MPLAB®ICE 4000 High Performance In-Circuit Emulator

Summary

The MPLAB ICE 4000 in-circuit emulator is intended to provide the product development engineer with a complete microcontroller design tool set for high-end PICmicro®microcontrollers. Software control of the emulator is provided by the MPLAB Integrated Development Environment, which allows editing, building, downloading and source debugging from a single environment.

The MPLAB ICE 4000 is a premium emulator system providing the features of MPLAB ICE 2000, but with increased emulation memory and high speed perfor-mance for dsPIC30F and PIC18XXXX devices. Its advanced emulator features include complex triggering and timing, up to 2Mb of emulation memory, and the ability to view variables in real time.

The MPLAB ICE 4000 in-circuit emulator system has been designed as a real-time emulation system with advanced features that are typically found on more expensive development tools. The PC platform and Microsoft Windows®32-bit operating system were cho-sen to best make these features available in a simple, unified application.

Features:

The MPLAB ICE 4000 is a powerful, full featured real-time In-Circuit Emulator capable of debugging the most demanding real time systems. Key features include:

- Full speed emulation
- Low voltage emulation down to 1.8 volts (or device limit)
- 64K deep x 216-bit wide Trace Memory
- Up to 2 MB of addressable memory
- Unlimited breakpoints
- Complex break, trace and trigger logic
- Multi-level trigger up to 4 levels
- 48-bit time stamp
- Stopwatch
- External inputs
- External output to sync with other instrumentation
- USB port and parallel port* connection to PC

*Feature to be available later with software upgrade

MICROCHIP
Development Systems

Part Numbers and Ordering Information:

MPLAB ICE 4000 is a modular emulator system with interchangeable components allowing the system to be easily configured to emulate different PICmicro MCUs. A complete system consists of:

1. An emulator pod
2. A processor module
3. A device adapter
4. A transition socket (if required)

Part Number	Description	Price	Availability
ICE4000	ICE4000 Emulator Pod including a parallel cable, a USB cable, universal 5V 3A dual power supply, MPLAB IDE CD and documentation	$2,560	February 2003
PMF18WA0	Processor Module supporting PIC18F6620, 6720, 8620, 8720	$595	February 2003
PMF18WB0	Processor Module supporting PIC18C601, 801	$595	TBD
PMF30XA0	Processor Module supporting dsPIC30F600X	$595	TBD
DAF18-1	Device Adapter for PMF18WA0, PMF18WB0	$225	February 2003
XLT64PT2	Transition Socket for 64-lead TQFP	$125	February 2003
XLT68L1	Transition Socket for 68-lead PLCC	$175	February 2003
XLT80PT	Transition Socket for 80-lead TQFP	$125	February 2003
XLT84L1	Transition Socket for 84-lead PLCC	$175	February 2003

MPLAB ICE 4000 Product Offering

Development Tools from Microchip

MPLAB®IDE	Integrated Development Environment (IDE)
MPASM™ Assembler	Universal PICmicro macro-assembler
MPLINK™ Linker/MPLIB™ Librarian	Linker/Librarian
MPLAB C17	C compiler for PIC17CXXX MCUs
MPLAB C18	C compiler for PIC18CXXX MCUs
MPLAB SIM Simulator	Software Simulator
MPLAB ICD 2	In-Circuit Debugger
MPLAB ICE 2000	Full-featured modular in-circuit emulator
PICSTART® Plus Programmer	Entry-level development kit with programmer
PRO MATE® II Device Programmer	Full-featured, modular device programmer
KEELOQ®Evaluation Kit	Encoder/Decoder evaluator
KEELOQ Transponder Evaluation Kit	Transmitter/Transponder evaluator
microID™ Developer's Kit	125 kHz and 13.56 MHz RFID development tools
MCP2510 CAN Developer's Kit	MCP2510 CAN evaluation/development tool

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Boston	(978) 692-3848
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Detroit	(248) 538-2250
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Los Angeles	(949) 263-1888
Phoenix	(480) 792-7966
San Jose	(408) 436-7950
Toronto	(905) 673-0699

Asia/Pacific
Australia	61-2-9868-6733
China – Beijing	86-10-85282100
China – Chengdu	86-28-86766200
China – Fuzhou	86-591-7503506
China – Hong Kong SAR	852-2401-1200
China – Qingdao	86-532-5027355
China – Shanghai	86-21-6275-5700
China – Shenzhen	86-755-82901380
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Japan	81-45-471- 6166
Korea	82-2-554-7200
Singapore	65-6334-8870
Taiwan	886-2-2717-7175

Europe
Austria	43-7242-2244-399
Denmark	45-4420-9895
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