

MenuMail

1. Introduction

1.1. Why ?

Imagine the following situation : a phone call comes in for Mr. Smith, but he is not at his desk, but hovering around in the offices. How will the secretary find him ? Easy, send a small message to each Macintosh in the office to ask if Mr. Smith is in the neighbourhood. Each user needs only **one** mouse click to answer the message. Or maybe, you would have liked to be warned when Mr. Smith is back at his desk ?

MenuMail was conceived to send simple messages to a large group of users. The key requirement was that the system should be **unobtrusive** : The user need not interrupt his work in order to read the message and to make a reply.

This requirement translated into two concepts :

- The user should be able to continue his work while the message was displayed on the screen.
- Replying should be as 'harmless' as possible, one mouse click should be enough, but more elaborate replies can also be made.

1.2. Why MenuMail ?

Traditional paging systems fall short on several points.

- Shouting in the corridor doesn't make a good impression on customers and is bad for the voice [Begin Footnote] --- This software is dedicated to Peggy Horemans (our dear secretary), she used this system for years. Her voice is recorded for eternity in the About-box.--- [End Footnote].
- A system with speakers in every office is distracting.
- The conferencing capability of existing mailing systems is slow and it interrupts the user's work substantially.

During the first stages of user testing, **MenuMail** soon substituted the conferencing capability of our electronic mail : it is much less distracting.

1.3. What is MenuMail ?

MenuMail is a system of sending small messages to other Macintoshes via the local network. The messages are displayed in an unobtrusive way : they appear in the menu bar. Although the normal menus are invisible, the user can continue working, he can even continue to use the normal menus : they are simply hidden underneath the message.



The **MenuMail** message can have several buttons with a standard reply. Clicking in one of these, makes the message go away and sends the reply to the sending Mac.

The **MenuMail** message can also have a reply-button. Selecting that one shows a dialog window where the user can formulate a custom reply.

The sender of a message has the capability to display all replies he gets in his own menu bar : he can then instantly react to them.

2. Installation

2.1. Files

The MenuMail system consists of three files :

- **MenuMail** is an extension (init). It handles the receiving end and the display in the menu bar.
- **MenuMail Sender** is an application. You will use it to create messages and send them. You use it also to set preferences for the overall system.
- **MenuMail Prefs** is a preferences file. It keeps any messages that the user makes and any other user settings. The file that is supplied contains some standard messages.

2.2. System 6

- **MenuMail** must be in the System Folder. You must restart your Mac to make it active.
- **MenuMail Prefs** must also reside in the System Folder.
- You can place **MenuMail Sender** anywhere you want. If you think you will need it often, you can place it on the desktop.

2.3. System 7

- **MenuMail** must be in the Extensions Folder. If you drag the file to the closed System Folder, the Finder will automatically place it there. You must restart your Mac to make it active.
- **MenuMail Prefs** must reside in the Preferences Folder. If you don't place it there, **MenuMail Sender** will create an empty one there.
- You can place **MenuMail Sender** anywhere you want. If you think you will need it often, you can place it (or an alias) on the desktop, in the Apple Menu Folder, or in the Startup Items Folder.

You are free to rename all files of the **MenuMail** set. The **MenuMail Sender** however expects the two other files to be called '**MenuMail**' and '**MenuMail Prefs**'. If you rename then, the sender needs slightly more time to locate them.

2.4. Requirements

- Macintosh SE, SE/30, Portable, II ci, II si, II fx, Powerbook, ...
- **MenuMail** occupies about 33K of memory, and takes 30K of disk space.[Begin Footnote] ---
This amount depends on the sound capabilities of SPPS.--- [End Footnote]
- **MenuMail Sender** needs about 200 K of memory, and takes about 137 K of disk space[Begin Footnote] --- These amounts depend on the sound capabilities. The figures are ... of RAM and ... of disk space without sound.--- [End Footnote].

3. Functionality

The MenuMail system uses the AppleTalk network. At startup time, the **MenuMail** extension registers its name on the network and starts checking for incoming messages. The **Sender** picks up the names of all the Macs having a **MenuMail** installed. It can then send messages to these workstations. Each message contains the text, the buttons and the name of the sender. A reply contains the button text or the reply the user has typed in. There is currently no encryption.

