

BITS, BYTES & PIXELS

APRIL 198/

Volume 3, Number 4



ALL "FUNNELNEB"'S ARE NOT CREATED EQUAL A REVIEW OF "FUNNELWEB V3.4"

by Charles Good

The Lima User Group has received the latest verion of FUNNELNEB v3.4 direct from Australia. This program used to be called FUNNELWRITER, but has evolved far beyond its original concept as an enhanced TI-Writer. FUNNELWEB can be loaded from disk or randisk using the XB module (usually the preferred method), the E/A module, the Mini Memory module, the TI-Writer module, or without any module using the Avarc or Cor-Comp disk controler. FUNNELWEB can also be loaded into the RAM of a supercart and loaded from there directly from the 99/4A powerup menu. Once loaded you can do all of the following from the FUNNELWEB disk (I have mine installed on a Horizon Ramdisk) without using any additional modules and usually with no additional disks. 1...Process text with an improved version of TI-Writer. 2...Type in and assemble assembly language code just as you would with the E/A module and the E/A disk *A*.

- 3...Load and run almost any program ever written for the 99/4A, including the Forth disk, the Myarc disk disk manager, small c language, and assembly language. If you are using a super cart module or Gram Kracker you can run code in the module ROM beginning at >6000. If you are using the XB module to load FUNNELMEB you can RUN "DSKx.---" any XB program from a selection of choices in the first menu displayed by FUNNELMEB.
- Manage disks with the latest version of DM1000.
 Edit disks sectors with an improved version of DISK8

 (also known as Disk Patch).

Each of the above features, except sometimes #3, will return you directly to FUNNELWEB when you are finished so you can go on and do something else. From within the FUMMELWEB environment a disk directory is almost always available by pressing AID. As you can see, this software is extremely versatile. The authors call FUNNELWEB a "Universal Utility Environment." I probably do 80% of my computer work using only the FUNNELWEB disk configured with my own choice of user options that load out of FUNNWLWEB. I hardly ever have to use anything other than my XB module.

What's that you say, you already have FUNNELWRITER v3.3. Well, FUNNELWER v3.4 is better as will be detailed in the following paragraphs. The authors wrote me a letter in which they state: "There has been about as much work that has gone into FWB from when v3.3 was launched to the present as there was from the very start of it all to the issue of v3.3."

Not all FUNNELMEB's are created equal. This program undergoes almost daily revision and updating. Bugs are corrected and the program is made compatable with new hardware and software as these appear. The object is to allow FUNNELWEB to load anything from any hardware configuration. There are very significant differences between early versions of FUNNELWEB v3.4 and more recent versions. Each FUNNELWEB distribution disk contains a file called FWDOC/REPT in which these changes are documented. The date of the last entry in this file tells you how recent that particular issue of v3.4 is. This date is also (I think) correctly repeated at the end of the -READ-MEfile. One significant date is Dec 15/86. The notation for, this date says that files ED/EE are modified to reduce keystroke loss on word-wrap. This refers to the II-Writer editor, and represents a SIGNIFICANT IMPROVEMENT over previous editions of TI-Writer. It used to be common for moderately fast typists to loose a keystroke as word-wrap occurred. This is because the 99/4A has no keyboard buffer. With FUNNELWEB dated Dec 15/86 or later this problem is greatly reduced although not eliminated. Another important date is Feb 16/87. As of this date, FUNKELWEB includes version 3.5 of Disk Manager 1000, which has no buos known to me and has some very nice features not found in earlier versions of DM1000.

FUNNELNEB consists of a group of linked system files and several DOC files. These almost fill a double sided disk or two single sided disks. The exact FUNNELWEB files you need on your system disk depend in part on how you are moing to load FUNNELWEB. Many of these files are not needed when loading from extended basic. To use FUNNELWED you put your user programs on the same disk with the FUNNELWEB files. If you are going to load from a SS/SD disk using the extended basic module and can do without FUNNELWEB's ability to assemble assembly language, then I recommend using the following FUNNELWEB files: QD, CHARAI, UL, LOAD, EAU, ED, EE, FO, FP, MG, MH, and DP. This list differs from the SS/SD list recommended by the FUNNELWEB authors. Their list doesn't give you access to DISK PATCH. My list does. These files will leave you with 123 sectors free on a SS/SD disk in which to place your user programs. If you want to automatically return to FUNNELNEB after using DM1000 or DISK PATCH add file UTIL1 to my list. This would leave you only 90 sectors for user programs on a SS/SD disk. A fully configured set of FUNNELWEB files set up for extended basic loading occupies 328 sectors. This would leave 300 sectors on a DS/SD disk for user programs. **NEXT PAGE**

