

**Flow measurement for conductive liquids**

**Dn from 25 to 200 mm**

**Connections DIN 11851 and CLAMP DIN 32676**

**Measurement accuracy:  $\pm 0.2\%$ ;  $\pm 0.5\%$**

**PFA coatings**

**Power supply 85-265vAC;12vDC;24vDC;24vAC**

**Datalogger on USB pendrive**

**Removable O-LED display module**

**Remote control via Smartphone**



RSmag flowmeters are suitable for applications in food and pharmaceutical industries. DIN or Clamp ISO 2852 process connection are suitable for applications with milk, beer or other drinks. Manufactured completely in stainless steel with the option for PFA lining makes RSmag suitable for pharmaceutical application

## TECHNICAL FEATURES

### Flow rate range

RSmag is able to process signals from fluids with flow rates of up to 10m / s in both directions (bidirectional meter).

### Range dimension / lining material

PFA DN25 - DN250

### Sensor pipe material

SS304

### Housing material

epoxy painted aluminum

### Electrodes material

SS316L - Hastelloy C - Titanio - Tantalio

### Measure range

<0.1m<sup>3</sup>/h - >600m<sup>3</sup>/h

### Accuracy

$\pm 0.5\%$  standard;  $\pm 0.2\%$  opt

### Repeatability

$\pm 0.1\%$

### Fluid conductivity

>5 $\mu$ S/cm

### Power supply

85-26vAC, 24vDC, 12vDC.

### Consumption

6W, max. 8W.

### Temperature range

Remote version operating temperature: RUBBER -10 to +80°C;

PTFE -40 to +150°C

Compact version operating temperature: RUBBER -10 to +80°C;

PTFE -40 to +100°C

Storage temperature: -40 to 85°C

### Communication

modbus or Hart (opt.)

### Data Logger

Internal data logger to USB pen drive for flow measurements and analog inputs storing;

the measurement storage interval can be set from 15 to 3600 seconds

### Output

4-20mA: 0-500 $\Omega$

Frequency output: 0.1-10000 Hz

Pulse output: 24vDC galvanically isolated or open collector galvanically isolated 24v 20mA (opt)

Alarm output: 2 relays, 3A 230vAC N.O.

### Input signals

RSmag has 2 active analog inputs at 24vDC for 2-wire transmitters connection (eg. Temperature or

pressure) and 1 digital input for an external contact connection for the integrated batch function restart and for

partial totalizer management.

### Reverse Flow

Allows measure and totalization of reverse flow

### Output Testing

Relays output: Transmitter can switch relays at testing value. Current Source: Transmitter can be commanded to supply a specified test current between 4.0 and 20.0 mA.

Frequency Source: Transmitter can be commanded to supply a specified test frequency between 1 and 10000 Hz.

### Low Flow Cutoff

Adjustable. Below selected value, instantaneous flow and outputs are driven to the zero flow rate signal level

### Humidity Limits

0-100% RH to 150 °F (65 °C), not condensing.

### Damping

Adjustable between 1 and 99 seconds

### Compact version IP rating

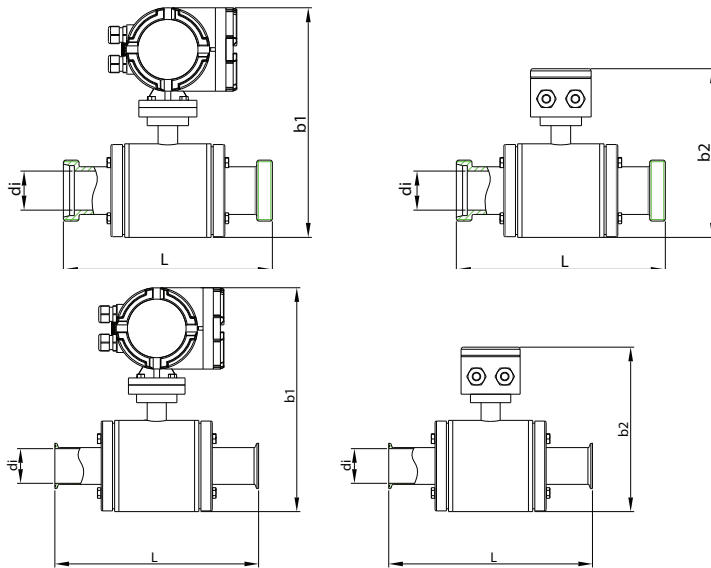
IP67

### Remote version IP rating

sensor IP67 / IP68 (by request) - converter IP67

### Anti-condensation filter

Anti-condensation filter installed on converter



DN (mm)	di (mm)	L (mm)	b1 (mm)	b2 (mm)
10	10	168	250	165
15	16	168	258	173
20	20	168	258	173
25	26	191	260	175
32	32	192	270	185
40	38	284	315	230
50	50	288	315	230
65	66	296	330	245
80	81	366	350	265
100	100	384	370	285