4. Receiver side

Only the **MenuMail** extension file is needed for receiving messages. If you have just installed **MenuMail** on your Mac, you must restart to make it active. The **MenuMail** icon will appear during the startup sequence.

The messages are displayed in the menu bar. If the text is too big to fit on one line, it is split over two lines. If that does not fit, the second line is truncated. This is indicated by an ellipsis (...) after the last character.

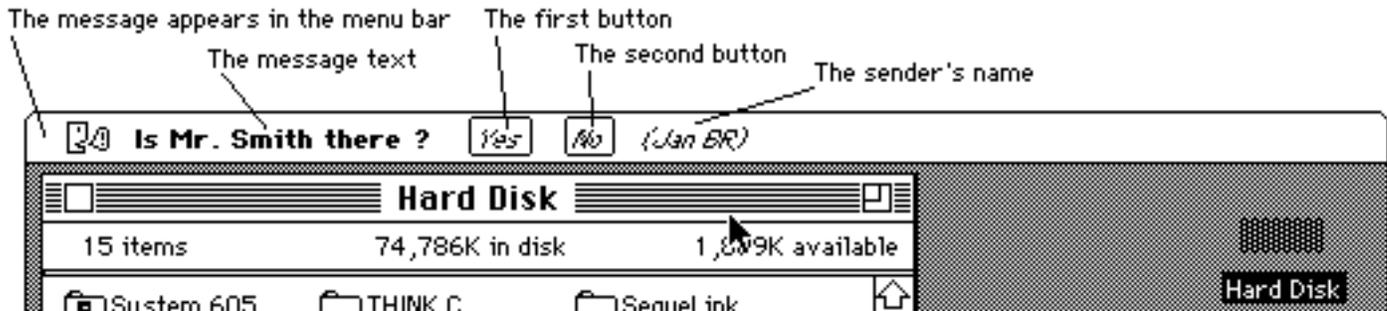
The normal menus remain available 'under' the message text : you can continue using your

menus.

When a message arrives, a discrete sound alerts the user, but he can continue working with whatever he was doing, including entering and editing text and selecting menus. If the user does not answer within two minutes [Begin Footnote] --- Two minutes is the default timeout, the user can change it in the Preferences dialog.--- [End Footnote] , the **MenuMail** message disappears from the screen.

4.1. Messages

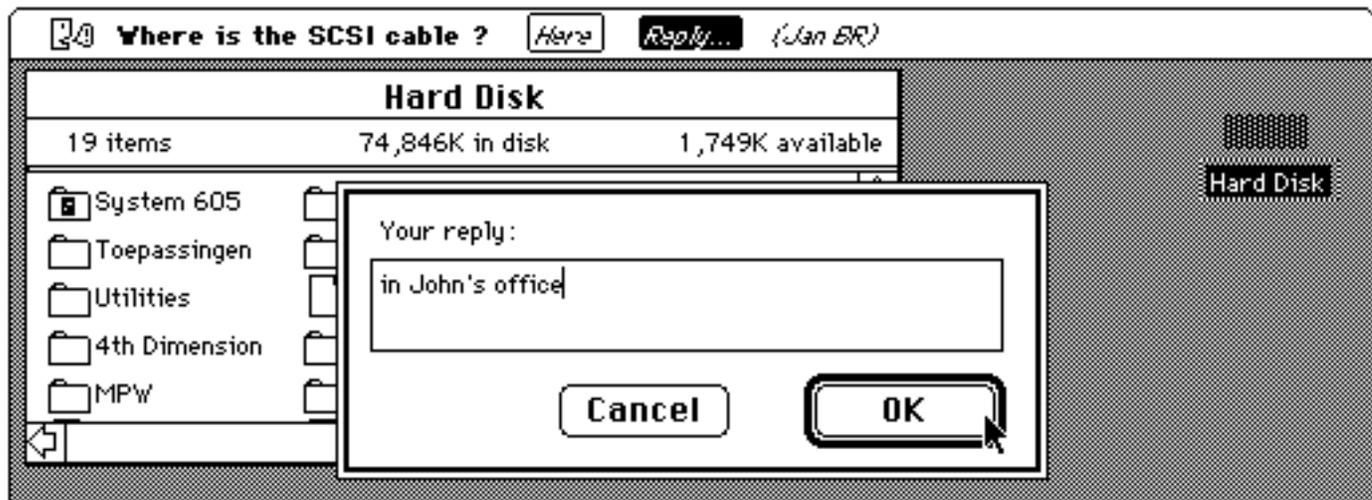
Anatomy of a message :



4.2. Answering a message

The user answers a message by clicking on one of the buttons. This will make the message disappear and restores the original menu bar. The corresponding reply will be sent to the receiver.

