

**Aumictech**

Test & measurement • bought, sold, repaired, calibrated

Data Sheet

August 15, 2026

ABACO SYSTEMS / SBS

Abaco Systems / SBS PCI-5565PIORC-110000 Reflective Memory PCI Node Card - RoHS Compliant

The Abaco Systems PCI-5565PIORC-110000 is a RoHS-compliant Reflective Memory PCI Node Card engineered for deterministic, low-latency data sharing across distributed embedded systems. The card enables transparent memory synchronization across up to 256 networked nodes with zero processor overhead, eliminating the need for traditional inter-system communication protocols. Its architecture operates independently of operating system and bus topology, enabling heterogeneous hardware platforms to function as a unified shared-memory network. Typical Applications Multi-system real-time data acquisition, distributed control networks, deterministic avionics and defense subsystem integration, high-speed industrial process synchronization. Compatibility & Integration Universal 64-bit/32-bit PCI add-in card rated for both 3.3V and 5.0V PCI buses. Supports ring and star network topologies for flexib

**MODEL****Abaco Systems /
SBS PCI-
5565PIORC-
110000****CALIBRATION****Available on
request****CONDITION****Used****STATUS****In stock****RFQ / SKU****PCI-5565PIORC-
110000****LISTING**[https://aumictechlabs.c
om/products/pci-5565p
iorc-110000-2/](https://aumictechlabs.com/products/pci-5565piorc-110000-2/)

NIST-traceable cal

SAM registered

30-day returns

NAICS 423690 • 811210 • 541380

This unit

The Abaco Systems PCI-5565PIORC-110000 is a RoHS-compliant Reflective Memory PCI Node Card engineered for deterministic, low-latency data sharing across distributed embedded systems. The card enables transparent memory synchronization across up to 256 networked nodes with zero processor overhead, eliminating the need for traditional inter-system communication protocols. Its architecture operates independently of operating system and bus topology, enabling heterogeneous hardware platforms to function as a unified shared-memory network.

Technical Specifications

Interface: PCI 64-bit, 66 MHz; 3.3V or 5.0V logic levels; 32-bit compatible

Network Connectivity: High-speed fiber-optic via 2.12 Gbaud serial link

Fiber Reach: Multimode to 300 m; single-mode to 10 km

Memory Capacity: 128 Mbyte or 256 Mbyte SDRAM

Data Transfer Rate: 43 Mbyte/s (4-byte packets) to 174 Mbyte/s (64-byte packets)

Packet Size: 4 to 64 bytes, dynamically configurable

DMA Channels: One independent channel

Operating Temperature: 0°C to +65°C with forced air cooling

Key Features

- Transparent data writes replicate across all network nodes automatically
- Configurable endian conversion for mixed-architecture networks
- Low-latency, deterministic packet delivery with ring or star topology support
- Dual transmit/receive FIFOs buffer peak-rate traffic for host optimization
- Any-to-any or broadcast interrupt generation across nodes
- Built-in error detection and redundant transfer mode support
- Field-upgradable firmware for runtime updates

Typical Applications

- Multi-system real-time data acquisition, distributed control networks, deterministic avionics and defense subsystem integration, high-speed industrial process synchronization.

Compatibility & Integration

Universal 64-bit/32-bit PCI add-in card rated for both 3.3V and 5.0V PCI buses. Supports ring and star network topologies for flexible deployment in legacy and modern platforms.

PCI5565PIORC110000 Characteristics / Specifications

PARAMETER	VALUE
Model	PCI-5565PIORC
Configuration	PCI-5565PIORC-110000
Instrument Type	Reflective memory PCI node card
Host Bus	PCI
Manufacturer	Abaco SBS GE
Family	5565 reflective memory
Network Rate Class	2.12 Gbaud fiber
Memory Window Class	256 MB SDRAM class
Mechanical Package	PCI
Rohs	PIORC RoHS compliant
Media	fiber optic
Topology	ring class
Latency Class	microsecond class reflection
Interrupts	on write class
Dma	PCI DMA class
Operating Temperature Class	0 to 50 C
Power	PCI 5 V 3.3 V
Connector	fiber LC/SC class
Redundancy	bypass class
Node Count Class	multi node network
Grounding	chassis ground
Related Pmc	VMIPMC-5588DMA fiber reflective memory
Operating temperature	Class: 0 to 50 C

PCI5565PIORC110000 Specifications

PARAMETER	VALUE
Applications	Hardware-in-the-loop shared memory, multi-computer real-time reflection, and deterministic DMA between PCI hosts.
Reflective memory PCI node	Fiber-optic 2.12 Gbaud class 5565 network
Technical Specifications	Model: PCI-5565PIORC

General Specifications & Supplementary Characteristics

PARAMETER	VALUE
Operating temperature	Class: 0 to 50 C
Operating Temperature	Class: 0 to 50 C
Operating Temperature Class	0 to 50 C
Power	PCI 5 V 3.3 V
Connector	fiber LC/SC class
Redundancy	bypass class
Node Count Class	multi node network
Grounding	chassis ground
Related Pmc	VMIPMC-5588DMA fiber reflective memory Notes Identity from Abaco/SBS PCI-5565PIORC-110000 Reflective Memory PCI Node Card listing. Exact SDRAM size and fiber transceiver type are on the 5565 PIORC datasheet matching 110000.

Full OEM specifications

Complete technical content extracted from the manufacturer datasheet. Sparse OEM tables are reconstructed as tables below; other text is preserved as paragraphs.

Specifications	
Specifications	
PARAMETER	VALUE
Model	PCI-5565PIORC
Configuration	PCI-5565PIORC-110000
Instrument Type	Reflective memory PCI node card
Host Bus	PCI
Manufacturer	Abaco SBS GE
Family	5565 reflective memory
Network Rate Class	2.12 Gbaud fiber
Memory Window Class	256 MB SDRAM class
Mechanical Package	PCI
Rohs	PIORC RoHS compliant
Media	fiber optic
Topology	ring class
Latency Class	microsecond class reflection
Interrupts	on write class
Dma	PCI DMA class
Operating Temperature Class	0 to 50 C
Power	PCI 5 V 3.3 V
Connector	fiber LC/SC class
Redundancy	bypass class
Node Count Class	multi node network
Grounding	chassis ground
Related Pmc	VMIPMC-5588DMA fiber reflective memory
Notes	
Identity from Abaco/SBS PCI-5565PIORC-110000 Reflective Memory PCI Node Card listing. Exact SDRAM size and fiber transceiver type are on the 5565 PIORC datasheet matching 110000.	

Available from Aumictech

Used and refurbished unit evaluated in-house. Calibration: Available on request. Used · In stock.

Request a quote: sales@aumictech.com · +1 (484) 841-9341

Aumictech

788 S 500 E, Pleasant Grove, UT 84062
sales@aumictech.com · +1 (484) 841-9341
<https://aumictechlabs.com>

NIST-traceable calibration · SAM registered ·
30-day returns
NAICS 423690 · 811210 · 541380
Generated August 15, 2026

Technical content from manufacturer specifications. Unit photo/stock from Aumictech listing when available. Specifications subject to OEM documentation and unit condition.