
Apple - Bug

The Newsletter of Apple-Q Inc.

July 1992 Edition Volume 11/Number 7

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Apple-Q Inc. The Brisbane Apple User Group.

Supporting the Apple Macintosh, and Apple][computers

Apple-Q Inc. Diary

Sunday	July 19th	1992
General Meeting	{ 11.00 am }:	Doors Open. Please refer to the Information Page for details.
Demonstration	{ 12.00 am }:	Demonstration of Apple Macintosh Music Software by Steve Smith of Parlings . . .
Committee Meeting	{ 3.00 pm }:	Committee Meeting. Members are more than welcome to attend.

Sunday	August 16th	1992
General Meeting	{ 11.30 am }:	Doors Open. Please refer to the Information Page for details.
Demonstration	{ 12.00 am }:	Demonstration of new Apple II and Macintosh Software by Wes Slade of Logical Solutions.
Committee Meeting	{ 3.00 pm }:	Committee Meeting. Members are more than welcome to attend.

Notice Board

Apology

Apple-Q would like to apologize for any inconvenience caused to users of it's BES due to problems we are having with our hardware . . .

We hope to have the BES problems solved by the time you read this issue..

Growth Computers

4 Park Road. Milton
Phone 369-4099

For all your Apple needs..

The Q-Store

5.25	DDDS blank disks	{Box 10}	\$9.00
3.5	DDDS blank disks	{Box 10}	\$18.00
3.5	DDHD blank disks	{Box 10}	\$36.00
3.5 / 5.25	Disk Satchells	{Pkt 50}	\$7.00
	Apple IIGS Replacement Battery	{Each}	\$25.00

We also stock supplies of Printer Paper, Ribbons, Mouse Holders etc . . .

Note: Prices are subject to change without notice, but are correct at the time of printing.



Public Domain Software

Apple-Q Inc. has a wide selection of Public Domain, Shareware and Demonstration software available to members. We charge a copying fee so the group can obtain more software to expand the library. The copying fee for 5.25 inch disks is 50 cents a side with a minimum charge of \$2.00. For the 3.5 inch disks, the minimum fee is \$3.00 per disk, with "Disks of the Month" costing a little extra than the older software in the clubs library.

On the inside back page you will find a software order form. This form can be used if you wish to order by mail or you can order & pick it up at the meeting. For mail orders, remember to add \$2.00 for postage & packaging.

Meeting Format

11.00 am - 12.00 - Open for Business

Trading table open, Hard copy Library Open
Registration of members (new and renewals).
PD Software Library sales. Raffle Tickets sold.

12.00 - 1.00 pm - Demonstration

Invited speaker to give a demonstration.
followed by a question and answer session
relating to the demonstration, draw raffles etc ...

1.00 pm - 3.00 pm - Special Interest Groups

Special Interest Groups ...
Trading Table, Software Library continues ...
General Computer Time ...

3.00 pm - Start Committee Meeting

SIGS, Trading Table, Libraries etc. close.
General computer time continues.
Committee meeting starts.
Members are welcome to attend committee meetings.

5.00 pm - (approx.) Open Day ends.

End of the General and Committee meetings.

Meeting Venue

Andrews Special School

79 Troughton Road, SunnyBank.

Membership Fees

Adults/Students:	\$25.00
Corporate Membership:	\$50.00
Associate Membership:	\$10.00 (BBS only)
Joining Fee:	\$10.00 (first year only)

At the discretion of the Executive Committee

Articles for Apple-Bug

If you would like to contribute to Apple-Bug, please send in your article (on disk if possible) to Apple-Q or bring it along to the meeting. The deadline for Apple-Bug is the Open Day meeting. Disks will be returned.

Executive Committee

Arn White	President	(07) 371-4067
Bob Godbehere	Vice-President	(07) 808-3892
Dale Rodgie	Secretary	(075) 91-2819
Stan Millar	Treasurer	(07) 801-1901
Kelvin Saggars	Editor	(07) 800-3577
Graham Black	Registrar	(07) 883-1525
Ian Millar	Hardcopy Librarian	(07) 343-4261

Software Librarians

John Finch	Apple Macintosh	(07) 260-5218
Steve Wilson	Apple//	(07) 282-6868
Paul Featherstonhaugh	Apple GS	(07) 201-1698

Bulletin Board

Name:	Apple-Q Inc. BBS
Telephone:	(07) 851-1711 [24 hrs - B.B.S.] (07) 351-3090 [7-9 pm - Voice]
Baud Rates:	300, 1200/75, 1200 & 2400 Baud
Data Specs:	8 Data bits, 1 Stop bit, No Parity, Full Duplex
SysOp:	Vince Crosdale
Co-SysOp:	Graham Black

Production Information

The Apple-Bug was written mainly with AppleWorks GS, and AppleWorks GS was also used for the Page Layout. Apple-Bug is printed by the Hooper Education Centre. Thanks to Kelvin Saggars for the use of the StyleWriter used to produce the original copy.

More Info

- The copying of Commercially produced software is not sanctioned by Apple-Q Inc. and members who do so risk expulsion from the group.
- No one is allowed in the (Apple) Q Store except for Committee members and anyone appointed to work at the counter.

Advertising

Classified advertising is Free to all Financial Members. For non-members, the charges are \$18.00 for a Half Page and \$30.00 for a Full Page. For more information, contact the Editor.

Help Line

Apple II General
BobGodbehere (07) 808-3892 7-9pm & WE

Apple IIGS General
VinceCrosdale (07) 351-3090 7-9pm
GrahamBlack (07) 883-1525 1-6pm
KevinRiethmuller (076) 30-2293 7-9pm

Apple Macintosh General
John Finch (07) 260-5218 7-9pm & WE
Ann White (07) 371-4067 7-9pm W'Days

Apple Macintosh - Music
Tony Truscott (07) 266-4795 7-9pm & WE

Apple Macintosh - Page Maker
Ann White (07) 371-4067 7-9pm W'Days

AppleWorks (Classic)
Ann White (07) 371-4067 7-9pm W'Days

AppleWorks IIGS
Kelvin Sagers (07) 800-4660 Modem/Anytime

AppleSoft / Beginners
BobGodbehere (07) 808-3892 7-9pm & WE
VinceCrosdale (07) 351-3090 7-9pm
Simon Skill (07) 800-1099 7-9pm & WE
GrahamBlack (07) 883-1525 1-6pm

Communications / Modems
VinceCrosdale (07) 351-3090 7-9pm
Kelvin Sagers (07) 800-4660 Modem/Anytime

Education Programs
Ann White (07) 371-4067 7-9pm W'Days
John Aspland (07) 368-2420 7-9pm
Geoff Galt (07) 355-5161 School hours

Seven Hills Partner
Kelvin Sagers (07) 800-4660 Phoenix BBS

Software Library & Disk of the Month
Steve Wilson (07) 282-6868 Apple II
Paul Featherstonhaugh (07) 2011-698 IIGS
Times: 7-9pm and Weekends

Apple IIGS Graphics, Programming
Paul Featherstonhaugh (07) 2011-698 7-9pm

The Editors Desk

By Kelvin Sagers

It's fun sometimes to read the comments in magazines put out for other computers, especially if they are 'having a go' at the 'other brands', because in most cases if you substituted brands, you end up with an article equally at home in say an Apple magazine. This 'blinkered bias' is true for just about every computer type you can name, and comes about because we all feel the computer we own is the best (after all we have outlaid a lot of hard earned cash for it so it can't be anything but). We all also think that 'our company' is at the forefront of every new break through, but that the particular computer model we own has far greater potential than the company that produced it has ever seen fit to realize. In some cases this is truer than others and is always a bone of contention in just about any computer magazine you care to pick up.

As Apple users we had, to a large extent been exempt, from this particular problem until a few years back, up until then everything had been backward compatible (aside from a few models that died quick deaths). Even then the Mac was heading along a different path, but in those days it was seen as a 'business machine' and was priced to suit, so it was not seen as being the 'average users' machine. Things have changed a great deal since those days and Apple is actively pushing the Mac as 'the' machine and has been for some time, with Apple II users feeling 'left out in the cold' unless they care to 'move on' to a Mac. What Apple fails to seem to grasp is that most Apple II owners don't want to, or cannot afford to, spend the dollars needed to make the change.