The sender can also include a reply-button. If the user selects this one, a dialog appears in which the user can type a custom reply. Pressing the OK button, closes the dialog and sends the reply to the sender. The maximum length of the reply text is 100 characters. (This can fit on a standard Mac screen using two lines)



Every button that contains an '...' (an ellipsis) will bring the reply-dialog to the front, containing the button text with the '...' highlighted. This is handy if you the sender wants you to fill in a text.

In case the message contains no buttons, clicking in the menu bar will make the message disappear. A message without buttons is handy to broadcast some thing like 'Lunch is ready !'.

4.3. Time-out

If a message remains unanswered, it will disappear after a certain time. This time is measured since its arrival, which is not necessary the same time as it is shown to you. You can set this time in the Preferences dialog in the **MenuMail Sender**.

4.4. Queue

It is quite possible that several messages for you arrive at (nearly) the same time, no panic :

you will see them all.

If a message arrives before you have answered a previous one, it is put in a queue. As soon as the front message is answered (or disappears after the time-out), the next message in the queue appears.

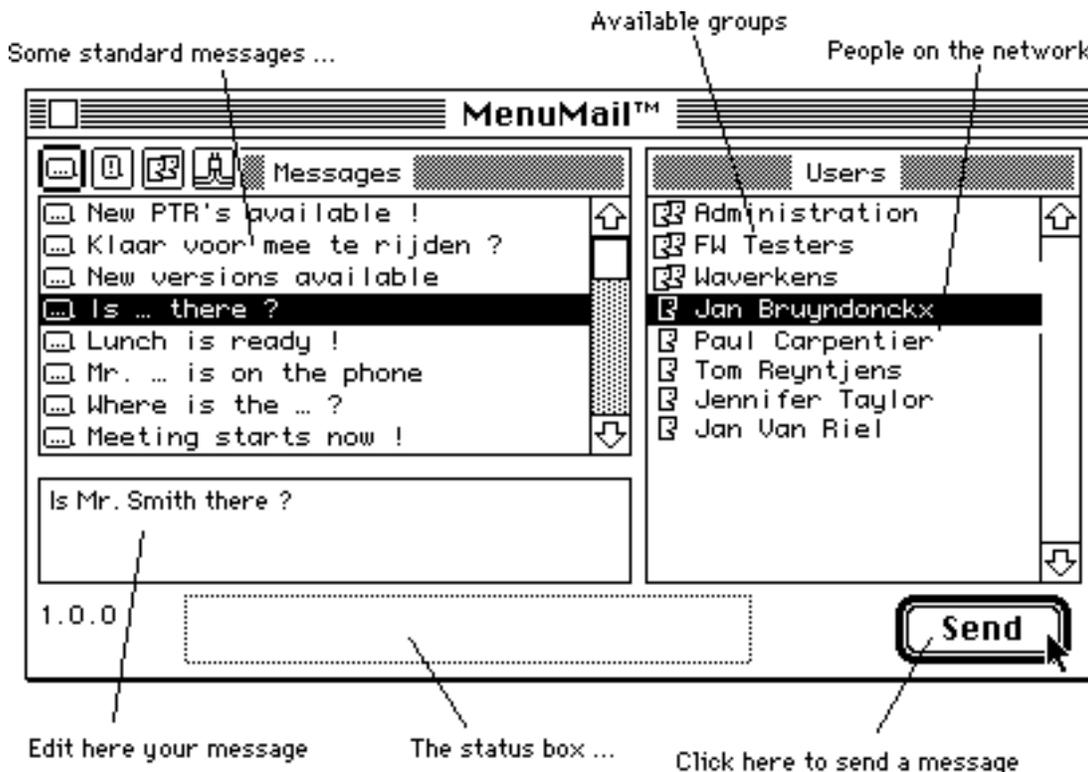
4.5. Getting a reply

If you choose to get your replies back in the menu bar, some extra buttons are shown. The 'Reply...' button again brings up a dialog if you want to react to that reply. This new message will be sent, of course, to the user making that reply. The 'Stop' button removes the message from the screen, without sending a message back. As some conversations can become quite long, the 'O & O' button (Over and Out) is a convenient way to gracefully stop a session.

