

Endura FM810

MICRO ATX/FLEX ATX INTEL® 810
DUAL ETHERNET PCI MOTHERBOARD

FEATURE SUMMARY

- Intel 810 Chipset
- Integrated VGA
- Dual Intel 10/100 Ethernet
- PGA370 Celeron Processors
- PGA370 Pentium III Processors
- Up to 512MB SDRAM
- System Monitoring
- Fan Control
- Eight GPIO Lines
- Four PCI Slots
- One Parallel Port
- Two Serial Ports
- Dual USB
- PhoenixBIOS™
- Support for 3-slot PCI risers
- 9" x 7.5"
- MicroATX and FlexATX Compliant

Endura motherboards are Intel® architecture motherboards designed specifically to meet the demands of the OEM embedded marketplace. Based on chipsets manufactured by the Embedded Intel Architecture Division, Endura motherboards have an extended lifetime, unlike commercial motherboards which have typical lifetimes of 6 to 12 months. Combined with high quality design and manufacture, engineering change control, engineering support and product life cycle management, Endura motherboards provide the ideal solution for an embedded system where long lifetime and low cost of ownership are paramount. Endura motherboards also offer continued support for legacy features such as standard serial interfaces and hard-switched power supplies, which remain important for embedded applications.

The FM810 is a small form factor, MicroATX motherboard that is designed specifically for use in Enterprise applications requiring dual Ethernet controllers. Typical applications are Virtual Private Networks, Firewalls and servers. The FM810 is also designed for ease of integration into 1U and 2U servers with features such as support for a 3-slot PCI riser card. The dimensions of the board are small enough such that the FM810 is also suitable for use in a FlexATX chassis. Supported processor speeds range from the entry-level 300MHz Celeron™ through the 1GHz Pentium® III, thus offering a scalable platform to suit the right price/performance point. The FM810 therefore combines the benefits of a low cost, highly integrated, motherboard platform with additional communications ports to provide an ideal building block for Enterprise applications.

SPECIFICATIONS

ORDERING INFORMATION

Call for pricing and availability.
Refer to the order codes below.

DESCRIPTION

566MHz Celeron-810 video, dual 82559ER LAN
MODEL • FM2L00C566-0

850Mz Pentium III-810 video, dual 82559ER LAN
MODEL • FM2L00P850-0

1GHz Pentium III-810 video, dual 82559ER LAN
MODEL • FM2L00P100-0

FEATURE	FUNCTION	DESCRIPTION
Processor	Socket	370-pin PGA ZIF for Intel Celeron and Pentium III processors
	FSB	66MHz and 100MHz operation
	Cache	Provided by processors with integrated L2 cache
Chipset		Intel 810 chipset with ICH1
Memory	Type	Two 168-pin DIMM sockets for PC100 and PC133 SDRAM
	Capacity	Maximum of 512MB
	ECC/Parity	Not supported
Video	Controller	3D graphics controller integrated in 810 chipset
	Frame Buffer	Stored in main memory (holds 2D and 3D data) Analog VGA output via 15-pin D-type
Audio		On-board minispeaker for status and diagnostic beep codes
Network	Controller	Dual Intel 82559ER MACs with integrated PHYs IEEE 802.3 10Base-T & 100Base-TX compatible
	Connector	Two RJ45 connectors, each with two LEDs to indicate line activity, link integrity and line speed 6x2 header for Front Panel Ethernet status LEDs
IDE	Devices Types	Two Ultra ATA/66 interfaces via 40-way boxed header Supports ATAPI, LS120 and ZIP drives
Floppy	Types	Supports standard 2- and 3-mode 3.5" floppy drives
Mechanical	Dimensions	9" x 7.5"
	Compliance	MicroATX and FlexATX compliant
	PCB	Four layers
	I/O shield	ATX-compatible I/O shield available
I/O	Parallel Port	25-pin D-type supporting bi-directional, EPP and ECP modes
	Serial Ports	COM1 on 9-pin D-type, COM2 via 10-way header
	IrDA	Supported in place of COM2 via front panel connector
	USB	Dual stacked USB 1.1 rear connector
	Keyboard & Mouse	Two 6-pin PS/2 connectors for keyboard and mouse interfaces Phoenix keyboard code Keyboard and mouse connections duplicated on internal headers
	GPIO	Eight GPIO lines for control functions or front panel indicators
Expansion Slots	PCI	Four dedicated bus master PCI 2.2 slots
		Supports 3-slot riser for low profile systems
System Monitoring		Monitoring of voltage, temperature and fans (2) CPU and chassis fan speed control Watchdog timer
Power Management		PCI PME, ACPI 1.0, APM 1.2
Power Supply	Type	Support for hard- and soft- switched PSU
	Typical	43W with 850MHz Pentium III running power stress software
Battery		Lithium coin cell (5 years operating life typical)
BIOS	Type	PhoenixBIOS 4.0 Release 6.0
	Special Features	Customizable defaults, customer logo, silent boot, automatic configuration
Operating Systems		Windows® 98, Windows 2000, Windows NT®, Linux, VxWorks® Qualification of other operating systems subject to demand
Safety Compliance		Designed for compliance with UL60950 and IEC60950
EMC Compliance		Designed for compliance with EN55022, EN55024 and FCC Part 15 Class B
Environment	Operating Temp	0°C to 55°C
	Storage Temp	-40°C to 85°C
	Relative Humidity	5% to 95% non-condensing

