

The SEETH JOURNAL

Official Newsletter of The Society of Eight Bit Heath Computerists

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Subscription & Order Form on Back

HAVE COMPUTER; DO TRAVEL!

by
Assistant Editor-At-Large
A Stapher

Ran my eyes across several articles recently which I found printed in a number of respected periodicals. Made me think, caught myself unconsciously nodding several times in agreement with what I read. Even caught myself uttering an occasional "Yeah! Right on!", which caused nearby fellow passengers to look at me askance. Must have been sounding off rather louder than muttering but less than shouting, still must have been audible to almost any one within earshot. (Not very far, most jet aircraft ARE noisy, plus there were all those returning nerf ball team members whooping it up...) Besides, this was one of the rare plane trips which I make, so my manners were probably a bit rusty.

One article in particular phased right in with my own opinions and observations: "The Fate of Old Computers" by G Harry Stine in Analog Science Fiction and Fact magazine, May, 1993 edition. G Harry writes the occasional article in Analog's "Alternate View" department, and those articles are always very good reading. Since this one was concerned with my favorite subject--Old Computers--I read it with considerable gusto. I strongly recommend our subscribers find their own copy and read it also.

Essentially what Mr Stine said is that he has too many old computers. (Does that phrase ring a bell with anyone reading this?!) He goes on to say that he doesn't have too many old cars [because] it's possible to trade in an old car toward purchase of a new(er) one. But, he says, it's virtually impossible to do that with an old computer.

A properly-maintained automobile can last for at least ten years--usually longer if you don't live in the northern tier of states with all that snow & salt. And if it's clean, does not blow blue smoke, rattle, or clank and the paint and tires look good, you probably can get better than "book" value.

Computers also last a long time, they usually aren't exposed to bad weather and generally are treated well. But, if you're trying to trade one in toward a newer machine; just forget it! No matter that you have a ton of easily understood, fully documented, and easy-to-use software for it, or that it runs flawlessly, and you've used it for years to

prepare your entire family's income tax forms, plus having written thousands of cash-paid-for articles and stories with it, any dealer will say, "if it ain't peesee compatible, it's plain old junk"!

When you bought your first Heathkit or ZDS computer back in 1980 or so, it was considered by People Who Really Know as being "state of the art". My own first computer was an H-8 with 16k RAM, cassette I/O, and the original "boat anchor" H9 terminal (12 lines x 80 columns, no graphics). The Heath cassette software left much to be desired, but what the heck, I knew next to nothing about computers then, the software "documentation" was very difficult to untwingle, so I experimented and kept extensive notes. Eventually the computer and I learned to get along together just fine, so well that I invested five hundred bucks (plus state tax) in a nice, new Epson MX-80 printer to use with it.

Next, HDOS and floppies came along. By then I was feeling greatly slowed by cassette data storage & retrieval--plus so many gaw-dawful tape data dropouts. I felt compelled to drop another stack of green stuff on Heath's local retail store counter. This time I brought home an external H17 2-drive package, a H8-17 hard-sector drive interface card, and HDOS version 2.0. I also bought MBASIC and Video Scribe (original copy didn't work, so the store swapped it for Text Processor, Version 4.1, no charge yet!) and I started writing for real.

Although by now I was really on a roll, I was constantly running out of RAM; 16k just won't do at all! So I splurge on a new Heath H8-64 ram board, an Org-Zero kit, and 64k worth of memory chips to replace the two old 8k memory boards. Soon I had a rapidly-building collection of text files on singlesided 40-track discs!

Eventually, I decided it was time to invest in some ok HUG software which would make it easy for me to run double-sided disc drives. I was able to pick up a pair of those drives, one 40, the other 80-track, at a fair price, and so I installed all these new goodies in my H-8. I then transferred all my single sided disc files onto 80-track "archive" double-sided discs. In the process, I found I was able to initialise (format) almost all my 40-track rated discs to 80-tracks and two sides which saved me not only space, but money.

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HAVE COMPUTER; DO TRAVEL! (Continued)

Later, I bought, built and installed a Heath Z-80 CPU upgrade kit. This permitted removal of the old CPU board and backward-mounted Org-Zero card. I'd long since removed the cassette I/O card, replacing it with a Heathkit 4-port serial I/O card. That freed a couple motherboard slots and made the H8 much more efficient, and it operated cooler too.

Still later I got a good trade-in allowance for my old H-9 terminal which the store applied on Heath's latest smart terminal kit, the H-19. This made my work go even better because its' keyboard is so much like a regular typewriter's. I type a steady error-free eighty-plus words a minute, and that keyboard has the most delightful touch...I just loved it, except for its' annoying key click. After lots of research, I found how to turn off the click; my ears stopped ringing after that!

Meanwhile, technology was cheerfully zipping forward and leaving me behind. Newer (and purportedly better) computers were popping up everywhere at a dizzying rate! Folks at the law office where I worked as a legal secretary [know any illegal secretaries?! - ed] urged me to scrap my "old boxes" and get with a "real" computer.