5. Sender

In order to send messages to other people you need the **MenuMail Sender**. You can place this application anywhere you want. If you are a frequent user of **MenuMail**, the desktop would be an excellent place to put it.

If you are a System 7.0 user, you might want to put it in the Apple Menu folder (so that **MenuMail Sender** shows up as a 'Desk Accessory') or in the StartUp Items Folder (so that **MenuMail Sender** is automatically launched).



5.1. Users list

The list on the right hand side shows all the people on the network. First you see the groups you have defined, underneath you see the users whose **MenuMail** extension is active.

You can select multiple entries in this list :

- click to select one entry, a user or a group
- shift-click to extend a selection
- command-click to select discontinuous entries

If you select a group, the message will be send to all the users in the group. (how to create groups is explained below)

If you have installed **MenuMail** on your own Mac, you will see your name in the list. Of course, you can send messages to yourself : it's sometimes nice to have a 'preview' of a new message.

5.2. Message list

This list contains the standard messages you will often use. In this way, you won't need to enter often-needed texts.

Clicking a message brings its text to the edit-pane. If the text contains an ellipsis character (...) it is automatically selected. This allows you to quickly fill in a name, etc. The maximum length of a message text is 100 characters, that much fits approximately on the standard screen of a Mac. Your Mac will beep when you reach that length.

You can double-click a message in order to edit it, a message can contain, besides its text, one or two buttons. This will be discussed in the chapter on 'Adding messages'.

5.3. Sending a message

If there is a message in the edit-pane and you have selected an entry in the users list, then you are ready to send the message. The 'Send'-button will be highlighted.

There are several possibilities :
• press the 'Send' button
• press the enter-key (not the return-key !)
• select 'Send' from the menu.

A message appears in the status box to indicate that the message has been successfully sent. This message disappears after 7 seconds.

You can modify the sending by pressing the keys :
• option key
• shift key.

Holding down the option key will cause the replies to appear in the alternate location. If the reply list is the default, the replies will then appear in your menu bar; if the menuBar is the default, the replies will go to the reply list.

Holding down the shift key causes the Sender application to quit after sending the message, the replies will come in the menu bar.

If the reply is expected in the menu bar, you can quit the Sender application. The **MenuMail** extension on your Mac will handle the reply for you. If the replies are expected in the reply list, the **MenuMail Sender** has to remain active.

5.4. Reply List

If you select the 'replies in Reply list' in the Preferences dialog, then the replies will be collected in the reply list. If your message contained buttons with feedback, the replylist appears automatically when you send something. Each time a user answers your message, you will see the user's name with his reply. If the reply does not fit in the list box, select it and it appears in the edit-pane.

The reply list is cleared each time you send a message. While waiting for replies, you can switch to another application; **MenuMail Sender** will collect the replies in the background.

5.5. Group List

Probably you are going to send messages to several people at once. Instead of selecting each time the same persons, you can create a group containing these people. Click on the small group icon, to see which groups have been defined.

Double-clicking on a group shows the users in it, double-click again to close the group.

Adding a new group : select 'New Group' from the Special menu. A dialog box appears so that you can name a new group. For deleting a group (or a user in a group), you select an entry, and choose the 'Delete Group' item in the menu.

In order to fill a group, select a group, select one or more users and click the 'Into Group' button.

5.6. Zones List

An AppleTalk network consists usually of multiple zones. These zones group a number of users. Mostly, you are only interested in the **MenuMail** users of a few zones. Click the zones you are interested in (a checkmark will appear in the box). The users-list is updated when you click the button, or when you leave the 'Zones'-list.

5.7. Using messages

The communication between **MenuMail Sender** and the receiver Macs goes via messages. Each message contains a message text, the name of the sender, and eventually some buttons. A return message contains only the text of the reply.

