OHIO SCIENTIFIC
TECH NEWSLETTER #5

CONFIDENTIAL

IMPORTANT NOTICE CONCERNING THE CD-23 HARD DISC

A POSSIBLE PROBLEM HAS BEEN FOUND IN THE 590 HARD DISC CONTROLLER BOARD FOR THE CD-23. THE PROBLEM COULD SHOW UP AS WHAT APPEARS TO BE A THERMAL PROBLEM. THE PROBLEM MAY OR MAY NOT SHOW UP AS IT IS DEPENDANT ON THE TEMPERATURE THAT THE 590 BOARD IS RUNNING AT AS WELL AS HOW CLOSE TO SPECIFICATIONS THE 74LS193S ACTUALLY ARE. IF YOU ARE HAVING A PROBLEM WITH A CD-23 (ACTUALLY THIS PROBLEM SHOULD ONLY EXIST IN EARLY CD-23S), CHECK THE 74LS193S ON THE 590 BOARD. IF THE 74LS193S ARE MADE BY FAIRCHILD, THEY SHOULD ALL BE REPLACED, WITH THE EXCEPTION OF I.C. E 11, WITH TEXAS INSTRUMENTS 74LS193 CHIPS. I.C. E 11 SHOULD BE A STANDARD 74 193 MANUFACTURER. IF YOU ARE NOT HAVING ANY PROBLEMS CURRENTLY, YOU SHOULD IGNORE THIS MEMO AS TROUBLE WOULD HAVE ALREADY SHOWN UP.

A FEW NOTES CONCERNING THE CD-23 AND CD-74 HARD DISCS

THERE ARE A FEW POINTS THAT MANY OF YOU APPEAR NOT TO BE AWARE OF. THE FIRST CONCERNS OS-CP/M WITH RESPECT TO THE CD-23 AND CD-74 HARD DISCS. OS-CP/M MAY BE RUN ON THE FLOPPIES OF A HARD DISC SYSTEM. HOWEVER, OS-CP/M CANNOT ACCESS THE HARD DISC (CD-23 OR CD-74). POINT NUMBER TWO, LEVEL III UNDER OS-65U V1.1 DOES NOT CURRENTLY SUPPORT THE CD-23 HARD DISC. WE WILL NOTIFY YOU WHEN LEVEL III FOR THE CD-23 HARD DISC BECOMES AVAILABLE. LEVEL III UNDER OS-65U V1.1 IS CURRENTLY BEING LIMITED TO 4 USERS. THE PROBLEM BEING THAT EVEN WITH A 16 SLOT BACKPLANE, THERE ARE NOT ENOUGH SLOTS TO ACCOMODATE MORE THAN 4 USERS. WE ARE WORKING ON A 48 K STATIC RAM BOARD TO ALLEVIATE THIS PROBLEM. YOU WILL BE NOTIFIED WHEN IT BECOMES AVAILABLE. NOTE THAT OS-65U V1.1 IS THE ONLY LANGUAGE OR OPERATING SYSTEM SUPPORTED BY THE LEVEL III MULTI USER CONFIGURATION.

OS-65U V1.1 CD-23 SYSTEMS ONLY

THIS 'CHANGE' CONVERSATION CORRECTS A PROBLEM THAT OCCASIONALLY OCCURRED IN THE SEEK RETRY ROUTINE. THE PROBLEM SHOWED UP AS AN ERROR NUMBER NINE (CYLINDER MISMATCH).

RUN "CHANGE", "PASS

DISK CHANGE UTILITY

MODE: HEX(H), DEC(D)? H UNIT? A ADDRESS OFFSET? CØØ ADDRESS? 362D ØØØØ362D 9C? 9E 0000362E 5 35? X

OK. CLOSE

OK

COPYING OS-65D V3.1 MINI-FLOPPY DISKETTES ON SINGLE DRIVE SYSTEMS (REQUIRES 20 K RAM MIN.)

MANY PEOPLE HAVE RUN INTO THE PROBLEM OF BACKING UP THEIR MINI-FLOPPY DISKETTES ON A SINGLE DRIVE SYSTEM. THE FOLLOWING DESCRIPTION SHOULD EXPLAIN THE PROPER PROCEDURE FOR BACKING UP ONE'S SOFTWARE.

THE BASIC SCHEME FOR BACKING UP INVOLVES INITIALIZING THE NEW DISKETTE AND THEN TRANSFERRING EACH SECTOR FROM THE ORIGINAL DISKETTE TO THE NEW DISKETTE.

