

IC-SSD-PMCa Storage board

IC-SSD-PMCa is a new family of storage boards which offers up to 128 Gbytes of Nand flash for mass storage in embedded applications. (64 GB with available flash devices)

Thanks to the NAND technology, this solution is suitable for applications in harsh environments (industrial and military environments with important temperature and vibration constraints)

Supplementary to the storage function, the **IC-SSD-PMCA** boards offers communication functions :

- One high speed USB Host port on front panel,
- Two high speed USB Host port on PN4 IO connector.



Description

The **IC-SSD-PMCa** is a PCI Mezzanine Card (PMC) form factor with low power consumption which can be used in conjunction with CompactPCI and VME carriers or proprietary design.

The **IC-SSD-PMCa** supports up to 66 MHz PCI bus clock frequencies in non Monarch mode with 32 or 64 bits wide.

It is based on the latest generation of USB Flash Disk controller, providing high performance data transfer (up to 15 MB/s per drive).

The **IC-SSD-PMCa** is seen by the host as 4 USB Flash disks. Depending on your Operating System, the **IC-SSD-PMCa** supports software Raid0, Raid1 or Raid5 configuration.

Depending on Raid0 configuration (e600/Linux), it offers a read speed up to 45 MB/s and a write speed up to 25Mb/s W .

IC-SSD-PMCa also features three supplementary USB ports to enlarge the communication capabilities of your system.

IC-SSD-PMCa exists in standard, extended, rugged and conduction-cooled version.

Main features

Storage features

- ▶ Complete USB specification ver.2.0 compatibility
- ▶ Complies with USB Mass Storage Class specification ver.1.0
- ▶ Support data transfert at high-speed (480 Mbits/s), full-speed (12 Mbits/s) and low-speed (1,5 Mbit/s)
- ▶ Bulk Only transport protocol

Communication features

- ▶ One front panel USB type "A" port
- ▶ Two USB port on PN4 PMC I/O
- ▶ Complete USB specification ver.2.0 compatibility
- ▶ Support data transfert at high-speed (480 Mbits/s), full-speed (12 Mbits/s) and low-speed (1,5 Mbit/s)
- ▶ OHCI compliant with "Open Host Controller Interface Specification for USB Rev. 1.0a"
- ▶ EHCI compliant with "Enhanced Host controller interface Specification for Universal Serial Bus Rev 1.0"

Software Support

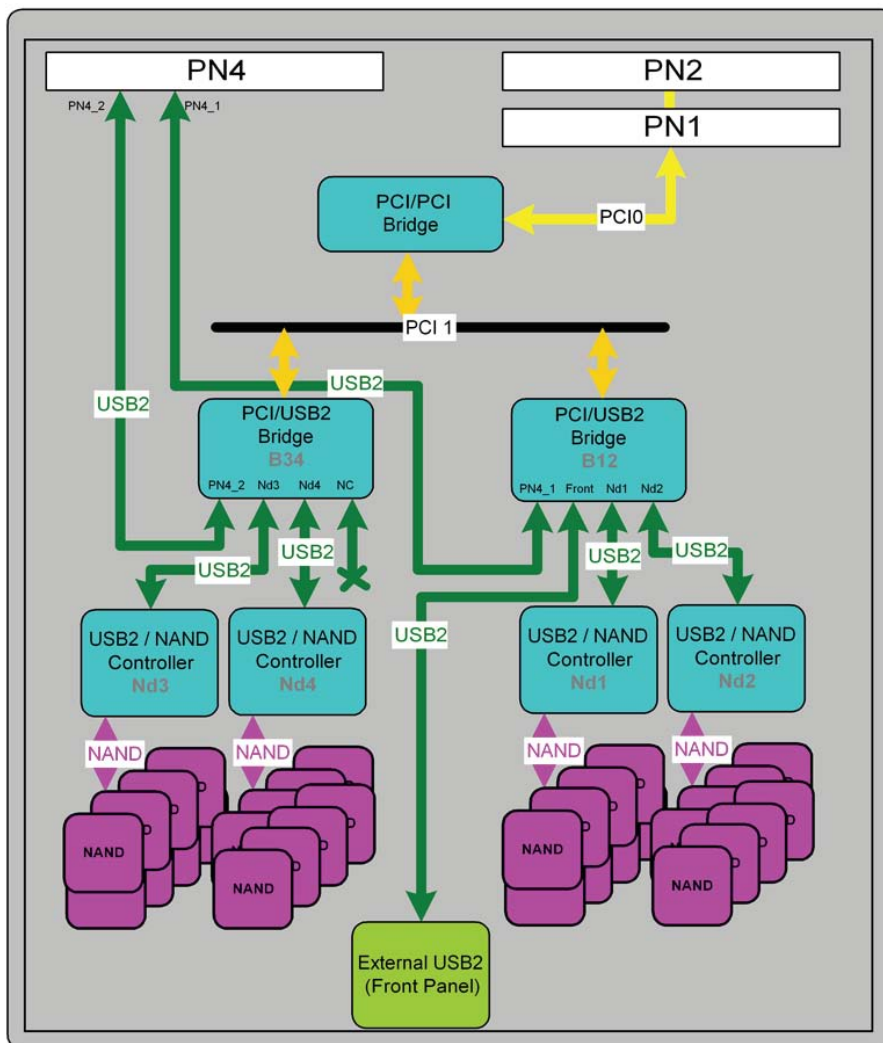
- ▶ Immediately compatible with Operating Systems supporting OHCI, EHCI drivers including USB flash drivers (VxWorks, Linux, Windows...)

Full operational consumption is less than 5 W (TBC).

IC-SSD-PMCa

Solid State Storage Board

Block Diagram



Board specifications

Physical dimensions

PMC Module single width, IEEE P1386 (150 mm * 75 mm) and ANSI-VITA 32-2003 standards compliant

Power requirements

3,3 V or 5V PCI signalization environment
Max 5W on 5 VDC

EM compatibility

EMC/EMI : 89/336/ECC, EN55022 CIE, EN50082-2

Environnement Specifications:

Please consult the IC-SSD-PMCa page at www.interfaceconcept.com.

Ordering Information:

Please contact our sales department : tel. +33 (0)2 98 573 030 - email : info@interfaceconcept.com

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