



Swift™ PCI NTDS Serial Type D and E

The Swift PCI NTDS Serial Type D and E interface provides a communications bridge between commercial computers with PCI slots, and military computers and peripherals using MIL-STD-1397C Type D for their communications with other devices.

Product Overview

- Fully MIL-STD-1397C Type D or E compliant
- Full-duplex 32-bit NTDS transfers
- Interrupt, PIO & DMA operation
- Independent NTDS sink and source channels
- Field Programmable Gate Array (FPGA) technology
- Separate word counters and time-outs for command and data words on inputs and outputs
- PCI Master and Slave operation
- Internal loopback test without disconnecting NTDS cables
- Software enabled SIF (for NTDS type E)
- Software enabled time stamp on input words with 125ns resolution
- Time stamps can be synchronized across multiple interfaces
- Front panel indicator LEDs, including two software-controllable user LEDs
- Supports receipt of multiple forced command words
- Control frame programmability for MIL-STD-1397 compatibility
- Software compatible with Serial Swift PMC and Swift cPCI boards

General Product Features

Input Mode Features

- Separate or combined data and command word buffers
- Input command words, stop on data word
- Input data words, stop on command word
- Single word or burst mode (NTDS type E)
- Passive tap mode

Output Mode Feature

- Concurrent data and command buffer operation
- Single word or burst mode (NTDS type E)

Time-out Mode Features

- Time-out values in 10 μ s or 1ms increments
- Time-out between words and/or total transfer times
- Start time-out at beginning of operation or upon transfer of the first word

Software Drivers Available*

- Choice of driver included with board purchase:
Windows NT® Windows® 2000/XP, VxWorks®, Solaris™,
Linux®, LynxOS®, HP-UX

*Contact factory for new OS support

Options and Accessories

- Cable Assemblies
- Tap Accessories



Swift PCI NTDS Serial Type D



Swift PCI NTDS Serial Type E

Swift PCI NTDS Serial Type D and E Technical Specs

NTDS Interface	MIL-STD-1397C Type D or E
PCibus Interface	PCI 2.2 Compliant 32-Bit, 33/66 MHz, Universal Card (3.3V or 5V I/O signaling)
Input Buffer	64K x 32-bit FIFO
NTDS I/O Connector	Type D: 2 coaxial connectors (Amphenol# 31-10-75) Type E: 2 tri-axial connectors (Trompeter# CBBJR79T L)
Form Factor	6.875" x 4.2" (Standard PCI Short Card)
Weight	4.8 oz – Type D 4.8 oz – Type E
Power Consumption	Average +5V current draw: 0.85A Average +V/I/O current draw: 5mA Average Power Dissipated: 2.89W
Relative Humidity	0% to 90% (non-condensing)
Operating Temperature	0°C to +55°C