

Pace Micro Technology

O.B.B.S.

BULLETIN BOARD SOFTWARE

For BBC Model B

from



* Full Colour *

* Electronic Mail Facility *

* Telesoftware *

OBBS Bulletin Board

Users Guide

Introduction

This manual assumes that, since you have purchased OBBS, you understand the basics of bulletin board systems and the various features which are available through them. OBBS itself was the first 'live' colour bulletin board system in the UK. It was also the first to run on the BBC micro. The intention behind OBBS is to provide a working, albeit, simplified bulletin board system for those who feel that they might be interested in setting one up on a permanent basis, but who do not want to invest hundreds of pounds in one of the standard packages such as TBBS.

Most of the OBBS code is written in BASIC and the actual programs are not protected so that you are free to change them as you wish. There are also several utilities on the discs to help you to configure the system. Again, you may alter these to suit your own tastes. Make sure you take copies before messing around! Good luck.

Getting started

With this manual you should have also received a registration card and two discs marked DISC 1 & DISC 2. It is advisable at this stage to make copies of these discs before proceeding to use the board, failure to do so may result in loss of data. Both discs 1 and 2 are double sided and formatted in 80 tracks.

OBBS is sold in a largely pre-configured form so that it is possible to begin running your board almost immediately with only minor alterations. However, once you are familiar with the system you may wish to alter the layout of the board considerably. For this reason a number of simple utilities are provided to help you to set up and maintain your system.

To begin running the board place Disc 1 in drive 0 and Disc 2 in drive 1. Press 'SHIFT' and 'BREAK' simultaneously. After a few seconds the main system menu will appear listing 7 options :

- 1) Run OBBS
- 2) Reconfigure System
- 3) Recreate System Files
- 4) Edit User Details
- 5) Edit Menu Files
- 6) Maintain/extend User File
- 7) Compact Message File

Option 1 is the main program and the remaining options provide utilities for creating or editing various screens and menus or for operating on system files. These are described later.

To familiarise yourself with the system you should start by choosing option 1 to run the board. Firstly, you are given the opportunity of selecting the use of a printer and/or log file and to set the date & time.

The first question is :

Printer online (Y/N) ?

If you answer Y to this question, information entered by the user's of the board will be sent directly to the printer. This information comprising the 'activity log', includes the dates and times at which users have logged on to the system and also any error messages which occur. If you do not have a printer or if you do not wish to maintain a hardcopy, the activity log can be maintained on disc :

Maintain activity log on disc (Y/N) ?

If you do not want to keep a log file at all just answer with N.

On an 800K drive system the activity file (O.Active) can normally be accommodated quite adequately. On smaller systems you will have to keep an eye on the size of the file. It is important that this file is the LAST file on the disc on which it resides otherwise you may get "Can't Extend" messages when you are running the board.

If you delete the O.Active file the system will create a new file when you next specify output to disc instead of printer.

The board is not quite ready to run immediately, you will need to change some of the header files that are displayed when a user first logs on to the system. These files are held in the T

directory of drive 0 eg. T.LOGON. These are TYPEable files which can be created on a word processor. You may also include BBC Mode 7 graphics codes in these files to add colour to your system.

Remember that if you edit any of the other files on the same drive as the 0.Active file, make sure you take a copy of the 0.Active file before you start and copy it back onto the disc when you have finished. This will ensure that it is always the last file on the disc.

Finally, you will be asked if you wish to set the date & time :

Set Date and Time (Y/N) ?

Answering Y will allow you to enter the date in dd/mm/yyyy format and time in 24 hour clock format. The 17th July 1985 would be entered as 17/07/1985 or just 17/07/85. For the time, 1:30PM would be entered as 13/30/00. After entering these (or not), the main program is loaded and a message appears at the top of the screen.

'WAITING FOR NEW USER'

The modem should previously have been set up for 300 baud answer mode i.e. the Originate/Answer button should be depressed and the Viewdata/300 Baud button should be out. To start the board up depress the Modem Connect button.

Before you start the board running 'live' you should logon to it yourself to see what the system looks like when it is running. You will then be in a position to decide what you want to put in your own display files. You can simulate logging on by pressing the TAB key once when the 'Waiting for new user' message is present. This sets the board running just as if a user had logged on and you

will see on the screen everything that a 'real' user would see when he logs onto the board. Obviously, some operations such as program downloading, will not be possible.

