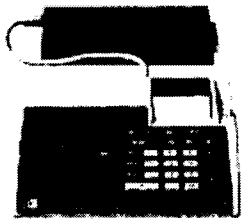
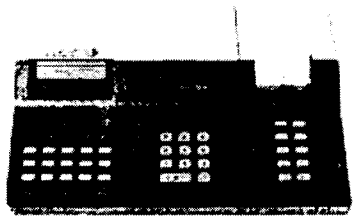
COMPUTERS, PERIPHERALS & CALCULATORS

Desktop Computers

Models 97S, 9815S, 9825B, 9825T

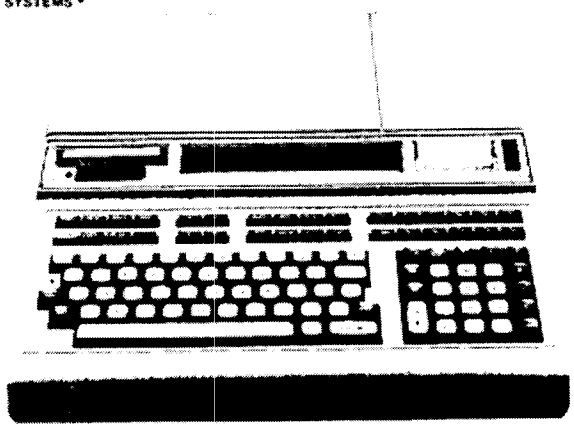


97S



9815S

DESIGNED FOR HP-IB SYSTEMS



9825B/T

97S

Flexible and simple interfacing is a design feature that makes the 97S a cost-effective solution for low-cost BCD data acquisition applications. In addition to the features of the 97A Scientific Programmable Calculator, the 97S allows a reading of up to 10 BCD digits to be input to the calculator at about 1 reading per second. Comparisons of input data with standards or other computations can then be easily performed. Magnetic cards provide data or program storage and an internal thermal printer provides hard copy output.

Instruments interfaced to the 97S include electronic balances,gaging and measurement systems, spectrophotometers, gamma counters, and chemical analyzers. A manual with all technical data and examples is included. A data sheet and supplement describing the interfacing with examples is available.

9815S

The 9815S offers economical solutions to dedicated data acquisition and computation problems. The integration of peripherals into a small package, plus price/performance flexibility, provide attractive solutions for OEMs.

Single keystrokes provide math and transcendental functions. For repetitive problem solving, simply program the keystrokes into the computer memory. The 9815S offers 3800 program steps. Ten data registers are always available and program steps can be assigned as additional data registers. The efficient RPN programming language has enhanced features such as FOR-NEXT loops, symbolic and calculated branching and nesting of subroutines. Fifteen keys can be defined to provide special functions by simply pressing a key.

The tape drive allows up to 96K bytes of program or data storage and a numeric display and 16-character alphanumeric printer are included. With the Auto-start feature, simply inserting a tape cartridge and turning on the machine will load the first program and run it, prompting the user for interaction. Operation of a system thus requires minimal operator training.

Two I/O channels allow use in data acquisition and control applications. The 98133A BCD interface allows 9-digit input at up to 2000 readings per second as well as an 8-bit output. The 98134A is a general purpose bidirectional 8-bit parallel interface providing transfer rates of up to 800 bytes/sec. The 98135A provides HP-IB compatibility. Up to 14 peripherals and instruments can be interconnected to one HP-IB interface. RS232C compatible serial I/O as well as current-loop receive-only capability is available with the 98136A. Peripherals are interfaced using standard interfaces. In addition to printers and digitizers, a paper tape punch and a low-cost plotter are available.

Software packages for Statistics and Financial Analysis and Electrical Engineering are also available.

9825B/T

The 9825B or 9825T Desktop Computer offers many features previously found only on minicomputers. It is particularly suited to controller applications and is a powerful stand-alone device. The 9825T includes a larger memory than the 9825B.

Packaged System

Both the 9825B and the 9825T provide a compact computing system with built-in peripherals. The 9825B includes 23K bytes of read/write memory and internally integrated ROMs (read-only memories) for Strings, Advanced Programming, Plotters, General I/O and Extended I/O. The 9825T has 62K bytes of read/write memory, all the built-in ROMs of the 9825B plus a built-in Systems Programming ROM.

A 32-character LED display and a built-in 16-character thermal printer provide alphanumeric readout including both capital and lower case letters. The high-speed bidirectional data cartridge holds 250K bytes and has an average access time of 6 seconds to any place on the tape. File verification is automatic on recording.

Twelve Special Function keys on the keyboard, combined with the shift key, can handle 24 different operations. They can serve as immediate execute keys, as call keys for subroutines, and as typing aids.

Powerful Programming

The 9825 is programmed in HPL, a high-level, formula-oriented language. HPL provides for subroutine nesting and flags and allows 26 simple variables and 26 multidimensional array variables, limited only by the size of the 9825's memory. Fixed- and floating-point formats can be set from the keyboard. Syntax checking is simple; a flashing cursor in the display identifies error locations.

The 9825 offers several contributions that make it a powerful and flexible programmable computer. Live keyboard lets the user examine and change program variables, perform complex calculations, call subroutines, and record or list programs while the 9825 is performing other operations. The internal calculation range is $\pm 10^{\pm 99}$ to $\pm 10^{\pm 99}$. The tape cassette can be used to record and load the entire memory automatically.

I/O Performance

Three I/O slots accept standard interface cards offering 16-bit parallel, BCD, serial, or HP-IB communication with instruments and peripherals. Code conversion logic is available to interpret a variety of machine codes. High-speed I/O handles data input speeds up to 400K 16-bit words/second. This is all accessible through formatted and binary read/write instructions in the HPL language.

With two-level priority interrupt, available in the Extended I/O ROM, the 9825 will act as a controller for several instruments or peripherals requiring attention at unpredictable rates or times. Stand-alone controlling is enhanced with auto restart and interface status testing.

Ordering Information	Price
97S I/O Calculator	$1445
97SD Five 97S I/O Calculators	$6860
9815S Desktop Computer	$3990
9825B Desktop Computer	$8100
9825T Desktop Computer	$8600