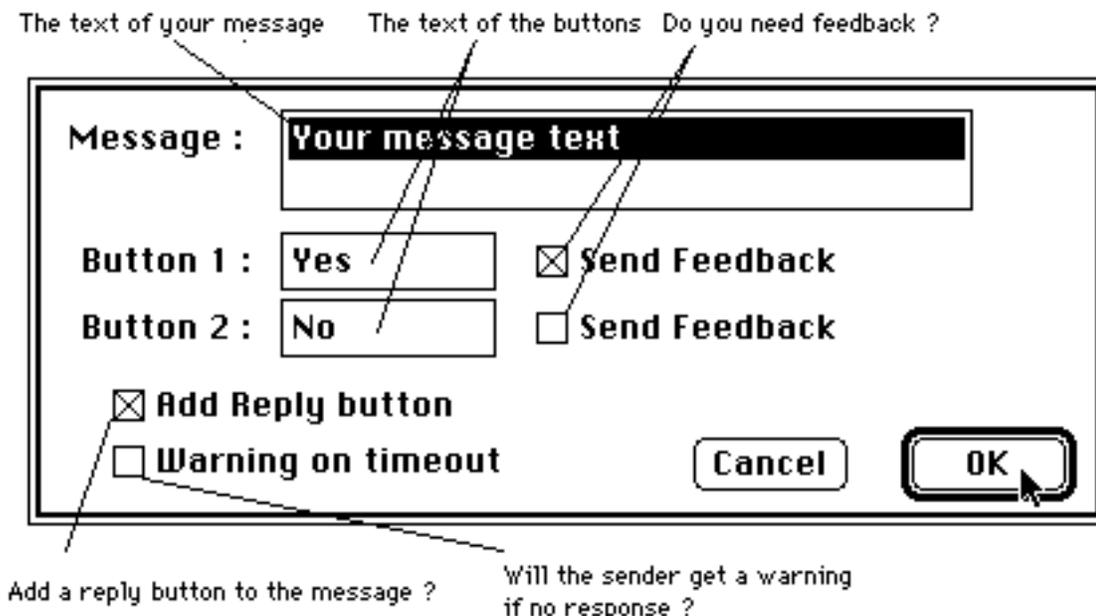
If you enter a message in the edit pane without selecting one in the list, a Yes, No and Reply button will be added by default.

5.7.1. The message dialog

This dialog window is used for editing messages. In the first edit pane, you write the text of the message, a valid message has always some text. If a button contains text, it becomes part of the message, the corresponding Feedback-button is then highlighted. If you want to give the receiver the opportunity to give a non-standard reply, select the 'Add Reply Button' check box

If you want feedback on the answer of the receiver, you select one (or both) of the 'Send Feedback' checkboxes. The user's answer will then appear in the reply-list. If you always want to be sure that your receiver has read the message, then check the Feedback for every button. If you only want to see the receivers who respond with e.g. 'Yes', just check only that button.

If the receiver is not at his Mac and the message times out, you can get a timeout-warning. This allows to see who has read your message.



If your message does contain only one button, the application will ask for your confirmation. Indeed, if there is only one button, the user does not have much choice. But in some cases, it is exactly what you want.

If your application contains two buttons without any feedback, you will also be asked for confirmation. Indeed, how will you be able to discriminate if the user select one button or the other ?

5.7.2. Editing

Each message in the list can be altered. Double-click the entry to bring the dialog window up.

5.8. Preference Settings

You can change several settings by selecting 'Preferences...' in the edit menu. A dialog box will appear, you can choose between five 'subdialogs'.

5.8.1. Sounds

The first popup menu lets you change the sound that is played when a **MenuMail** message arrives on your Mac. The default is a kind of 'Ahem' sound.

The second popup menu changes the sound that is played for each reply that comes in. The default is a 'Pop' sound. A good alternative choice for this one would be a short but distinctive sound.

5.8.2. System

When you send out a message, you can determine where to accept the replies. Either in the reply list (default), or in the menu bar. This last option treats a reply as a **MenuMail** message to yourself, to which you can reply again ...

The time visible-menu alters the time that an incoming message remains active in your menu bar. If several messages arrive simultaneously, the time is measured since the message arrived, not since it became visible.

5.8.3. Privacy

Perhaps you are conducting an important meeting and you don't want to be bothered, not even by a **MenuMail** message. Or perhaps you are leaving your Mac for some time, and you would like a default message to be sent back.

The privacy menu lets you select the time that no **MenuMail** messages will appear on your screen. This time is measured from the moment you click the 'OK' button.

The privacy is reset to its 'off' state when the time expires or if you reselect the Preferences dialog (and quit by pressing 'OK').