Eventually, I relented and went to a nearby "big blue" computer sales center. I wanted to make a quick examination of what my acquaintances were so very excitedly chattering about. Normally, I browse around, checking out displayed merchandise. But the sales staff were not about to permit such unseemly lolly-gagging by me! Three snazzy-looking, polyester-wrapped types converged upon me as I entered. One held out a foam plastic cup which I assumed held coffee, another proffered a daintily-wrapped cup cake, and the third clutched a sales book in one hand and pen in the other. They said--virtually in unison--"Welcome to our humble premises! Were you perhaps interested in buying a new computer?"

"No," I replied, "I've heard many tales of your machines being ever-so-much better than my present computer, and I want, if you'll allow it, to verify for myself how well they work, and if they can do what mine now does for me as well, possibly better, and most importantly of all, cheaper."

Again, in Greek-chorus-like unison, they said, "We're quite sure our personal computer can do anything yours can do, better, and a whole lot faster." (Nobody mentioned the word "cheaper"!)

Then one individual (he may have been the manager) pontificated, "May I enquire as to what make and model machine are you presently using? And for what are you using it?"

He nearly choked when I replied, "It's a Heathkit H-8, and I use it to write fiction, and non-fiction legal or technical manuscripts. I like it because I assembled it from a kit and

also am able to repair it myself whenever it stops working. It does everything I want it to, and I came in only because everyone at the office kept harping at me, saying that I MUST look over the newer machines, and because they keep saying that mine is obsolete--whatever that means."

Waiting until his color was no longer quite as choleric and his breathing became somewhat less labored, I continued, "May I try one of your machines to get an idea of what all my acquaintances are chattering about? Do you have a simple 'MYSIWYG' text processor I might try to see and determine if it's better than mine?"

"What do you mean by 'MYSIWYG'? We have an excellent word processor with which you may create very professional page layouts for letters, or even business forms. Would you like to try it on this machine?", he asked, steering me toward an unimpressive drab-colored set of keys, terminal, and printer.

"'MYSIWYG' is computer-speak for 'What You See (on the screen) Is What You Get' when you send it to the printer", I replied. "I'm surprised you didn't recognise that; you ARE a computer expert, are you not?"

"Well, I'm new to this store and we get a very mixed bag of clients; it's a bit difficult to keep up with new products AND language changes", he replied. "But do please test this machine and this word processor program, both of which I'm quite sure you'll like. Here, I'll turn the computer on and show you how to call up the programs from the on-screen menu..."

Half an hour later I thanked the man, told him I'd be back quite soon, and walked out clutching a thick sheaf of sales literature. I'm sure he was delighted to see me leave; I had thoroughly tested everything the fancy machine had to offer, including some of its' graphics, generously commenting upon how odd the keyboard felt, compared with my H-19's, how oddly the display randomly jerked upward on the screen rather than scrolling smoothly the way the H-19 does, and so on. I also expressed my opinion that they wanted an awful lot of money for such an unimpressive computer because, even though mine was about five years old, it had cost less than twenty five hundred dollars (including state sales tax). Also, I'd saved even more by buying my equipment in unassembled kit form. To be fair, they were asking somewhat less for their printer than I had paid for my MX-80, but I didn't think that worth bringing to their attention.

By now you're perhaps wondering why a legal-secretary-type individual would consider buying, building, and using a kit computer. The un-exciting reason is quite simple: One of my cousins is an amateur radio "nut" and has built almost everything in his "ham shack" from Heathkits. One day I watched him use his own H8 computer to print and address post cards.

More Travelling COMPUTER!

He said they were something which sounded like "Que-so cards". (Later I found "que-so cards" meant Q.S.O. or radio-contact verification cards--a rather odd jargon, those "hams" use!)

What he was doing looked fairly simple, so I tried my hand at writing a short note with his computer setup. It took several tries to get what I wanted to come out the way I wanted it, both on the computer screen and then on the printer. But I found it so much fun, it wasn't long before I was elbow-deep in my own collection of instruction manuals, tools, and electronics parts!

Putting it briefly, I was "Heathkit-hooked" (and I've not been the same since)! My family is firmly convinced that I've gone way 'round the bend and will never come to my senses. They say, "It isn't proper for you to work with such complex, technical stuff! You long since should have been married and had a couple of nice kids, rather than be fooling around with these expensive toys!" (Their problem, not mine!)

Nowadays I tool across the United States (with occasional side trips into Mexico and Canada) in a used GM front-wheel-drive vehicle. It's one of those oh-so-comfortable car-rental company airport limos which I've reworked. I've outfitted it with a fold-away work station for my computer stuff, (made use of the former internal luggage rack for that), installed a pair of large rooftop "bullet-proof" solar power arrays, and a pair of 12-volt "golf-cart" storage batteries. Also, there's a husky solid-state dc-ac converter, a stand-by gas/LP-gas motor-generator, an office-type photo copier, a mobile telephone, a CB radio phone, a small radio-tv-vcr-cd player combination, and other practical "comforts of home" items including an LP gas space heater, cook stove, galley, and other amenities.

