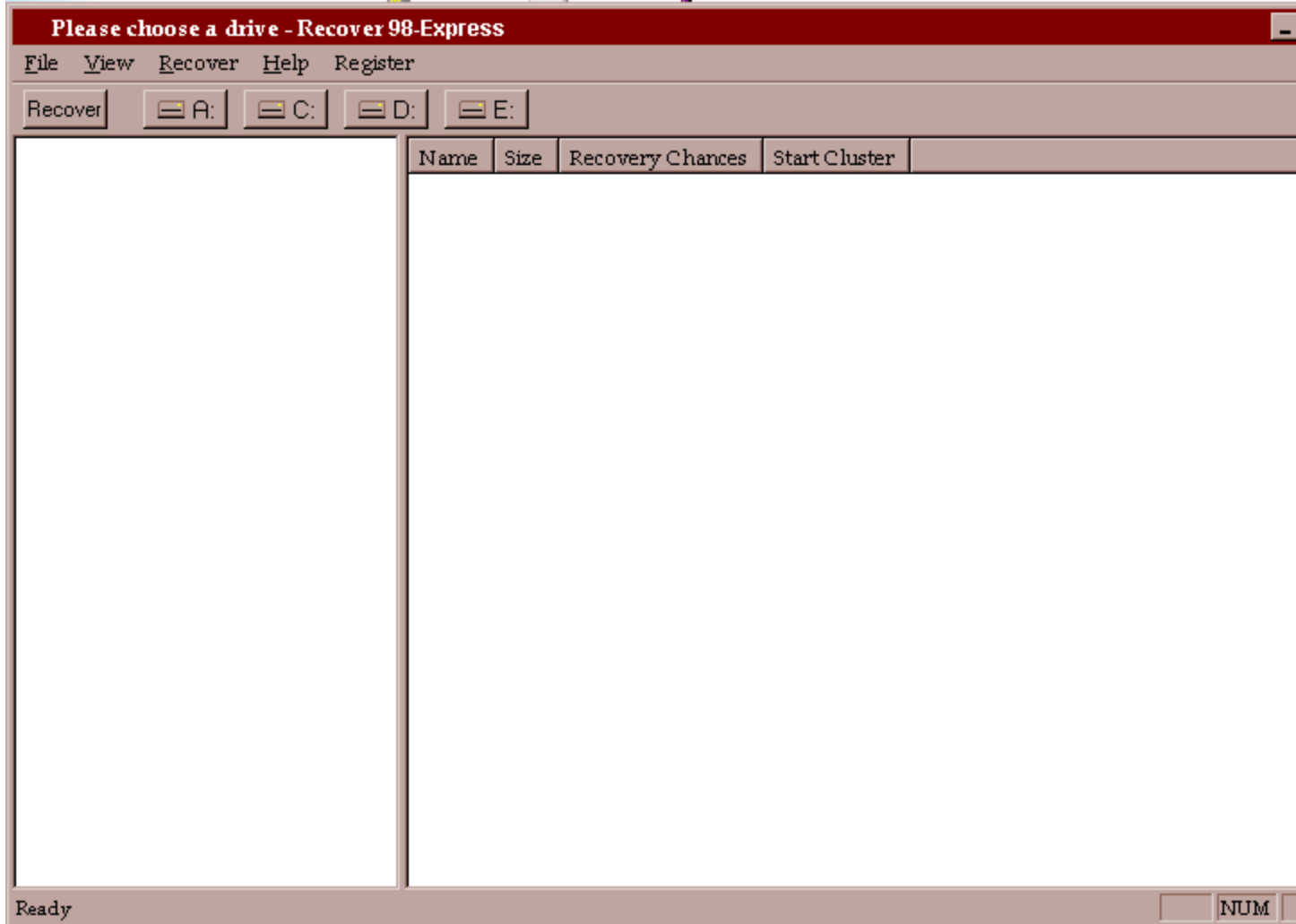
Recover98 and Recover98-EXPRESS are Registered Trademarks of LC Technology International, Inc. 1999 All Rights Reserved

Copyright Advanced Utilities GmbH 1999, All Rights Reserved

Windows is a Trademark of Microsoft Corporation, Redmond, Washington, USA

## Running Recover98®-EXPRESS

Once the program is executed you will be presented with the following Main Screen, which is the Recover98-EXPRESS File Manager.



The Toolbar will display the Recover Button as well as all the drives available to the system. You can scan any drive for deleted files by CLICKING the Drive Letter in the Toolbar. Once Clicked the File Scan will commence and a status bar will be displayed.