Press TAB now and the first message file, :O.T.INTRO will be displayed followed by :O.T.LOGON. When you receive the OBBS discs these contain pre-prepared messages including Pace's name & Address. You should alter these using a word processor.

The next line informs the user that at any time CTRL-S, CTRL-Q and CTRL-K may be used to Pause, Continue or Abandon an action respectively. This is then followed by your own message file which initially contains the following :

```
=====
Sysop: Put your own welcome message here
       in file :O.T.LOGON2
=====
```

You should edit this file to include your own name and other details about your system.

The next stage is for the user to enter their First and Last names and the Town from which they are calling. Note that First and Last names may be entered on one line if separated by a semi-colon.

If they are a new user i.e. they do not appear in the user file, the system will log them into the USERS file and then display the contents of the file :O.T.NEWUSRS. Once again you should edit this file to contain any information that you think new users might find helpful.

Once a user has entered his name, you will notice that their Priority and Password are displayed in the top right hand corner of your screen. The user himself will not see this information, it is

provided on the sysop's screen in case the information is needed at some time.

To set yourself up as the Sysop, you should logon using the TAB key as described above. Enter your name and home town and then logoff via the normal method (the terminate menu) and press CTRL-BREAK followed by SHIFT-BREAK to re-display the main menu. Your priority will initially be 1 but you may now use option 4 on the main menu to set it to 255 (see section).

Once logged a on user is free to use any of the features of the bulletin board which appear in the menus. This is dictated by their priority and flag bytes (see later) and by the way in which you have configured the menus. Apart from the more obvious features such as 'telesoftware' and electronic mail, there are various other functions available and to a certain extent you are free to incorporate your own ideas into the structure of the board.

You will get a good feel for what can be achieved by simply using the board for a while and then studying the menu files using option 5 from the main menu.

System Configuration

There are several features within OBBS which can be altered to suit your own requirements without having to edit the main program. These include the drives on which certain system files are held, how many Special Interest Groups you wish to incorporate etc. These details are held in the file :0,0.INITIAL and can be edited using option 2 on the OBBS main menu.

When you receive OBBS the 0.INITIAL file (which can be displayed using *TYPE), will contain the following :

```
1.      OBBS
2.      :3.0.SYSVARS
3.      :2.0.MESSAGE
4.      :3.0.USERS
5.      :3.0.MSGPTRS
6.      :2.0.Last
7.      :3.M.
8.      :0.0.Active
9.      0
10.     * BBC *
11.     xMSG TO SYSOPxE-MAILx
12.     xMSG TO SYSOPx
13.     xOBBSx
14.     2048
```

The first line is the name of the system, normally OBBS, which you can change to your own name (eg. Esmerelda's Electronic BBS). Lines 2 to 8 contain the names and drive numbers for some of the main system files. You may alter the drive numbers on which these files are stored but you should not alter the filenames.

The ninth line is the number of Special Interest Groups (SIG's), minus 1 followed on subsequent lines by the names of the SIG's. There must always be at least one SIG but there may be up to eight

so that messages can be directed at people who are most likely to be interested. For instance, there is one default SIG board for BBC users so that programming notes, hints or just news items related to the BBC can be communicated via the BBC SIG rather than by the main board which should be reserved for general use.

Apart from the SIG's there are two types of message, Public and Private that can be left by users of OBBS and the system can be effectively be segregated into a number of distinct areas by the use of board names. Initially there are two private boards called 'MSG TO SYSOP' and 'E-MAIL'. You may wish to create more than this. OBBS is normally the main public board but you may wish to create others.

Selecting option 2 from the main menu will allow you to alter the contents of the 0.INITIAL file. You will be prompted for each item in turn until all details are ready when they will be written to the new 0.INITIAL file.

When entering the names of the Private message boards, choose sensible names. For example, the board on which messages for the sysop are normally left is (by default) called MSG TO SYSOP. Also, the name of the Terminating message board (line 12 in the file) must be the same as one of the Private message board names, usually the MSG TO SYSOP or equivalent board. This board is used when the user wishes to leave a confidential message for the Sysop when he logs off.