On the road--whenever the urge strikes--I'll park in a hi-way rest area, or in some likely shopping center lot, fire up "Ladybug"--my H8--and start writing. Usually I'll phone publishers and let them know I'll have a story ready. If they're interested and want a sample to read, I'll shoot some text to them by modem, tagging the last paragraph with a notice that I can send the rest of the story the same way. Because I'm tight with money, I don't have a "fax", and my modem is much more environmentally-correct...

Usually I'll ask the publisher to send payment to me, care of General Delivery at the next town's Post Office on my itinerary. This works ok, but if they want a permanent address, I use a Canadian bank which accepts and deposits payment by electronic funds transfers in my account. Works better than the Postal service, and nothing gets lost in the mail (also, I usually make a slight profit on the US/Cn\$ exchange rate).

Or, if I'm rather short of cash, I'll find a likely temporary location, park, and call around town, scaring up paperwork which I can then "instantly" process for overloaded secretaries and those lawyers who can't afford full-time help. Some days I'll garner several twenty-dollar bills, but other times just the lonely five-spot. But what the heck, it does put bacon, eggs, bread, butter, and the occasional orange, grape, or bannana on my table!

Word travels fast; haven't hit a town in the last year or so where legal types haven't heard of me and the rapid professional-type services I provide. Only thing I can't do is notarize documents, need a fixed address to become a notary public.

My experience proves you don't need to spend huge sums of money on the latest gee-whizz super-brain computer to do a respectable job. You do need a dependable computer--such as an H-89 or H/Z-100 all-in-one, and a dependable Letter Quality dot-matrix printer. Stay away from laser or ink-jet types; they're very attractive, produce excellent output, but are oh so expensive to buy, operate, and maintain!

Most office supply houses carry top-notch replacement ribbon cartridges for Epson-style printers. These run about \$2-\$4.50 each, cheaper by the dozen. My LQ-800 prints about 500 pages on a ribbon, vastly cheaper than refilling a laser toner cartridge or an ink-jet printer refill (hey, we're talking BIG bucks for that fancy stuff!)

You must have an easy-to-use text- or word-processor which permits changing type styles in mid-stream (italics, emphasized, and maybe even Greek symbols when required). Don Lancaster probably will have apoplexy when he reads this, but "Post Script" and other "desk-top publishing" software and the ancillary equipment required really is too complex, also quite expensive.

You can do excellent work with older 8-bit Graphic Text processors such as Skycastle's Calligraphy-II (the editor of this newsletter constantly uses it). An ever-so-nice Calligraphy-II feature is their character/font editor with which you can create your own special fonts (such as Chinese characters) or symbols. Since fonts are stored on floppies, they don't hog memory as do many of the newer graphic text software programs do. That alone is a big plus in my humble opinion.

Sure, the "old 8-bit stuff" runs under "obsolete" operating systems such as (gasp!) CP/M, or (shudder!) HDOS, but they do get the job done! And VERY cheaply, I must add. In fact, I employ Lindley Systems' HDOS-type MX.DVD and GR.DVD printer drivers with Text Processor whenever I get unusual jobs which some of my CP/M software can't handle. I never

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Still-Travelling Computer

explain my production techniques to clients, they're uniformly delighted with my work, so everyone's happy (except maybe some "big blue" aficionado who may be spying on me at work).

To effectively handle commercial-type work I use Hoyle and Hoyle's QUERY! and CALCulator package; it's GREAT! It lets me produce client-pleasing "boiler plate" circular letters at almost instant notice. Also I have a nice, good-but-simple HUG accounting program called Small Business Package-III for tracking personal expenses, my client's names, addresses, accounts, and other important client data. Also there are some standard office tools such as rubber stamps, staplers, pens, pencils, yellow "legal" pads, manila folders, plain or postage-stamped envelopes, and NON-MAGNETIC paper clips; those are about all the business-type supplies kept aboard.

Whenever necessary, I'll find an "Office Max" store and pick up additional twenty-pound bond tractor paper, or other stationery items which are getting low, so that is about the extent of my "business" shopping. Since there usually is a supermarket nearby in the same mall, I'll restock my pantry/galley--I do like to eat well, and regularly. (Also guests might find peanut-butter-and-jelly, or sardine sandwiches offensive, so I look ahead!) The under-sink potable water tank has an activated-carbon particle/taste/odor filter fitted to its' filler pipe; there never are "dire rear" problems for this traveller and chums--even in way out-back Mexico!

