Transition Module



APPLICATIONS

The AD TP1/003 is designed to be used with Concurrent Technologies 3U CompactPCI® Single Board Computer, the TP 442/34x. The Transition Module mounts in the rear transition area of the CompactPCI backplane and provides very simple access to the majority of the I/O

functions provided by the processor board. Many I/O functions are provided on the Transition Module's own front panel as well as from headers mounted on the Module.

HIGHLIGHTS

- Transition Module for rear I/0:
 - 80mm depth as per CompactPCI specification
 - single slot
- Interfaces to CompactPCI via J2
- 2 x Serial ATA interfaces via on-board SATA connectors:transfer rates up to 300Mbytes/s
- PC speaker via 5-way header
- General Purpose I/O interface via 5-way header
- 2 x USB interfaces via USB connector on Transition Module's front panel and 10-way header
- Option for 10/100/1000 Mbps Ethernet interface via RJ45 connector on front panel
- Digital graphics interface via front panel connector

- Option for RS232 port via RJ45 connector on front panel
- Option for RS232/RS422/RS485 port via 9-way D-type connector on front panel
- Stereo Audio provided by onboard codec, via 10-way header:
 - stereo line in
 - stereo line out
 - microphone in
- Extended temperature versions available:
 - -25°C to +70°C (E-Series)
 - -40°C to +85°C (K-Series, includes humidity sealant)



Specification

Serial ATA

- 2 x SATA interfaces via 2 onboard standard SATA headers:-
 - → transfer rates up to 300Mbytes/s

USB Interfaces

- USB1 accessed via USB connector on front panel
- USB2 accessed via 10-way header

Serial Interfaces

- option for COM1 port:-
 - → RS232 signal levels
 - → accessed via RJ45 front panel connector
- option for COM2 port:-
 - → RS232, RS422 or RS485 signal levels
 - → accessed via 9-way D-type front panel connector

Graphics Interface

- supports a DVI-D connector:-
 - → for driving TFT flat panels
 - → connector on front panel

Ethernet Interface

- option for 1 channel via front panel RJ45 connector:-
 - → supporting 10Base-T,100Base-Tx and 1000Base-T

Stereo Audio Interface

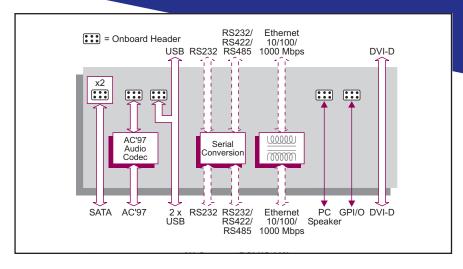
- Onboard CODEC supports:-
 - → stereo line-in
 - → stereo line-out
 - → microphone in
 - → accessed via 10-way IDC header

Other Interfaces

- PC speaker via 5-way header
- General Purpose I/O interface via 5-way header

Electrical Specification

- all voltages to be within ±5%
- +5V@0.2A; +3.3V@0.15A; +12V@0.0 A; -12V@0.0 A



Environmental Specification

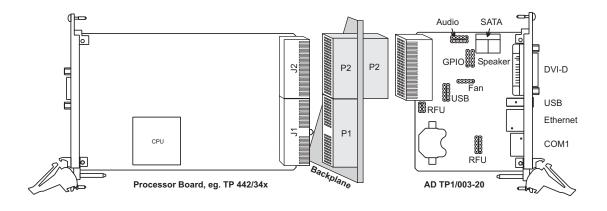
- operating temperatures:-
 - → 0°C to +55°C (N-Series) → -25°C to +70°C (E-Series)
 - → -40°C to +85°C (K-Series)
- 10% to 90% Relative Humidity,
- non-condensing (operating):
 → K-Series includes humidity sealant
- -40°C to +85°C (storage)
- 10% to 90% Relative Humidity, non-condensing (storage)

Mechanical Specification

- 3U form-factor:- 3.9" x 3.2" (99mm x 80 mm)
- single-slot: 0.8" (20.3mm)
- connector: IEC-1076-4-101 for J2
- shock:

20g, 11ms, ½ sine (operating); 30g, 11ms, ½ sine (non-operating)

 vibration: 5Hz-2000Hz at 2g, 0.38mm peak displacement (operating); 5Hz-2000Hz at 5g, 0.76mm peak displacement (non-operating)



ORDERING INFORMATION

Order Number Product Description (Hardware)

AD TP1/003-10 3U CompactPCI Transition Module for TP 442/34x with COM2 (RS232/RS422/RS485) (see *) AD TP1/003-20 3U CompactPCI Transition Module for TP 442/34x with COM1 (RS232) and Ethernet (see *)

* I/O available on both versions = 2 x SATA, 2 x USB, DVI-D, Stereo Audio, PC Speaker and GPIO

For extended temperature, E or K-Series, please contact your local sales office