That's one side of the coin and I guess I have beaten that drum, almost to death, so lets look at the other side. At first Mac models and resale values were reasonably stable, now even that has changed over the past few years, with Apple pumping out new models so fast that Mac owners are finding that their purchases are outdated by newer models or even discontinued by the time they have become only marginally acquainted with it's capabilities. This has left quite a few disgruntled Mac owners by the wayside, true in most cases Apple offers 'an upgrade path' but this always seems to involve a hefty outlay of green stuff.

I guess what I am trying to say is that a lot of people have machines that they feel have been 'cast aside', these machines are not 'dead', they have value, as long as they do what you expect of them, sure we would all like the latest wiz-bang model but money does not grow on trees, so if you are happy with what you have, stick with it. That in itself is OK, but sooner or later we all must move on, and what companies must start to take note of, is that people want security as well as the latest gadgetry. When they purchase items like computers they like to see the company they have supported for years produce one that fulfills their needs and is priced to suit their pocket, or they feel betrayed, and cast aside, and as they say, that's no way to run a business...

As I said at the start, change the names and the shoe still fits no matter what computer you own. So next time you start feeling that your one of those 'left out in the cold' just look down and see if you are sitting in front of an Apple II, or a Macintosh... or

If you are free to aid other members and would like your name added to the list, please let us know.

Please Only call the help line between the times listed. WE stands for Weekend, W'Days stands for Weekdays only, A'Machine stands for an automatic answering machine, and Modem and BBS are not voice lines.

The History of the Apple II - Part 6

Compiled and written by Steven Weyhrich
(C) Copyright 1991, Zonker Software
Version 1.1 :: 12 Dec 91

Edited by Kevin Sagers

The Apple II Plus - Hardware ...

We now go cruising ahead in time about one year, to June of 1979. AppleSoft BASIC had been in heavy demand since the introduction in late 1978 of an improved version. It was needed by those wanting to write and use applications that needed the capability of floating-point math. Because of this, Apple engineers had begun working in 1978 on the Apple II Plus, a modest enhancement to the Apple II.

The main attraction of this newer Apple would be AppleSoft in ROM, available immediately without having to load it from cassette or disk. Also, having it in ROM would move it out of the part of memory where RAM AppleSoft conflicted with hires graphics (after all, AppleSoft had commands specifically written into it for manipulating those graphics, something that Integer BASIC could only do via special CALLs to the routines in the Programmer's Aid #1 chip). With the decision made to upgrade the Apple II, other changes were made to make it more attractive to new computer buyers. The cost of RAM chips had dropped considerably, so most new II Plus systems came standard with a full 48K of RAM. Since the disk operating system consumed about 10K of memory, having the full complement of available RAM made it easier to use the Disk II with either version of BASIC. Since users would not need to add the smaller 4K memory chips, the strapping blocks that had made it possible to use either 4K or 16K RAM chips on the original Apple II were removed.

Small changes had already been made to the product since it first began distribution. Most of these changes were made primarily to simplify the Apple II and decrease costs of manufacturing. First of all, the original Apple II motherboard, designated as "Revision 0", was changed to make it possible to display two more colors in hires graphics.

The Revision 0 board had only four colors (green, violet, black, white), but Wozniak had learned that by making a simple alteration he could get two more colors (blue and orange) and two more varieties of black and white. The Revision I & later boards were capable of displaying all eight colors. The means of making this modification to Revision 0 Apples was described by Wozniak in his reply to an article by Allen Watson III about hires graphics (in the June 1979 issue of Byte magazine). With that change, people who were not afraid of doing a little electrical work on their computers had some of the benefits of an updated Apple II.

Hardware bugs that Apple engineers fixed included one that caused text characters to be displayed with green and violet fringing, whether in graphics mode or text mode. The "color killer" circuit they added fixed things so that non-graphical text would be displayed in black and white only. Another problem involved RAM configurations of either 20K or 24K (a 16K RAM chip plus one or two 4K RAM chips). In those systems a hardware bug caused the 8K of memory from \$4000 to \$5FFF to be duplicated in the next 8K of memory, from \$6000 to \$7FFF, whether there was RAM present at those locations or not. This made a 20K Apple appear to have 24K, and a 24K Apple appear to have 36K. The Revision I motherboard fixed this problem as well. [1]

Revision I boards also modified the cassette input circuit to respond with more accuracy to a weak input signal, thus making it much easier to load in data and programs from cassette. Also, one "feature" of the original Apple II was that any sound generated by the internal speaker also appeared as a signal on the cassette output connector; this was fixed in the new motherboards. Lastly, the RESET cycle was made part of the power-up circuitry, eliminating the requirement that the RESET key be pressed after turning on the computer. [2][3]

The Apple II Plus: Firmware

More important than the minor hardware changes, however, were the changes in the ROM code. The new ROM replaced the original Monitor with one that, among other things, better supported the new Disk II drive. Since RESET was now automatically activated when the power was turned on, the new ROM code had the computer automatically do a few things. It cleared the screen (displaying "APPLE II" at the top), and began a scan down the slots, starting at slot 7 down to slot 1, looking at the first few bytes of code in each card's ROM for a specific sequence that would identify it as a Disk II controller card. If one was found, control was passed to that card, causing the disk drive to startup and begin loading the disk operating system into memory. If no disk controller was found, the ROM code jumped instead to the start of BASIC (instead of leaving the user in the Monitor, as in the old ROM). This "Autostart ROM", as it was called, made it possible to have a system that started up a program on the disk with little action needed by the user.

The RESET code was more intelligent in the Autostart ROM than in the Old Monitor ROM. There was now a "Cold Start" RESET (which functioned as described above), and a "Warm Start" RESET. A Warm Start RESET could occur without re-booting the Disk II (if it was present); in fact, it ensured that the disk operating system remained "connected" after RESET was pressed. This feature was implemented by setting three bytes at the end of page \$03 in memory. Two of the bytes were the address of the place in memory to which the Apple should jump if RESET was pressed. The third byte was a specially coded byte created from half of the address byte. When RESET was pressed,

this special "power-up" byte was checked with the address byte. If they didn't properly match, the Monitor assumed that the power had just been turned on, and it executed a Cold Start RESET. This feature was extensively used by writers of copy protected software, so users could not modify or copy the code in memory simply by pressing the RESET key.

The other major change, mentioned earlier, was the BASIC that was supplied in ROM. Gone was Steve Wozniak's hand-assembled Integer BASIC, in favor of the newer AppleSoft. Since these ROM versions of BASIC used the same memory locations, they could not be used simultaneously. With the introduction of the II Plus, Apple also released the AppleSoft Firmware card. This card, which plugged into slot 0, made it possible for previous Apple II owners to have some of the benefits of the II Plus without having to buy an entirely new computer. Even with that card, however, you could not use features of one BASIC while the other one was active, and switching from one BASIC to the other erased any program that was being used at the time. The two BASICs could be told apart by the prompt they used; Integer BASIC used the ">" character, but AppleSoft used the "]" character.

Another change made to the Monitor ROM made screen editing easier. The original Apple II's procedure for editing a line typed in via BASIC or in the Monitor was tedious at best. To change a line of text in BASIC, you had to list the line, move the cursor up to the start of the line, and then use the right-arrow key to "copy" text from the screen into the input buffer. If you wanted to skip part of the line, you had to move the cursor past the text that you wanted to eliminate WITHOUT using the arrow keys. If you wanted to INSERT something into the line, you had to move the cursor off the line (above it or below it), type the additional text, and then move the cursor back into the line to finish copying the original part of the line.

For example, suppose you had typed this line in AppleSoft and displayed it on the 40-column screen:

```
100 FOR I = 1 TO 100: PRINT "I LIKE MY APPLE":  
NEXT: END
```

To change that line so the PRINT statement read "I REALLY LIKE MY APPLE" meant either retyping the entire line, or using the edit feature. (If the line was particularly long, it was preferable to edit rather than retype the entire line). To edit this line, you would have to move the cursor up to the "1" of "100" and begin pressing the right arrow key. When you got to the "L" of "LIKE" you would have to move the cursor above or below the line, type the word "REALLY" followed by a space, then move the cursor back to the "L" of "LIKE", and continue copying with the right arrow key.