My home/office-mobile has the H8 computer, H19 terminal, and LQ-800 printer permanently mounted in a custom-designed enclosure with locking doors and slide-out shelves. It also has a compact galley with a 2-burner LP-gas stove, microwave oven, an electronic refrigerator-cum-ice box, and convertible table-cum-double bed. There's lots of space beneath the computer equipment which holds the backup battery bank and power switching gear (enclosed and vented outside--to prevent accidents), computer spares, photo-copier, pair of folding chairs and folding table, extra bedding, and some extra clothing.

A tiny "personal" cubicle to the cabin rear holds a developmental-model Enzymatic(tm) toilet. Very nice Enzymatic* features are that it rarely needs emptying, requires virtually NO water, doesn't smell, and is "Environmentally Correct"! A constant supply of a-c power for its' exhaust fan and bubbler air pumps comes from a 100-watt dc/ac converter connected to one of my heavy-duty batteries when I'm parked, or the vehicle's engine alternator in transit. Note: The Enzymatic (also called "Digest-O-Matic"[tm]) toilet does have a couple drawbacks: First, if anyone uses it while taking antibiotics, the enzyme solution quickly dies! The other is, NEVER use chlorine-based or bathroom-type spray cleaners near, on, or in it; they are deadly to the system's special enzyme and bacteria mix. Re-starting a dead toilet in either case is a very real chore, something one might wish upon only the most annoying "friend".

I can overnight anywhere I feel like dropping anchor, but usually I'll seek an inexpensive, respectable motel (or "bed-and-breakfast") near a laundromat. Normally I carry supplies adequate for a day or so, then must restock. Rarely do I buy supplies other than fuel and oil at highway "convenience shops", and only in a pinch because supermarkets are at least 35% to 45% cheaper! Also, fuel, oil, and LP gas is likewise much cheaper in town.

ABSOLUTELY NO advertising sign or "cutesie-wootsie" sticker is visible anywhere on the outside of my home/office-on-wheels. Plain nosy folks, or curious, shady types peeking in see what appears to be just another average camper with many closed cabinets and some built-in furniture. I draw the blinds while parked and working in the daytime, and always at night.

There are externally-mounted foldaway TV, radio-telephone and C-B antennae--most any RV has similar equipment, so there isn't much which gives me away. Also, my windows are coated with photochromic (light-changing) plastic which reduces the visibility quite a bit for those outside in daylight. Also, it helps regulate heat gain and loss.

It pays to be very plain-looking. Always whenever I park and leave the vehicle, my shiny bright yellow industrial hard hat is visible on the dash. Two bumper stickers reading "Insured by Smith and Wesson" with drawings of their "6-shooter" are on front and rear bumpers. Those, plus the hard-hat tend to keep most riff-raff away. As an extra bit of insurance, I have a police riot-style twelve-gauge pump gun mounted out of sight but ready at hand, plus two boxes of "double nought" shells for it nearby. Haven't used it yet, but it's there, loaded and ready behind an innocent-looking break-away panel. What nosey officials don't see--or know of--won't hurt me. And additional security is the "pepper-type" spray can I have clipped to the steering column ready for my quick grab. "Be Prepared", the Boy Scouts' motto says....

In case of small fires, I've mounted numerous halon-type fire extinguishers strategically about the cabin. An excellent, very sensitive LP-gas/carbon-monoxide detector I built and installed alerts me in case of leaking LP gas or a smoldering fire whenever I'm asleep.

Also, I've recently installed an extra-loud "yelping" intruder alarm and external loudspeakers. It's a nice secure feeling knowing it's on and armed when I park overnight in a lonely high-way rest area, or a well-lit 24-hour shopping-mall lot. It is so loud that only the most-determined crook, or terribly stupid jerk will attempt to break in. Police often have arrived and caught someone before I could shut it off; it's a proven crook deterrent.

My caravan (as the British call such motor homes) has been

The COMPUTER is PARKED!

on the road now for over six years, and the "clock" (odometer) is well through its' third rotation. That's a lot of happy miles, chums!

[eof]

* The Hargrave "Digest-O-Matic" and "Enzymatic" toilet system is fully protected by U.S. Patent Law. For prices or other information, please contact: Charles F Geisler, 1-813-365-2058.

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[We certainly appreciate A Stapher's entertaining and informative article about how one may enjoy, use, and "take it with you" one's still-functional and productive 8-bit computer. Should any other SEBHC member have a similarly-enlightening (or just plain entertaining) story to tell, please send it to us as soon as possible! Just think; you'll not only get to see your name in print, but you could possibly inspire other 8-bit-ers to even greater endeavour! Also, don't forget that your subscription will be extended, and "author" will be placed after your member number on your mailing label! -- ed]

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OBSERVATIONS, etc.

by

Your Editor

Ran across a Whole Bunch of eight-inch H/Z HDOS and CP/M (of various dialects) discs full of Super-Neat Software over at Gus Bakalis's shop recently (Gus is a long-time JOURNAL subscriber and former editor of the DKUG.DOC newsletter). He bought the software and some nifty other computer items from ex-subscriber Sanford R Evans out in CA land who had advertised them in our JOURNAL. Since Gus doesn't have an H/Z computer with a working 8-inch drive, I volunteered to check out a few discs "just to see what was on them" (my H120 can read H89 CP/M discs, no problem).

