

## GENERAL CHARACTERISTICS

**Magnetostrictive** continuous level transmitters base their operation on the physical principle called Wiedemann effect and allow a continuous and precise measurement of liquid levels. The electronic unit sends a pulse to a waveguide contained in the measuring rod; the magnetic float intercepts the pulse generating an echo that is detected by the same electronic unit.

The elapsing time between the emission of the pulse and its recognition is directly proportional to the position of the float, and then to the value of the level to be measured.

## • Stainless steel – AISI 316

- 1 analog output, current or voltage.
- 2 analog outputs, current and voltage.
- 2 factory programmable PNP digital outputs.
- RS485 serial output, Valco protocol.
- Programming via dedicated handheld computer VSP.130, on request
- Up to 2, 9 m length.
- Working pressure up to 50 bars depending on the used float.
- Operating ambient temperature -30 / +70 °C, RH 90%.
- Standard working temperature up to 105 °C  
150 °C working temperature on request.
- Minimum degree of protection IP67.



See MULTISIGNAL

## TECHNICAL DATA

Tab.1

Power supply	18 ÷ 30 Vcc
Power consumption	< 100 mA
Signal output resolution	< 1 mm
Accuracy	≤ 1 mm
Room temperature	-30 / +70°C
Process temperature	105° C 150°C with heat sink
Measuring length L0	2, 9 m - max. 2, 8 m - max. - 150°C application
Electrical connection	S5 Conec M12 x 1, 8 poles
Protection class	IP67

Analog output	Current	• 4-20mA	420		
	Voltage	0-5V	005		
	0-10V	010			
	0,5-4,5V	545			
Communication output	Current / Voltage	4-20mA/0-10V	420/10		
	RS485 - Valco protocol	RS485			
N.2 Digital output factory programmable	2 x PNP - not protected maximum load 100mA				
	Via dedicated handheld computer VSP.130 available on request				
Programming of instrument					

- Standard, others signal output and indicated option on request

## FLOATS

Tab.2

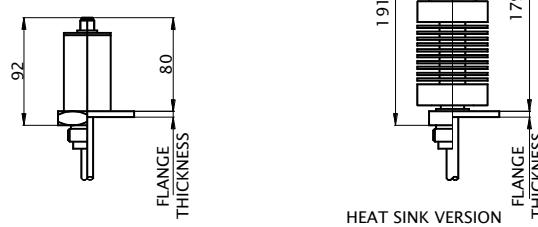


Material	Stainless steel – AISI 316			
Specific gravity	0,75	0,55	0,65	0,7
Max. pressure – Bar	30	10	10	50
Max. temperature – Class	L = 105°C	-	R = 150°C	

## ELECTRICAL OUTPUT

Tab.3

S5	L	105°C	Standard	Anodized aluminum
	R	150°C	With heat sink	



## PROCESS CONNECTIONS

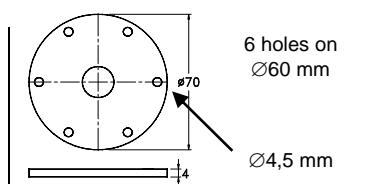
Tab.4

Type of float	25	32	40	50	FSHX	DN65	DN125
	1"	1-1/4"	1-1/2"	2"	Flange	Flange	Flange
S29	G	G-C-N	G-C-N	-	•	-	-
S32	G	G-C-N	G-C-N	-	•	-	-
S41	-	-	G-C-N	G-C-N	-	•	-
S52S	-	-	-	G-C-N	-	•	-
S100	-	-	-	-	-	-	•

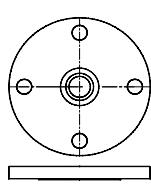
  

Male thread			Available materials		DN = Available materials	
G	C	N	S	AISI-316	S	C
Parallel UNI 228/1	Conical UNI 7/1	Conical NPT			AISI-316	Steel on request

## FLANGES Dimensions in mm.

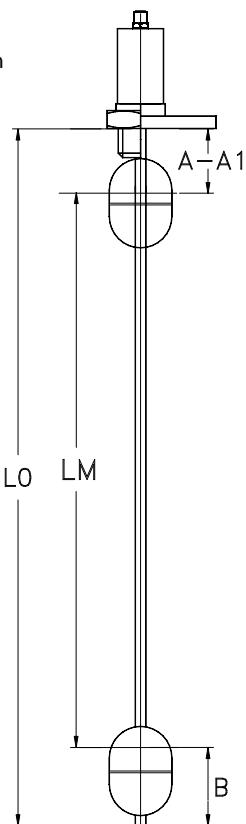


FSHX

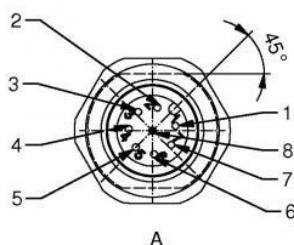


DN = UNI - DIN - ANSI Flanges

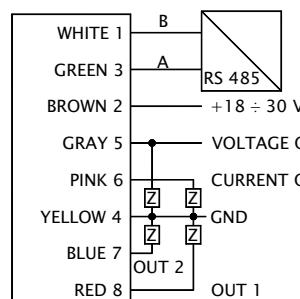
A Flanged connection  
A1 Threaded



## WIRING



PIN	SIGNAL
1	RS485 - line B
2	Power supply +V
3	RS485 - line A
4	Ground
5	Analog output - voltage
6	Analog output - current
7	Digital output - PNP2
8	Digital output - PNP1



## DIMENSIONS mm.

Tab.5

The dimension L0 - LM is measured from the stop of the fitting (A1) or flange (A) connection. Tolerance on dimension L0 - LM ± 3 mm.

	S29	S32	S41	S52 (S)
A	75	75	75	75
A1	75	75	75	75
B	65	65	65	65

Damping tube	—	— S	— V
On request	—	AISI-316	PVC

## NOMENCLATURE

LCM	S52	1300 / 1400	S	— S	50	G	S	420	S5	L
•	•	•								
			•							
				•						
					•					
						•				
							•			
								•		
									•	
										•

Type	
Tab.2	Float
Tab.5	Measuring length LM / Total length L0 (mm)
Tab.2-4	Stem material
Tab.5	Damping tube (option)
Tab.3	Process connection dimension
Tab.4	Process connection thread
Tab.4	Process connection material
Tab.1	Analog output and options required
Tab.3	Electrical output.
Tab.2-3	Temperature class

## CABLE- PLUG

Connection cable 2m. with connector M12x1

Accessory on request

We reserve the right to change the data without notice

BE#246/1-06/2014