

Intel® Evaluation Board Selector Guide

A reference tool for Intel® I/O Processors
based on Intel XScale® technology.

Intel® Evaluation Boards for Intel XScale®-based I/O Processors

Intel® IQ81342MC Kit

The IQ81342.MC Customer Reference Board (CRB) is a standard sized Micro-ATX board with a 1200 MHz IOP342 Two Core Processor, but this can be used to emulate the single core IOP341 by jumper switch selection. The board has one x8 PCI Express* slot and one 100 MHz 64 bit PCI-X* slot and is supplied with a 256 MB DDR-2 533 MHz memory DIMM. The other on board peripherals include an Intel® 82546 Dual Port Gigabit Ethernet controller, Dual UARTs, Four I2C Fan Controllers, a temp sensor, and a real time clock with battery. RedBoot is programmed into the onboard Flash,* and allows for serial or Ethernet loading of application programs or operating systems, or the Compact Flash (CF) expansion slot can be used to hold an OS. A Mini-JTAG header is on board, and is supplied with an adapter cable for use with the included 20-pin Macraigor Raven* JTAG device to enable Flash programming and debug access to both cores.



PRODUCT CODE	MM#	FORM FACTOR
IQ81342MC.kit	889950	MicroATX 7.5 in x 9.0 in (190 mm x 230 mm)
Processor Product Brief	www.intel.com/design/iao/prodbref/315033.htm	
Customer Reference Board Manual	www.intel.com/design/iao/docs/315057.htm	

Intel® IQ81342SC Kit



The IQ81342SC Customer Reference Board (CRB) is a PCI Express Host Bus Adapter (HBA) card with a 1200 MHz IOP342 Two Core Processor. The board has one x8 PCI Express edge connector, for connecting to an IA-Server, or other motherboard. On board peripherals include an Intel® 82545 Gigabit Ethernet controller, Dual UARTs, a temp sensor, and a real time clock with battery. RedBoot is programmed into the onboard Flash, and allows for serial or Ethernet loading of application programs or operating systems. The board is supplied with a 256 MB DDR-2 533 MHz memory DIMM, but the user can replace this with a larger DIMM, up to 2 Gb/s, if required. A Mini-JTAG header is on board, and is supplied with an adapter cable for use with the included 20-pin Macraigor Raven JTAG device to enable Flash programming and debug access to both cores. The board sources power from the PCIe slot, and the 100 MHz 64 bit PCI-X slot has an auxiliary 4 pin Molex* disk-style socket.



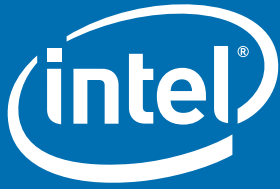
PRODUCT CODE	MM#	FORM FACTOR
IQ81342SC.kit	889947	Full Size PCIe 5.75 in x 12.25 in (145 mm x 310 mm)
Processor Product Brief	www.intel.com/design/iao/prodbref/315033.htm	
Customer Reference Board Manual	www.intel.com/design/iao/docs/315056.htm	



Intel® Evaluation Board Product Specifications

	 <p>Intel® IQ81342MC Kit</p>	 <p>Intel® IQ81342SC Kit</p>
PROCESSOR	1.2 GHz Intel® IOP342 Processor	1.2 GHz Intel® IOP342 Processor
MEMORY	<ul style="list-style-type: none"> ▪ 256 MB DDR2 533 MHz DIMM ▪ 2 GB supported 32 MBs Flash* ROM ▪ 16-bit Flash interface ▪ Compact Flash Type II Connector 	<ul style="list-style-type: none"> ▪ 256 MB DDR2 533 MHz DIMM ▪ 2 GB supported ▪ 32 MBs Flash ROM ▪ 16-bit Flash Interface
I/O PARTS	<ul style="list-style-type: none"> ▪ Intel® 82546 GB Dual Port Gigabit Ethernet Controller ▪ Two Serial Console Ports ▪ Mini-JTAG Header ▪ Three I²C Ports 	<ul style="list-style-type: none"> ▪ Intel® 82545 GB Ethernet Controller ▪ Two Serial Console Ports ▪ Mini-JTAG Header
EXPANSION	<ul style="list-style-type: none"> ▪ One 64-bit PCI-X* slot ▪ 100 MHz (the ethernet controller is on this same bus) ▪ One x8 PCI Express* slot ▪ CF slot can be used for ROM expansion 	<ul style="list-style-type: none"> ▪ One 64-bit PCI-X slot ▪ 100 MHz (the ethernet controller is on this same bus)
INDICATORS	<ul style="list-style-type: none"> ▪ Two 7 Segment Hex display ▪ Power LED ▪ Buzzer 	<ul style="list-style-type: none"> ▪ Two 7 segment Hex display ▪ 8 status LED ▪ Buzzer
PERIPHERALS	<ul style="list-style-type: none"> ▪ Temp Sensor ▪ 4 I²C Fan monitor/controllers ▪ Real Time Clock with Battery 	<ul style="list-style-type: none"> ▪ Temp Sensor
POWER/MOTHERBOARD CONNECTOR	<ul style="list-style-type: none"> ▪ MicroATX 7.5 inch x 9.0 inch (190 mm x 230 mm) ▪ 20 Pin Standard ATX 	<ul style="list-style-type: none"> ▪ Full Size PCIe 5.75 inch x 12.25 inch (145 mm x 310 mm) ▪ This board sources power from the x8 lane PCIe motherboard connector ▪ 4 Pin Molex* HDD connector for power to the PCI-X slot





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