

Handheld Ultrasonic Flow Meter

RUF300



Support Data Storage



High Accuracy, Better Than 1%



Wide Measuring Range



Convenience for routing inspection

**Product
Datasheet**

ROCKSENSOR AT A GLANCE

(ABOUT US)

Rocksensor is one of the global leaders specializing in process Instrumentation, Research and Development and Designing of Industrial Automation Equipment. We provide highly precise pressure sensors and transmitters, flow metres, level transmitters & temperature transmitters with a prime focus to help our clients efficiently, safely and economically run complex industrial processes.

Rocksensor headquartered in Germany (originated in Switzerland), has its footprint in various geographical regions such as the US, Russia, South Korea, Italy, Germany, Singapore, Malaysia, China, Taiwan, Australia, UAE, Brazil, and India. Our clients come from some of the major industries such as Oil and Gas, Petrochemicals, Pharmaceuticals, FMCG, Automobiles, Water, Cement, Metal & Mining and mainly from the Power Industry like Nuclear, Thermal, Hydro and Solar.

Rocksensor deals in a wide range of highly accurate industrial automation instruments ensuring that even the complex industrial processes happen efficiently.

To fulfill the needs of our clients we make sure that our instruments work in even the harsh environmental conditions offering accurate recordings and communication.

We, at Rocksensor, believe in creating bonds that last a lifetime and create a success story for each and every client. Rocksensor aims to achieve a perfect fit in global market landscape and establish our footprints across the globe.



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KEY APPLICATION INDUSTRIES

- Oil and Gas sector
- Cement
- Metal
- Pulp and Paper
- Agriculture
- Textiles
- Chemicals
- Power
- Water
- Pharmaceutical
- Fertilizer
- Plastics and HVAC

1. Application

RUF300 series handheld ultrasonic flow meter is designed to work with clamp-on sensors to measure the liquid flow within a closed pipe without any insertion mechanical parts. Mainly be used for routing inspection or pipe monitoring, very convenience for use. It is controlled by a micro-processor system which contains a wide range of data that enables it to be used with pipes with an outside diameter ranging from 15mm up to 6000mm (depending on model) & constructed of almost any material.



Clamp on Transducer

- Easy to install & no need to cut off the flow, no pressure loss.
- Different Transducer from DN15 ~ DN6000.
- Different Transducer for temperature -30 ~ 160°C.
- Reduces installation time, improve installation accuracy.



2. Technical Specifications

Accuracy	$\pm 1\%$
Velocity Range	0 ~ $\pm 10\text{m/s}$
Pipe Size	DN15-DN6000mm
Liquid Temperature	(-)30 ~ 160°C
Liquid Type	Water, sea water, waste water, alcohol, beer, various kinds of oil etc which can conduct ultrasound single uniform liquid
Pipe Material	Steel, stainless steel, cast iron, copper, PVC, aluminum, FRP etc, all kinds of dense pipeline, can be liner inside
Output Signal	1 channel OCT pulse output, pulse width 6-1000ms, (default is 200ms)
Communication	Isolation of 232 communication interface, can upgrade flowmeter through PC
Power Supply	Three internal 1.2V, 2000mAH rechargeable Ni-MH battery. Can work 12 hours fully charged. Can achieve continuous measurement with AC100-240V power adapter
Temperature	Main unit: (-)20 ~ 60°C; Sensor: (-)30 ~ 160°C
Protection	IP65
Power Consumption	1.5W
Data Storage	32K BIT built-in data storage, can store two thousand rows of data
Installation	Upstream 10D, downstream 5D, 30D away from the pump outlet (D for diameter)



