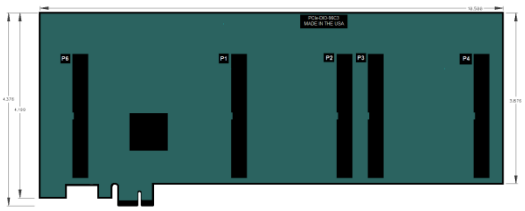
PCIe-DIO-96C3

Digital I/O and Counter/Timer Card

FEATURES

- 96 high-current DIO lines
- Four & eight bit ports configured as ins or outs
- DIO lines buffered
- I/O buffers under program control (tri-stated)
- Jumper selectable 10k ohm Pull-up/Pull-down resistors on DIO lines
- VCCIO voltage available to the user via 0.5A resettable fuse
- Four 50 pin DIO header connectors are compatible with industry standard I/O racks
- Three field configurable 82C54 counter/timers on first 50 pin header
- Ribbon cable strain relief at mounting bracket



FACTORY OPTIONS

- Extended temp operation (-40° to +85°C)
- RoHS compliant version

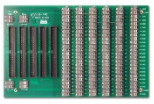
FUNCTIONAL DESCRIPTION

This product is a x1 lane PCIe DIO board with 96 I/O lines and counter/timer capabilities designed for use in high I/O density applications. The card emulates four 8255 compatible chips, providing 96 DIO lines. The DIO lines are grouped into three 8-bit ports: A, B, and C. Each 8-bit port is configured via software to function as either inputs or outputs. Port C is further broken into two 4-bit nybbles via software, configured as either inputs or outputs.

Each DIO line is buffered and capable of up to 32mA source/sink. The VCCIO logic level is globally configured via jumper selection as 5V, 3.3V, 2.5V, or 1.8V. Also, ports A, B, C low nybble, and C high nybble are individually jumper configurable as pull-up or pull-down through 10kΩ resistor networks.

The card is 10.5 inches in length and 4.2 inches seated height. I/O wiring for this board is via five 50-pin male header connectors. Ribbon cables can be used to connect this card to termination panels with strain relief bars at the mounting bracket to bring the cables out of the PC case.

OPTIONAL ACCESSORIES

CAB50-6	CAB50F-X	STB-120CH	STB-50	DIN-SNAP-6
Female to Edge Ribbon Cable for solid state rack	F/F Ribbon Cable Assembly, X=length in feet	50-Pin Multi-Header Screw Terminal Board for 120 DIO lines	Screw terminal board, panel mount on SNAP-TRACK or DIN-SNAP	SNAP-TRACK for DIN-rail mounting one STB-50
				

SOFTWARE

The card comes with a free DOS/Linux/Windows (XP and newer) software package containing drivers, utilities, a graphical settings program to help configure option jumpers etc., and sample programs (with source) in Visual Basic, C#, Delphi, and Visual C++ for Windows. Linux support includes basic Comedi and direct-register source with tips on using the card from Python and other modern environments. Our Windows-standard DLLs can be used from all the most popular application programs including LabVIEW and even most "office applications". Embedded OS support includes XPe, all flavors of Windows Embedded Standard, and more...including VxWorks and QNX.

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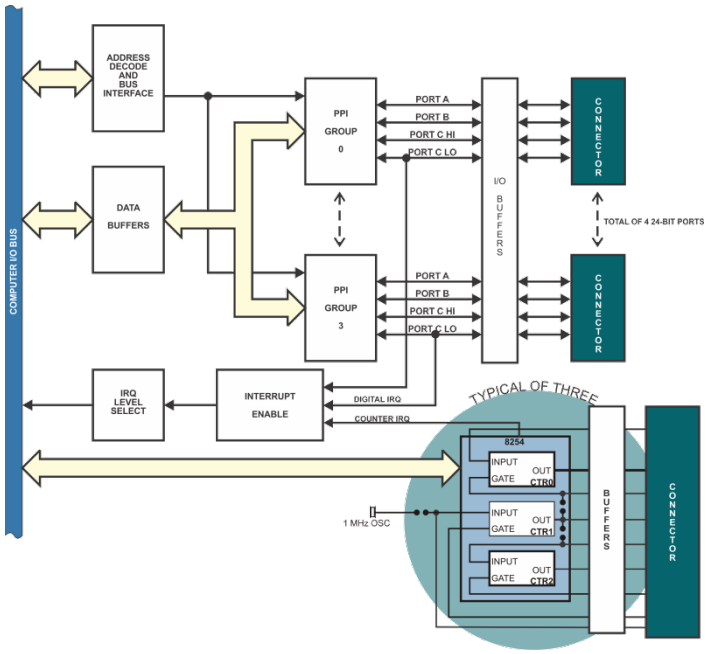

BLOCK DIAGRAM

SPECIFICATIONS

Digital I/O

Lines	96; Ports A, B, and C
Type	8255 compatible
Logic Level	VCCIO jumper selectable
Pull-up/down	10k ohm, jumper selectable

VCCIO

Logic Levels	5V	
Low Inputs	≤ 1.5V	≤ 2uA
High Inputs	≥ 3.5V	≤ 2uA
Low Outputs	≤ 0.55V	32mA
High Outputs	≥ 3.8V	32mA

Environmental

Operating Temperature	0° to 70°C, optional -40° to 85°C
Storage Temperature	-55° to +150°C
Humidity	5% to 95% RH, w/o condensation
Card Dimensions	Length – 10.5"; Height - 4.2" seated

ORDERING GUIDE

• PCIe-DIO-96C3	96-line DIO with un-dedicated 82C54's Card

Factory Options

- Extended temp operation (-40°C to +85°C)
- RoHS compliant version