{button Print,Print()} Print This Topic




Recover98 and Recover98-EXPRESS are Registered Trademarks of LC Technology International, Inc. 1999 All Rights Reserved

Copyright Advanced Utilities GmbH 1999, All Rights Reserved

Windows is a Trademark of Microsoft Corporation, Redmond, Washington, USA

## Finding Deleted Files

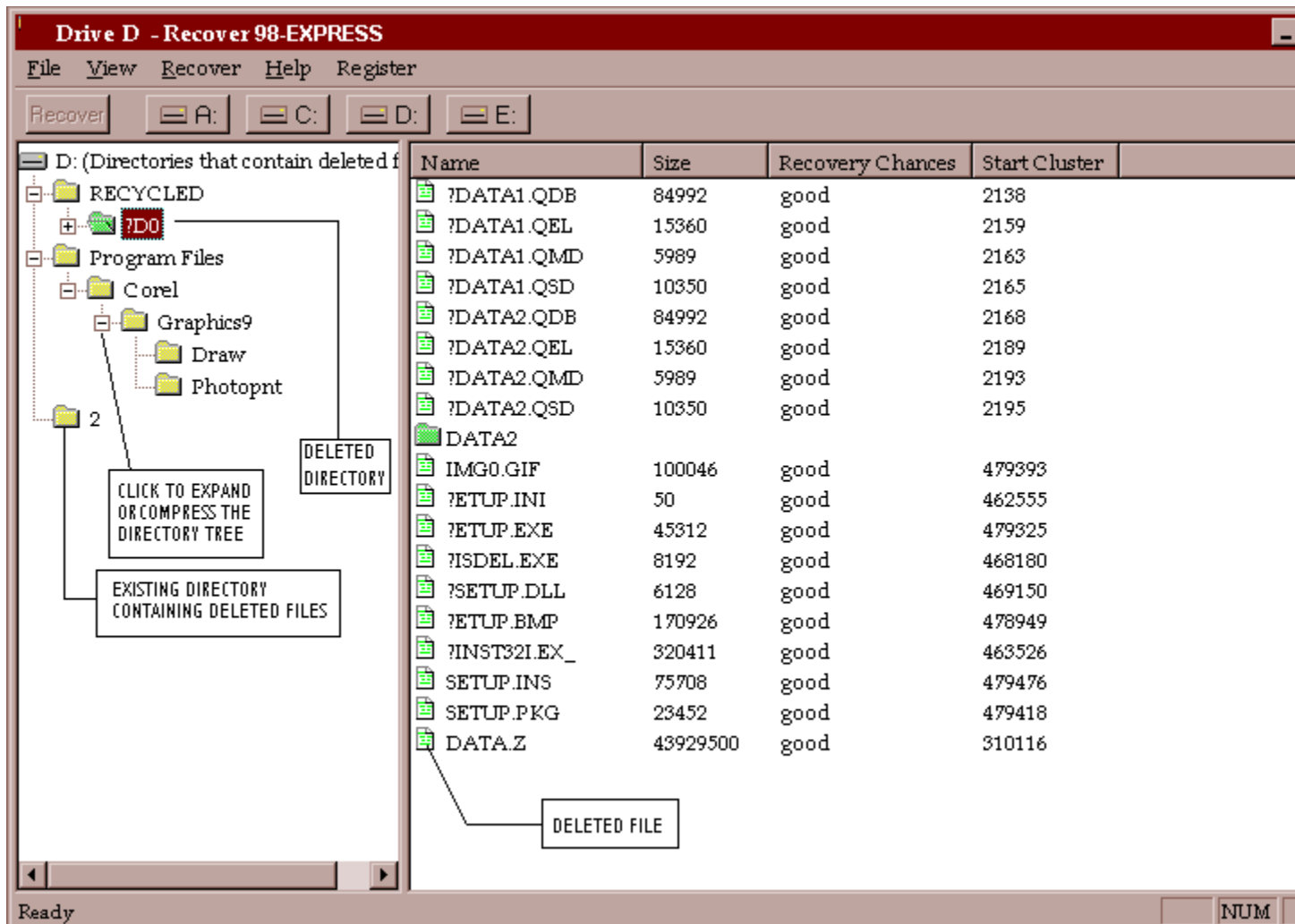
Once the scan of the drive is complete the Virtual File System will be displayed in the File Manager. The Virtual File System will show only Deleted Files, Deleted Directories containing Deleted Files and Directories containing Deleted Files. Directories with no deleted files will not be displayed. You can distinguish between Deleted and Existing Directories as follows:

ICON	MEANING
	A green folder indicates a directory which has been deleted from the drive which you have scanned. This directory may or may not contain deleted files.
	A yellow folder indicates a directory which exists on the drive and contains deleted files, remember, directories which contain no deleted files will not appear in the Virtual File System.
	A green page indicates a deleted file. The # in front of the file is the missing first letter of the file. The File System uses this as a deleted file designator.