The editing field lets you enter any message that will be replied to anyone trying to send you a **MenuMail** message.

5.8.4. Lookup

This dialog lets you adapt the Sender to your network. If you have a slow network, **MenuMail** will do more effort and wait longer in its network handling. Do not change these settings if you are unsure about their meaning. A wrong setting might make some users 'invisible' to the Sender, or slow the application down unnecessarily.

5.8.5. User Licence

Each user of the **MenuMail** system needs its own unique license key. This consists of 12 uppercase characters. Please ask your system administrator for *your* unique key. If **MenuMail** finds the same key on the network or during its activity, it will warn you of it !

5.9. Compatibility

The **MenuMail** system extension has been tested on a variety of Macs with a rich variety of programs by many people. No compatibility problems were encountered.

5.10. Technie stuff

5.10.1. Network protocols

MenuMail registers itself on the network. Its type is "SilentPeggy2". Messages are sent using the ATP protocol. The Sender starts with an ATP request with 5 retries, each 5 seconds apart. The **MenuMail** inits on the receiving Macs, respond with an acknowledge. As a receiver makes a reply, it is resend to the Sender as an ATP request packet.

5.10.2. Sounds

The **MenuMail Sender** contains two sounds. "Peggy" is played when showing the About-box. "Pop" is used as the default sound. "Peggy" is defined with resource type 'jb15', this makes it invisible in the Sounds Preferences dialog. (It wouldn't go that one can select it as e.g. an arrival sound). The "Peggy" sound occupies almost 88 K. In order to save (memory) space, you can delete it, this will allow you to decrease the 'SIZE' resource.

If you received MenuMail over a BBS, this sound might not be present. It is removed to save transmission time.

5.10.3. AppleTalk lookup

When **MenuMail** looks for users, the Sender performs the call NBPLlookup. Two parameters

of this call : 'interval' and 'count', are modifiable in the Preferences dialog by setting the network speed. You can change them in accordance with your network.

If you want to see, or alter, the count and interval parameter to the LookUp-call used, have a peek in the 'NBP '-resource. A template is provided, but this operation is only for the very experienced user !!

5.10.4. Version Checking

The administrator can easily check the version of all **MenuMail** inits on the network. Send the message '•VERSION' (exactly as written here, in upper case, but without the quotes) and all extensions will reply with their version. The users won't notice.

5.10.5. Remote Key Administration

The administrator can set the keys of all **MenuMail** extensions remotely. This alleviates the need to go round with a disk : just distribute the **MenuMail** extensions without a key (the one on the distribution disk) and set the keys from your own workdesk. The message to send is : '•KEY=nnnnnnnnnnnn' (in upper case, without the quotes and where 'n' stands for each letter in the key.

5.10.6. Check User Activity

You want to reach a person (eg. by phone), but he is not at his desk. Maybe you would like a warning when he's back ? The Mac cannot do that (yet) for you, so the next best thing : it can warn you when that person clicked the mouse or typed something. Send the message '•ACTIVE_AGAIN' to that user, and MenuMail will send you a warning when his Mac becomes active. The message '•ACTIVE' simply returns the number of seconds since the last user activity.

5.10.7. Change Strings

Although it is not recommended, you can change the wording of most strings and labels. The labels of the buttons ('Stop', 'O & O') are contained in the STR#-resource (ID=128) in the MenuMail extension. Idem for the MenuMail Sender (STR#, ID=131). If you would prefer other labels, edit these strings with 'ResEdit', 'Resorcerer' or another resource-utility. If you change the label of a button to the empty string, the button will not appear in the message. (Some people do not like eg. the 'O & O' button, so emptying its entry in the STR# will remove it)

Please, do not further distribute these modified versions. If you think they are worthwhile, contact me first ! Thanks !

6. Messages

6.1. MenuMail Extension

- **"Message timed out..."** You send a message to another user, and he did not respond so the message disappeared from his menu bar. You can only get this message when the 'warning on timeout' option has been set when defining a new message.
- **"No user key !"** The person you are trying to reach does not have a **MenuMail** extension with a user key.
- **"User key conflict !"** The person you are trying to reach does have a **MenuMail** extension with the same user key as you !
- **"A network error occurred while replying (error number)"** An error on the network occurred when you tried to reply to a message. Most likely, the error number is -1096 (retry count exceeded), this would occur if the Mac on the other side has shut down.
- **"Your MenuMail will not work : I found a duplicate key on the network (the culprit : a name)"** You will get this error when starting up your Mac. The **MenuMail** extension has found another Mac with the same license key. The offender's name is indicated so you can give him his due punishment.