Many features of FUMNELMEB can be modified by altering code in the extended basic portion of the "LOAD" program on the FUMNELMEB disk. Specifically:

Line 120-- The second and third numbers after CALL COLOR
give, respectively, the foreground and background power
up colors. Each additional second and third number
gives additional color combinations selectable from the
keyboard after powerup.

Line 130-- The TI-Writer and E/A editor printer default for the PF command.

Line 140-- the TI-Writer formatter printer default, usually with ".LF" after the printer name.

Lines 180-330-- The names of user options that will appear on the first menu.

Line 340-- K=x where x is the default drive number that appears in file names. If K=3, then when you sepcify SF or LF from the TI-Writer or E/A editor "DSK3." will appear on the screen. If a number is placed in between the parentheses of the null string that follows K in CALL LINK("FNLWEB",K,"", etc.) then FUNNELWEB expects all its assembly language files to load from this drive number. Set this null string to a drive number if you put FUNNELWEB on a ramdisk. Putting a number inside this null string makes it no longer necessary to go through the LOAD and UTIL1 files with a disk editor changing all DSK1.'s to DSK3. in order to make FUNNELWEB work properly on a DSK3. configured ramdisk.

NEXT COLUMN

Lines 360-510 will RUM "DSKx.XBPROGRAM" or will run an assembly language program. In the latter case, follow the examples given. The value of K is the same as the number you press to load the program from the LOADERS option of the central menus: 2 for a GPL program, 3 for running an assembly PROGRAM image file, and 4 to load and run a DIS/FIX 80 assembly program.

When autobooted from extended basic, the FUNNELWEB "LOAD" program described in the preceeding paragraph first displays a title screen and then a menu with 18 choices, the last 16 of which are user programs. You can speed up the display of this menu by pressing any key as soon as the FUNNELWEB title screen appears. This first menu, as it appears with my own user programs is shown below. A single keypress loads each choice.

TI-WRITER REDISKIT EDITZASSM WORD COUNT CALCULATOR C BOOK FILE CheckWritel D ScreenDump DISK LABEL! SORTING CALENDAR ALBUM FILE DISK PATCH G EXT. DOSIC MAIL LISTS! Н DSK1.LOAD MOVIE LIST I DSK2.LOAD FUNNELWEB ٧n 3.4 from HV99

The menu item labeled ScreenDump loads SDUMP II, a memory resident assembly language screen dump program by Quality 99 software, and then returns to extended basic and reloads the FUNNELWEB "LOAD" program. Similar FAIRWARE screen dump programs are available from most user group libraries. FUNNELWEB's LOAD program contains a CALL INIT which would normally erase the just load memory resident screen dump program. Here is a trick to prevent this from happening. OLD the FUNNELWEB "LOAD" program and delete the CALL INIT found in line 110. Then save whats left of the original LOAD program with the name "FN". Make a new LOAD program that reads 100 CALL INIT :: RUN "DSKx.FW". Every time you want to reload FUNNELWEB from a user list extended basic program add the code RUN "DSKx.FW" whenever an END or STOP is found in the XB user program. This way you can load any one of several memory resident assembly language screen dumps from FUNNELWEB, automatically return to FUNNELNEB without erasing the just loaded screen dump program, and then dump your choice of screens from any other XB user list program. This is how the FUNNELWEB first menu shown above was produced. NEXT PAGE

Bits, Bytes & Pixels

Pressing "1" (TI-WRITER) from the first XB menu, leaves the XB environment, and produces the following central menu:

