Analogue signals that add up

Evaluation unit for analogue standard signals

- Monitoring, analysis and offsetting of two analogue values
- Ideal for determining differential values, e.g. pressure, flow, level or temperature values
- Limit value indication via two separate relay outputs
- Extensive and convenient parameter setting via IO-Link
- Clearly visible OLED display for actual value indication and parameter setting

IP20

IO-Link

ifm – close to you!

Technical data DL3003	
Input	2x analogue (4...20 mA or 0...10 V)
Output	2x relay, 1x analogue (4...20 mA), IO-Link, 24 V DC (for sensor supply)
Operating voltage	110...250 V AC or 24 V DC
Protection rating	IP20

Monitoring analogue process values

Everywhere in industry, electronic sensors are used to detect process values such as temperature, pressure or flow.

Process value monitoring often takes place directly in the sensor. However, sometimes separate monitoring devices are required, for example if two measured values are to be offset against each other and the resulting value is to be monitored.

Calculating and evaluating measured values

The evaluation unit has various operating modes and two analogue sensors can be connected.

This way, two switching points can be assigned to a measured signal, or a limit value can be assigned to two measured values. The two measured signals can be scaled and linked with each other using mathematical functions such as addition or subtraction.

The process value calculated in this way can be monitored with up to two switching points and can be output as an analogue signal (4...20 mA).

Measured values can be transmitted digitally to a higher-level controller via IO-Link. The device's extensive parameter setting is also conveniently carried out via IO-Link.

Differential pressure measurement on filters
Two pressure sensors measure the pressure before and after the filter. If the filter becomes clogged over time, the differential pressure increases.

Pressure measurement in a fermentation tank
In addition to the hydrostatic pressure at the bottom of the tank, the pressure of the gas above the medium, which increases as a result of fermentation, is measured and subtracted from the hydrostatic pressure to determine the level.

BEST FRIENDS

moneo|RTM
Analysis software for simple condition monitoring

Pressure sensors
Precise detection of pressure values and levels

Temperature sensors
Reliable temperature detection

For further technical details, please visit: ifm.com/fs/DL3003