After editing a line, the screen might look like this:

```
100 FOR I = 1 TO 100: PRINT "I      LIKE MY  
APPLE": NEXT: END      REALLY
```

In this example, I moved the cursor down one line, typed "REALLY", and then moved it back to the start of the word "LIKE".

If you didn't make any mistakes it would read like this:

```
100 FOR I = 1 TO 100: PRINT "I REALLY LIKE MY  
APPLE": NEXT: END
```

The big problem with the cursor moves for editing under the Old Monitor was that each move required two keypresses. To move the cursor up, you had to press "ESC" and then "D" EACH TIME you wanted to move the cursor up. "ESC A" moved right, "ESC B" moved left, and "ESC C" moved the cursor down. With a long line that needed much editing, this would get old real fast. Not only was it cumbersome, but the layout of the keyboard made it difficult to remember the correct letters used for cursor movement; although "D" (up) was above "C" (down), it seemed that "D" should stand for "Down". Also confusing was that "A" was to the left of "B", but their functions were the opposite of their position!

The new Autostart ROM improved this screen editing process just a bit. Now, pressing "ESC" turned on a special editing mode. Repeated presses of "I" (up), "J" (left), "K" (right), and "M" (down) continued to move the cursor until a key other than ESC was pressed. On the Apple II keyboard these letters were arranged in a sort of "directional keypad" or diamond, which made remembering them a little easier. The previous ESC editing codes were still supported, but still with their previous limitations. Unfortunately, however, you still couldn't tell whether you were in the regular text entry mode or in the ESC editing mode, and often attempts at changing a line took several tries to get it right. [4] [5]

Other features added in the new Autostart ROM included the ability to pause a listing by pressing Ctrl-S (VERY helpful when trying to scan through a long program!) As mentioned above, pressing RESET would return control through the soft-entry vectors on memory page \$03. This would allow a user to exit from a runaway BASIC program by pressing RESET, and still keep program and variables intact in memory (which could not be guaranteed with the old Monitor ROM.) [5]

John Arkey at Apple wrote the changes to the original Monitor ROM and created the Autostart ROM in November 1978 (he's the "John A" mentioned in the source code listing found in the 1981 edition of the APPLE II REFERENCE MANUAL). After he had done the work and the ROMs had been created, Apple wanted to publish a new version of the Reference Manual to cover the Apple II Plus. The older Reference Manual (affectionately known as the "Red Book") had included an assembly language source code listing of the

Monitor ROM. They wanted to include the source for BOTH the old and new versions of the Monitor, but a problem came up.

While developing the Monitor, Apple had used a local mainframe computer dial-up service known as "Call Computer." They used a cross-assembler on that computer, assembled the code, and then used the resulting object code to create the ROM. (A cross-assembler is an assembler that creates object code for a processor other than the one the cross-assembler runs on, e.g., if you write 8080 machine code with an assembler running on a 6502-based computer, you are using a cross-assembler). Unfortunately, Call Computer had accidentally done a system backup with the source and destination disks reversed, erasing all the files containing the source code for the Apple II Monitors. There were no disk or cassette copies of the source code for the Autostart ROM back at Apple. Working from the source listing in the Red Book, John recreated the source file for the original Monitor, and then disassembled his own modifications for the II Plus and re-created his Autostart ROM source file. Those reconstructed listings are what appeared in the 1981 edition of the Apple II Reference Manual.[6]

Not everyone was pleased with the modifications made in the Autostart ROMs, however. Some of the authors of the magazine CALL-A.P.P.L.E. liked to refer to the new computer as the "Apple II Minus", since Arkley had to remove some of their beloved routines from the ROMs to make room for the new features. Missing from the Apple II Plus ROMs were Integer BASIC, the mini-assembler, and Woz's SWEET 16 interpreter (that entire space now being filled by AppleSoft). Missing from the Monitor were the assembly language STEP and TRACE features, and a set of sixteen-bit multiply and divide routines. [5]

The Apple II Plus: Cost

The new Apple II Plus, at \$1,195, sold for over \$100 less than the original Apple II, although it came with more memory and had AppleSoft (previously an added expense item) in ROM.

The Apple II Plus: Bell & Howell

Apple made a deal early on with Bell & Howell to let them sell the Apple II Plus with a Bell & Howell name plate on it for use in schools. These 'Apple II pluses were black in colour (instead of the standard beige), and had screws on the back to keep the lids on (apparently to keep students' hands out). They were sometimes called "Darth Vader" Apples and also had the "shift-key mod" (see below) applied. Since Bell & Howell was a major supplier of school equipment, this was a means for Apple to get a foothold in the school environment. [7][8]

Bell & Howell also had electronics correspondence courses, and used the black Apple II Plus for one of their courses. They offered a one year warranty, instead of the

ninety-day warranty offered by Apple. [9][10][11]

The Apple II Plus: Early User Experiences

An Apple II veteran on GEnie, Dennis Ulm, kindly provided me with the following reproduction of his ORIGINAL Apple II Plus packing list (see Item 2). It gives a little picture of what early non-disk users had to work with.

LITTLE BRICKOUT was an abbreviated AppleSoft version of Woz's Integer BASIC Breakout game (the reason he designed the Apple II in the first place). BRIAN'S THEME was a hires graphics program that drew lines on the screen in various patterns. HOPALONG CASSIDY was a "guess who" program that also used the hires screen. [12][13]

Also included in Dennis's II Plus box was this photocopied instruction sheet (item 1):

Tape Loading Instructions

If problems are encountered in LOADING tape programs, it may be necessary to "queue" (sic) the tape before LOADING.

To queue a tape, use the following procedure:

1. Rewind the tape.
2. Disconnect the cable from the tape recorder (so you can hear what's on the tape).
3. Start the tape recorder in PLAY mode.
4. When a steady tone is heard, STOP the tape recorder.
5. Connect the cable to the tape recorder and adjust the volume and tone controls on the tape recorder to the recommended levels.
6. Make sure your computer is in BASIC.
7. Type LOAD.
8. START the tape playing.
9. Press RETURN.

The program should LOAD properly. If an error message occurs, repeat the procedure, but try readjusting the tone and volume controls on the tape recorder.

Item 1 - Cassette Notes

Dennis told me that in his experience it took at least five to ten tries to get anything to load properly from tape!

The Apple II Plus: More Hardware Add-ons

Lowercase was still not supported on the new Apple II Plus, though it was a popular user-modification. The thriving industry for Apple II peripherals made up for this shortcoming, with various vendors supplying small plug-in circuit boards that fit under the keyboard, allowing display of

Apple II Plus Packing List

This package should contain the following items:

Item	No.	PartNumber	Description
1	1	600-2023	cassette tape: LITTLE BRICKOUT, COLOR DEMOSOFT
2	1	600-2024	cassette tape: RENUMBER/APPEND, ALIGNMENT TESTTONE
3	1	600-2025	cassette tape: FINANCE I, PENNY ARCADE
4	1	600-2026	cassette tape: LEMONADE, HOPALONG CASSIDY
5	1	600-2027	cassette tape: BRIAN'S THEME, PHONE LIST
6	1	030-2057	manual: Introductory Programs for the Apple II Plus
7	1	030-0044	manual: The Applesoft Tutorial
8	1	030-0013	manual: Applesoft II BASIC Programming Reference Manual
9	1	030-0004	manual: Apple II Reference Manual
10	1	030-0035	publication: Apple Magazine
11	1	600-0033	1 pair of game controls
12	1	590-0002	cable: to hook up a cassette recorder
13	1	590-0003	cable: power cord for the Apple II Plus
14	1	030-0001	Apple Warranty Card
15	1	600-0816	Apple II Plus System 16K
	or	600-0832	Apple II Plus System 32K
	or	600-0848	Apple II Plus System 48K

Item 2 - Apple Packing List

lowercase on the screen (and sometimes direct entry of lowercase from the keyboard). By 1981, when the Revision 7 motherboard was released for the Apple II Plus, a different method of character generation was used, which reduced radio-frequency interference that was generated. For Revision 7 boards, lowercase characters could be displayed with the addition of only a single chip. However, unless a user changed the keyboard encoder with a third-party product, only uppercase characters could be typed. [14]

The keyboard itself underwent some changes, both by users and by Apple. The original RESET key was in the upper right-hand corner of the keyboard. The problem with that key was that it had the same feel as the keys around it, making it possible to accidentally hit RESET and lose the entire program that was being so carefully entered. One user modification was to pop off the RESET keycap and put a rubber washer under it, making it necessary to apply more pressure than usual to do a RESET. Apple fixed this twice, once by replacing the spring under the keycap with a stiffer one, and finally by making it necessary to press the CTRL key and the RESET together to make a RESET cycle happen.

