


GENERAL CHARACTERISTICS

The principle of operation is of potentiometric type, based on the gradual shutdown of a chain of resistors and reed contacts, placed inside the guiding rod, by a magnetic float. The only moving element is the float that moves, for buoyancy, along the measuring rod. This ensures a high degree of reliability.

- **PVC – PP – PVDF**
- Measuring resolution 5 mm.
- Potentiometric signal output (**LC**).
- 4-20mA analog output (**LCT**).
- 0-5 / 0-10V analog output (**LCTV**).
- (0)4-20mA analog output with digital display (**LCO**).
- Up to 5m length.
- Maximum working pressure 6 Bar.
- Operating ambient temperature -30/+55°C UR 90%.
- Standard working temperature up to 130°C.
- Minimum degree of protection IP65.
- Built-in temperature sensors, on request.
PT – PTC – NTC.
- ATEX  Executions (See Linear ATEX E – Linear ATEX I series)



FLOATS

Tab.1

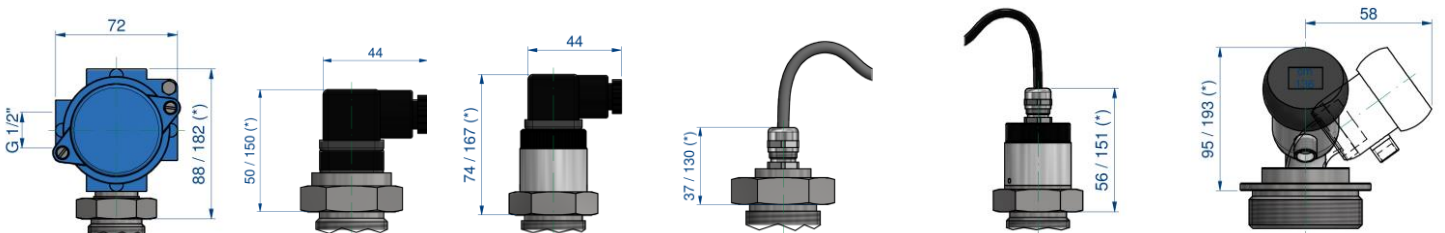


	F49 Ø49x53	P49 Ø49x53	V49 Ø49x53
Material	PVDF	PP - Polypropylene	PVC
Specific gravity	0,8	0,45	0,7
Measuring resolution - mm	5	5	5
Max. bar	6	3	6
Max. °C - Class	N = 130°C	D = 90°C	B = 60°C

ELECTRICAL OUTPUT

Tab.2

W1	S1	S1	P1 - P2	P1 - P2	O1
IP65 Housing	DIN 43650 IP65 Plug	DIN 43650 IP65 Plug	P1 Brass cable-gland IP68 P2 Polyamide cable-gland IP67	P1 Brass cable-gland IP68 P2 Polyamide cable-gland IP67	OMNI electric head



LC - LCT - LCTV	LC	LCT - LCTV	LC	LCT - LCTV	LCO
With heatsink – see dimension (*)					
LCT - LCTV - LCO = Temperature class N					

PROCESS CONNECTIONS

Tab.3

LC type P1-P2 output = Installation from inside		Float type	LC - LCT - LCTV - LCO type = Installation from outside			
10	15		50	DN65	DN80	DN100
3/8"	1/2"		2"	Flange	Flange	Flange
All type of floats All type of thread		F49	G-C-N	•	•	•
		P49	G-C-N	•	•	•
		V49	G-C-N	•	•	•

Male thread

G	C	N
Parallel UNI 228/1	Conical UNI 7/1	Conical NPT

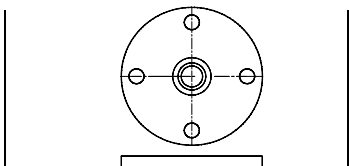
Available materials

F	P	V
PVDF	PP	PVC

DN = Available materials

V	S
PVC	Stainless steel On request

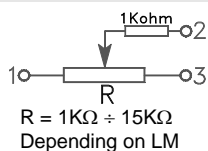
FLANGES



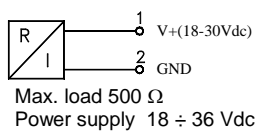
DN = UNI - DIN - ANSI Flanges

WIRING

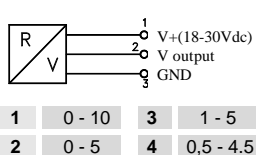
POTENTIOMETRIC OUTPUT



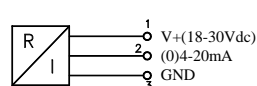
4-20 mA OUTPUT



V OUTPUT



4-20 mA OUTPUT WITH DIGITAL DISPLAY



LC

LCT

LCTV..

LCO

DIMENSIONS

mm.

