

VIBRATING TYPE LEVEL SWITCH

ELT series single vibrating material level switch is one of the tuning fork material level switches. It is not afraid of hanging materials, not afraid of impact, without clamping problems, and has higher sensitivity.

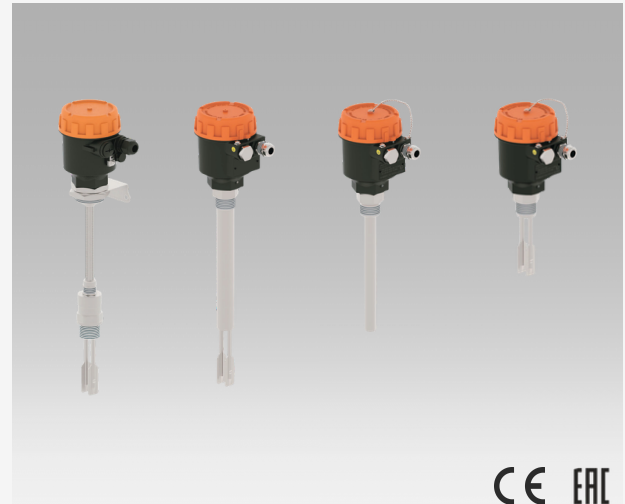
Its cylindrical single measuring rod structure determines its wider adaptability to industrial field. Single rod vibrating level switch uses the "resonance" principle of tuning fork to generate vibration under the driving of piezoelectric elements. Only when all around the probe rod are surrounded by materials, the vibration amplitude will be sharply reduced, resulting in switch action.

Applications :

It can be used in process that containers , silos , free flowing dusts, granules and various types of small particulate solids such as cereals, beans, edible oil process, sugar, animal feed, rice plants, detergents, dye powder, chalk, gypsum, fly-ash, cement, sand, plastic granules, spices, milk powder etc.

Technical specifications

Fluid	Liquid, Solid, Powder
Wet Parts	316 St. St.
Fork Material	316 St. St.
Housing Material	Aluminium
Max. Solid Particle Size	≤ 10 mm
Max. Liquid Viscosity	< 1000 mm ² / sec
Measurement Density	For Solid ≥ 0,1 g / cm ³ For Liquid ≥ 0.7 g / cm ³
Vibration Frequency	280 KHz (For ELT102,104, 202, 204) 300 ± 50KHz (For ELT101, 201)
Delay Time	0.5 sec (Vibration Stop) 1-2 sec (Vibration Start) It can be adjusted between 1-60 seconds
Exit: (For ELT101, 201,105, 205) (For ELT102,104, 202, 204)	2 x 5A NO / NC Relay 30 VDC / 220 VAC 2 x 8A NO / NC Relay 24 VDC / 220 VAC
Supply	15-80 VDC , 15-260 VAC
Power consumption	2,5 W
Connection	1"BSP (Std.) Male Thread Opt. Flanged
Working Pressure	Max. 20 bar (For ELT101, 201) Max. 40 bar (For ELT102,104, 202, 204)
Working Temperature	(-) 20 °C...(+) 150 °C (Std.) Opt. 200 °C
Ambient Temperature	(-) 20 °C...(+) 80 °C
Ambient Humidity	% 95 RH
Protection Class (EN60529)	IP 66