Recreate System files

If you have used option 2 described above to reconfigure the system you may need to follow this with option 3 to recreate the files themselves. The files which are affected are MESSAGE, MSGPTRS, USER and SYSVARS and the option simply recreates the files, destroying any message or user data previously held in them, and then reinitialises them ready for use. The option should only be used if you need to alter your system radically and you should always make a backup of your discs before proceeding.

It is of course possible to reconfigure the system and then simply move the files onto the appropriate drives without recreating them. This should only be attempted once you understand the system.

If when using the option you get the error message

Can't extend

you should delete all four files and compact the discs before selecting the option again.

Edit User Details

When a user first logs on to your bulletin board he is automatically given a privilege of 1 and a Flag setting of 00000000. It may sometimes be necessary to alter some of the information which is held in the user file. For example, a user may change address or you may wish to allocate a higher privilege. In order to facilitate this, a utility program called UEDIT4 is provided as one of the OBBS system files. This may be loaded and run by selecting option 2 from the OBBS main menu. Having done this you will be prompted for the name of the user, whose details you wish to edit.

FIRST NAME ?
LAST NAME ?

Here, you should enter the name with which the user logs onto the board being careful to use upper case and to include spaces and other punctuation exactly as does the user.

If the user's name is not found, a message appears on the screen telling you that the name is not on file. If the user does exist the following information will be presented :

- 1 > Calling from
- 2 > Privilege
- 3 > Flags
- 4 >
- 5 > Password
- 6 > Called
- 7 > Last day on
- 8 > Last time on
- 9 > Last msg. then
- 10> Terminal format code

You are asked which of these you wish to change. If you wish to leave the information unaltered you must press 0, but if there are changes to be

made, press the appropriate number.

Calling from? should only be changed if the user has informed you that he has changed address. The Privilege and the Flags fields will be the options most often changed. The Privilege command, when altered will only allow you to enter a number between 0 and 255. The higher the privilege, the more access the user has.

A privilege of 255 should be reserved for yourself as Sysop and will give you (or any other person with this value) the ability to read private mail. A privilege of 0 will prevent a user from leaving replies to messages.

The flags field provides another means of limiting the User's access ability. This 8-bit binary number is used in conjunction with the privilege byte and only user's who have the same flags bits set to 1 and also have a high enough priority can access a particular command. For example, a user with flags 10101011, could access a command with flags 10101010 but could not access a command with flags 10101110. A user with flags of 11111111 will be able to access all commands with an equal lower privilege than his own. You should reserve flags of 11111111 for yourself as the sysop.

The password need not be changed as the user has an option from the utilities menu to change his password should he wish to do so. However, if the user has forgotten his password, you may need to alter it via this method.

Option 6 gives information on the number of times the user has called the system.

'Last day on' and 'last time on' display the previous date and time that the user accessed the system.

Last message is used to store the last message number when the user previously used the board. This is used when the user checks for new messages. The software will display only messages after this number.

Finally, the Terminal Format code holds the information about the user's terminal capabilities. The information is stored as a binary number of which only the last three bits are normally used.

Upper/Lower case bit

Bit 0 of the Terminal format code determines whether or not the user is capable of displaying both upper and lower case. If bit 0 is 1 the user can display lower case, if it is 0 only upper case can be displayed.

Line feed bit

Bit 1 of the Terminal format code is set according to the user's reply to the question :

Does your terminal need line feeds ?

If Line feeds are required bit 1 will be set to 1, otherwise it will be set to 0.

Colour code display bit

If user has a BBC computer or other machine which can display teletext graphics and text, OBBS will send out menus, text or even graphics frames in colour. On terminals which cannot display Teletext control codes, OBBS will send only normal text. If bit 2 is 1, colour/control codes will be sent, if it is 0 only ASCII text will be sent, colour codes being replaced by spaces.

When you have finished editing users just press

**<CR> for the first name and you will be returned
to the main menu.**

Edit Menu Files

The menu editor is a Basic program which can be used both to create and edit OBBS menus. It is loaded by selecting option 3 at the OBBS main menu.

After the editor (which runs in Mode 3) has been loaded you are prompted to enter the filename of the menu that you wish to edit. By default the program always looks at drive 3 (OBBS disc 2, side 2), directory M although this is one of the items that can be altered in the file 0.INITIAL (line 7).