- 1. EDITOR
- 2. FORMATTER
- 3. DM1000
- 4. DATABASE
- 5. MODEM
- 6. USER LIST

1 and 2 from this central menu loads improved versions of the TI-Writer editor and formatter. Upon exit from the editor (0-uit and then E-xit) you are returned to this central menu. 4 loads your choice of any assembly language database program whose first file you rename DB. 5 loads your choice of terminal emulator programs whose first file vow have renamed MD. 6 (USER LIST) produces a menu of all your NON BASIC user programs and is configured with a special FUNNELNED file ULINSTL. Once USER LIST is configured to your satisfaction, you don't have to use ULINSTL again. You can't load extended basic programs from USER LIST. These can only be loaded from the first menu when loading FUNNELWEB with the extended basic module. You cannot get directly back to this first XB menu from any of the central menus such as that shown above. You have to reboot FUNNELNEB from the beginning in order to access extended basic user programs after entering one of the central menus.

Pressing "2" (EDIT/ASSM) from the first XB menu leaves the XB environment and produces this central menua

- 1. EDITOR
- 2. ASSEMBLER
- 3. LOADERS
- 4. c-COMPILER
- 5. DISKPATCH
- 6. RESET

1 and 2 from this menu load improved versions of the Editor/Assembler editor and assembler. The assembler creates a DIS/FIX 80 assembly program from DIS/VAR 80 source code entered into the editor. An additional FUNNELNEB utility is provided which converts DIS/FIX 80 code to PROGRAM image files which are more compact.

Pressing *3" (LOADERS) from the E/A central menu lets you load assembly language programs that are not already part of your FUNNELWEB user list. The following is displayed: 1. TEXT MODE (TWr)

- 2. 6PL Environment
- 3. PROGRAM (E/A)
- 4. LOAD/RUN (E/A)
- 5. RE-ENTER (1-3)
- 6. LOAD/RUN (6-8)

NEXT COLUMN

The numbers 1 thru 4 of this menu correspond to the K value used in loading user list assembly language programs from the XB load menu. I from the LOADERS menu loads UITL1 or other programs designed to load from the li-Writer module. This is where the Dragon Slayer spelling checker would load. 2 from the LOADERS menu simulates a GPL environment. and can be used to load disk versions of TI command modules. 3 from the LOADERS menu loads program image (RUM PROGRAM FILE) files. It is the same as choice 5 from the E/A module. 4 from the LOADERS menu will load DIS/FIX 80 assembly language programs the same as 3 from the E/A module. After loading all the needed files with number 4 above, just press ENTER and you get a list of all the DEF table. This means that it is no longer necessary to memorize or guess the "PROGRAM NAME" that gets a DIS/FIX 80 program running. (It is too bad that 3. PROGRAM and 4. LOAD/RUN from the above LOADERS menu are not numbered the same as they would be with the E/A module. When using the menu displayed by the E/A module to load assembly programs. LOAD/RUN is number 3 and RUN PROGRAM FILE is number 5. This sometimes causes me confusion, since many of my programs are labeled "E/A #3" or "E/A #5".) 5 from the LOADERS menu allows you to immediately restart a previously loaded assembly program without reloading from disk, if the program is re-enterable. 6 thru 8 from the LOADERS menu are similar to 4 (LOAD/RUN) but are used to load DIS/FIX 80 programs that will overwrite part of FUNNELNEB. The file FWDDC/EASM explains the use of items 6 thru 8.

Item 4 from the E/A central menu loads the c-Compiler developed by Clint Pulley. This compiler must be obtained separately from Mr. Pulley. It is not part of the FUNNELWEB parkage.

Item 5 from the E/A central menu loads an improved version of DISKO in which the sector number and byte number where the cursor is within the sector are displayed. Sectors can be displayed and edited in either Hex or ASCII. A disk directory is available from within this version of DISKU if loaded from the E/A central menu instead of the first XB menu. Unfortunately, a printer dump of the displayed disk sector is not available.

Item 6 from the E/A central menu (RESET) places the current file name in memory so that you can switch between TI-Writer and the Editor Assembler and see this file name displayed on screen whenever needed. Item 6 changes to *QUIT* after RESET is pressed. If you now press & again (BUIT) you are returned to the 99/4A's title screen.

When in either central menu, you can bring up the other central menu by pressing any key except a number key. You can thus quickly alternate back and forth between the two central menus. When loading FUNNELNEB any way other than from the XB module you go directly to a central menu. The first XB menu with its 18 choices, illustrated above, is only available if you load FUNNELMEB from the XB module.