Tab.4

The dimensions L0 and LM are referred to the stop of the fitting (A1) or flange (A) connection.
Tolerance on dimension L0 and LM \pm 3 mm.

	F49	P49	V49
A	25	25	25
A1	45	45	45
B	30	30	30
Damping tube On request	—	- V PVC	- S AISI-316

OPTION - Built-in temperature sensor

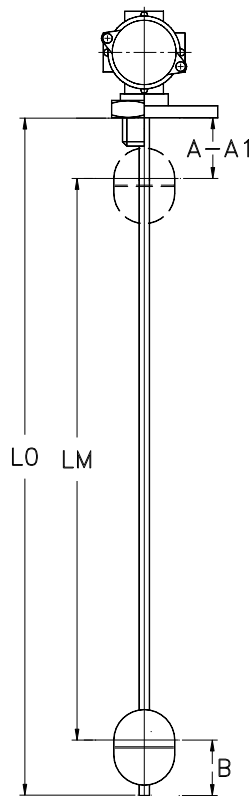
Only for LC type = On request, it is possible to install a temperature sensor located at the bottom of the rod inside the instrument.

PT100 - PT1000	PTC	NTC
EN 60751 - IEC 751	Resistance at 25°C \leq 500 Ω	Resistance at 25°C 2-5-10-50-100 K Ω
Class B - (Class A on request)	Temperature 60°C \div 150°C	Precision \pm 5% / \pm 3% (on request)

NOMENCLATURE

LC V49 05 1300 / 1380 V - V 50 G V W1 L 1,5 M

LC	V49	05	1300 / 1380	V	- V	50	G	V	W1	L	1,5 M	
•												Type: LC - LCT - LCTV - LCO
	•											Tab.1 Float
		•										Tab.1 Measuring resolution (mm).
			•									Tab.4 Measuring length LM / Total length L0 (mm).
				•								Tab.3 Rod material.
					•							Tab.4 Damping tube (option).
						•						Tab.3 Process connection dimension.
							•					Tab.3 Process connection thread.
								•				Tab.3 Process connection material.
									•			Tab.2 Electrical output.
										•		Tab.1 Temperature class.
											•	Tab.2 Cable length (P1 - P2) 1,5m / 3m, other lengths on request.





LINEAR VF



Request form

External mounting

Internal mounting

W1

Electrical housing IP 65

S1

Plug IP65
DIN 43650

P1

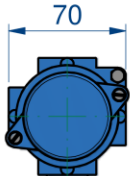
P1 Cable-gland brass IP68
P2 Cable-gland polyamide IP67
L cable.....mm

P2

C

Only internal mounting
Cable L.....mm

LC/LCT



70

LC



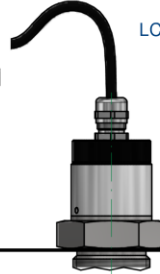
LCT



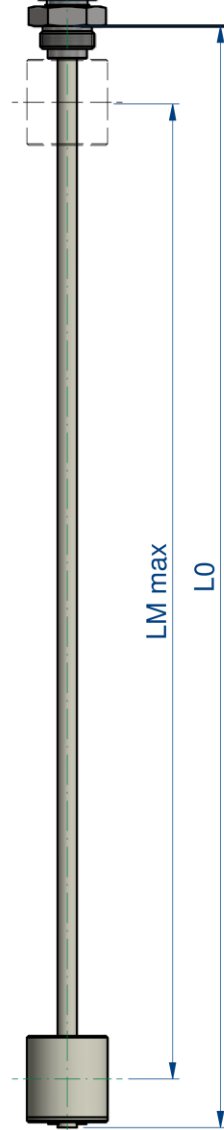
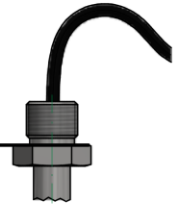
LC



LCT



LC



LM max

L0

Liquid under control:

Specific gravity:

Maximum pressure:

Maximum temperature:

Measuring resolution:

5 mm

10 mm

20 mm

Process connection:

Threaded:

Flanged:

Material:

Brass

AISI-316

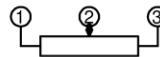
PVC

PP

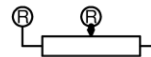
PVDF

Electrical output:

3-wires potentiometer



2-wires potentiometer

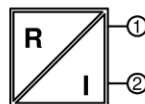


Calibrated potentiometer

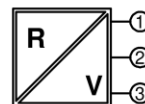
Empty tank =ohm

Full tank =ohm

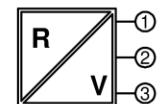
4 ÷ 20 mA output



0.5 ÷ 4.5 V output



1 ÷ 5 V output



Total length
L0 (mm)

Measuring length
LM (mm)

0 ÷ 5 V output



0 ÷ 10 V output

