

# Flowmax<sup>®</sup> 22i / Flowmax<sup>®</sup> 44i

Ultrasonic Flowmeter



## Flowmax 22i / Flowmax 44i

Flowmax 22i and Flowmax 44i are flowmeters for measuring liquid flow by calculating the volume flow rate in the liquid. Based on the Ultrasonic-Technology Flowmax is able to measure conductible and not conductible liquids contactless. Flowmax suits for continuous volume measurements and with its 250 Measurements/Second also for very dynamic applications. Flowmax has no moving parts and is free of wear. The design of the pipe minimizes dead volumes over the whole geometry. All parts having contact to the medium are PSU. Therefore Flowmax can be used for a big amount of different medias like: distilled water, body cares, cosmetics, fluid food, alkaline liquids, toxic or aggressive media like concentrated acids and leaches. CIP cleaning processes are possible. Flowmax advantage is its high measuring accuracy and repeatability.

**MIB GmbH**

Messtechnik & Industrieberatung

# Flowmax<sup>®</sup> 22i / Flowmax<sup>®</sup> 44i

## Ultrasonic Flowmeter

### Flowmax 22i / Flowmax 44i

- ◆ Measuring of conductible and non-conductible fluid media, e.g. DI-water, cosmetic, body care, polymers, industrial cleanser, mineral oils, acids and leaches, food like cooking oils, colorings, flavor enhancers and many other liquids
- ◆ to control the volume in food manufacturing, e.g. food oil, vinegar, food colorings, flavor enhancers
- ◆ very dynamic processes like round or line filling machines
- ◆ reproducible batches in dosing plants with dosing times even below 1 second for the whole dosing process. With the available I/O's Flowmax 44i can control even the valve.
- ◆ Controlling and logistic tasks, e.g. controlling of recipes or assigning of quantities
- ◆ Empty pipe detection additional to the flow measurement
- ◆ Limit control for keg switching, process control like dry running protection
- ◆ In combination with diaphragm pumps with fast changing hydraulic conditions

The measuring result is provided over a scalable pulse output. Programming and visualizing of the analog output is done via a RS485 interface. It is possible to share all measured information with IT-systems on the computer.

Flowmax 44i shows the measured flow in series on a background lighted display with actual flow and volume counter. Standard programming can be done by the keypad. Additional to the editable pulse output there are, current output, two digital outputs and one digital input available. All parameters of the flowmeter are individually configurable with MIB PC-Software FlowSoft and USBtoRS485-Converter.

The integrated gas control with empty pipe detection on the alarm output offers additional information.

### Housing

Material	PSU (Polysulfon)
Protection Class	IP 67
Medium Temperature	0° ... 130°C
Pressure	10 bar
Nennweite	12 mm (additional in prepare)
Connection	Aussengewinde 3/4" (additional in prepare)
End of measuring range	36 l/min
Dimensions L/W/H	145/80/84 mm
Weight	450 g

### Electronics Flowmax 22i

Power supply	24VDC, 3,6W
Connection	Plug 5 pins
Outputs	1 digital output, alternatively as pulse output empty pipe alert RS485-interface

### Electronics Flowmax 44i

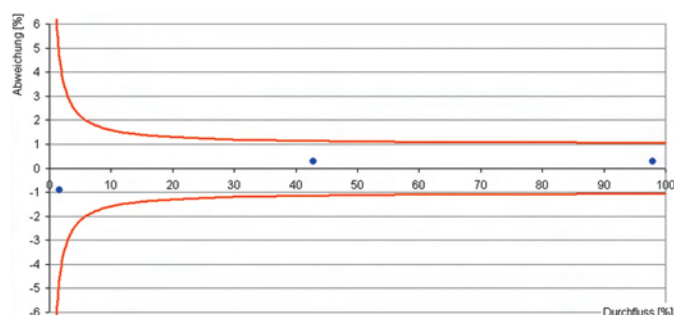
Power supply	24VDC, 3,6W
Connection	plug 5 pins and jack 8 pins
Current output	0/4-20 mA
Outputs	2 digital output, alternatively as pulse output empty pipe alert RS485 interface
Input	1 digital input for starting dosage

### For both variations

Max. Error of measurement	$\leq \pm 1\%$ v.M. $\pm 3\text{mm/s}$ (o.r. = of reading) Reference conditions (VDI/VDE 2642)
Repeatability	$\leq 0,5\%$

All flowmeter parameters of Flowmax 44i and Flowmax 22i are individually configurable with the USBtoRS485-Converter and the MIB PC-Software FlowSoft. This package can be ordered separately and is not part of the delivery of the Flowmax 22i/44i.

Example: Measuring points of a calibrated Flowmax in error graph according definitions



Technical subjects to be changed!

### Further Information:

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