You can DOUBLE CLICK a directory to change into that directory. The Virtual File System can be expanded by CLICKING the + next to the directory in the left pane of the File Manager. The right pane will contain the files and directories within the selected directory in the right pane.

As Follows:





{button Print,Print()} Print This Topic

Recover98 and Recover98-EXPRESS are Registered Trademarks of LC Technology International, Inc. 1999 All Rights Reserved

Copyright Advanced Utilities GmbH 1999, All Rights Reserved

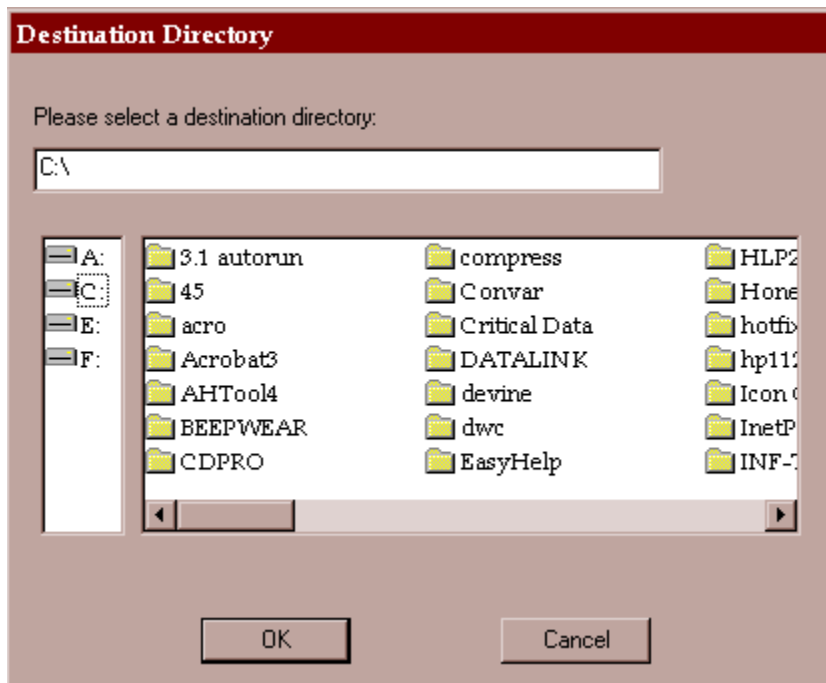
Windows is a Trademark of Microsoft Corporation, Redmond, Washington, USA

## Saving Recovered Files

Once you have located the files you wish to recover you will need to save them to a new location. Files should be saved to a different drive to avoid overwriting existing deleted files you may wish to recover. Removable media such as Zip Drives or Floppies or a Network Drive if one is available is most desirable.

To save files highlight the file with your mouse, You can choose multiple files using the SHIFT or CTRL key to highlight more than one file. This is exactly the same as in Windows Explorer, or you can choose all the files in a directory by CLICKING Recover in the Menu Bar then CLICK Select All. Once the files are selected CLICK the Recover Button.

You will be presented with the Save Files Screen. Choose a drive and directory to save the files to. You may create a Directory "on the fly" by typing in the desired path and directory name, for example, C:\RECOVERED FILES\, would create the Directory, if it did not already exist, and place the files on Drive C: in a Folder called Recovered Files.



To choose the directory, simply CLICK the desired drive in the Drive List, and then CLICK the directory in the Directory List.

Once the directory is open, CLICK OK. The files will be saved to the chosen directory.

{button Print,Print()} Print This Topic

Recover98 and Recover98-EXPRESS are Registered Trademarks of LC Technology International, Inc. 1999 All Rights Reserved

Copyright Advanced Utilities GmbH 1999, All Rights Reserved

Windows is a Trademark of Microsoft Corporation, Redmond, Washington, USA

# Troubleshooting

While Recover98-EXPRESS is simple to use, there are some conditions that may cause errors to be generated. These conditions are outlined below, and are easily corrected.

## At Start Up

If Recover98-Express is started under WindowsNT the following Message will be generated:  
**("The program only runs under Windows 95/98.")**, To correct the problem make sure the system you are working on is Windows 95 or Windows 98.

## ERROR MESSAGES AFTER PRESSING RECOVER BUTTON

The following message will be displayed if Recover98-EXPRESS runs out of memory. This is the only event that can cause the program to crash. Though the memory exception is caught, there could be some cleaning up problems after the following message box was displayed (**"An exception occurred. The program will be terminated. Close all other applications before you start the program again. )** To solve this problem free up some memory by closing all unnecessary programs and restart the system.

If another application has locked the drive for exclusive access (another utility, defragger, scandisk, or a Network User) the following message will be displayed:  
**("Cannot access drive. Close other applications before you continue.")**. To solve this condition, close everything running on the system, you may need to restart to release the drive.