Talk about a gold mine! Sanford must have been EXTREMELY busy in his local HUG, because there is all kinds of HDOS MBASIC (and other) stuff for RBBSES on these discs. Also HORDES of games, both CP/M and HDOS, plus a lot of CDR-type op-sys stuff for a CDR-RAM disc. Even ran across a copy of The Software Tool Works' Computer Chef programme. That was nice, because I'd lost my original distribution discs (but not the manuals) and still haven't found them. But now I can resume cooking. And maybe my son (he's a Real Chef) will now become interested in computerising his own kitchen....

It'll take lots of time for Gus and me to go through this pile and I'm sure we shall find masses of other Public Domain software which should be of interest to our general members. I'm planning on Real Soon Now lending Gus my spare H8, H19, and a pair of H47 8-inch drives plus HDOS 2.0 and CP/M 2.2.04

systems discs so he can run barefoot through all those discs he's accumulated. I'm sure he'll have a ball--as I presently am--with it!

We'll probably be talking back and forth considerably by modem, since Gus's shop is about 45 or 50 miles distant, on the edge of Eastpointe (nee East Detroit) in Warren, MI. (It takes about an hour to drive to his place, no matter which of three routes I use, so using a modem is faster and probably will be less expensive than driving.)

And there are several different modem programmes on some of those discs I'm presently looking through, such as X-MODEM, MODEM-7, and MOVE-II, for example. We'll probably find many others. To make this project even more interesting, Gus got a bunch of instruction manuals with the hardware and discs, so this spring will be Very Interesting, indeed! We shall be keeping you posted on our progress....

Recently got an enquiry from a guy wanting X10 controller information. The envelope his letter came in must be something new from the Postal Service. It has a holographic 29-cent stamp with a 3-D view of a space station against a lunar and Earth background, with two EVA-suited figures--one in the foreground, other in the background--attending it. Most impressive, I must say! Think I'll make a run over to the "Postique" and see if there are more in this series. The stamp's picture is embedded in the envelope and is quite striking. I particularly like it because it shows two EVA-suited astronauts and a shuttle nosing in as if to dock. Altogether there are eight docking stations, seven of which already have what appears to be unmanned craft locked into them.

Here's one way our new president might interest us real people in "Investing" funds in Really Worth-While Projects, rather than letting entrenched bureaucrats and congresscritters stupidly pour our country's hard-earned money and resources down bottomless international sink holes! What can be more rewarding than regaining our national lead in space exploration and exploitation? It's certainly better than wastefully throwing lives and money at internal problems of "the third world". And far better than Congress's endlessly dodging the REAL national problem of GOVERNMENT WASTE.

Why continue pay government employees to mark time at F D Roosevelt's defunct Rural Electrification Authority? What SANE taxpayer wants a tame government scientist make ketchup viscosity studies? If Heinz MUST know how thick their red stuff is, they can do the measuring--a whole lot cheaper and probably more effective than some government boffin's work! Our FedGov pays many farmers to plow FOOD CROPS under, and others to GROW TOBACCO! Congress MUST scrap the FedReserve's phony "green stamps", and restore our original, Gold Backed currency. That's REAL INVESTMENT not "mj" smoke, Slik Willy!

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Miscellaneous NOTES & NEWS

From The Source You Can Believe

LYBEN COMPUTER SYSTEMS new catalogue (1993 Spring-Summer #116) just arrived on our desk. Looked through it for 5-1/4" hard-sector discs, didn't find any listed. Phoned Lyben and found they've sold every last one they had in stock!

But LYBEN COMPUTER SYSTEMS does have excellent prices on "generic brand" soft-sector discs. Catalogue item LCS#0129 is priced at \$25/100 unformatted double-side, double-density 5-1/4" discs, while item LCS#1568 is \$35/100 5-1/4" high-density discs. Sleeves, labels and write-protect tabs come with those. They also have bulk-packed DS/DD 5-1/4" discs in 50-packs, multi-colored labels included, \$18/50 w/sleeves, 10 different colors, but only one color to each 50-pack. Want mixed colors? Ask for LCS#3012 Rainbow 50-pack of 10 each of 5 different colors, High Density discs.

Want their catalogue? (They DO give quantity discounts.)

Call/contact: Lyben Computer Systems, 5545 Bridgewood, Sterling Heights, MI 48310; 1-313-268-8100 (fax 313-268-8899)

Hours, Eastern Daylight Time:

Mon-Thur 8:30 - 7:00 Fri 8:30 - 6:00 Sat 9:30 - 2:30*

* Closed on Saturdays of holiday weekends

[Editor's note: We've bought many items from Lyben and have always been quite satisfied with their courteous and rapid service. They're GOOD FOLKS, and sell GOOD STUFF!]