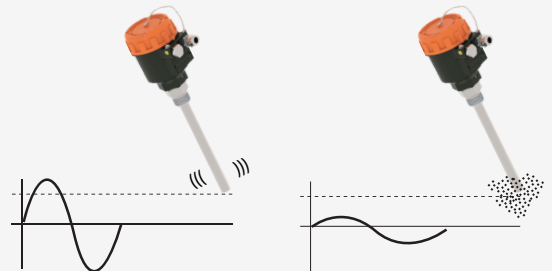
CE EAC

Model

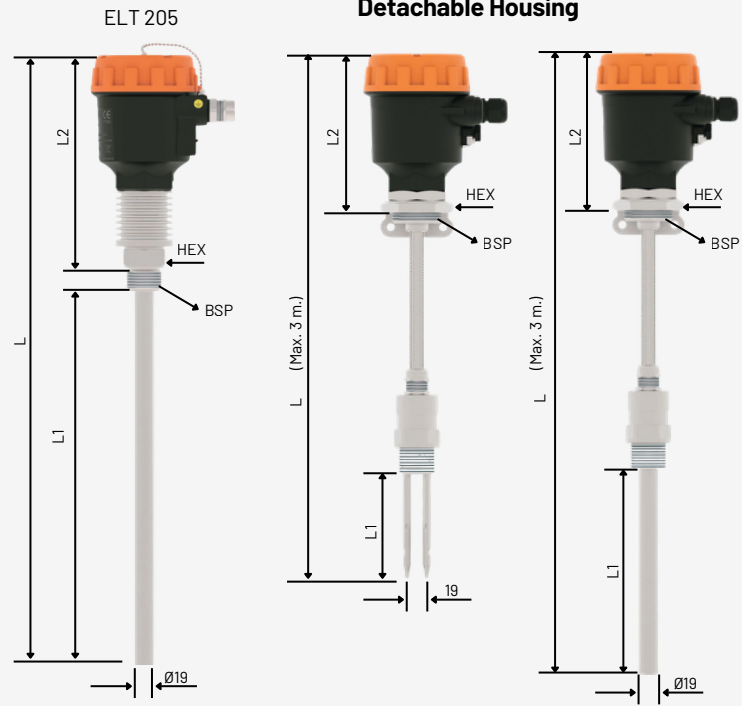
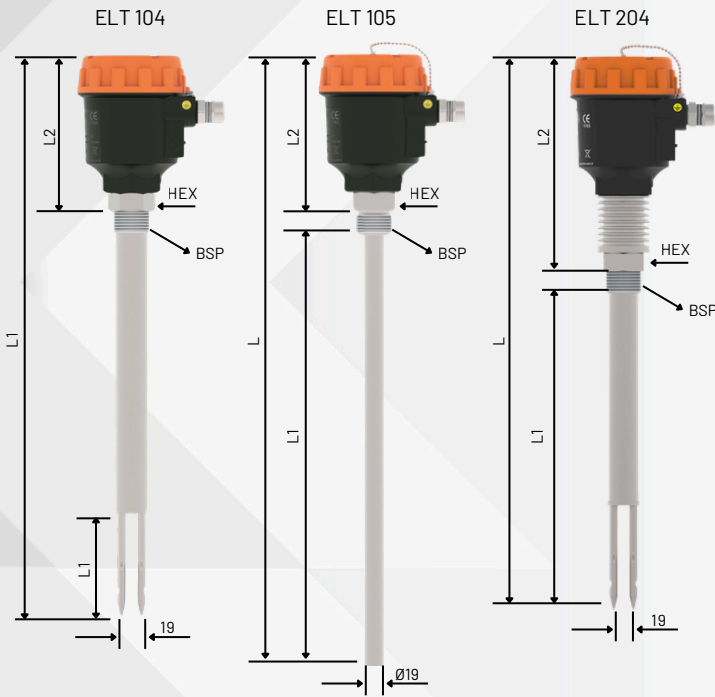
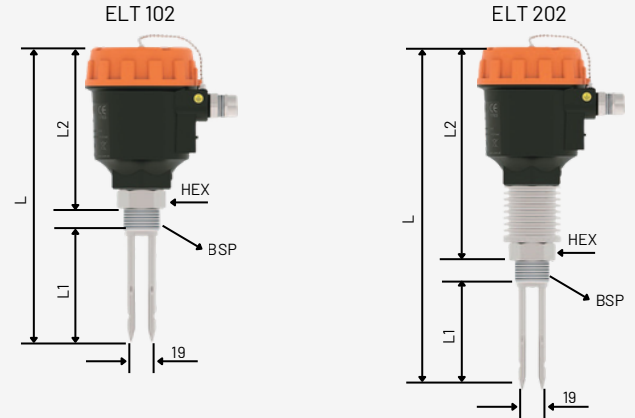
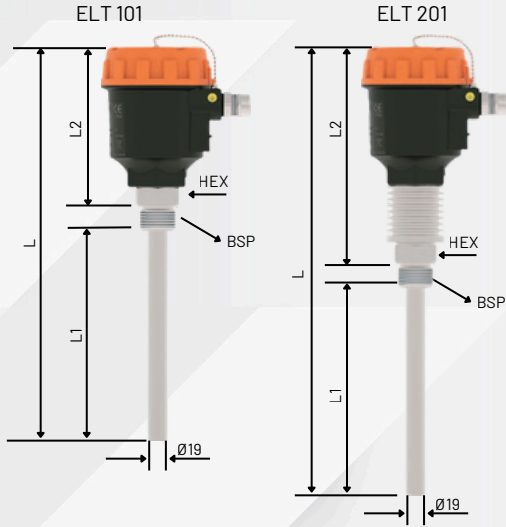
- ELT 101
- ELT 102
- ELT 104
- ELT 105
- ELT 201
- ELT 202
- ELT 204
- ELT 205

