Handheld Ultrasonic Flow Meter

บริษัท แฟ็คโต คอมโพเนนส์ จำกัด | FACTO COMPONENTS CO., LTD.
845/3-4 ชั้น 3 ถ.เทพารักษ์ ต.เทพารักษ์ อ.เมือง จ.สมุทรปราการ 10270
TEL. 02-384-5701, 02-753-3652 | LINE OA: @134ovdbx | Website : www.factocomponents.co.th | Email : info@factocomponents.co.th

Overview

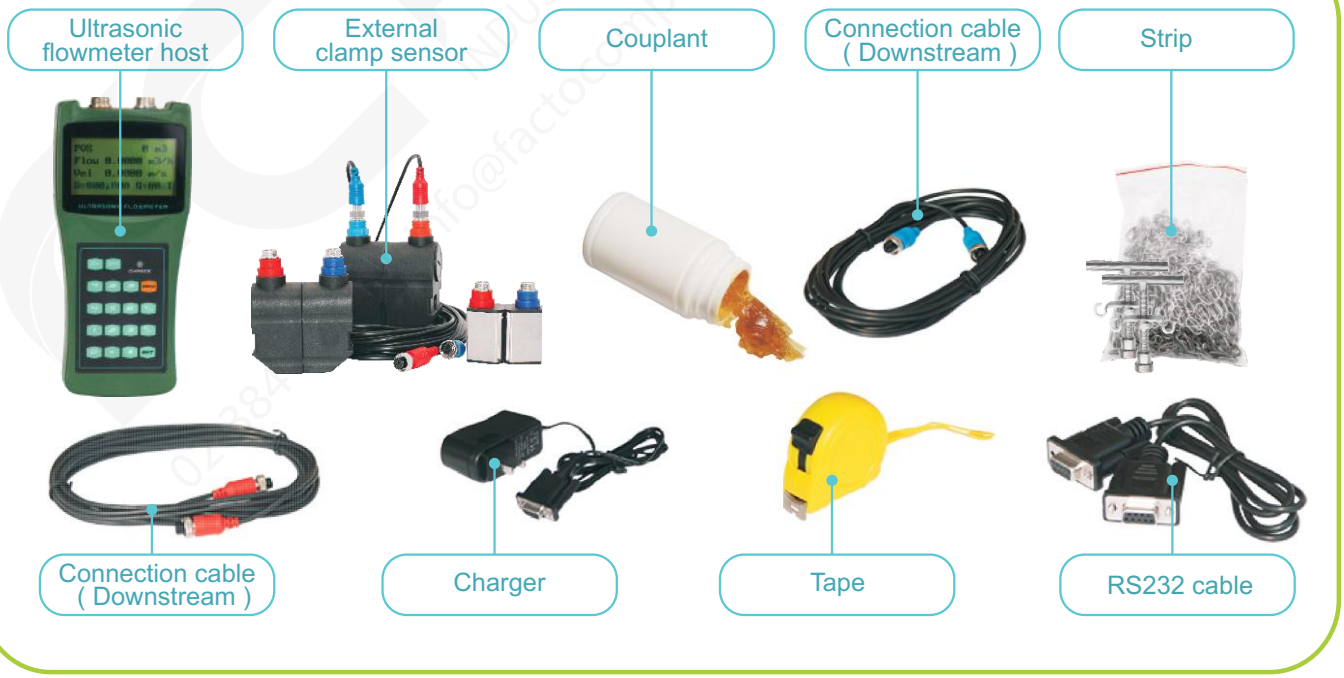
Handheld ultrasonic flow meter works on transit-time principle. It's designed for 12 hours of continuous operation with a built-in battery capable of recharging in 3 hours with the supplied power adapter. SD memory card allows flow, velocity and total data to be stored for later recall. RS232 cable permits communication with a PC to save and read data files. The clamp on design doesn't require a system shutdown or penetration of the pipe in any way when installing and operating this meter.

Application

Features

- Accuracy better than 1%
- Measurement range from DN15-DN6000
- Built-in high-capacity Ni-MH rechargeable batteries will last more than 12 hours (Fully charged).
- Non invasion measurement, Can achieve measurement with clamp on sensors
- Data Storage, 32K BIT built-in data storage, can store two thousand rows of data
- LCD dispaly can display the instant flow, total flow, flow velocity and working condition

Handheld Ultrasonic Flow Meter Components



The main components feature

① Transducer interface

② Communication interface

③ LCD Display

(Sight size:85*19mm LCD display 2*20 English letter)

④ High Strength Protective Case

⑤ Delicate Button Cover

Exquisite diaphragm button response quickly, good keyboard tactile, long working life.