In its supplied form the system has 11 menus :

Filename - Name of Menu

MAIN	-	MAIN
MSGs	-	MSGs
EMAIL	-	EMAIL
SIGs	-	SIGs
SOFTWAR	-	SOFTWARE
MUSIC	-	MUSIC
UTILS	-	UTILS
SYSOP	-	SYSOP
OBBSM	-	OBBSM
LOGOFF	-	LOGOFF
SURVEY	-	SURVEY

Note that the menu name can be up to 14 characters in length, only the first seven characters are used as the filename and should therefore be unique. The full name must be used in the LDMU command so that in the list above, SOFTWARE is the filename for the SOFTWARE menu.

On entering a filename, a table divided into five columns and sixteen lines will be displayed. Each line in the table represents a menu option that the user can execute. The various columns are

system information, messages etc. that are associated with the command.

If the filename corresponds with any of the above, various commands will already be visible. If the file does not exist it will be created and an empty table will be displayed.

The cursor keys may be used to position the cursor over any field in the table. When it is correctly positioned just enter the details via the keyboard. The first key that you press will erase the remaining contents of the field.

The first column contains the character which is used to select the option from the menu when a user is on-line. Whenever the user presses a key, this table is searched and if there is a corresponding entry then the appropriate command will be executed. The character used should be chosen to reflect as closely as possible the command description. For example 'L' might be used for the 'Logoff' command.

The second column contains a description of the command. This is the text that is displayed in the menu as it appears to the user. Up to 34 characters can be used.

Column three is the privilege column. The value it contains determines which users can access that command. When a user first logs on to the board, he is automatically given a privilege value of 1. This can only be altered by you, the Sysop, using the User Editor. Commands requiring a privilege value of 10 or more will not be displayed when a user with a lower privilege value logs on. However, if the user's privilege value is equal to or greater than that of the command then the menu option will be displayed normally.

The privilege value will normally range from 0 to

255. At a value of 0 all users will be able to access the command, at 255 only the sysop can access it. If you choose a value above 255 the command will not be displayed on the menu, nor can it be accessed (by anybody), hence the default value of 300). You may find this useful if you wish to remove a command temporarily from the system or to remove blank lines from the menu display.

Column four contains the flag byte for the command. It is immediately adjacent to the privilege column and separated by a ' '.

NB: When entering the number, any character other than '1' will be treated as 0.

i.e. 71000010 is read as 01000010.

A user with a flag of 11111111 and a priority of 255, will be the most powerful user on the board and will be able to read private mail, etc. You should reserve this priority for yourself only.

The final column holds the actual OBBS system command that will be executed on selection of the option. There are 21 different commands used within OBBS to carry out various operations. In effect, you have available a command language. Each of these commands consists of a 4 character name followed by an optional parameter.

All of the commands available in the command language are detailed below with a summary of the command syntax at the end of each description.

OBBS System Command Language

The following commands may be used within the OBBS menus to carry out the various operations that are available :

CHAN

The CHAN command is used to load and run a BASIC program from within the system. The program that you CHAIN must have it's own error checking routine, otherwise numerous problems can occur when users are logged on to the system.

NB: If you intend writing your own program to run on the board, you must ensure that there is always an option to return to the main program. From this option, the command CHAIN "RETURN" must be entered.

Syntax : CHAN <Filename>

CHAT

Allows the user to have a conversation via the keyboard with the Sysop. When the user selects Chat, a loud tone is emitted and a message appears on the user's screen.

'The sysop has been paged, if he is around he will break in, otherwise continue to use the system normally'. In the top left hand corner of your screen, a 'Paged' sign is visible so that you are aware that somebody is attempting to contact you if you did not hear the tone.

The Sysop can break in and communicate with a user at any time, he does not have to wait for the user to use the Chat option. To break in and chat you should press the 'Escape' key. On doing this a message appears on the screen :

Sysop breaking in for a chat

To end chat mode and allow the user to return to the system press the 'Escape' key again, the following message will be displayed :

'Chat mode has ended'

The user will then be automatically returned to the board and can proceed to use it as normal. CTRL-K will also end chat mode.

Remember that you should not attempt to use Chat when a user is in the middle of downloading.

Syntax : CHAT

CMD*

This command simply allows the use of BBC MOS or sideways ROM commands to be made from menu options. The command could for example, be used for allowing the user to see what ROM's are available on the board eg. the menu entry for such a command could be :

<R>oms on system [000 00000000] CMD*H.