Advantages

- Suitable for side as well as top mounting
- Minimum and maximum fail safe field selectable.
- Process pressure max. 40 bar
- Process temperature max 200 °C
- Low power consumption.
- Settable switching delay as a standard feature
- Durable Construction
- Immune to External Vibrations



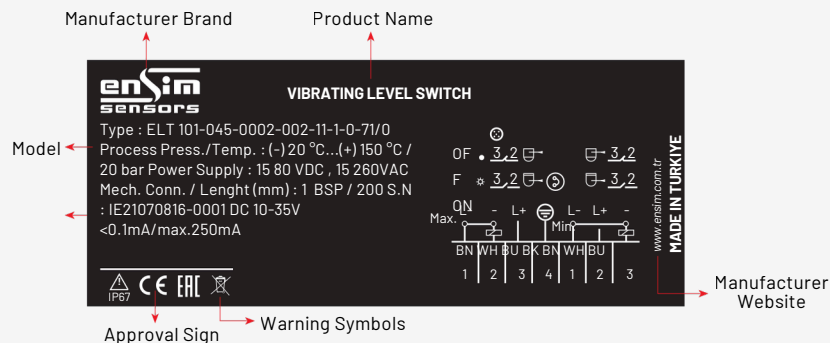
Technical Drawing



Dimensions

Model	Conn. BSP (mm)	L (mm)	L1 (mm)	L2 (mm)	HEX (mm)
ELT 101	1" BSP	220	195	150	38
ELT 201	1" BSP	220	217	210	40
ELT 102	1" BSP	125	100	150	38
ELT 202	1" BSP	125	217	210	38
ELT 104	1" BSP	Max.	100	150	38
ELT 204	1" BSP		217	210	38
ELT 105	1" BSP		100	150	38
ELT 205	1" BSP		217	210	38

Label



Housing

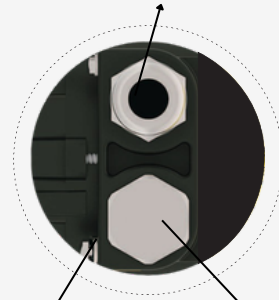
Order Code	Type	Material	Protection Class	Temperature (°C)	Size a x b (mm)
600	B20x	Aluminium	IP 66	-40...+200	132 x 104



DO NOT OPEN WHEN ENERGIZED
KEEP TIGHT WHEN CIRCUIT ALIVE



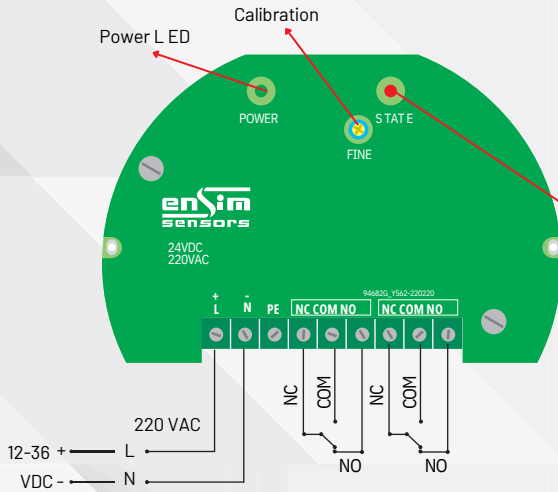
Aluminium Housing
CablePlug
(Suitable Cable Diameter : Ø 6-12mm)