Transducers

Clamp on transducer

Clamp on transducer with bracket

Specifications

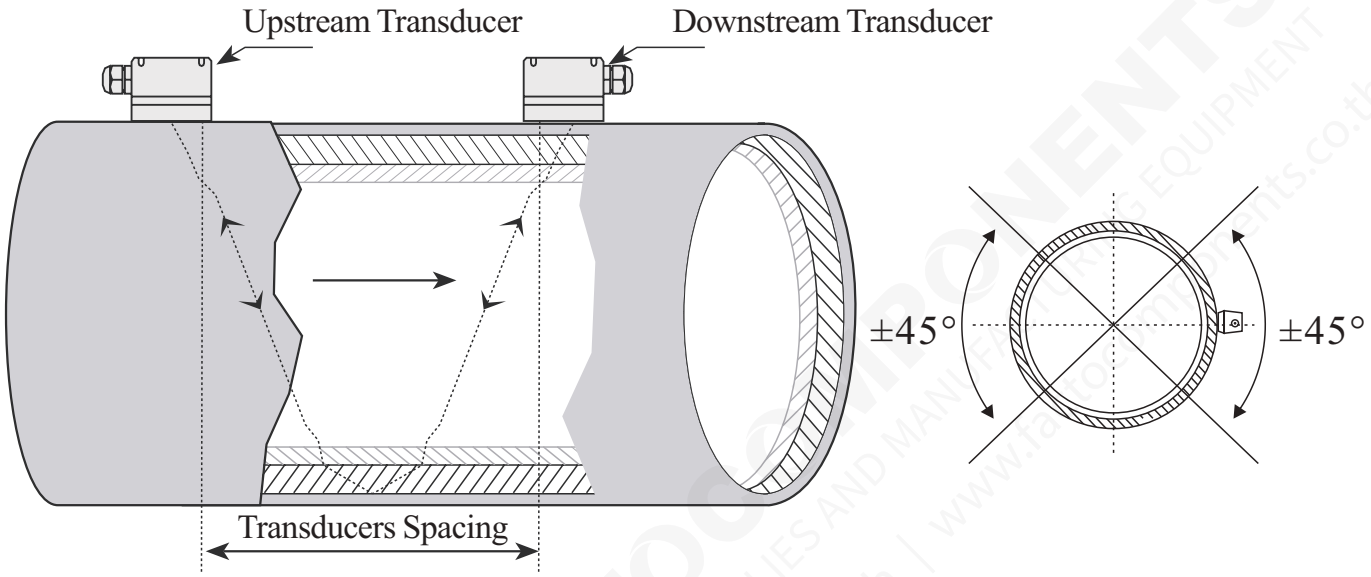
Type		Performance Parameter
Transmitter	Principle	Ultrasonic transit-time principle, Four-byte IEEE754 floating-point arithmetic
	Accuracy	Flow: better than ±1%
	Display	LCD display with Chinese, English, Italian language
	Output	One OCT pulse output (pulse width 6-1000ms, default 200ms)
	Data Interface	Isolation of RS232 communication, can upgrade flowmeter through PC
Pipeline Conditions	Pipe Material	Steel, stainless steel, cast iron, copper, PVC, aluminium, FRP etc. (liner allowed)
	Diameter	DN15~DN6000 / 1/2"~240"
	Installation	Upstream 10D, downstream 5D, 30D away from the pump outlet (D for diameter)
Medium	Fluid	Water, sea water, acid liquid, beer,alcohol, oil and any other liquid that can spread sonic
	Temperature	Temperature: -30~160℃
	Turbidity	10000 ppm and with little bubbles
	Velocity	0~±10 m/s
Operating Environment	Temperature	Transmitter: -20~60℃ ; Transducer: -30~160℃
	Humidity	Transmitter: 85%RH; transmitter protection grade: IP67
Power	Three intermal 1.2V, 2000mAH rechargeable Ni-MH battery. Can work 12 hours fuly charged. Can achieve continuous measurement with AC100-240V power adapter	
Comsumption	1.5W	
Case Material	Flame retardant ABS	
Weight	Transmitter: 514g	