The keyboards that had the CTRL-RESET feature made it user selectable via a small slide switch just inside the case (some people didn't want to have to press the CTRL key to do a RESET). Another keyboard limitation was addressed through a modification that became known as the "shift-key mod". This was such a widely used trick that Apple ended up supporting it in hardware when they designed the Apple

IIe. Since the II and II Plus keyboards could not directly generate lowercase characters, early word processing programs had to find some way to make up for that deficiency.

Apple's own Apple Writer program used the ESC key as a shift and shift-lock key, displaying uppercase characters in inverse video and lowercase in regular video. Other programs suggested installing the shift-key mod to allow more natural entry of uppercase, using the SHIFT key already present on the keyboard.

The user had to attach a wire to the contact under the SHIFT key, and run it to the game port socket where the input for push-button 2 was found. (Push-button PB2, (\$C063 in memory), was designed as one of an optional second pair of game paddles that third-party hardware companies supplied for the Apple II). The program would assume that all letters being typed were in lowercase, unless the SHIFT key (attached now to paddle button PB2) was also being pressed; in that case the letter would be entered as uppercase.

Since the PB2 button was not often used for a second pair of game paddles, it was unlikely that this modification would be accidentally triggered by pressing one of the game paddle buttons. This modification did NOT use buttons PB0 or PB1, which were on the first pair of game paddles. (PB0 and PB1 now correspond to the Open-Apple and Solid-Apple/Option keys on modern Apple II computers).

The Next Installment

The Apple IIe

Notes

- [1] "Memory Organization", APPLE II REFERENCE MANUAL, 1979, 1981, pp. 70-73.
- [2] APPLE II REFERENCE MANUAL, 1979, 1981, pp. 25-27, 34-36.
- [3] Bruce Field, "A.P.P.L.E. Doctor", CALL-A.P.P.L.E., Jan 1984, pp. 74-75.
- [4] "Apple and Apple II History", THE APPLE II GUIDE, Fall 1990, pp. 9-16.
- [5] APPLE II REFERENCE MANUAL, 1979, 1981, pp. 25-27, 34-36.
- [6] John Arkley, (personal telephone call), Sep 9, 1991.
- [7] Joe Regan, GENIE A2 ROUNDTABLE, Category 2, Topic 16, Apr 1991.
- [8] Dan Paymar, "Curing A Shiftless Apple", CALL-A.P.P.L.E., May 1982, pp. 63-64.
- [9] Tom Vanderpool, GENIE A2 ROUNDTABLE, Category 2, Topic 16, Mar & Aug 1991.
- [10] Tom Zuchowski, GENIE A2 ROUNDTABLE, Category 2, Topic 16, Mar 1991.
- [11] Steve Hirsch, GENIE A2 ROUNDTABLE, Category 2, Topic 16, Mar 1991.
- [12] Dennis Ulm, GENIE A2 ROUNDTABLE, Category 2, Topic 16, Apr 1991.
- [13] Wes Felty, GENIE A2 ROUNDTABLE, Category 2, Topic 16, Apr 1991.
- [14] Bruce Field, "A.P.P.L.E. Doctor", CALL-A.P.P.L.E., Jan 1984, pp. 74-75.

Macintosh Mumbblings

By John Finch

New Mac BBS ...

Now, I wonder if I can get this bit of information past the editor, without him censoring it? There is a new bulletin board in town especially for the Macintosh, and if you have the right software, it works with icons & pull down menus! No more that dreaded command "Hit escape key to continue". (You do not have an escape key on a Mac plus!). This BBS is run by the Macintosh Association of Queensland Inc, and is on 847-2066. You can log on as a guest using any communications package, but you need to use "Telefinder" to get the Macintosh interface. See your friendly public domain librarian for a copy.

Hard Drives ...

It has already been announced that the Apple-Q Macintosh public domain library now has a Mac plus. Recently a 65 Mb hard disk was added. This drive came in two parts, both "pre-loved", the case/power supply from a "Rodime 45 plus" and the SCSI 65 drive itself. I had to complete the drive by marrying the two together. At first sight it looked like an easy job as all the brackets, cables etc seemed to be the exact size and shape; as long as the drive was mounted up side down. However, before proceeding I did a little investigating about mounting hard drives. Apparently many drives do not like to be mounted up side down as the bearings are not always designed to take the thrust in that way.

As I had no documentation from the drive manufacturer to say I could mount the drive up side down, I erred on the side of caution and made a new bracket. The point of this tale is that I believe this problem is not widely known, and many hobbyists, as well as a few dealers, will mount disks the wrong way up. They may work well for years, but there is

an increased risk of the drive failing. Sideways is OK by the way.

Once more I bring you news of darkness and despair to add to the ever growing list of FUD (Fear Uncertainty and Doubt) factors.

And now for something different ...

Those of you who read my demented ramblings will probably have noticed that I do not often mention commercial games. It is not that I do not like, or play games on the Mac, I do. I just do not think this column is the place for reviews of commercial games. However, there is a game I have become hooked on. It is "Warlords". It is just an adventure game, where you have to fight the baddies, but the difference between this game and others of the genre is that this game not always predictable, and it will react to your play. It is surprising how much more interesting the game is when you cannot always predict what the computer will do next. The graphics and colour are excellent as well.

Another game that I have seen recently which caught my eye is "Loom", an adventure game with a difference. You can chat to the baddies instead of the usual instant battle, and the "battles" appear to be bloodless. (I say "appear", as I only saw a part of the adventure at the start.) You drive the baddies away rather than the incessant "kill kill kill" of most games. The battles are fought by casting spells by music, so a keen ear for musical notes will help you learn the spells faster. Interesting, very humorous, and different.

Whilst I am on the subject of games, there is a new games shop in town. This one deals only in Mac games, but the proprietor has played most of the games himself and can demonstrate many of them on the shop's Mac. The shop is in Commercial Road, Newstead.

Have you hugged your Mac today? I have.

Disk of the Month

by Steve Wilson & Paul Featherstonhaugh

This month we have a mixed bag for both Apple II and Apple IIgs owners. Apple-Q's Software Library Disks are available at the open day meetings from either Steve or Paul at the Software Library Table, or if you wish the disks can be ordered via phone/mail. An order form appears on the inside back cover of this issue. Even if you don't wish the disks sent by mail you can help out if you order via phone so we can then have the disks ready for you to pick up at the meeting. The prices are as follows:

Disk Type	no disk	with disk
5.25 inch	\$4.00	\$5.00
3.5 inch	\$5.00	\$8.00

Apple-Q disks of the month contain any documentation files that may have been provided with the programs, but if you still have any problems give me us call (both Paul's and Steve's numbers are listed on the Help Line section on page 4 - Ed), or see us at the meetings.

First up we have some PrintShop Utilities. (I'd say most, if not all, Apple II owners would own a copy of PrintShop.) Well, this disk contains several programs for use with both PrintShop and NewsRoom. One displays PrintShop graphics on the screen; another converts Fontrix fonts into PrintShop fonts. The third program converts PrintShop graphics and borders to high resolution graphics. The last program uses PrintShop graphics to familiarize children with the keyboard.

The second disk is a program called Computer Keyboarding, which has been around for a while, and this release is actually version 3.32, but the writer, a teacher in the USA has only recently offered it as a PD program. It will run on any Apple II with 64K, but an 80 column card is not necessary for II+ owners without one. This program is unique in that it puts greatest emphasis on accuracy, not speed. It is structured around the Apple II keyboard, and lessons cover all letters and most punctuation marks.