=====

D-G ELECTRONIC DEVELOPMENTS Company, manufactured and sold the Super-89 CPU board for our H/Z-89s and '90s way back in the early 1980s. The Super-89 CPU board is a marvelous upgrade-type interchangeable replacement for standard H/Z-89 CPU boards. Its' many unique features include:

Four Megacycle (MHz) Z80 CPU

Clock 2.048 or 4.096 Meg, jumper selectable

64k RAM standard--expandable up to 256k of bank-selected RAM
(RAM can be write-protected in 4k-byte increments)

Two serial I/O ports (INS8250 or equal):

1 standard console port,

1 general purpose port (addressed by jumpers)

Right-hand I/O bus fully compatible with H/Z peripherals

Improved Left-hand bus structure for added flexibility
and expandability (compatible w/R-H bus)

On-board Real-Time Clock

Socket for AM9511 Arithmetic Processor

Fully assembled and tested

Original price, fob Denison, TX: \$650, now just \$150 each!

Contact: Bruce Denton, D-G Electronic Development Co.

700 South Armstrong, Denison, TX 7502; 1-903-465-7805

Do tell Bruce that Lenny sent you.

PS: Quikdata once carried D-G S89 CACHE89.DVD, AX89.DVD HDOS

and CP/M support software. If Henry at Quikdata doesn't have those drivers or the original CP/M BIOS modification we may be able to supply copies (with Henry's and Bruce's permission, of course).]

Editor's Experience

We've installed three D-G Electronics Super-89 CPU boards in two Heathkit H89As and one ZDS Z90A. We're using one '89A and one '90A here at JOURNAL headquarters. The remaining CPU chugs along across town in a happy SEBHC JOURNAL subscriber's H89A business system. With TMSI's TLB speedup mod kit installed, our SEBHC JOURNAL's H89As run circles around our H120 8-Mcs machine!

All machines in which we installed D-G S89 CPUs have both HDOS 2.0 and CP/M-80 2.2.0x operating systems modified to take advantage of the RAM disc and (for CP/M) the printer spooler. That, plus a faster CPU clock makes machine operation more than satisfactory.

If you are contemplating purchasing a newer computer because you've reached your present speed and memory limits, at just \$150 a copy, the D-G Electronics Super-89 CPU board is a far better way to go. A big plus: you can use all your present software without having to spend a ton of money or having to learn umpty-thousands of new and confusing commands for the new machine's operating system and programs!

One outstandingly useful D-G S89 CPU feature is its' RAM disc which provides a minimum of 147k bytes of extra-fast data storage. That comes in very handy if you're running software which you'd think normally would make a floppy drive overheat. Under CP/M the RAM-disc is virtually invisible in operation because it's running at the CPU clock speed. For example, when sorting a QUERY! database, I use the RAM-drive for temporary data storage because sorting some 400-plus subscriber's records takes a little less than ten minutes.

Using a standard floppy drive to hold data while QUERY! sorts it can take almost twice to 3 times more time, plus all the annoying buzzing, clicking, and clacking from the drive. (Also there's no wear & tear with the RAM drive!) Note that the speed is approximately the same for a QUERY! sort under both HDOS and CP/M operating systems. The only drawback with HDOS is that one must INIT the RAM-disc, system re-boot, then MOUNT AX0: (RAM drive) and the others. With Livingston Labs' CP/M BIOS modification, the drive is always there, ready to go. (Sometimes CP/M is a little easier to use than HDOS....)

When I'm running Calligraphy-II, putting GTF.COM and more common GTF font sets on RAM-disc saves beau coup time because Calligraphy is so very disc I/O intensive. Especially so when a GTF text file calls many different type faces, or a mix of type-faces and graphic symbols (for example, this newsletter's regular front page). Time saved is quite impressive compared with GTF.COM accessing standard floppy drives. We simply can't complete work as quickly without a D-G S89 CPU! Too bad Bruce and his pals failed to design a similar H8 upgrade....