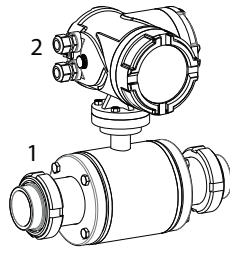
DN (mm)	di (mm)	L (mm)	b1 (mm)	b2 (mm)
10	9	168	250	165
15	15	168	258	173
20	19	168	258	173
25	25	191	260	175
32	31	192	270	185
40	37	284	315	230
50	49	288	315	230
65	66	296	330	245
80	81	366	350	265
100	100	384	370	285

## Rsmag Electromagnetic Flowmeter

For conductive fluids even with a content of suspended matters.  
 With sensor body in SS304  
 For chemical/pharmaceutical and food applications  
 Ambient temperature range: -20°C to 75°C  
 IP67 electronic housing with osmotic filter  
 2 alarm relays (min/max)

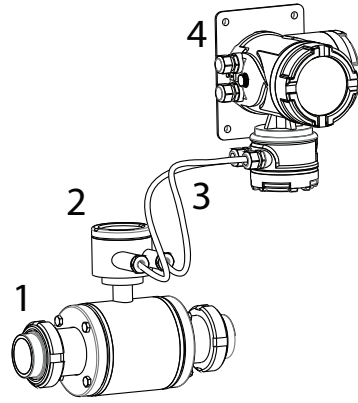
Version	
<b>E</b>	Remote - accuracy 0.2% - standard cable length 5m (over 5m, price each additional meter)
<b>F</b>	Remote - accuracy 0.5% - standard cable length 5m (over 5m, price each additional meter)
<b>W</b>	Compact - accuracy 0.2% - max temperature of the fluid 100°C
<b>Y</b>	Compact - accuracy 0.5% - max temperature of the fluid 100°C
<b>B</b>	Remote - acc. 0.2% - Data logger - n.2 4-20mA input - standard cable length 5m (over 5m, price each additional meter)
<b>C</b>	Remote - acc. 0.5% - Data logger - n.2 4-20mA input - standard cable length 5m (over 5m, price each additional meter)
<b>L</b>	Compact - acc. 0.2% - max temperature of the fluid 100°C - Data logger - n.2 4-20mA input
<b>N</b>	Compact - acc. 0.5% - max temperature of the fluid 100°C - Data logger - n.2 4-20mA input
DN flange / Max. pressure / Lining ( temperature range of the fluid)	
<b>0025E2</b>	DN25 / 1.6MPa / PFA (-40° to +150°C); range 0.6-18m <sup>3</sup> /h
<b>0032E2</b>	DN32 / 1.6MPa / PFA (-40° to +150°C); range 1-30m <sup>3</sup> /h
<b>0040E2</b>	DN40 / 1.6MPa / PFA (-40° to +150°C); range 1.8-42m <sup>3</sup> /h
<b>0050E2</b>	DN50 / 1.6MPa / PFA (-40° to +150°C); range 3-66m <sup>3</sup> /h
<b>0065E2</b>	DN65 / 1.6MPa / PFA (-40° to +150°C); range 5.8-120m <sup>3</sup> /h
<b>0080E2</b>	DN80 / 1.6MPa / PFA (-40° to +150°C); range 8.9-180m <sup>3</sup> /h
<b>0100E2</b>	DN100 / 1.6MPa / PFA (-40° to +150°C); range 11-282m <sup>3</sup> /h
<b>0125E2</b>	DN125 / 1.6MPa / PFA (-40° to +150°C); range 20-450m <sup>3</sup> /h
<b>0150E2</b>	DN150 / 1.6MPa / PFA (-40° to +150°C); range 30-600m <sup>3</sup> /h
<b>0200E2</b>	DN200 / 1.6MPa / PFA (-40° to +150°C); range 50-1100m <sup>3</sup> /h
Process connection	
<b>D</b>	DIN 11851
<b>E</b>	SS304 CLAMP DIN 32676
<b>Z</b>	Special
Electrodes material	
<b>1</b>	SS316L stainless steel
<b>3</b>	Hastelloy C
<b>4</b>	Titanium
<b>5</b>	Tantalum
<b>9</b>	Special
Power supply	
<b>A</b>	85-265vAC
<b>B</b>	24vDC
<b>C</b>	24vAC (only for B,C,L,N versions)
<b>D</b>	12vDC
<b>Z</b>	Special

<b>Output</b>	
<b>B</b>	4-20mA with galvanic separation + pulse + MODBUS RTU + BLUETOOTH (for B/C/L/N version only)
<b>C</b>	4-20mA + pulse output + HART (B/C/L/N versions standard with galvanic separation-PENDING)
<b>E</b>	420mA + pulse + MODBUS RTU (B/C/L/N versions standard with galvanic separation)
<b>Pipe protection degree</b>	
<b>1</b>	IP67
<b>2</b>	IP68 (only for remote version)



**COMPACT VERSION**

- 1. Sensor
- 2. Converter



**REMOTE VERSION**

- 1. Sensor
- 2. Connection housing
- 3. Connection cables
- 4. Converter, wall mounting