TO INITIALIZE A BLANK DISKETTE:

- 1) BOOT UP UNDER OS-65D V3.1 AS ONE NORMALLY WOULD.
- 2) ENTER THE D. O. S. BY EXITING BASIC I.E. TYPE EXIT < CR >
 AFTER ENTERING THE LINE ABOVE ONE SHOULD SEE A A*
 ON THE SCREEN.
- INITIALIZE THE BLANK DISKETTE BY ENTERING
 IN < CR>
 THE QUESTION:
 ARE YOU SURE?
 WILL APPEAR ON THE SCREEN, ANSWER THIS QUESTION BY ENTERING
 Y
 WHEN THE DISKETTE HAS BEEN FULLY INITIALIZED THE COMPUTER WILL PRINT
 A*
 TO THE SCREEN
- 4) INSERT THE ORIGINAL DISKETTE INTO THE FLOPPY DRIVE
- 5) TYPE THE FOLLOWING::

 CALL Ø2ØØ=13,1∠CR >

 THIS CALLS THE DISC COPY UTILITIES INTO MEMORY
- 6) NOW ENTER:
 GO Ø2ØØ∠CR >
 A MENU WILL APPEAR ON THE SCREEN. SELECT ITEM NUMBER
 TWO (2) FROM THE MENU
- 7) NOW TYPE : R4200 < CR > THIS CALLS THE CONTENTS OF TRACK ZERO INTO MEMORY
- 8) INSERT THE NEW DISKETTE INTO THE FLOPPY DRIVE
- 9) NOW ENTER:
 W4200/2200,8 < CR >
 AT THIS POINT TRACK ZERO HAS BEEN PLACED ON THE NEW DISKETTE

THE REMAINING STEPS CONCERN THEMSELVES WITH 'CALL'ING EACH SECTOR ON THE ORIGINAL DISKETTE INTO MEMORY AND THEN TRANSFERRING THAT SECTOR ONTO THE NEW DISKETTE.

THE COMMANDS USED TO DO THIS ARE : DIR TRACK NUMBER < CR >

(TWO DIGITS)

CALL 4200=TRACK NUMBER, SECTOR NUMBER < CR> (TWO DIGITS), (ONE DIGIT)

SAVE TRACK NUMBER, SECTOR NUMBER=4200/LENGTH CR >

(TWO DIGITS), (ONE DIGIT) (ONE DIGIT)
THE DIR COMMAND IS USED TO DETERMINE THE NUMBER OF SECTORS ON A GIVEN TRACK AND THE SECTORS LENGTHS. THE CALL COMMAND IS USED TO BRING A SECTOR INTO MEMORY FROM THE ORIGINAL DISKETTE. WHILE THE SAVE COMMAND PROVIDES A MEANS FOR PLACING THE SECTOR 'CALL'ED INTO MEMORY ON THE NEW DISKETTE.

- 10) INSERT THE ORIGINAL DISKETTE INTO THE FLOPPY DRIVE
- ENTER A DIR COMMAND FOR THE TRACK TO BE TRANSFERRED 11) INTO MEMORY. FOR EXAMPLE : IF TRACK 13 CONTAINED 4 SECTORS EACH ONE PAGE LONG THE COMMAND : DIR 13 CCR> WOULD PRINT : TRACK 13 01-1 Ø2-1 03-1

04 - 1

THE FIRST TWO DIGITS TELL THE SECTOR NUMBER AND THE LAST DIGIT DEFINES THE SECTOR'S LENGTH IN PAGES

- 13) FROM THE INFORMATION PROVIDED BY THE DIR COMMAND ONE SHOULD NOW PROCEED TO 'CALL' EACH SECTOR OFF THE TRACK TO BE TRANSFERRED TO THE NEW DISKETTE ONE AT A TIME. USING TRACK 13 AS AN EXAMPLE : FOR THE FIRST SECTOR ENTER: CALL 4200=13,1 < CR> THIS CALLS THE FIRST SECTOR ON TRACK 13 INTO MEMORY
- 14) NOW INSERT THE NEW DISKETTE INTO THE FLOPPY DRIVE
- 15) PROCEED BY 'SAVE'ING THE SECTOR TO THE NEW DISKETTE BY ENTERING: SAVE 13,1-4200/1<<-> THIS SAVES THE SECTOR IN MEMORY TO TRACK 13 SECTOR ONE WITH A LENGTH OF 1 PAGE.
- 16) STEPS 10-15 SHOULD BE REPEATED FOR TRACKS 1-13 AND FOR ANY OTHER TRACKS CONTAINING PROGRAMS ONE DESIRES TO PLACE ON THE NEW DISKETTE.