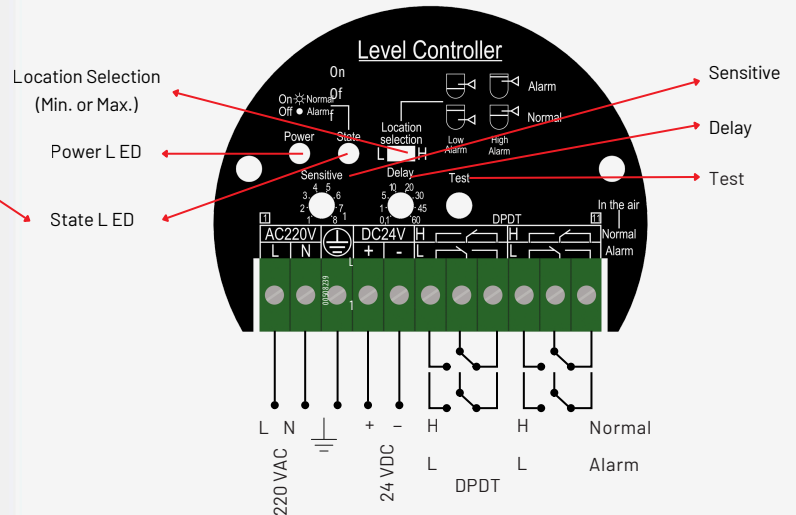
Grounding Terminal
(Max.1,5 mm²)
Recommended Cable (5x1,5 mm²)

Electrical Connection

For ELT 101 / 201 / 105 / 205



For ELT 102 / 104/ 202/ 204



Protection Case

Material : 304 Stainless Steel
Welded manufacturing
Opens - Closes Hinged
To Protect Against external conditions.



Order Form: You may use the sample models as a reference for coding..

LEVEL

1	MODEL ELT	Std. Type - 1	High Temperature Type - 2
2	CERTIFICATE	None - 0	(EN10204-3-1) Material Certification - 1
3	CONNECTION TYPE	Thread Type - 1	Long Fork Type - 4
		Thread Fork Type - 2	Long Rode Type - 5
			Special - x
4	STEM LENGHT (mm) L	Std. (For ELT102) - 100	Std. - 1000
		Std. (For ELT 101) - 200	Special - x
5	CONNECTION	1" BSP (Std.) - 0006	DN 50 - PN 16 (Std.) - 0505
		1 1/ 2" BSP - 0008	DN 80 - PN 16 - 0507
			DN 100 - PN 16 - 0508
			Special - x
6	WETTED PART MATERIAL	316 Stainless Steel - 002	Special - x
7	OUTPUT	2 x 8A NO/NC Relay (For ELT102, 202) - 12	1 x 3A NO/NK Relay (For ELT101, 201) - 43
		1 x 5A NO Relay (For ELT103m) - 44	Special - x
8	WORKING TEMPERATURE	(-) 20 °C...(+) 150 °C - 1	(-) 20 °C...(+) 200 °C - 2
			Special - x
9	HOUSING	Plastic Housing (For ELT101, 102, 104, 105) - 103	Special - x
		Aluminium Housing (For ELT201, 202, 204, 205) - 600	
10	ELECTRICAL CONNECTION	Terminal (For Housing Models) - 00	Special - x
		Polyamide Large Socket P01 - 50	
11	OPTIONAL	None / 0	Separable Housing - St.St. Flexi Spiral (It depends on the model) / S1
		Protection Case - for Outside Tank. 304 St. St. / K2	Separable Housing - Plastic Flexi Spiral (It depends on the model) / S2
			Special / x

EXAMPLE

Vibrating Type Level Switch, Model ELT101, L=250 mm , 1" BSP Male Thread , 1 Contact

ELT 101-200-0006-002-43-1-103-00/0

