



## Positive Displacement Meter Flowal® Plus, Series OR Plus

Positive displacement meter for industrial fluids



- Direct measuring of volume
- No straight inlet and outlet sections required
- Long service life and high reliability due to robust construction
- Easy installation
- Accuracy up to  $\pm 0.5\%$  at 3 mPa·s /  $\pm 0.25\%$  limited measuring range
- Repeatability up to  $\pm 0.02\%$
- Viscosity up to 3000 mPa·s

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### Constructive design

- Housing in stainless steel PN68
- Oval wheels in stainless steel
- Seals in Viton, EPDM

### Description

The positive displacement meters Flowal® Plus series OR Plus allow accurate, reliable and economical measurement of flowrate, volume and mass. They are based on a robust concept with simplicity. The OR series are compact oval wheel meters with female threads and directly mounted compact multifunctional electronics MFE (8-digit LCD) or with pulse output (Open collector NPN, NAMUR, REED).

### Application examples

- automotive industry
- engine and oil test benches
- cooling lubricants
- industrial cleaning agents
- filling corrosion inhibitors e.g. for heat transfer systems
- filling of antifreeze

### Version with multifunctional electronic MFE

- OR-MFE-1: battery-powered display
- OR-MFE-2: battery-powered display pulse output
- OR-MFE-3: power supply 24V DC, pulse output, current output 4-20mA, PT 1000 input for density correction

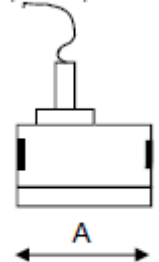
### Version with pulse output

- OR-RM: REED pulse output **Ex**
- OR-N1: NPN pulse output **non Ex**
- OR-P1: PNP pulse output **non Ex**
- OR-PT: PNP pulse output **non Ex**,  $T_{\text{max}}: 130^\circ\text{C}$
- OR-A1: NAMUR Sensor **Ex**

### Application

The Oval Wheel Meters are ideally suited for dispensing, filling or blending applications of industrial liquids. The counters are highly suitable for viscous products, and are characterized by low pressure losses. They are suitable for small amounts and are insensitive to pulsating flows.

blind version with pulse output



compact version with electronics MFE





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Technical data									
Flowal□ Plus, series OR Plus - for industrial fluids									
		OR 015	OR 06	OR 1	OR 2	OR 5	OR 10	OR 50	OR 115
Materials	housing	stainless steel (SS)							
	oval wheels	stainless steel (SS)							
	bearing shafts	stainless steel (1)							
	seals	Viton / EPDM							
Technical data	nominal size	G ¼“	G ½“	G ½“	G ¾“	G 1“	G 1“	G 2“	G 2“
	measuring range [l/min]	0,03–1	0,2–7	0,4–14	1–30	2 60	3–120	15-300	35-660
	nominal pressure	PN 68							
	temperature	minus 40°C up to 130°C							
Installation data A	Face to face [mm]	78	78	78	99	112	112	184	196
Pulse output	RM, ex		•	•	•	•	•	•	•
	N1, non ex	•	•	•	•	•	•	•	•
	P1, non ex	•	•	•	•	•	•	•	•
	PT, 130°C, non ex	•	•	•	•	•	•	•	•
	A1, ex	•	•	•	•	•	•	•	•
or									
Multi-functional electronic*	MFE-1 exi	battery-powered display							
	MFE-2 exi	battery-powered display, pulse output							
	MFE-3 exi	Power supply 24 V DC, pulse output, current output 4-20 mA, PT 1000 input for density correction							

**Order code example.: OR1 SS1SS MFE-2**

\*degree of protection MFE electronic: IP 65

### Important instructions!

Technical changes and errors reserved.

Pictures can be similar.

The operating instructions belonging to this device must be observed! Download at [www.schmidt-messtechnik.com](http://www.schmidt-messtechnik.com).