This is a brilliant program, and since I've started using it, I've noticed that my accuracy on the keyboard has improved, as I can now use more than one finger, just. This program is available on either a double-sided 5.25 disk, or a 3.5 inch disk for IIgs owners and others with one. There is also a patch on the disk, to be used if you intend installing this program on a hard drive. One problem here though. The program asks your name each time you run it, so it can keep track of where you are up to. The problem is that if someone else puts their name in, the program tells you not to use someone else's disk. So if there is more than one person in the house who wants to use this program, everyone should have their own copy.

The third disk is a game, but not just for the kids. It is Tetris 2: A Clone Program. For those who have never played Tetris, it is a highly addictive, fast action strategy game in which odd-shaped objects drop from the top of the screen. You must rotate and move the objects as they fall so that all the pieces fit precisely with all the other pieces to form a complete row. This disk **MUST** be booted from Slot 6, Drive 1.

For Apple sound lovers we have 3.5 disks full of sounds, for example for system 6.0 users we have a whole heap of new system sounds for you to add to you quacks, and beeps, and for Apple II users we have a utility that lets you play G: sounds on your own machine . . . Some of the sounds include the intro music to 2001, Monty Python, Birds, trains, guns, and much more . . . add a little noise to your computer.

And Now, A Word From Our Sponsor, Err . . . Apple II Librarian

I thought I would just drop a few lines to let you know what is happening with the library, as I have had a few requests for help and some ideas have also been passed on to me for possible ways to improve the library & catalog. Here I will attempt to outline the changes I wish to make. If you have any suggestions as to what you would like to see improved, don't be afraid to come forward, after all, it is your library.

First up, I am trying to sort out the catalog into categories, such as Games, Utilities, AppleWorks add-ons, PrintShop Graphics, Educational, etc. I have had a number of members, particularly new ones, ask me if there was an easier way to find a program in the catalog than what exists presently. With the current catalog, if you want to find say, a particular AppleWorks template, you have to look through the whole catalog, and we all know how long that could take.

Hopefully, the new listings will make things much quicker and easier, easier for you that is, as it will take a while to do the whole library. Don't worry about the disk numbers quoted in the catalog changing on you, as I will keep a cross-reference of old-to-new numbers, so when you want to order a disk, you will still only have to give me the number quoted in the catalog. Once the whole library has been completed, I will make the new catalog disk available so that you may bring in your old one for updating, or should I say upgrading.

Secondly, a number of newer members have complained that they can't get the disks they get from the library to boot, easy reason, many of the masters are only data disks, and don't have the operating system (either DOS 3.3 or ProDOS) on them. The old hands had no problems coping with this, knowing how to boot off one disk, then change directories, etc. Unfortunately for newer members, and many youngsters, this is either inconvenient or something they just do not know how to do. I must admit, even after using the Finder on my IIgs, having to go back to typing in new

directory paths does get very frustrating, to say the least. I hope to rectify this by putting operating systems on disks that need it. In the interest of making our software as user-friendly as possible, it was felt that this was the only way to go. This means that a program or two may have to drop off a disk to fit the system on, but those programs WILL find

their way onto another disk, so nothing will be lost.

I do hope that these changes won't inconvenience anyone, after all, they are meant to make things easier for you. Hopefully, when completed, the catalog and library will be a joy to use!

GS Ramblings

By Robert Hook

Looking at the membership list published in the June 92 Apple Bug, I was struck by the fact that there seems to be a lot of GS owners in the club who don't often get to the meetings (Note - The listing only shows those members who have indicated no objection to their information being published in the club's newsletter - Ed). Now, before I joined Apple-Q Inc., I was starting to feel as if I was the only GS owner outside of the United States. No support to speak of. No software. Nobody to gossip with.

Take heart! There are at least 34 other GS's in Queensland! And maybe I can start to spread some of the gossip and guff from the meetings out to you by penning a barely literate series of mumbles. I'll just briefly introduce my GS system. I've been meaning for years to give her a pet name, but none presents itself. The best course is to assume that, as T.S. Elliot informed us of cats, the GS has three separate names: a common, everyday name; one which is more peculiar and dignified; and a name that is never divulged, but is what the system is contemplating in those moments when it is not in use . . .

This nameless GS (perhaps I should name it RumbleTeaser or Mungojerry?) is a ROM01 version, with 0.25Mb of RAM on board, and an additional 1Mb Apple memory board. It has one 3.5" and one (largely ignored) 5.25" disk drive, a 30Mb SCSI hard disk, and an MDIdeas stereo card. Attached to it is a Netcomm modem, and thus indirectly the world! The system gets used for three main things: writing software in C, playing games, and telecommunications.

I guess the most interesting thing to have happened in the GS world recently is the release of GS/OS 6.0. I strongly recommend upgrading to this version, with one caveat: GS/OS 6.0 is BIG. It would be fairly difficult to run it effectively with all of it's bells and whistles on a single 3.5" disk. It can be done, but you won't have room for much else on the disk. And it really is very memory hungry. I've reduced the requirements as much as possible, yet GS/OS is using 493kb on my system, and the finder is using an additional 425kb. Less than 2Mb of RAM is really not enough with 6.0.

Now, if you've been following all the numbers, you'll notice that I only have 1.25Mb of memory, & generally have

only about 350kb of memory available to work in. This has seriously slowed down my programming efforts, just as I was about to embark on a series of projects to be released into the public domain. So the next several months I'll be saving every cent to buy more memory. Stay tuned for further episodes of "Indiana Hook and the Lost RAM"...

What do you get for all this cost in memory? Just about everything you've always wanted in GS/OS. It's faster. Not only that, it SEEMS faster when you're using the finder. Opening windows is faster, manipulating files is faster. And the system tends to not interrupt you. For example previous versions of the Finder would force you to wait while window contents were redrawn before responding to keystrokes or menu selections. Now the system will respond to you first, and do it's housekeeping when it's not busy.

An Apple design philosophy that has been expressed over the past few years is that sound should be a major part of the user interface. GS/OS implements this very effectively. A Control Panel Device (CDEV) lets you assign a range of sounds to just about every system event. If you choose, windows can "whoosh" open and closed. An explosion could sound when a "Stop" alert is presented. Dropping something in the trash can could be accompanied by the sound of a drip of water. You get the idea. It may sound chaotic, but judicious use of sound in this fashion can enhance the environment by providing cues for events that you may not otherwise be aware of. For example, with a hard disk, I like to know when the trash can fills or empties. It's not always obvious that the trash can has changed shape - I like to know that the file I thought I'd dropped on the desktop hasn't accidentally gone into the trashcan!

Changes do standard file dialogs allow the user to see how the folders are nested inside each other, and often allow the user to select files by entering the first few letters of the required file. Almost all dialogs now support keyboard entry as well as mouse actions.

An updated backup program that is a proper desktop application has been included. This is slightly faster than it's predecessor, and is easier to use, but is still painfully slow and disk-hungry compared to some commercial competitors. It does, however, allow you to make archives of files to another file, rather than to a disk, which can be useful.

In the future, I hope to gather together some hints and tips regarding GS/OS 6.0. Meanwhile, get it if you can, and if you have sufficient memory.

Apple News and Views

Edited By Kefvin Sagers

A collection of news items and rumors for Apple users from various sources . . .

Personal Font . . .

Signature Software is causing some concern with its new Macintosh software package called Personal Font, which allows a user to digitize a handwriting sample, and create a font which mimics it almost exactly. Some people are worried about the potential for forgery, and this issue may become more significant as the technology evolves. —Minneapolis Star & Tribune 6/4

New Companies

Control Data, a company which has been going through tough times, has decided to split into two new companies: Ceridan, which will offer computer services; and Computer Data Systems, to carry on what's left of Control Data's manufacturing business. In recent years Control Data has been selling off businesses in an effort to cut costs. —Financial Times 6/4

Low cost PC's

Speculation about new low-cost PC's from IBM and Compaq helped push down the stocks of several companies in the price-competitive PC industry, including Apple, AST, and Dell. Egghead, a specialty retailer, reported earnings for the past quarter slightly lower than the same period last year, and its stock fell 1 1/4 points to close at 20 1/4. —Wall Street Journal 6/4

Job's for the . . .