Syntax : CMD*<MOS command>

DNLD

This command offers three methods of downloading software to the user. The simplest method allows the transfer of ASCII files (Basic programs must be spooled, machine code must be converted to expanded ASCII), and the user will require only the simplest of terminal software. The same method can be used with the additional facility of buffer control codes. Once again files must be ASCII only and most modern communications software such as Commstar, incorporates the ability to use these control codes. Finally, any type of file may be transferred without conversion by using the XMODEM error checking protocols invented by Christensen. This method does of course require the user to have XMODEM capability. Whereas the first two methods are prone to data corruption due to line

noise, the third method will detect errors and request retransmission of the affected data.

When the DNLD command is selected by the user, a menu is displayed and the user can choose which method he wishes to use. In the menu file itself, the DNLD command should be followed by the full file specification of the file.

Syntax : DNLD :<Drive no.>.<Filename>

DSIG

Allows the user to toggle the Special Interest Group (SIG) boards which are currently in use. At present the only group setup is the BBC Micro group. By using these SIG boards, when users log on to the board, they can read only the messages which they are interested in and as such do not waste valuable time on the telephone. When the DSIG option is selected, a list of the available and currently selected boards is displayed and the user can toggle any of them in or out by pressing the appropriate letter.

Syntax : DSIG

FMAT

The FMAT command allows the user to change the set up of his own terminal. When a user first logs on to the board he is asked

Can your terminal display lowercase ?
Does your terminal need linefeeds ?
Will your terminal display BBC mode 7 colour commands ?

By using the FMAT command, these questions will be asked once again and the user can re-enter the details. The information is stored along with his priority etc. and can therefore be altered by

the Sysop via the User Editor.

Syntax : FMAT

INP*

This allows the user to enter a MOS command without logging off the board. By using this command a '*' appears on the screen and the user is able to enter the MOS command. You should reserve this only for users with high privilege and flags bytes, indiscriminate use of commands such as *FORMAT could destroy your discs.

Syntax : INP*

LDMU

LDMU is one of the most frequently used commands. It is used to swap between different menus. For example, from the main menu a user might wish to go to the software menu. The LDMU command would then be used followed by the name of the menu to be loaded. All menus, by default, reside in the M directory of drive 3 as defined in the :0.0.INITIAL file.

Syntax : LDMU <Filename>

LGON

When a user first enters the board he has to log on by entering his name, where he is calling from and his password. The LGON command is used for the user to log on to the system again, without having to re-dial. All files are closed and the system is restarted as if they had re-dialled.

When LGON is used, the amount of time that the user has been on the system is reset and the title page is again displayed. The user is then asked for :

FIRST NAME ?
LAST NAME ?
CALLING FROM ?
PASSWORD ?

NB: PASSWORD is only displayed if the user has set up a password from within the utilities menu.

Syntax : LGON

LMSG

LMSG is the main method by which a user is allowed to leave a message on the system. LMSG must be followed by the board name on which the message is to be left. The system is supplied with three boards set up :

xEMAILx	- The electronic mail board
xMSG TO SYSOPx	- The message to the Sysop board
xOBBSMx	- The main OBBS board

The EMAIL and the MSG TO SYSOP boards are normally both private boards (as defined in the file O.INITIAL) and therefore, the messages left on these can only be read by either the particular user to whom the message was addressed or the Sysop. When specifying the board name in a menu definition you must precede and suffix it with a lower case 'x'. This applies to all references to board names within menu commands. In the O.INITIAL file the x's are automatically inserted by the program which is used to create the file.

The command prompts the user with :

Who is the message for ? (Not on MSG TO SYSOP)
What is the subject ?
Is it a private message ?
After answering these the message text may be entered.

Private message boards and MSG TO SYSOP are defined as being private in the file 0.INITIAL.

Syntax : LMSG xBoard Namex

LOFF

When a user logs off the system, the amount of time he has been accessing the board is displayed. LOFF is the command which displays the final message and drops the line. This command should really only be incorporated in the terminate menu. It will then only be used when a session is terminated through the correct channels.

NB: After three minutes without any input to the board, the board automatically logs off.

Syntax : LOFF

LSIG

Works in a similar way to the LMSG command except that the message is automatically left on the selected SIG board and therefore should not be followed by a board name, the particular board is prompted for.