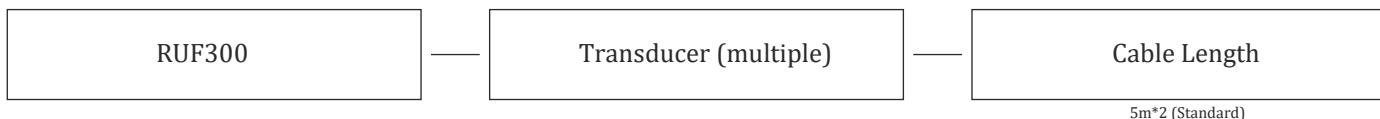
3. Optional Transducer

Type	Picture	Specification	Model	Pipe Size	Temperature	Dimension
Standard Clamp-On Type		Small	S2	DN15 ~ DN100	(-)30 ~ 90°C	45x25x32mm
		Medium	M2	DN50 ~ DN700	(-)30 ~ 90°C	64x39x44mm
		Large	L2	DN300 ~ DN6000	(-)30 ~ 90°C	97x54x53mm
High Temperature Clamp-On Type		Small	S2H	DN15 ~ DN100	(-)30 ~ 160°C	45x25x32mm
		Medium	M2H	DN50 ~ DN700	(-)30 ~ 160°C	64x39x44mm
		Large	L2H	DN300 ~ DN6000	(-)30 ~ 160°C	97x54x53mm
Standard Bracket Type		Small	HS	DN15 ~ DN100	(-)30 ~ 90°C	318x59x85mm
		Medium	HM	DN50 ~ DN300	(-)30 ~ 90°C	568x59x85mm
		Extension	EB-1	DN300 ~ DN700	(-)30 ~ 90°C	188x59x49mm
High temperature Bracket Type		Small	HS-HT	DN15 ~ DN100	(-)30 ~ 160°C	318x59x85mm
		Medium	HM-HT	DN50 ~ DN300	(-)30 ~ 160°C	568x59x85mm
		Extension	EB-1-HT	DN300 ~ DN700	(-)30 ~ 160°C	188x59x49mm

4. Calibration

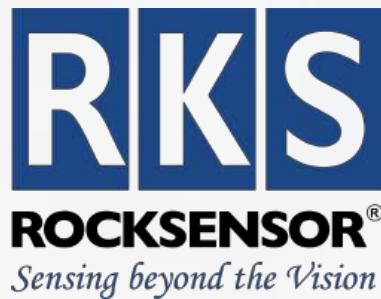
Each piece of handheld ultrasonic flow meter is calibrated & attached with calibration certificate.

5. Model Selection



Example: RUF300 - S2, M2, L2-5

Explanation: Handheld Ultrasonic Flowmeter with S2, M2, L2, 5m* cable.



Field Instrumentation Range

Pressure Measurement

- Smart Differential Pressure Transmitter
- Smart Gauge Pressure Transmitter
- Smart Absolute Pressure Transmitter
- Miniature Pressure Transducer without display
- Sanitary Gauge/ Absolute Pressure Transmitter

- Submersible Pressure Transmitter
- Remote Seal Differential P.T. with capillary
- Remote Seal Differential P.T. Direct Mount
- Remote Seal Gauge/Absolute P.T. with capillary
- Remote Seal Gauge/Absolute P.T. Direct Mount

Flow Measurement

- Coriolis Mass Flowmeter
- Thermal Gas Mass Flowmeter
- Positive Displacement Flowmeter
- Electromagnetic Flowmeter
- Vortex Flowmeter

- Turbine Flowmeter
- Variable Area Flowmeter
- Clamp On Ultrasonic Flowmeter
- Inline Ultrasonic Flowmeter
- Portable Ultrasonic Flowmeter

Level Measurement

- RADAR Level Transmitter Horn Antenna
- Compact RADAR Level Transmitter
- RADAR Level Transmitter Sanitary
- RADAR Level Transmitter
- Guided Wave RADAR Level Transmitter
- Guided Wave RADAR Level Transmitter
- RADAR Level Transmitter Lens Antenna

- RADAR Level Transmitter Rod Antenna
- Ultrasonic Level Transmitter
- Microwave Barrier Level Switch
- Admittance Level Switch Series
- Vibrating Rod Level Switch Series
- Tuning Fork Level Switch Series

Temperature Measurement

- Head Mount Temperature Transmitter
- Temperature Transmitter for Sanitary Applications

- DIN Rail Temperature Transmitter
- Field Mount Temperature Transmitter

Rocksensor India Pvt. Ltd.

B -36, Sector 67, Noida, Uttar Pradesh - 201301

For more details, contact us on:

+91 928 948 8117 | +91 1204121469

: info@rocksensor.in

: www.rocksensor.in

Global Offices

Head Office
Rocksensor GmbH, Germany

North America:
Rocksensor Automation LLC, USA

APAC:
Rocksensor Automation Co.Ltd., Shanghai

: Rocksensor India

: Rocksensor

: Rocksensor

: Rocksensor

: Rocksensor India