



#### principle and characteristics

SN52 series electromagnetic flowmeter is a main flow meter, consists of a sensor and a converter two parts, based on Faraday's law of electromagnetic induction work, used to measure the conductivity of liquid or two–phase medium, The electrical conductivity should be generally greater than 5  $\,\mu$  s /cm(from the original water conductivity of about 100–500  $\,\mu$  s /cm), can be used to measure a variety of acid, alkali, salt solution, pulp, pulp and other media, but the medium can not contain more ferromagnetic substances and a large number of bubbles, Widely used in petroleum, chemical, metallurgy, textile, paper, environmental protection, food and other industrial departments and municipal management, water conservancy construction and other fields of fluid measurement.

- ◆ Set range: 1... 150 cm/s (water)
- ◆ The measurement pipe has no obstructing flow parts, no pressure loss, and the requirement of straight pipe section is low
- sensor can be equipped with grounding electrode, to achieve good grounding of the instrument
- has a positive/negative two-way flow measurement function
- Converter with LCD backlight display makes reading in direct sunlight or dark room easy
- converter can simultaneously display volume flow percentage, actual flow and cumulative flow
- Mounted on a pipe with a standard (model) rotating display into ≤90°C improves visibility of a body type flowmeter
- ◆ The converter has the functions of self-diagnosis alarm output, empty load detection alarm output, flow upper and lower limit alarm output, two-stage flow value output and so on

#### technical index

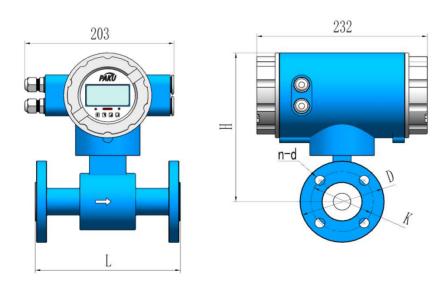
caliber	DN10 – DN1000
Liquid Measure	Conductive liquid, slurry
conductivity	≥51S/cm
accuracy	Indicates $\pm0.5\%$ of the value, optionally $\pm0.3\%\pm0.2\%$ of the value
measuring range	Flow rate setting: 0.1~<15m/s
structural style	One body type, separate body type
electrode material	Stainless Steel 316L, Platinum-Iridium, Hastelloy, Tantalum, Titanium
lining material	Chloroprene rubber, polytetrafluoroethylene (PTFE), poly perfluoroethylene propylene (FEP), polyurethane rubber
canning material	Carbon steel (standard), stainless steel (non-standard custom)
medium	$-40^{\circ}$ C~+180° C, limited by the temperature resistance of the lining material
environment temperature	-25° C~+60° C
ambient humidity	5~100%RH (relative humidity)
enclosure protection class	IP65、IP68



# measuring range

nominal			flow range	e ( m³/H )		
diameter	floor	upper limit	floor	upper limit	floor	upper limit
DN ( mm ) 4	\				0.04	0.25
6					0.1	0.6
10					0.12	1.2
15			0.3	3	0.6	6
20				·	0.7	7
25					1	10
32					1.5	15
40					2	20
50					4	40
65					8	80
80					10	100
100					20	200
150					40	400
200					80	800
250					120	1200
300					180	1800

# dimension figure





### Selection table

SN52-	050	Α	Α	1	1	1	1	D	1	1	specification			
SN52-	2_							SN52 series electromagnetic flow sensor						
	DN										(Optional diameter DN10-DN1000 special pipe diameter, please consult sales engineer)			
		Α									stainless steel316L			
		В									hastelloyB			
electrode		С									hastelloyC			
		D									platinum			
		Е									titanium			
		F									tantalum			
А										neoprene ( CR )				
lining material B C D			В								urethanes(PU)			
			С								PTFE			
										FEP				
				1							4.0MPa			
work	ing press	sure		2							1.6MPa			
				3							1.0MPa			
one	rating ter	mnora	turo		1						≤70°C			
opei	rating ter	прега	luie		2						≤120°C			
						1					Analog quantity 4–20mA output, on–site display			
output mode 2						2					Pulse output, local display			
						3					Analog quantity 4-20mA output, no display			
						4					Pulse output, no display			
	comm	unicat	ion m	odo			0				无			
	COMMI	umcat	ion m	Jue			1				RS485 communication interface			
power supply mode								J			220V			
								D			24V			
								С			Battery powered (no output option only)			
level of protection									1		IP65			
									2		IP68			
Converter Type										1	integrated			
										2	split type			

<sup>\*</sup> The scope of supply of electromagnetic flowmeter does not include the paired flange, the user can manufacture or order separately.

<sup>\*</sup> The selection table is only available for parameter selection, and the corresponding code is delivered.