Although FUNNELNEB is designed to load everything, there are a few assembly language programs which do not run properly when loaded through FUNNELWEB. The FUNNELWEB authors discuss the reasons for this in one of the DOCs. Often the problem is that the program expects specific code to be present at a specific module ROM or 6ROM address. Multiplan won't work with FUNNELNEB. It is coded in an unusual manner and requires the Multiplan module. I also know of two programs that do load correctly from the E/A module but won't load with FUNNELWEB. One of these programs is "Disk Information Manager", a public domain program that is listed as H171 in Guy Romano's free access library. The other program that won't run properly from FUNNELWEB is the chess playing program SARGON. SARGON appears to load properly, but locks up at about the second or third chasspiece move. You need to use the E/A module to play SARSON.

Is FUNNELWEB v3.4 better than FUNNELWRITER v3.3? I think so, and I sent the authors an additional donation as evidence of this viewpoint. It is very handy to have the large XB menu with TI-Writer, Edit/Assembler, and 16 user programs displayed right after an XB load. In some ways this is similar to the Gram Kracker's multi-item powerup menu. The previous version (3.3) had only 9 user programs, none showing up on the initial menu. More important are the little day to day changes that keep making FUNNELWEB v3.4 better and better. These significant improvments since the initial release of v3.4 include complete compatability with Horizon Ramdisks, improvements to DISKO, reduction of keystroke loss at word wrap from the II-Writer editor, and the inclusion of DM1000 v3.5.

Many user groups have a FUNNELWEB v3.4 release in their library, but the dates of these releases may vary. Recent updates of FUNNELWEB v3.4 can be obtained by individuals from Guy Romano for a small copying and postage charge. He gets most of the significant updates almost as soon as they are issued. Call him at 415 753 5501. User Groups (not individuals) can obtain a copy of the Feb 16/87 update from the Lima User Group at P.O. Box 647, Venedocia OH 45894. Send a flippy or 2 floppies along with return postage and mailer. The FUNNELWEB authors will be glad to send you the latest, or tell you about someone in your area who already has the latest update, IF you send them a substantial donation. How much would such software sell for if it were commercial? FUNNELWEB's authors Tony and Will McGovern live at 215 Grinsell St., Kotara 2285, NSW Australia.

DONE

QUAD DENSITY FROM RYTE DATA

It has been brought to our attention that you cannot, as suggested in the March issue of this newsletter, use ordinary TI disk drives for Quad density format, and maybe not for double density format either. Ryte Data will install chips in a TI disk controler that permit double and quad density. However, you need extra quality drives in order to utilize quad density.

DONE

MOVIE LIST

Here is another example of a program that doesn't do anything similar to examples discussed by Jim Peterson in one of his Tigercub Tips colums.

The local public library has a very extensive list of videotapes that are available for free loan to anybody with a library card. Each video title has a number, the numbers running from 1 to over 600. The library is by far the best video bargain in town.

Since I am the one who has the opportunity to regularly pick up library videos, I made a copy of the library's list of video titles and took it home for my family to review. Each family member provided me with a list of movie numbers that they wanted to eventually see. I turned on my 99/4A, booted extended basic, and typed in each number on these lists, presing (ENTER) after each number. These lists were not necessarily in numeric order, and sometimes several family members requested the same video number. I just continued merrily typing in each number on the lists. When I was finished I typed LIST, and the computer displayed all these movie numbers in numerical order! I then put a "!" after each "line number" of my "program" followed by the title, name of family member(s) requesting, and movie rating (6,P6, etc.) if known. I saved all this under the name MOVIELIST.

Now whenever I need a printout of the family movie list to take to the library I OLD DSK1.MOVIELIST and then type LIST "PID" for the printout. When we see a movie I delete it from the list and by loading MOVIELIST, typing the movie number, pressing (ENTER), and resaving MOVIELIST.

This program that does nothing is one of my family's most important databases. The ability of BASIC in the 99/4A to instantly sort program line numbers in numerical order and to quickly delete numbers is what does the trick.

DONE

Bits, Bytes & Pixels

SPIDER-MAN WORD LIST

Here is a list of words accepted by the Scott Adams adventure SPIDER MAN. The computer responds to the first four letters of each word in a two word command.

