RogaDAQ 4

Four Channel USB
Data Acquisition System

TECHNICAL DATA:

Analog Inputs	4 BNC Input Channels, differential & single ended, optically decoupled
Resolution	24bits for each channel, simultaneous sampling
Frequency range	DC - 80 kHz
Sample rate per channel	8/16/24/32/48/92/192 kHz
Input voltage range	±10 V / ±1 V selectable
Input coupling	DC/AC/IEPE selectable
Sensor supply	4 mA @ 24 V
Impedance of input	1 MΩ, 20 pF
Over voltage protection	±40 V
Anti alias filterer	800 dB / octave
Dynamic range	free of distortion > 123 dB
Precision of amplitude	better 0.1 %

Tachometer input	Two inputs
Resolution	32bits
Input voltage range	±30 V
Basic frequency	10 MHz

Miscellaneous	
Interface	USB 2.0
Connectors	BNC receptacles, counter Lemo Type EPG.0B.303.HLN
Power supply	inklusive Netzteil für Spannungsversorgung 220 V AC / 5.2 V DC
Rugged aluminium case closed on all sides	
Dimensions	180 x 118 x 64 mm
Weight	400 g
Operating temperature range	0 - 55 °C

RogaDAQ4 Front End is a high precision portable data acquisition system. Four simultaneously sampled 24bits resolution channels measure precisely any signals with frequencies up to 80kHz. RogaDAQ4 combined with PC or notebook is a perfect measurement solution. It offers high levels of precision and it is very easy to use.

Possible Applications

*   PC based portable data acquisition
*   Frequency analysis in the range 0 - 80kHz
*   Structural analysis
*   Modal analysis
*   Machine maintenance
*   Building acoustics and building oscillation analysis
*   Process monitoring
*   Final check

Properties

*   Four high precision inputs with 24bits A/D converter
*   8 - 192 kS/s selectable sample rate
*   Integrated anti alias filter ensures perfect signal integrity
*   AC, DC coupling or IEPE for direct power supply
*   Tachometer input
*   5 Volt power supply
*   Rugged aluminium case

Technical Details

RogaDAQ4 high precision inputs are designed for measuring dynamic signals. They are sampled simultaneously. Signals are digitized at a maximum of 192kS/s with 24bits resolution.

Preamplification is realized with noise reduced instrument amplifiers with extremely low distortion. For IEPE compatible sensors a constant current source can be activated by software.

User Software

The RogaDAQ4 front end can be operated directly out of DasyLab version 13.0. This allows to perform complex monitoring tasks like final checks in production lines or monitoring of a frequency range with signaling if predefined intervals are left. And all of this without writing a single line of code. Beside this drivers are available for customer specific programming for .NET, ANSI C, Visual C++ 6.0, Delphi, DasyLab, LabView, and MatLab.