Guy 'Bud' Tribble, one of the co-founders of NeXT, has resigned to become a vice president of Sun's SunSoft subsidiary. Steve Jobs said that Tribble left because NeXT's senior executives did not make him general manager of the new software division in March. Tribble says he now hopes to get Sun's user environment "on an awful lot of desktops." —Denver Rocky Mountain News 6/3

Computer Growth . . .

Computer Spending Worldwide could increase as much as 5% this year, compared to a 2% increase last year, according to a survey, conducted by International Data Corp., asking 7,000 information systems executives to project corporate spending. Japan and Germany are expected to show the most growth, with projected purchasing increases of 8%. —Wall Street Journal 6/3

New Transistors for smaller Chips . . .

Scientists at Ibm are announcing today that they have developed transistors twenty times smaller than the world's previous smallest ones. IBM's metal-oxide semiconductor

field-effect transistors measure one seventy-five-thousandth of the width of an average human hair, and could be used in memory chips holding four gigabytes or more of information. —S.J. Mercury 5/29

Raster Expansion . . .

Raster Ops, a company which specializes in graphics products for the Macintosh PC, is acquiring Truevision, Inc. for \$33 million in a stock swap. Truevision is a privately-held company which makes broadcast-quality video products for IBM PC's and compatibles. Shareholder approval will be required before the merger becomes official later this year. New York Times 5/22

New Data Storage Medium . . .

A New Data Storage Medium capable of recording and retrieving a gigabyte of information in a device the size of a credit card, could become a popular standard for computer data, music and video information. The cards cost under \$20 to make, and prototypes are expected from Los Angeles-based developer Urshan Research within the next six months. —St. Louis Post Dispatch 5/11

Philip's CD-I . . .

The lack of a standard interface and the relative uselessness of much of the available software might spell doom for Philips' CD-I experiment in consumer interactive multimedia. At \$800 for the basic unit and \$20-60 per disk, reviewer Walter Mossberg suspects the marketing might still be a few years ahead of the technology to make this product viable. —Wall Street Journal 5/7

Apple the best . . .

Apple Canada's full-page black & white newspaper advertisement for a Macintosh Classic PC, employing a slightly-modified version of a classic Clement Moore Christmas poem, was named the best newspaper ad of 1991 by Advertising Age. The ad was created by Baker Lovick/BBDO in Toronto. —Advertising Age 4/27

A taste of the future . . .

Superstores keep getting bigger, as demonstrated by Tandy's latest venture, a 100,000 square foot giant called 'Incredible Universe'. Tandy plans to offer practically every brand of PC, along with other consumer electronics, sold by roaming clerks with networked hand-held checkout terminals. IU will even have a restaurant and daycare center for customers. —Wall Street Journal 4/16

Virtual what . . .

The advancement of Virtual Reality "could prove as important as Apple Computer's mice and windows in demystifying data processing", according to writer Alan Cane. With VR products already using PC technology, such as W Technologies' wired glove and helmet for the Amiga, finding an appropriate, intuitive interface will be the critical challenge. —Financial Times 4/14

Speak up ...

Voice annotation, which has been available in NeXT and Macintosh computers, is starting to become more widely accepted, and is appearing in the IBM PC clone world as well. Poor speaker quality is a limiting factor, as is the amount of memory needed to store digitized sound, but speech processing software could reduce such problems in a few years. —Wall Street Journal 4/14

So whats new ...

According to columnist Don Crabb, "any Mac you can buy beats the pants off of Windows 3.1", the latest operating environment from Microsoft. Windows 3.1 still suffers from being pasted over MS-DOS, and applications which have been converted to take advantage of its features are noticeably slower than their Macintosh OS or plain DOS counterparts. —Chicago Sun-Times 4/12

Education ...

Columnist John Dvorak published excerpts from a letter written by Marvin Zauderer, rebutting an earlier column about the Macintosh PC being an inappropriate choice for education. Zauderer demonstrated that Dvorak's statements were based on an outdated impression, referring to the LC and the wide range of educational Macintosh software available. —S.F. Examiner 4/12

Lay off ...

Last Friday IBM issued notices to thousands of employees in its marketing and services divisions, telling them that their jobs were redundant, and would need to be eliminated. Employees will have the opportunity to find other jobs in the company or accept severance packages. In December IBM estimated that it would have to reduce employment by 20,000. —New York Times 4/11

Novell and the Mac ...

Novell Inc. Announced yesterday that it has acquired International Business Software Ltd., a software company

which specializes in products designed to connect Macintosh PC's, for \$5.2 million. —Wall Street Journal 4/7

Radius doing OK ...

Last year Radius, which makes Macintosh PC monitors and peripherals, lost 8c per share in its second fiscal quarter, but the company's estimate of a 16c per share profit in its second quarter this year drove Radius stock up 2 1/8 to close at 19 3/4 yesterday. Sales for the quarter are expected to be up 87%, from \$23 million last year to \$43 million this year. —S.F. Chronicle 4/7

New Company ...

Paul Allen, one of the founders of Microsoft, and David Liddle, formerly of IBM and Xerox, have jointly founded a new company, Interval Research Corp. Few details were released about the company's plans, beyond saying that it would focus on "advanced development in the areas of information systems, communications & computer science". —Investor's Business Daily 3/31

Yet Another Rumour

Delbert Yocam, former Apple Computer executive, is rumored to be a prime candidate for the position of chief operating officer at Momenta, a startup company in the pen-based computer industry. Momenta's founder, Kamran Elahian, would not comment on the rumor, but did say that he has been planning to hire a COO for the company "from day one". —S.F. Examiner 3/26

Apple joins forces ...

"Apple joined forces with Borland, Novell and Lotus to develop a standard for communications software. Specifications for a vendor-independent messaging interface are expected from the group next month, to outline how mail systems can communicate across proprietary hardware platforms and different operating systems. IBM said it supports the pact as well". —Wall Street Journal 2/5

The Presidents Corner

By Ann White

Improving On Club Days

At the Committee meeting after the June Club Day, the Committee discussed suggestions made by our Treasurer, Stan Millar. Stan proposed a number of actions to improve on services to members and the general conduct of club days. So, hopefully from the next meeting, you should see the following in operation:-

1. Signs on doors, tables etc. to indicate the activity available at that station. We used to have them, but somehow they got lost in the move from Hooper Centre to Andrews Special School.

2. Committee members will endeavor to arrive earlier to set up and have everything ready. Doors will open at 11.00am. This will hopefully mean that several committee members will be on hand to meet and greet members and prospective members as you arrive.

3. One Committee Member will have the specific task of ensuring that the attendance register is signed and that you are given every opportunity to buy a good quantity of raffle tickets!

4. From the July meeting, we will be using the larger room (the Gym) to set up all computers (Macs and Apple II) for general SIG activity. We are concerned that the current practice of a Mac room and an Apple II room may currently suggest that there is some schism within the Apple family . . . with one breed banished to the distant region! This

practice has not been by design . . . just something that happened with the change of venue and the luxury of a little more space.

5. The smaller room will now be set aside for the demonstration, currently scheduled for 12.00, and the committee meeting, starting 3.00pm sharp. The effect would be that those people desiring to continue to work on their computers could remain in the Gym without obvious discourtesy to the presenter(s). Similarly the committee and any interested members can withdraw to the committee meeting without others feeling they have to close down. There is, of course, no reason why members who wanted to use the smaller room for general computer activity should not do so, provided they realize they will need to power down their machines, and make room for other members who wish to attend the demonstrations (12.00) and the Committee meetings (3.00).

6. Our junior Committee member, Simon Skill, will be developing a Membership Kit. He has a brief to look at including the following: Current Apple Bug, Membership card, Welcome letter, name tag, PD catalog disk and a map of the club meeting area. If you have suggestions, perhaps a call to Simon would not go astray.

7. We will be attempting to adhere more closely to the advertised times for activities, e.g. demos etc. However, we also acknowledge that the club is composed of members using their spare time and we need to make allowances for the exigencies of such items as work, overtime and extended travel.

