Q.raxx D104

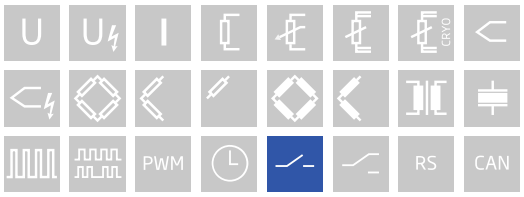
Digital Input Module

Q.raxx is the ideal 19" rackmount DAQ solution for applications that require high channel density and custom sensor terminations. Q.raxx DAQ systems can utilize an integrated, high-performance controller for communication, control, and data logging purposes. With a controller, multiple Q.raxx systems can be synchronized to each other allowing for efficient DAQ distribution with low jitter and gradual expansion up to thousands of channels.

- High Density
  up to 13 I/O modules per Q.raxx 3U chassis with up to 16 channels per I/O module
- User Friendly
  front panel indicators for module status, power, and input range error
- Fully Customizable
  multiple front panel termination options available
- Maximum Flexibility
  parallel communication available in TCP/IP, CAN, PROFIBUS, Modbus, and EtherCAT

Key Features

- 16 Digital inputs
  status, single bit or bitset
- 3-Way galvanic isolation
  500 VDC group to group, group to power supply, and bank
- Configurable logic
  TTL or 24 VDC (according IEC 61131-2, Type 1)
- Fast response time
  10 µs per channel
- Electromagnetic compatibility (EMC)
  according to IEC 61000-4 and EN 55011



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Digital Input Module

Gantner instruments

Technical Data

Digital Input

Channels	16
Mode(s) of operation	status
Logic levels	TTL or 24 VDC according to IEC 61131-2, Type 1
TTL logic voltage	0 to 0.8 VDC (Low) 2 to 5 VDC (High)
24 VDC logic voltage	-3 to 5 VDC (Low) 11 to 30 VDC (High)
Input type	PNP (current sinking)
Response time	10 µs
Input voltage	30 VDC max.
Input current	2 mA max.
Isolation voltage	500 VDC, group to group, group to power supply, channel to bus [1]

[1] noise pulses up to 1000 VDC, permanent up to 250 VDC

Communication Interface

Electrical standard	RS-485, 2-wire
Data format	8E1
Protocols	local bus (115200 bps to 24 Mbps) ASCII (19200 bps to 115200 bps) Modbus RTU

Power Supply

Input voltage	10 - 30 VDC, overvoltage and overcurrent protection
Power consumption	2 W (approx.)
Input voltage influence	< 0.001 % / V

Environmental

Operating temperature	-20°C to +60°C
Storage temperature	-40°C to +85°C
Relative humidity	5 - 95 % at 50°C (non-condensing)

Remarks

Validity of all listed specifications are subject to a warm-up period of at least 45 minutes
Specifications subject to change without notice

Ordering Information

Article number	213523

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