- **“This MenuMail does not work (a duplicate key on the network)”**This message will be received by anyone who tries to reach you, while you still have a duplicate user key. Have a chat with your system administrator !
- **“Your MenuMail does not yet have a user key ! (Ask your system administrator)”**Indeed, the **MenuMail** extension has an empty user key. Ask one from your network administrator.

6.2. MenuMail Sender

- **“The MenuMail system extension has not been found. You cannot receive replies in the menu bar.”**You are starting the **MenuMail Sender** without a **MenuMail** extension present. You can continue working, but you cannot receive replies in the menu bar (because this is, indeed, handled by the extension on your Mac)
- **“The MenuMail system extension has not been loaded. You cannot receive replies in the menu bar. Restart your Mac to load it.”**The **MenuMail** extension is present, but is not loaded in memory. Maybe you have just installed it, and haven’t rebooted your Mac yet.
- **“Appletalk is not active, please check the Chooser settings and restart your Mac.”****MenuMail** uses the AppleTalk network for its communication. Checking your Chooser is indeed the best advice.
- **“The key you entered is invalid. Press the button to quit the program ...”**You entered an invalid key in the Preferences dialog. As a punishment, you have to quit this program.
- **“The system data in the MenuMail extension is invalid. Please, install a new extension.”**The program found an inconsistency in its system data. (Maybe some hacker tried a few weird things ... ?)
- **“MenuMail configuration info not found. You cannot receive replies in the menu bar. Restart your Mac to reload the info.”**The configuration data is missing. Restarting will supply default values, but you will need to supply your user key to really start working.
- **“The key you supplied is invalid. Please check it again.”**You tried to use the ‘•KEY’ message without a valid key. Try again !

7. Legal stuff

Although I commit myself to provide the highest quality and to give the best service possible, I guess it’s best to include a few clauses if I don’t want a lawyer knocking on my chamberdoor ... nevermore ...

7.1. Limitation on Warranties and Liability

Even though Jan Bruyndonckx has tested the software, he will not make any warranty or representation, either express or implied, with respect to this manual or to the software described in this manual., their quality, performance, merchantability, or fitness for any particular purpose. You, the user, are assuming the entire risk as to their quality and performance. In no event, shall Jan Bruyndonckx be liable for direct, indirect, incidental, or consequential damages resulting from any defect in the software or manual, even if they have been advised of the possibility of such damages.

7.2. Copyright

This manual and the software described in it are copyrighted © by Jan Bruyndonckx, with all rights reserved. The author gives permission to the user to share this software with others, to put it on a bulletin board or any other means of communication (including disk and CD-ROM) as long as all the components (manual and software files) remain together. The keys the user has received as part of the licence (thus not the original 4 keys) are NOT to be distributed.

8. Thanks

My sincere thanks to all the people who contributed to MenuMail.

Peggy Horemans, our dear secretary, used to shout in the corridor if there was a phone call for

someone (as a sample, hear the About-sound[Begin Footnote] --- Not available in all implementations. If you received MenuMail over a BBS, the sound was removed in order to save space. (see 5.10.2)--- [End Footnote]). So she gave the initial stimulus to create with something new.

Theo Heselmans, Michiel Carpentier, Jennifer Taylor and Marc Surinx gave valuable advice and recommendations. They were the 'touchstone' of all the ideas I had, and they were never ashamed to ask for 'one more feature'.

These four people were also my first beta-testers (Jennifer even unwillingly, I disguised MenuMail in another init and scared the hell out of her).

Many more ideas, suggestions and bugs were brought in by many people, including Steve Edwards, Lionel Lumbroso (who suggested the name), Bart Ghesquière, Jan Van Riel, Tom Reyntjens and many many others.

My sincere thanks also to all the people who ensure its popularity by talking about it to other people. My thanks extend in particular to Wave Research, which provide a stimulating work environment. The product we're developing, FileWave™, is going to be the next big hit in the software market. MenuMail and FileWave are used to demo each other, a wonderful example of symbiosis !