16 Bit Digitizer (oszilloscope) PCIe Gen-3 2 channels 500 MS/s 4GS memory

Order-No.: RMX-165-020 Series/Model: RazorMax / CompuScope Express 16502



_ Click to enlarge

Main Product Features

- **2 channel Digitizing Input Channels**
- **500 MS/s Maximum Sampling Rate per Channel**
- **350 MHz Bandwidth**
- **16-Bit Vertical A/D Resolution**
- **4 GS (8 GB) Onboard Memory Standard**
- **FPGA Based Applications for Real-Time DSP Functions**
- **Dual Port Memory w.Sustained PCIe**
- **Data Streaming with more then 4 GB/s**
- **Full-Featured Front-End w. DC or AC Coupling a. 50 Ω Inputs**
- **Software Control of Input Voltage Ranges**
- **Ease of Integration with External or Reference Clock In & Clock Out**
- **External Trigger In & Trigger Out**
- **Full-Height 1/2 Length PCI Express (PCIe) Generation 3.0 x8 Card**
- **Programming-Free Operation with GaGeScope PC Oscilloscope Software**
- **Software Development Kits Available for C/C#, LabVIEW and MATLAB**

The new extremely fast and high-resolution Gage digitizers of the series RazorMax Express CompuScope offer with a half long Single slot PCI Express card a resolution of 16 bit and a sampling rate of 1 GS/s (per channel).

Sampling rates: The 2 or 4 channel 16 bit RazorMax PCI Express (Gen-3) PC oscilloscope cards are available in 2 versions:

The PCI Express x8 Gen-3 CSE161Gx digitizer /oscilloscope cards series has a sampling rate of 1 GS / s per channel
The PCI Express x8 Gen-3 CSE1650x digitizer /oscilloscope series has a sampling rate of 500 MS / s per channel.

Possible transfer speeds in the PCIe slots:

PCI Express (PCIe) x8 (8 Lane) Gen-3 (Version 3.0): 4+ GB/s

PCI Express (PCIe) x8 (8 Lane) Gen-2 (Version 2.0): 3.1 GB/s

PCI Express (PCIe) x8 (8 Lane) Gen-1 (Version 1.0): 1.5 GB/s
PCI Express (PCIe) x4 4 Lane) Gen-1 (Version 1.0): 1 GB/s
PCI Express (PCIe) x1 (1 Lane) Gen-1 (Version 1.0) 245 MS/s

Possible transfer speeds with Thunberbolt-3 Expansion:

Gage Thunderbolt-3 version: (PCIe) x8 (8 Lane) Gen-3 (Version 3.0): 4+ GB/s

OneStop Systems / Magma Expansion: PCIe) x8 (8 Lane) Gen-3 (Version 3.0): 4+ GB/s

Possible eXpert On-Board Real-Time Application Options **(model-dependent):**

- eXpertTM Daten Streaming Stream-to-Analysis
- eXpert DDC (Digital Down Conversion
- eXpertTM MittelwertbildungeXpertTM
- eXpert FFT (Fast Fourier Transform)
- eXpert OCT (Optical Coherence Tomography)

Possible Software Development Kits (SDK's)**.**

- CompuScope SDK für C/C# (WINDOWS 7/8/10 32Bit/64Bit und Linux)
- CompuScope SDK für MATLAB (WINDOWS 7/8/10 32 Bit/64Bit)
- CompuScope SDK für LabVIEW (WINDOWS 8/10 32Bit/64Bit)

GageScope (Oscilloscope-Software)

- GageScope: Lite Version
- GageScope: Standard Version
- GageScope: Professional Version

Combination possibilities with broadband Downconverter:

- Broadband Downconverter solution from 100 kHz to 8 GHz
- Downconverter solution from 100 to 18 GHz
- Downconverter solution from 100 kHz to 8 GHz 100 kHz to 27 GHz

Applications:

- RADAR Design and Test
- Signals Intelligence (SIGINT)
- Ultrasonic Non-Destructive Testing
- LIDAR Systems
- Communications
- Optical Coherence Tomography
- Spectroscopy
- High-Performance Imaging
- Time of Flight
- Life Sciences
- Particle Physics

Manufacturer page

http://www.gage-applied.com/

Data Sheet Download

16 Bit Digitizer, 2 or 4 channels HighSpeed with 500 MS/s or 1 GS/s per channel (3.4 MiB)

Opening the Download-Files May require the Adobe-Acrobat-Reader.
Click here to download the Adobe-Acrobat-Reader.

Wuntronic GmbH, Heppstrasse 30, D-80995 Munich, Germany
Phone +49 (89) 3133007, Fax +49 (89) 3146706, wuntronic@wuntronic.de