First Word Second Word (usually a verb) (usually a noun) ADJUst ACID ASK AIR AT AQUATium AWAKe ARM BELT AROUnd BREAK BASEment CAST BEGIn CATCh BIO CHANge BLADder CLIMD BLICK CLOSe BUILding CRAW1 BUT CREATE **B**UT **Ton** DANCe BYE DESCend CALCium DIE CARBonate DISTrou CAT DODGe CEILing DOWN CHLOride DRINK CIELing DROP CLOCK DUCK CLOUd EAT COMPuter EMPTu CONNers ENTER COUCH EXAMine CRIB FEEL DESK FIGHT DIAL FOLLow DIR? FORCe DOCTor FREE DOOR GET DOS GIVE DOWN GRAB DRAW **GROPe** DUCT HELP EAST HIT EGG HOLD ELECtro INVEntoru **ELEVator** JUMP ENERGY KEYIn **EXECute** KICK EXOTic **EYES** LEAP FAN LEAVe FLOOR LIST FLUId

First Word

LOOK LOWER MAKE MIX MOVE OPEN PICK PREPare PRESS PULL PUNCh PUSH PUT QUIT RAISE READ RELEave RESCue RESET RIP RUN SAVE SAY SCAN SCORe SCREen SEE SET SHAKe SHOOt SXUt SING SLUG SMASh SMEL1 SPEAK SPILI SPRAy STAR STOP TAKE TALK TELL THROW TΠ TOSS Tuuch TOWArd TURN TWISE TYPE UNF01d UP.

USE

Second Word

FOREtune

FORMula FORWard FRAMe GAME GEM GOOD **GROUnd** HALL HELL HYDRoman INVEntoru J.J. Jameson JAMEson KEYBoard KILL KNOB LAB LEDGe LIFT LIST LIZArd LOAD MADAme MAZE ME MESH MIRROR MIST MOTOR MYSE1f MYSTerio NΕW NEWSpaper NICH NORTH OCT OCTOpus OFF OFFER DUT PAINting PAPEr PARK **PENThouse** PETE PLATE PRESses PRINE QUEStprube REBOot RESE? RINGmaster NEXT PAGE

WAIT WAKE
WALK
WHIStle
WITH
YELL

ROOF ROOM RUN SAND sandman SCALe SCORe SELF SHAFt SIGN SKY SKYScraper SOME SOUTH SPIDer-man STAR STATE THERmostat TOOL UP **UENT** WALL WATEr WEB WEST **WIND** YOU.

**DONE **

YOUR

FOR SALE

GEMINI 10X Printer, TI compatable with formating software and full documentation. \$110 or a good offer. Call Hal Sehnert 419-991-4521

FOR SALE

TI99/4A console with 2 cartridges and dual cassette cable and documentation. \$65 or a good offer or trade for an Atari. Call Mark Wagner evenings at 419-339-5853

FOR SALE

Software for Radio Shack Color Computer. Includes 059, games, rom packs, 20 disks, etc. \$75 or a good offer. Call Greg Hyman at 419-331-3261

QUALITY 99 SOFTWARE SALE

The Lima user group has received a notice of sale prices on Quality 99 software. Some of these prices are as low as Fairware prices. Credit card orders or info can be obtained by calling 202-667-3574. DRAW "N PLOT......\$9.95
DISK MANAGER IV.....\$9.95
QS-XREF.....\$14.95
THE DUPLICATOR....\$9.95
BANNER MAKER....\$9.95
SOFTKEYS...\$9.95
SCREEN DUMP II\$9.95
etc. etc.

If you purchase SCREEN DUMP II, show Charles Good your original and he will tell you how to break to code on the loader program so that it will load faster and automatically input your printer name.

Home Computing Journal update--

One of the Lima User Group members has received an offer from them that includes full refund of the unfulfilled portion of the member's 99er subscription. This offer was made by H.C.J. after 9 months of letter writing and complaints. Once the check is received, details of the offer will be published so others can also demand their money back.

