

# Data Logger MDL 8/3

# Data logger with various connection options

The data loggers of the MDL family are reliable everywhere, where measuring data have to be precisely gathered, saved, processed and documented under extreme environmental conditions. The MDL 8/3, the most comprehensive data logger has got eight analogue inputs and three for wind parameters.

## Features and advantages

- Diverse possibilities of saving data: by interval, by condition or by event
- Actual value, minimum, maximum, mean value, sum, intensity, peak
- Comprehensive alarm functions via SMS, modem call or switch contact
- · Quick retrieval of the actual measuring values via SMS
- Failsafe data saving for up to 600.000 records
- Quick and assistant-supported parametrisation
- Easy connection of diverse sensors by automatic internal input configuration
- Extension options
  - - MDL-AE4: 4 x additional analogue inputs incl. channel extension
  - o MDL-AE8: 8 x additional analogue inputs incl. channel extension
  - Channel extension for MDL 8/3 for additional measurement variables
  - Second serial interface for serial sensors or connection of radio device (e.g. SOMMER DFM-433) to connect to other weather stations via radio

## Fields of application

The MDL 8/3 has been developed for comprehensive request for environmental monitoring. It is a station manager to establish big or spread measuring stations. With a robust, reliable and economic design and technics, the MDL 8/3 is optimized for the usage in remote areas off any infrastructure. To fulfil specific requirements of measuring the data logger has a variety of functions for gathering, saving, alarming, managing and transferring of measurement data. For the operation in the field, the data logger mostly comes in a switch cabinet. Optionally the functions of the MDL 8/3 can be extended by up to 40 analogue inputs and two serial interfaces by the add-on modules MDL-AE4 or MDL-AE8.

#### **Technical details**

### **Connection possibilities**

8 x analogue inputs



- 3 x inputs wind direction and wind speed
- 1 x counter input (precipitation)
- 1 x switch output for e.g. GSM modem for energy saving remote data retrieval
- 1 x switch output for alarm
- 1 x serial interface for connection modem (analogue, GSM, GPRS) for remote data retrieval
- Extension possible for up to 40 measuring channels

### Inputs

- Analogue voltage 0 ... 2.5 V (22 Bit correlates 1 μV)
- Analogue current 0 ... 20 mA or 4 ... 20 mA (22 Bit correlates 0.1 μA)
- Analog resistance 0 ... 10 kOhm
- Frequency wind 2 ... 1500 Hz, resolution 0.1 Hz
- Impulse precipitation 0 ... 10 Hz

#### **Others**

- Outputs solid state relay, max. 1.8 A /24 VDC
- Interface (digital) RS 232; 9.6 115 kBd
- Memory 2 MB (correlates app. 600.000 records)
- Supply data logger 5.5 ... 20 V; max. 30 mA (without sensors, measuring time approx. 2 sec.); standby 100 μA
- Supply sensors 5 or 15 VDC; 2.5 V reference voltage, 1 mA or 0.4 mA reference current, max. 50 mA each sensor