8. We have often discussed the suggestion that members wear name tags during club days, so that we all know the name of the fascinating and erudite person with whom we are talking. The suggestion will hopefully become reality this time.

Feedback . . .

The Committee would welcome any feedback from the general membership re these suggestions . . . or any other which may come to your fertile imaginations!

Apple-Q Help Lines . . .

As a service to members, there is a listing in the Bug each month of club members who are prepared to assist others with inquiries. Please bear the following points in mind if you use, or intend to use this service.

Advertised Times . . .

This is a voluntary service provided on those members' private phones as a service to you. You will assist in keeping these Help Lines available if you can keep to the hours for inquiries which are listed. Of course, if your computer is on fire or is zapping the family cat, MAYBE someone on a help line number would see that as an "AFTER

HOURS EMERGENCY" that would justify disregarding the advertised availability times!

Most members are really good about this, but a few who call at inconvenient hours do tend to ruin it for the rest.

Need for more Help Liners . . .

We can always use extra help in this area. If you have an area of computer knowledge or skill that you would be willing to share with others, why not let Kelvin know and get your name in print. After all, the more people to share the work load, the less onerous the task becomes. . . . And the less likely it is that willing volunteers suffer burn out and remove their names from the help list.

Multi-coloured Computing . . .

For those folks who don't make it to club days, perhaps you would like to know that the club is now selling Centech disks in a wide range of brilliant colours.

3.5 " HD	\$3.60
3.5 " DD	\$1.80

Colours - Fluoro yellows, greens, pinks, purple, orange.

5.25"	\$1.30
-------	--------

Colours - Yellow, Fuschia, Mid Green, Darker Green, Pale Blue, pretty Pink, Orange, Purple, Grey.

Centech disks are fully guaranteed and are being used widely in schools and industries.

M.A.Q. Workshops . . .

Financial members of Apple-Q Inc. are able to attend any MAQ workshop at the MAQ membership price of \$30.00.

Saturday - July 25th

12.00 - 4.00 P.M.

Communications Workshop

While the theory will be generally applicable, a part of this workshop will be aimed at the specific Macintosh interface, Telefinder, and the new MAQ BBS.

Saturday - August 15

12.00 - 4.00 P.M.

Hard Disk Management and Utilities

This session will again be of general interest to users of hard disks, but would be most relevant to Mac Users. It will include disk of PD Utilities.

To enrol for any of these, or for further information, contact me (Ann White) on Club Days or evenings 7-9 p.m.: (07)371-4067.

Committee Highlights

by Dale Rodgic

Here it is, the next instalment of War and Peace or the latest edition of the Committee Highlights - pick one of the above. Well, here we go...

- The Apple User Group Convention will be held on the 21st to 23rd of August this year. Six Committee members showed interest in attending the Conference on behalf of the club, however, only three can go, so after a short word from each of the contenders, a vote was taken. The following members were chosen to represent the group at the convention: Ann White (President), Kelvin Saggars (Editor) and Steve Wilson (Software Librarian).

- The stall at the Pet & Hobby Expo was not as successful as we would have liked, however, one person joined during the Expo and another four have joined to date. If nothing else we have proved to the general public that we are alive and kicking. We are currently looking at a stall or sharing a stall at the Computer Expo at the end of the year.

- Look out for an ad for Apple-Q in the Courier Mail the day before the next meeting.

- We had 12 new members and renewals at the meeting.

- The club's Apple IIe and Monitor II used by the Registrar is in need of repair.

- Anyone picked up some Nibble magazines (June 1988 - October 1988) at the May General Meeting by mistake, could you please return them to the Hard Copy Librarian, Ian Millar- they belong to the club.

- None of last month's Apple-Bug were missing the red apple logo on the front cover. The Hooper Centre ran out of preprinted newsletter covers. The winner of the Cover Competition will start appearing on the Newsletters covers as from the August Meeting.

- The prices of Seven Hills Software will rise slightly since we are not covering the costs of obtaining the software. The last batch seemed to have cost a little more than expected, and in future members can only be given an approximate price if the club is to keep the prices as low as possible, and pass the benefits on. Kelvin will contact Apple II Series Software, the Seven Hills agent, and update the prices in next month's newsletter.

- Kelvin is again lending his Maestro 2400 ZXR modem so the Apple-Q BBS can get up and running again. The committee is still checking prices to get the best deal on a modem.

- The HyperCard Seminar was successful with people attending from both Apple-Q and MAQ. The seminar raised much needed funds for the group.

- Inquires for the group are mainly coming from the Yellow Pages ad and Growth Computers, with a few from Logical Solutions, newspaper ads, word of mouth etc.

- Brashes at Loganholme are offering Apple-Q members a 10% discount on all Macintosh software. This offer is only available at the Loganholme store and you will require to show your membership card. Club members are reminded that Growth Computers also gives club members 10% discount but you must have proof of current membership.

- At a courtesy, please turn off your computer while a demonstration is being run in the room. You may take your computer to the other computer room if you wish to continue to use it. See *The Editorial and The Presidents Corner for more on this - Ed*

- Future Apple-Q Inc. Demonstrations

July Meeting

Steve Smith from Parlings
Music/MIDI on the Macintosh

August Meeting

Wes Slade from Logical Solutions
Mac and Apple II software demo

September Meeting

Apple-Q Inc. Auction

- MAQ Workshops are open to Apple-Q Inc Members for the same cost as MAQ members (\$30.00). Ann White will provide details of current workshops run by MAQ that might be of interest to Apple-Q Inc's members. See *the Presidents Corner in this issue - Ed*

Saturday - July 25th

12.00 - 4.00 P.M.
Communications Workshop

Saturday - August 15

12.00 - 4.00 P.M.
Hard Disk Management & Utilities

September

The Long Seminar: 8.30 A.M. - 3.30 P.M.
MicroSoft Works: 3 modules.

Apple Unveils New Newton Technology

**A Preview of the Industry's first
PDA Device
Chicago - May 29, 1992**

Edited by Kelvin Sagers

After months of industry speculation and anticipation, Apple Computer, Inc., today provided the first glimpse of its Newton technology. This new technology will be the core of Apple's first major new product line since the popular Macintosh personal computer was introduced in 1984.

Shown today at the Summer Consumer Electronics Show, Newton devices fall into an emerging new class of products that Apple calls Personal Digital Assistants - devices that use digital technology to bridge the gap between personal computers and consumer electronics. Newton is also the first new technology announced from Apple's new Personal Interactive Electronics division, which has been chartered with extending the company into new growth areas, where Apple has unique technology and business advantages.

"The possibilities for vendors and customers in this emerging market are enormous," said John Sculley, Apple's chairman and CEO. "The convergence of digital technology and information represents the biggest opportunity for Apple and other vendors in the personal computer, consumer electronics, telecommunications, entertainment, and publishing industries since the advent of personal computers. And Apple is poised for success with multiple projects and technology that will come to fruition over the next several years.

"Newton is a technology that exemplifies the best of Apple's strengths: using leading-edge software technology to allow people to do things more easily and efficiently," he added.

Newton is an entirely new technology from Apple that will be the basis for a broad array of new products. To assist in the proliferation of Newton technology, Apple is licensing Newton to selected vendors to use in their own versions of Newton devices. Last March, Apple announced such a relationship with Sharp Corp. of Japan. Sharp has licensed Newton technology from Apple for its own future products, and will also jointly design and produce the first commercial product version of Newton technology for both companies, due out early next year.

The first Newton products will be electronic notepads that intelligently assist the user in capturing, organizing and communicating ideas and information. These products will

be small, portable devices that allow freeform notetaking, drawing, calculating, scheduling, and communicating. Newton's revolutionary new hardware technology offers performance capabilities similar to a high-end personal computer, and because of its unique software environment, is very easy to learn and use.

Breakthrough New Technologies

Groundbreaking technology from Apple has been under development for more than four years and has provided the basis for a number of core technologies in Newton.

Newton Intelligence . . .

