

Altos 986 Series



The Altos 986 family of products is a line of powerful systems designed to meet multi-user and multitasking requirements. The 8086, 16 bit systems offer a complete systems solution with a wide selection of industry standard operating systems and languages, full communications and support of application software to meet any business need. The Altos 986 Series is designed to perform larger, more comprehensive tasks for more users than 8 bit systems.



General Description

The 986 Series has a 1 MB 5 1/4 inch diskette drive, 42 MB hard disk storage with an additional 42 MB disk available as a second drive, and the capability to handle up to 9 users simultaneously.

The 986 Series is a general purpose computer based on the Intel 8086 microprocessor family, offering the following features:

- Multiple processors 8086 — CPU
Dual Z80 — Serial I/O
8089 — Intelligent Hard Disk Controller
- 1 mbyte of Main Memory with parity
- Supports up to nine users plus serial printer
- Intelligent Disc/Tape controller supports up to two Disk drives
- Self Diagnostics at power up
- Power fail detection
- Time of day clock with battery back up
- Networking via WorkNet RS422 twisted pair, or Ethernet

Features and Capabilities

Multiple processors

While the 8086 serves as the master CPU, the two Z80 based intelligent I/O handles serial I/O functions and the 8089 based intelligent disk controller manages mass data storage with direct memory accessing.

Memory Management

986 Series carry a proprietary memory management system. It can subdivide up to 1 MB of mem-

ory into 4K blocks. It assigns a logical to physical address translation and various access attributes to each block so that noncontiguous physical memory can be assigned to any given task. Also provides write protection and access protection to increase reliability and performance.

Memory Expansion

The design of the 986 systems includes as standard one megabyte of random access main memory with byte parity error detection.

Integral Data Storage

The 986 system comes standard with 1 MB of floppy storage and a 42 MB hard disk. In addition, the 986 can support a second 42 MB disk upgrade, giving a total capacity of 84 MB.

An intelligent hard disk controller is an integral part of the 986 system. This controller takes full advantage of higher CPU speed and fast hard disk access providing enhanced throughput.

Communications

986 Series supports asynchronous, 3270/3276 IBM Clustered Terminal Emulation and 3780 IBM BiSynchronous Communications.

The 986 Series also supports WorkNet, the Altos local area network which allows Altos to Altos communications.

Magnetic Tape Back Up

The 986 Series supports an optional magnetic tape unit to provide high performance, high capacity back up for the hard disk.

Configurations

The 986 Series consists of 1 mbyte RAM, 1 MB floppy, 10 serial RS-232 Ports* and XENIX™ Run Time system and 42 MB Winchester disk.

* WorkNet requires one RS-232 port.

Specifications

Microprocessor

Model	8086
Technology	NMOS
Data/Instruction word size	16 bit
Clock Frequency	10 MHz

RAM Memory

Capacity	512K Bytes
Maximum	1M Byte
Cycle Time	375 NSEC

I/O Control

I/O Processor	Z80A
DMA processor	8089
Interrupt system	vectored
Serial ports	10 RS-232

Floppy Storage

Number of drives	1
Capacity	
Unformatted	1 MB
Density	Double
Side	Double
Data transfer rate	250 Kb/Sec
Access Time	132 msec

Winchester Drives

Number of Drives	1
Capacity Unformatted	
986-40	42 MB (33 MB Formatted)
Data Transfer Rate	5 mbits/sec
Average Access Time	
986-40	45 msec

Optional Add ons

- 42 MB (unformatted) Winchester disk
- 17 MB (unformatted) magnetic tape cartridge

Communications

WorkNet Altos local area networking
3780 IBM Bisynchronous
3270 IBM Clustered Terminal
Controller/Emulator

Physical Characteristics

Width	16 7/8"
Height	6"
Depth	18"
Weight	33 pounds

Environmental and Safety Standards

Meets FCC docket 20780 Class
A requirements
UL and CSA approved
Ambient Temperature Range
15-32°C
50-90°F
Relative Humidity
non condensing 20-80%
Power dissipation
250 Watts

XENIX is a trademark of Microsoft.

Specifications subject to change without notice

Altos Computer Systems

2641 Orchard Parkway
San Jose, CA 95134
(408) 946-6700

Stock Number 305A