If you attempt to recover from a removable drive (ZIP, Bernoulli Etc.) and the drive is empty the following error will be displayed: (**No or no valid removable disk in drive:**) or (**"No valid disk in drive."**) To solve this issue insert the proper disk in the drive.

If you have been infected with a Virus or if the Disk is damaged you may receive the following message:  
**("Cannot read boot sector.\n Cannot work with this drive.")** You may be able to solve the problem by Re Sysing the drive using the command SYS X: where X is the letter of the drive you want to work with or by using the FDISK /MBR Command, DO NOT RUN FDISK WITHOUT THE /MBR SWITCH, YOU COULD LOSE DATA!

If a removable drive has an invalid File Allocation Table or if it is not FAT formatted the following message will be generated: The FAT of a removable disk could not be read:  
**("The program cannot work with this disk. \n",).** To solve this problem check that you are using the right cartridge.

If The FAT of a fixed disk drive could not be read the following message will be generated:  
**("The program cannot work with this drive:\n the FAT could not be read.")**. This may be a serious issue witch requires a Full Version Of Recover98 to perform data recovery, this issue may be beyond the scope of an undelete. Contact LC Technology Immediately after taking the drive out of service.

If no files are selected to save the following message will be displayed: (**"No files are selected."**). To solve this, simply select some files to save.

## **ERROR MESSAGES AFTER ENTERING PATH IN DESTINATION DIRECTORY BOX:**

The path didn't begin with X:, where X is the Drive Letter; the following message will be generated: **("Please select a path.") Or ("Cannot save to:\n" PATH "\n\n Please choose a valid path.")**. To solve this enter a valid path, for example, C:\RECOVERED FILES\.

If the user selected a path on the drive with the deleted files the following message will be generated: **("You cannot save the files to the drive where they were located.")**. To solve this, choose another drive.

If the path ended with \ or \ or // or \ the following message is generated: **("Invalid Path.")**. To solve this enter a valid path, for example, C:\RECOVERED FILES\.

If the directory didn't exist and couldn't be created (e.g. on read only drive) then the message: **("Could not create directory\n" (directory is appended)** is displayed. To solve this choose another drive that is not read only, or check you permissions for the drive.

Before recovering removable drives make sure that the disk with the same number of sectors is still in the drive or the following will be displayed: **("Disk has changed. Scan again.")**. If you changed disk on purpose, you must rescan the disk to update the file list.

If the target disk is full or doesn't have room for the recovered files the this message will be displayed: **("File could not be saved. Is the disk full?")**. To solve this, make room on the disk or choose a location with more free space.

If a directory was selected rather than a file the following is displayed: **("Directories cannot be recovered. Please select the files inside the directory.")**. To solve this, choose the files within the directory or sub directory then resave.

If files(s) could not be saved because files with the same name are already in the destination directory: **("File(s) of the same name already exist in\n")**. To solve this problem, choose or create an empty directory, undelete the files and copy the ones you need to the proper location.

Sometimes a heavily fragmented file cannot be recovered. This occurs when the free space on the disk is smaller than the file size (rare): **("Some fragmented file(s) could not be completely recovered.")**. Try saving to a different location, but these files are probably unrecoverable.

When a file couldn't be created with the given filename, the file is saved as r4a0001.r4a or r4a0002.r4a. If all 9999 filenames already exist the following is displayed: **("Some filename(s) seem to be invalid. These file(s) could thus not be recovered.")**. Rename the already recovered files and try to recover additional files.

After the scan is completed, if a deleted file was overwritten and the space is no longer free the following message is displayed: **("The disk space for some file(s) is already allocated.")**. The file is now unrecoverable, this is an example of why the undelete should be preformed as soon as possible, or the drive should be taken out of service until the recovery can be completed.

If a sector of the deleted file could not be read and the file was not completely recovered the following message is displayed: **("Couldn't read some sector from disk.")** along with **("Some file(s) could not be undeleted.")**. Try rescanning, but chances of recovery are slim.

The extension of a filename was invalid and prevented the filename from being created, thus the default

extension r4a was used: ("**Some files were recovered using the default file extension R4A.**"). Not a problem, just rename the files with their original extensions.

If the filename was invalid and prevented the filename from being created, thus the default filename was used the message would be: ("**Some files were recovered using the default filename R4A\_!?!?!?."**). Again, not a problem, simply rename the files to their original names.

Recover98 and Recover98-EXPRESS are Registered Trademarks of LC Technology International, Inc. 1999 All Rights Reserved

Copyright Advanced Utilities GmbH 1999, All Rights Reserved

Windows is a Trademark of Microsoft Corporation, Redmond, Washington, USA