"Ex-HUG" Discs

OLD HUG PART #	TITLE/DESC	Price	HUG PART #	TITLE/DESC	Price
-no p/n-	HDOS SUBMIT & ENHANCED SUBMIT Two disc set	\$15	885-1032	Disc V--Misc H8 Software, Bootable Disc	\$11
-no p/n-	EVERYWARE GAMES Vol 1	\$10	885-1038	W.I.S.E. (ASM course) H8, Bootable	\$11
-no p/n-	M6800 DEVELOPMENT SYSTEM (for HERO robot control)	\$10	885-1041A & B	HUG Small Business Package BH BASIC Version -- 2 disc set	\$35
-no p/n-	HUG FIG-FORTH (3 discs)	\$30		(See MBASIC SBP-III below)	
-no p/n-	HDOS PRINTER PROGRAMS (by /AWIZ/)	\$10	885-1044	MISC H-8 UTILITIES SOFTWARE	\$10
-no p/n-	MISC BASIC & ASM FILES	\$10	885-1050	MODEM COMMUNICATIONS SYSTEM	\$10
-no p/n-	MODEM BOOT DISC w/HTERM	\$10	885-1059	FOCAL-8 INTERPRETER Disc A	Four*
-no p/n-	MACRO Version II	\$10	885-1059	FOCAL-8 DOCUMENTATION Disc B	disc*
-no p/n-	MBASIC & BHBASIC GAMES	\$10	885-1060	"DISC VI" MISC SOFTWARE	\$10
-no p/n-	COMPLETE EDDIE-BABY	\$10	885-1063	FLOATING POINT PACKAGE	\$10
-no p/n-	H-8 COLOR GRAPHICS-ASM	\$10	885-1068	Disc XII H8w/H19 or H89 MBASIC Graphic Games	\$11
-no p/n-	HUG SYSTEM SOFTWARE & UTILITIES	\$10	885-1069	FOCAL-8 DOCUMENTS Disc C	set-*
-no p/n-	AUTOSCRIBE WORKING MAS- TER Issue 150.02.XX	\$10	885-1069	FOCAL-8 SOURCE FILES Disc D	\$30*
-no p/n-	CSHDOS COMPUSEVERE [MODEM] UTILITY (demo?)	\$10	885-1071A, B, C	HUG Small Business Package III MBASIC Vers, 3 disc set w/doc	\$45
-no p/n-	HUG MAILING LIST SYS- TEM (for internal use?)	\$10	885-1075	HDOS SUPPORT PACKAGE Disc A	Set:
-no p/n-	HDOS 2.0 DESPOOLING DEVICE DRIVER - Tom Jorgenson	\$10	885-1075	HDOS SUPPORT PACKAGE Disc B	\$15
-no p/n-	HUG MODEM COMMUNICATION SYSTEM	\$10	885-1077	BASCON/TXTCON cassette to disc conversion package	\$10
-no p/n-	HUG MBASIC GAMES (Bootable disc)	\$10	885-1078	Z80 ASSEMBLER (some docs)	\$10
-no p/n-	HDOS INVADERS GAME - Includes debugger by "GAC"	\$10	885-1079	PAGE EDITOR FOR H89/H8/H19	\$10
-no p/n-	MISC HDOS ABS & ASM FILES	\$10	885-1083	"DISC XVI" MISC. SOFTWARE	\$10
-no p/n-	SOURCE DEMO - online modem (an HEC promo item?)	\$10	885-1086	TINY PASCAL Version 4.1	\$10
-no p/n-	HUGMAN & MOVIE (anima- tion program for H19)	\$10	885-1089	Disc XVIII Misc H8/H89 HDOS Software (incl HTERM.ABS)	\$11
-no p/n-	FIG-FORTH OPERATING SYSTEM <JWF>	\$10	885-1090	MISC HDOS UTILITIES	\$10
-no p/n-	HA-89-3 COLOR DEMO DISC 1 The		885-1092	RD1 DEBUGGING TOOL FOR HDOS & RD1 DEBUGGING TOOL	Set:
-no p/n-	HA-89-3 COLOR DEMO DISC 2 set:		885-1092	/*MODIFIED*/	\$15
	(probably for HEC promo use)	\$15	885-1093	MBASIC DUNGEONS & DRAGONS	\$10
			885-1094	FIG-FORTH "Disc #1"	\$10
			885-1095	SY: HARD-SECTOR DEVICE DRIVER	\$10
			885-1098	HDOS ASM/ABS H8 Color Graphics (req HA-8-3 Color Graphics board & composite video monitor)	\$11
			885-1099	HDOS Tiny PASCAL H8 Color Gra- phics Software (req HA-8-3 Color Graphics Board, composite video color monitor)	\$11
			885-1103	Sea Battle (game)	\$11
			885-1105	HDOS Device Driver Disk - H8/H89 Software	\$11
			885-1108	MBASIC Data Base Systems H8/H89 HDOS Software	\$11
885-1022	PROGRAM DEVELOPMENT EDITOR	\$10	885-1111	HDOS MBASIC Graphic Games	\$11
885-1025	RUNOFF TEXT PROCESSOR	\$10	885-1112	H8-H19/H89 Software	\$11
885-1029	Disc II Games "1"	\$11	885-1113	HDOS FORTRAN Graphic Games	\$11
885-1031-A &-B	Disc IV--H8 Music Creating Bootable Discs	\$15		H8-H19/H89 Software	\$11
				HDOS Fast Action Games	\$11

NOTE: The above "no p/n" discs may have been Pat's working, or in-development discs. We've checked them all, and the software seems ok. * ORDER THESE DISCS BY FULL DESCRIPTION ONLY! *

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More "Ex-HUG Discs"

