



## Clamp-on Ultrasonic Flow Meters

Katronic Technologies is a specialised manufacturer of clamp-on ultrasonic flow meters used to externally measure the flow of acoustically conductive liquids inside fully filled pipes. The instruments are developed and manufactured in the UK to the highest quality standards. The flow meters of the KATflow series are easy to set up and work non-invasively and non-intrusively on pipes of various materials and diameters from 10 mm to over 3,000 mm.

**Accuracy flow velocity (mean):**

±0.5 % of measured value

**Accuracy volumetric flow:**

±1 ... 3 % of measured value,  
±0.5 % process calibrated

**Repeatability:**

0.15 %, ±0.015 m/s

**Resolution:**

0.25 mm/s

**KATflow 150**

**KATflow 200**

**KATflow 230**


Model type	Fixed-installation	Hand-held	Portable
Pipe diameter range	10 mm ... > 3,000 mm	10 mm ... > 3,000 mm	10 mm ... > 3,000 mm
Temperature range	- 30 ... 200 °C	- 30 ... 200 °C	- 30 ... 200 °C
Measurement channels	1 or 2 <sup>1)</sup>	1	2 <sup>1)</sup>
Flow velocity range	0.01 ... 25 m/s	0.01 ... 25 m/s	0.01 ... 25 m/s
Accuracy range	0.25 ... 25 m/s	0.25 ... 25 m/s	0.25 ... 25 m/s
Weight	2.3 kg	650 g	2.0 kg
Battery life	n/a	Up to 24 h	Up to 24 h
Power supply	100 ... 240 V AC or 9 ... 36 V DC	100 ... 240 V AC (mains socket) <sup>2)</sup>	100 ... 240 V AC (mains socket) <sup>2)</sup>
Display	LCD graphic display 128 x 64 dots, backlit	LCD graphic display 128 x 64 dots, backlit	LCD graphic display 128 x 64 dots, backlit
Process inputs	PT100 temperature <sup>3)</sup> 0/4 ... 20 mA	No	PT100 temperature <sup>3)</sup>
Process outputs	0/4 ... 20 mA, pulse (OC), digital relay, frequency, voltage, HART	No	0/4 ... 20 mA, pulse (OC), digital relay
Communication	RS 232, USB, RS 485, Modbus RTU	RS 232, USB	RS 232, USB
Internal data logger	Yes	Yes	Yes
Wall thickness gauge	n/a	Yes	Yes
Energy metering	Yes <sup>4)</sup>	No	Yes <sup>4)</sup>
Ex approved version	Yes	No	No

1) For simultaneous measurement on two separate pipes or for measurement on one single pipe in a two-path transducer mounting configuration.

2) For charging of internal batteries and supply of flow meter with power when connected to mains electricity socket (100 ... 240 V AC input).

3) + 4) For contactless measurement of thermal energy consumption. Displayable units: W, kW, MW, J, kJ, MJ, BTU (upon request).

**KATflow 150**

- Fixed-installation clamp-on ultrasonic flow meter with one or two measurement channels using transit-time correlation measurement with dual DSP-technology
- Bi-directional measurement with totalizer function and input, output and serial communication options including RS 485, Modbus RTU and HART
- Lockable and sturdy IP66 transmitter enclosure with keypad and multifunctional graphic LCD display
- Heat quantity measurement capability and Ex approved transmitter and sensor versions for Zone 1 and 2
- AC or DC, optional battery and solar panel power supply for installation at remote locations

**KATflow 200**

- Hand-held clamp-on ultrasonic flow meter with one measurement channel using transit-time correlation measurement with dual DSP-technology
- Bi-directional measurement with totalizer function, internal data logger and download/terminal software *KATdata+*
- Auto-detected ultrasonic clamp-on sensors and optional integrated wall thickness gauge
- Available with crush-proof IP67 case or lightweight soft case holding all necessary accessories including clamp-on chains, clips and acoustic coupling paste
- Graphic LCD display with real time graph of the flow data and diagnostic functions

**KATflow 230**

- Portable clamp-on ultrasonic flow meter with two measurement channels using transit-time correlation measurement with dual DSP-technology
- Bi-directional measurement with totalizer function, internal data logger and download/terminal software *KATdata+*
- Auto-detected ultrasonic clamp-on sensors and optional integrated wall thickness gauge
- Available with crush-proof IP67 case or lightweight soft case holding all necessary accessories including clamp-on chains, clips and acoustic coupling paste
- Heat quantity measurement capability and optional process outputs, graphic LCD display and diagnostic functions

**По вопросам продаж и поддержки обращайтесь:**

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