PCIE-1840
PCIE-1840L

4-Ch, 16-Bit, 125 MS/s Digitizer

4-Ch, 16-Bit, 80 MS/s Digitizer



Features

PCIE-1840

- 4 simultaneous analog inputs, up to 125 MHz, 16-bit resolution
- 500 MHz time-interleaved sampling

PCIE-1840L

- 4 simultaneous analog inputs, up to 80 MHz, 16-bit resolution
- 320 MHz time-interleaved sampling

PCIE-1840/PCIE-1840L

- Non-stop data streaming capabilities
- 2 GB of onboard memory
- 1M or 50 Ohm selectable input impedance
- Built-in tunable anti-aliasing filter
- AC/DC coupling support

Introduction

PCIE-1840/1840L is a 16-bit resolution digitizer that provides up to 2 GB of onboard sample memory, true ENOBs of up to 11.4 bits, and sampling rates of up to 125 per second. PCIE-1840/1840L divides the input voltage range into 65,536 digitization levels and can support 1 or 2 digitizing channels (up to 250/500 MSPS).

Specifications

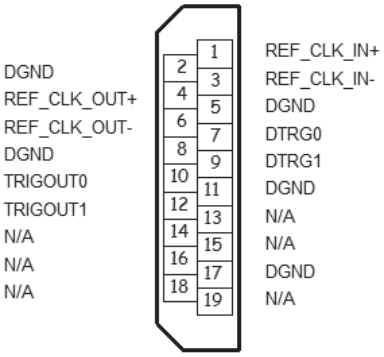
Analog Input

Channels	4 x single ended, simultaneous
Resolution	16 bits
Max. Sampling Rate	125 MS/s (PCIE-1840) 80 MS/s (PCIE-1840L)
Memory Size	2 GB
Overvoltage Protection	30 Vp-p
Input Impedance	50 Ω / 1M Ω For 1 MΩ: AC/DC coupling
Sampling Modes	Software and external clock
Trigger Modes	Start, Delayed Start Stop, Delayed Stop
Input Range	0.2 / 0.4 / 1 / 2 / 4 / 10 / 20 Vpp (input Impedance must be 1 MΩ)

General

Bus Type	PCI Express Gen2 x4
I/O Connectors	4 x BNC (for analog input) 1 x HDMI (for external clock and trigger)
Dimensions (L x H)	175 x 100 mm (6.9" x 3.9")
Power Consumption	Under test
Operating Temperature	0 ~ 50 °C (32 ~ 122 °F)
Storage Temperature	-20 ~ 70 °C (-4 ~ 158 °F)
Storage Humidity	5 ~ 95% RH, non-condensing

Pin Assignments



Ordering Information

PCIE-1840-AE	4-ch, 16-bit, 125 MS/s digitizer
PCIE-1840L-AE	4-ch, 16-bit, 80 MS/s digitizer
PCLD-8840-AE	20-pin DIN rail HDMI cable wiring board for PCIE-1802 and PCIE-1840
PCL-10119-1E	HDMI cable
PCL-1010B-1E	BNC coaxial cable, 1 m

All product specifications are subject to change without notice.
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