Geneve 9640 update

It now looks like the 9640 computer by Myarc may actually exist. Micropendium reports receiving one. Watch for a review in the April issue. Many of us who have Micropendium subscriptions have received a colorful mailing about this computer on a card. These mailings have a Micropendium mailing label. Apparently Micropendium sold its mailing list to Myarc for the purpose of this mailing.

GRAM KRACKER BATTERIES

MG will be glad to sell you a GRAM KRACKER replacement battery for \$2.50 including postage. Those of us who have gotten used to the KRACKER being immediately available on powerup will be upset when the battery dies, usually after about a year of use. It would probably be a good idea to purchase a spare battery after 9 months or so and keep the spare in the refrigerator or freezer until needed. MG takes personal checks. They are at 1475 W. cypress Ave., San Bimas CA 91773.

##DONE##

STOP PRESS!!! ANOTHER "FUNNELWEB" UPDATE

As this newsletter was being prepared, and after the FUNNELWEB article on p.1 was written, we received from Australia a FUNNELWEB v3.4 dated Mar 30/87. This update includes two features not found on the Feb 16/87 FINNELWEB issue.

- 1. A beep sounds when using the TI-Writer or E/A editor every time you are almost at the end of a line. You have four spaces left after the beep sounds before word wrap occurs. You can, if you want, turn off word wrap (CTRL 0) and hyphenate words when you hear the beep, just as you would with a typewriter.
- 2. You can now load a whole group of up to 15 D/F 80 assembly language files by using just a single file name with SCRIPT LOADER from the LOADERS submenu. You create a D/V 80 file listing each of the files to be loaded in the order of their loading. You then give the name of this B/V 80 file when prompted after selecting SCRIPT LOADER, and all your assembly files automatically load in the order specified. You can control which drive each file loads from, and you can specify the link name for automatic running or use an internal autostart built into one of the loaded files. This SCRIPT LUADER is somewhat similar to making the TI-Writer formatter print a whole chain of files using the .IF (Include File) command repeatedly.

User groups (not individuals) can obtain this Mar 30/87 update by sending a flippy or 2 SS/SD disks to the Lima User Group.

##DONE##

NO NEW "CHECKWRITER" THIS MONTH

Last month we promised to publish an improved version of Mel Nomina's Checkbook Writer program in this April issue of Bits Bytes and Pixels. Well, it just isn't ready yet. This improved version of Checkbook Writer is somewhat similar to the Myarc 9640 computer. When it finally does appear it should really be great!! Hopefully we will have it for you next month in the May issue of this newsletter.

We have received a list of new and used equipment for sale from ARMADILLO BYTES P.O. Box 900921 Dallas TX 75218. 214-328-9257. They offer 10% of for orders totalling over \$200 and 15% off for orders totalling over \$500. They have lots of goodies.

Description of Merchandise	Retail Price	Your Price
II 99/8 Computer with Hexbus Disk Controller/half Hi drive (double sided/double density) 56" Hexbus caple, Original II 99/8 Manual, and Two Sarmadillo Interface" Carde, Dwn's true collectors item!! This computer works perfectly.	1000.00	750.00
TI 74 Handheld Computer, with Thermal printer, Pascal Cartridge, Finance, and Math Cartridges, and Cassette Interface All In original Boxes with all Manuals	299.95	225,00
II RS202 Cards II Disk Controller Cards II Drode Pascal Cards-W/switch II Pcode Pascal Cards-No switch II Pcode Pascal Expansion Box II P-box(no interface card-Great for Use with the Myarc 2040!!) II Speech Synthesizer II External Disk Drives(w-p/s) Percom Disk Erives-W/Controller, power supply and case II Standalone Disk Controller	119, 95 109, 95 119, 95 129, 95 129, 95 129, 95 129, 95 139, 95 129, 95 129, 95 129, 95	85.00 85.00 90.00 125.00 115.00 150.00 100.00 30.00 100.00 100.00 100.00 90.00 90.00 90.00 90.00
II Extended Basic-W/manual II Whiter word Frocesser II Microsoft Multiplan-Spreadsheet Multiplan Cartridges-No manuals or disks II Physical Fitness Module II Securities Analysis II Tan Investments/record Keeping II Personal Record Keeping II Speech Editor II Serminal Emulator II	25.00 19.95	30,00 20,00 25,00 19,00 19,00 15,00 15,00 15,00 10,00 20,00