Optional Transducers

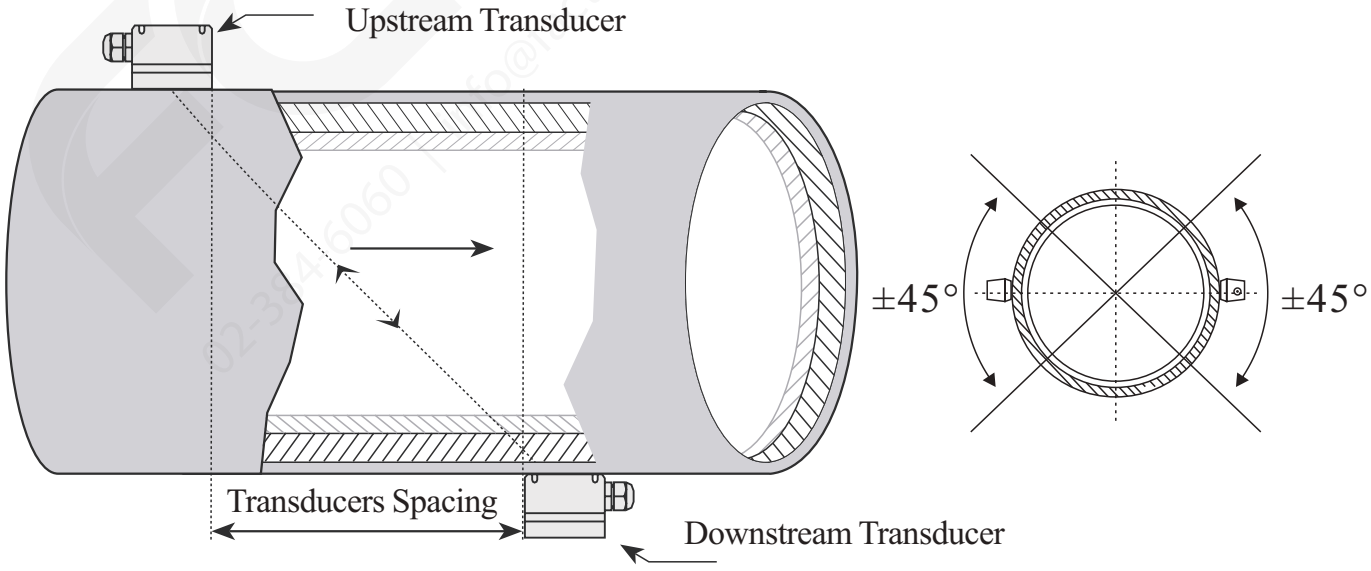
Type	Picture	Size	Model	Measuring range	Temperature	Dimension
Standard Clamp on Type		Small	S2	DN15-DN100 1/2"-4"	-30℃~90℃	45×25×32mm
		Middle	M2	DN50-DN700 2"-28"	-30℃~90℃	64×39×44mm
		Large	L2	DN300-DN6000 12"-240"	-30℃~90℃	97×54×53mm
High Temperature Clamp on Type		Small	S2H	DN15-DN100 1/2"-4"	-30℃~160℃	45×25×32mm
		Middle	M2H	DN50-DN700 2"-28"	-30℃~160℃	64×39×44mm
		Large	L2H	DN300-DN6000 12"-240"	-30℃~160℃	97×54×53mm
Standard Clamp on Type		Small	HS	DN15-DN100 1/2"-4"	-30℃~90℃	318×59×53mm
		Middle	HM	DN50-DN300 2"-12"	-30℃~90℃	568×59×85mm
		Extension	EB-1	DN300-DN700 12"-28"	-30℃~90℃	188×59×49mm
High Temperature Clamp on Type		Small	HS-HT	DN15-DN100 1/2"-4"	-30℃~160℃	318×59×110mm
		Middle	HM-HT	DN50-DN300 2"-28"	-30℃~160℃	568×59×110mm
		Extension	EB-1-HT	DN300-DN700 12"-28"	-30℃~160℃	188×59×49mm

Optional Transducers

V method is usually used on pipes from DN15 to DN200



Z-method is usually used on pipes from DN200 to DN600.



Model Selection

100H	XX	XX	XX	Description
Handheld 100H Ultrasonic Handheld * 1 set Power Adaptor * 1 set RS232 communication cable * 1 set Tape * 1 set Clamp * 1 set Carrying Case * 1 set	100H			Handheld Flowmeter
Small clamp sensor, DN15-DN100 (½"-4"), -30~90°C	S2			Transducers
Middle clamp sensor, DN50-DN700 (2"-28"), -30~90°C	M2			
Large clamp sensor, DN300-DN6000 (12"-240"), -30~90°C	L2			
High Temperature small clamp sensor, DN15-DN100 (½"-4"), -30~160°C	S2H			
High Temperature middle clamp sensor, DN50-DN700 (2"-28"), -30~160°C	M2H			
High Temperature large clamp sensor, DN300-DN6000 (12"-240"), -30~160°C	L2H			
Bracket Small clamp Sensor, DN15-DN100 (½"-4"), -30~90°C	HS			
Bracket Middle clamp sensor, DN50-DN300 (2"-12"), -30~90°C	HM			
Bracket Middle clamp sensor, DN50-DN700 (2"-28"), -30~90°C	EB-1			
Bracket Small clamp Sensor, DN15-DN100 (½"-4"), -30~160°C	HS-HT			
Bracket Middle clamp sensor, DN50-DN300 (2"-12"), -30~160°C	HM-HT			
Bracket Middle clamp sensor, DN300-DN700 (extend to 28"), -30~160°C	EB-1-HT			
5m length, 2 Cables (Standard length)		SC		Signal Cable Length
Optional cable length		X		
IP65 Protection for transducers			ST	Protection Class
IP68 Protection for transducers			IP68	