Newton will actively assist users in their day-to-day tasks. As the device is used, it will learn more about the user and actually propose solutions to help them work more efficiently. For instance, if a user wanted to schedule "lunch with Jane", they would simply write "lunch Jane Thursday". Newton technology would know that lunch normally means noon, and that Jane in the individual's address book is Jane Green, and that Thursday probably means this Thursday. A Newton device would then suggest this to the user, by opening their calendar to Thursday and scheduling lunch from noon to 1 p.m. with Jane Green.

Recognition Architecture . . .

The goal for the recognition architecture is to make using Newton products as easy as using a pencil and paper. Newton products will be able to read a user's handwriting, transform it into text as they write, and quickly refine and scale drawings or sketches. Newton technology allows the user to write in a natural and freeform manner because it does not limit the user to writing in boxes or on lines on the screen surface. This Newton technology is different from other pen-based operating systems because it is based on the simultaneous use of several recognition technologies, rather than forcing the user to choose one at a time. The benefit to the user is a higher recognition factor and greater adaptability to personal style.

Information Architecture . . .

Newton devices will provide users with a single repository for all of the little pieces of information they would typically accumulate in various forms (phone numbers, business cards, directions, meeting notes, birthdays). Because of the advanced object-oriented data structure, Newton products will then allow users to organize the information so that they can easily access it in any variety of ways. For instance, a user could view the information for everything that relates to a specific client, a specific week, or a specific subject such as "Jane Green".

Communications Architecture . . .

Newton technology was designed from the ground up to take great advantage of communications. These new products will foster easy communications between various Newton product users in meetings, on the street corner, or during

lunch. Newton devices will have built-in wired and wireless communications capabilities. For instance, two Newton users could compare calendars or exchange business cards. Newton users could also fax a letter, check electronic mail messages or connect to a satellite news service to obtain current news or stock information.

Hardware Architecture

Newton technology is based on a new breed of powerful RISC processors optimized for high performance, low power consumption, and low cost. The Advanced RISC Machines, Ltd. (ARM) RISC processor Apple has chosen, the ARM 220, gives Newton products the equivalent power of leading desktop computers, yet consumes less battery power than a small flashlight. In addition, the Newton architecture allows users to add intelligent cards to increase the amount of information the products can access and store as well as add specific functions. Both Apple and third party companies will provide a variety of intelligent cards to give users choices for specific needs.

Industry Leaders Announce Support

The first group of a number of major companies have announced support for Newton technology and have

committed to development of future complementary products.

Representing many industry segments, the range of products expected will be focused in the general areas of:

- 1) Communications Products - to enhance the use of Newton devices in a mobile environment.
- 2) Content Products - to offer users a wide spectrum of interesting and personal information for their Newton products.
- 3) Compatibility - allowing users to use Newton devices easily in parallel with existing computer systems.

Motorola, Pacific Bell, Random House, SkyTel Corporation and Traveling Software, Inc. today all made announcements in conjunction with Apple.

Availability

The first Newton product from Apple will be available in English-language versions in early 1993. Newton-based products from Sharp Corp. are also expected to be available in the same timeframe. Pricing will be announced at the time of delivery.

The Apple II Achievement Awards The Winners Circle

by Kevin Sagers

A Little Background . . .

The Apple II Achievement Awards are presented for significant achievement in the Apple II community. The nominations were posted in last month's issue, and as promised this month the names of the winners have been revealed.

In addition to the awards listed below, the Apple II Individual Achievement Award was presented to Andy Nicholas (ShrinkIt, Finder System 6.0) and Apple II Group Achievement Award was presented to the Apple Two Software team (Apple Computer Inc.). Individual Recognition Awards were also presented to Alan Bird (InWords, Pointless) and to Tom Weisharr (Resource Central).

And The Winners Are . . .

The following products and programs were nominated in their individual categories, the winners are shown in bold print within each group. The winners' names have been taken from the America Online Transcript of the Presentation Awards.

Best FreeWare Or ShareWare Program

Milestones 2000	Dr. Ken Franklin, ReliefWare
Nifty List 3.3	Dave Lyons, DAL Systems
ShrinkIt GS 1.0.4	Andy Nicholas
SuperView 2.2	Chris McKinsey
UtilityWorks GS	George Wilde, GRW Systems

Best Educational Program

GeoQuiz	PC Globe, Inc.
HyperCard IIgs	Apple Computer, Inc.
HyperStudio 3.0	Roger Wagner Publishing
McGee at the Fun Fair	Lawrence Productions

Best 8-bit Application

Delta Drawing Today	Power Industries LP
InWords	Westcode Software
ProTERM 3.0	InSync Software
PublishIt! 4	TimeWorks
Total Control	JEM Software

Best 16-bit Application

DreamGrafix	DreamWorld Software
GraphicWriter III 1.1	Seven Hills Software
HyperCard IIgs	Apple Computer, Inc.
HyperStudio 3.0	Roger Wagner Publishing, Inc.
SuperConvert	Seven Hills Software

Best Innovation

DreamGrafix	DreamWorld Software
HyperCard IIgs	Apple Computer, Inc.
InWords	Westcode Software
Pointless	Westcode Software
System 6.0	Apple Computer, Inc.

Best Multimedia Achievement

HyperBole	Resource Central, Inc.
HyperCard IIgs	Apple Computer, Inc.
HyperStudio 3.0	Roger Wagner Publishing
Media Tool	Apple Computer, Inc.
Script-Central	Resource Central, Inc.

Best Utility

Finder 6.0	Apple Computer, Inc.
Prosel 16	Glen Bredon
Salvationseries	Vitesse, Inc.
ShrinkIt GS	Andy Nicholas
SuperConvert	Seven Hills Software

Outstanding Developer Aid

GSBug 1.6	Apple Computer, Inc.
GNOME	Procyon, Inc.
Nifty List 3.3	DAL Systems
ORCA/M2.0	The Byte Works, Inc.
Talking Tools	The Byte Works, Inc.

Best Apple II Periodical

A2-Central	Resource Central, Inc.
A+inCider	IDG Communications
GS+Magazine	EGOSystems
NibbleMagazine	MindCraft Publishing
Script-Central	Resource Central, Inc.

System 6.0 Blues

[Part Two]

By *Kevin Sagers*

If like me you have had a few problems with System 6.0 then here are a few items that might be of help, sourced from other news letters, BBS's and my own observations (so they may be wildly inaccurate).

Keyboard Lockout . . .

Easy Access is incompatible with some applications, as it preprocesses keyboard input, so the keyboard 'dies' if an application locks out interrupts, even Reset doesn't work, so if your having problems with some of your programs, remove Easy Access from System.Setup. That means you should remove or not install any of the Universal Access Suite, Close

Best Apple II Online Service

America Online (a tie)	
CompuServe	
Delphi	
GEnie (a tie)	
The Internet	Including all Apple II news groups and mailing lists.

Software of the Year

DreamGrafix	DreamWorld Software
HyperCard IIgs	Apple Computer, Inc.
HyperStudio 3.0	Roger Wagner Publishing
Pointless	Westcode Software
ProTERM 3.0	InSync Software
System 6.0	Apple Computer, Inc.

That's all folks . . .

The awards were presented on a national (U.S.) online conference on America Online on Friday, April 3rd, 1992 at 10:00 PM EST. I had intended to use the session as a basis for this article but change my mind, and use this format instead.

A copy of the transcript of the original presentation session will be made available in the General files area of my BBS the Phoenix (07) 800-4660, or from the clubs Software Library.

The Apple-Q Inc. September Auction

Start looking through that old software and hardware, and turn those unwanted or unused items into hard cash

View, Sticky Keys, Mouse Keys, and Video Keyboard. I know Divisi Tune, and ProTerm 2.1 are programs that fall into this group as I lost all keyboard control if I tried to run them with the Universal Access Suit installed but have no problems since I have removed them.

Icons . . .

I was having trouble with my old Icons until I found out about this one, Icons that worked fine under 5.04 did not seem to want to work under 6.0. One of the problems lies with the fact that finder icons that match by name and have a leading wildcard (*) now require uppercase letters. e.g. *.Stack will not work but *.STACK will. System 6.0 also does not look for any other Icon 'matches' once it finds the first one, so you should go through your icons and delete any duplicates, and rearrange the other others so that 'named specific' Icons come before WildCard Icons.

Apple-Bug

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