Syntax : LSIG

PSWD

The PSWD command allows the user to change his password. The old password is first displayed and the new password of exactly five characters can be entered.

Syntax : PSWD

QSTN

The board has a built in questionnaire facility,

where you can ask the user to reply to a set of questions which are displayed on their screen. This information can be either sent to the printer or to the activity log, depending upon how you chose to set up the system, when you first began running the board.

The questionnaire 'form' itself may be created using a standard word processor. At the positions on the screen where you want users to input replies you must put two right arrows (the right square bracket key on the BBC keyboard, these display as right arrows in mode 7). They inform the system to expect input which will then be written to the activity log. All characters up to <CR> are accepted, <CR> being used to end input.

Syntax : QSTN <filename>

RMSG

The RMSG command is used whenever the menu option allows the user to read messages on the board. RMSG must be followed by the board name on which the message was left (See LMSG).

When a user uses this command he is asked which of the following searches he would like

- Forward multiple - Reads all messages from the first number
- Reverse multiple - Reads all messages backwards from the last number
- New messages - Reads the messages that have been left since you last accessed the board
- Individual messages - Reads individual messages
- Abort retrieve - Returns you to the main menu

If, instead of entering a board name, /ALL/ is placed after the RMSG command, the user will be able to read messages from all boards (except

private messages).

Syntax : RMSG xBoard Namex

RSIG

Works in a similar fashion to RMSG except that this command should not be followed by a board name as the message is read automatically from the SIG boards which have not been deselected.

Syntax : RSIG

SRCH

This allows you to begin a selective search through the messages left on the board. By using this command, the user is asked for

FROM ?
TO ?
SUBJECT ?

By choosing any of these, a search will then begin through the board and the messages will be displayed when the particular search string is found in the subject field of a message. The command works in a similar way as RMSG whereby the command should be followed by the board name to be searched.

Syntax : SRCH xBoard namex

TIME

This displays the amount of time that a user has been accessing the system.

Syntax : TIME

TYPE

When the Sysop wishes to display text other than menus, the TYPE command may be used. Text can be prepared to be displayed on the board by using a word processor. One good use of this command is to provide information files. For example, you could create a text file containing the names and telephone numbers of other bulletin boards and then allow the user to view this using TYPE.

Syntax : TYPE <Filename>

UPLD

UPLD

Users can upload software to OBBS as well as downloading it. Simply insert the UPLD command at the appropriate menu entry. When the user selects an Upload program option, the file transfer is carried out and the program stored on disc automatically. The UPLD command should be followed by the drive number on which you wish uploaded files to be saved. It may also be wise to specify the directory so that the user cannot overwrite system files by specifying a duplicate filename.

Syntax : UPLD :<Drive Number>.<directory>.

USRS

USRS is used to obtain a list of the system's users. By using this command, the names of the users and the last time they contacted the board will be displayed on the screen.

Syntax : USRS

Maintain/Extend User file

You may find after running the board for a time, that the user file becomes full or that some users who have previously been using the system do not use it any more. In the interests of efficiency it is worthwhile going through the user file occasionally to delete 'unwanted' users.

Option 6 on the main menu will allow you to do this and at the same time extend the file if necessary. It is important that you take a backup of the USERS before you commence.

A new, empty file is created with an option being given to allocate a different amount of space to the file. Following this each USER record in turn will be displayed on the screen for you to edit, leave unchanged or delete. If you do not delete the record it is copied into the new file. When the last record has been dealt with both files are closed and you may copy the new file back onto your working system disc and make a backup.

Message file compaction

As with the USERS file, you may find that the MESSAGE file becomes full periodically. In this case you should go through the messages by logging onto the board and reading them all, deleting the very old messages and the messages that have already been 'read' by the recipient. Note that the last message in the file cannot be deleted.

Once this has been done you should select the message file compaction program. You will first be asked if you have taken a backup. If you have not done so should exit the program and make a backup of the disc before proceeding. This is in case there is any possibility of an interruption whilst compacting the messages (i.e. a power cut, etc.)

One message at a time is read from the old file and if it is not flagged for deletion it will be moved to the new file. Messages which have been flagged for deletion are ignored. At the end of the process the new file will contain all unread/undeleted messages and a report showing how much space has been saved will be displayed.