OLD HUG PART #	TITLE/DESC	Price	OLD HUG PART #	TITLE/DESC	Price
885-1114	HDOS H8 Color Raiders & Goop games; HA-8-3 & Color Monitor	\$11	885-1210	HUG CP/M EDITOR (upgraded)	\$11
885-1116A	HDOS ALDT Z80 Debugging Tool	\$11	885-1211	CP/M SEA BATTLE Game	\$11
885-1119	BH BASIC Support	\$11	885-1212	CP/M Utilities Software Disc	\$11
885-1120	HDOS "WHEW" UTILITIES	\$11	885-1215	CP/M BASIC-E	
885-1121-A	HUG HARD-SECTOR PACKAGE		885-1215[37]	(Two-disc set, -[37] is 80trk	\$15
885-1121-B	(Two disc set)	\$15	885-1216	NEW HUG BIOS, incl DDD Hex file	
885-1123	HDOS XMET Cross-Assembler for ET18 (HERO) & ET3400 TRAINER	\$11		(Three-disc set)	\$18
885-1126	HDOS UTILITIES by PS:	\$11	885-1217	CP/M Disc Dupe Utilities	\$11
885-1127-A	HUG SOFT-SECTOR SUPPORT PKG		885-1219	Navprog 7 (Educational Game)	\$11
885-1127-B	(Two hard-sector discs)	\$15	885-1220	CP/M ACTION GAMES	\$11
885-1127[37]-A	HUG SOFT-SECTOR SUPPORT PKG		885-1221A, B	WATZMAN/HUG H19 (Keyboard ROM	
885-1127[37]-B	(Two soft-sector discs)	\$15		code upgrade) (Two-disc set)	\$15
885-1128	HDOS DISKVIEW	\$11	885-1223A,B,C	HRUN CP/M HDOS EMULATOR	
885-1129	HDOS Color Video Terminal CVT H8/H19/HA-8-3 or H/Z89/HA-89-3 & Composite Video Color Display	\$11		(Three disc set)	\$18
885-1131	HDOS CHEAPCALC (spreadsheet)	\$11	885-1226	CP/M UTILITIES by PS:	\$11
885-8001	HDOS SE (Screen Editor) "va"	\$11	885-1228	CP/M FAST-ACTION GAMES	\$11
885-8007	EZITRANS	\$11	885-1227[37]	CARD GAMES	\$11
885-8009	EVERYWARE GAMES DISC (boots!)	\$11	885-1229	XMET for CP/M	\$11
885-8017	HDOS Programmer's Helper rl	\$11	885-1230	KEYMAP utility	\$11
			885-1231	MBASIC XREF utility	\$11
			885-1232	CP/M Color Video Terminal (CVT)	\$11
			885-1233[37]	CP/M CHEAP CALC	\$11
			885-1235[37]	COPYDOS Utility (Z100)	\$11
			885-1245[37]	CP/M-85 KEYMAP utility (Z100)	\$11

RARE, USEFUL & UNUSUAL NON-HEATH HDOS SOFTWARE
(Working Copies From Various Non-Supporting Sources)

no p/n	SIX DRIVES FOR HEATH -- How2 expand H17 interface to run six floppy drives, w/on-disc instructions (Dual HDOS & CP/M format!)	\$15
no p/n	MXGRAPH an HDOS MX-80 Graphics editor & driver w/sample pix, no manual--company long defunct	\$15
#211-H5	HDOS ED-A-SKETCH Graphics Editor w/manual, sample pix	\$15
#215-H5	HDOS SPOOL-N-GO Printer Spooler w/manual	\$15
#223-H5	HDOS ZENCALC Electronic Spreadsheet w/manual	\$15

CP/M SOFTWARE (from the PS: donation collection)

OLD HUG PART #	TITLE/DESC	Price
885-1116B	CP/M Z80 ALDT version	\$11
885-1207	TERM (Modem) and HTOC Utility	\$11
885-1208	CP/M FIG-FORTH	
	(Three-disc set)	\$18
885-1209A & B	Dungeons & Dragons (DND) Game MBASIC version (2 discs)	\$15

NOTE: Parts with numbers ended by "[37]" indicates original discs came in soft-sector format only. BECAUSE OF HARD-SECTOR DISC SCARCITY, ALL SOFTWARE WILL BE SHIPPED ON SOFT-SECTOR DISCS UNLESS SPECIFICALLY REQUESTED THE OTHER WAY. We do hope you understand our limitations....

WHEN ORDERING SOFTWARE FROM THESE LISTS: Please DO NOT USE disc titles, just the part number(s). That way you will make more efficient use of our back-page order blank (and not have to write so much).

We shall do our best to ship your disc(s) within five real days of our receiving your order.

Many of the above-listed HUG items came with hard-copy documentation, but we still have not been able to completely sort out what we got. If the item you order indicates "w/man", that means we actually have a manual we can photocopy for you. In many cases there is adequate documentation on the disc and you can print out your own hardcopy, thus saving shipping costs.

* HAPPY COMPUTING, EVERYONE! *
