

TECHNICAL DATA

FOZMULA
INNOVATION IN SENSORS

TLL150 Liquid Level Sensor Cut-to-Length and Calibrate



The **T/LL150** liquid level sensor is designed for use in diesel fuel tanks and is available with a variable resistive or voltage output suitable for driving industry standard fuel gauges or connecting into PLCs.

This capacitance type level sensor is supplied in standard lengths and is designed to be cut-to-length and calibrated by the customer making it ideal for custom and urgent projects.

SPECIFICATION

Dimensions

Probe Lengths:	500mm, 1,000mm for cutting to length by customer.
Threads:	½" BSPT, 1" BSPT, ½" NPT
Optional Flange:	SAE 5 Hole: Fozmula F/T1 for ½" BSPT Fozmula F/T8 for ½" NPT

Performance

Accuracy: ±2% of depth @ 20 °C

Materials

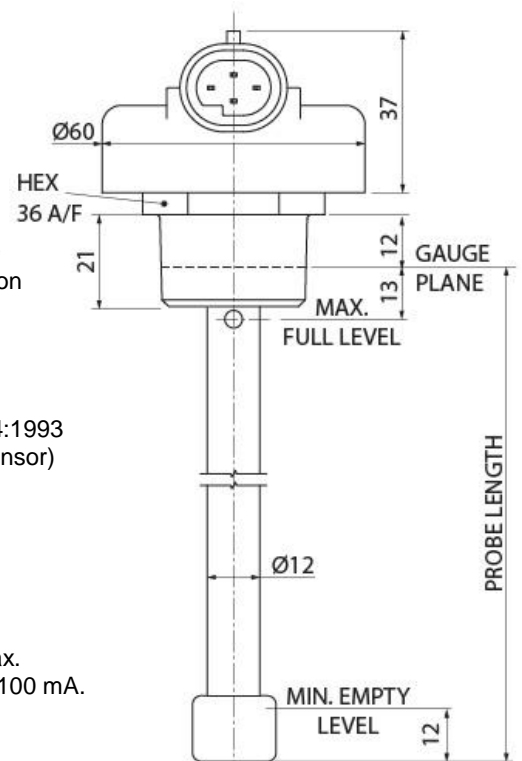
Enclosure:	30% glass filled nylon	Internal Spacers:	Polypropylene
Internal Electrode:	Aluminium alloy 6063	End plug:	PVC / G/F nylon
Sensor Tube:	316 stainless steel	Wetted Seals:	Viton, NBR

Environmental Ratings

Sealing:	IP67 with mating connector	Shock:	50 g, 6.3 ms
Max Pressure:	1 bar	Vibration:	7.6 Grms BS EN 60068-2-64:1993
Operating Temp:	-20 °C to +85 °C	Weight:	300 g (1 m long sensor)

Electrical

Supply Voltage:	9-34 VDC
Supply Current:	30 mA
Supply Protection:	Over-voltage 80 VDC for 2 minutes. Reverse polarity.
Signal Output:	Resistance range; 0-250 Ω or 250-0 Ω, 2 Ω steps, 0.4 W max. Voltage source range; 0-5 V or 5-0 V, 20 mV steps, 10 mA max. Switch to ground, close on fall at 12.5% of active length. Max 100 mA.
Alarm Output:	Switch to ground, close on fall at 12.5% of active length. Max 100 mA.
Connections:	4 Way Delphi Packard Metri-Pack 150 Series.
Mating Connector:	Fozmula C/K1 (Delphi Packard Metri-Pack 150) To fit 0.8-1.0 mm ² conductor, Ø1.6-2.15 mm sleeve.



Calibration Instructions

Units will be supplied calibrated for diesel.

Full Point:

1. Install sensor in the tank and power on.
2. Fill tank to required full level.
3. Depress "CAL" button for 5 seconds to set full point. Release button. Check output for full point.

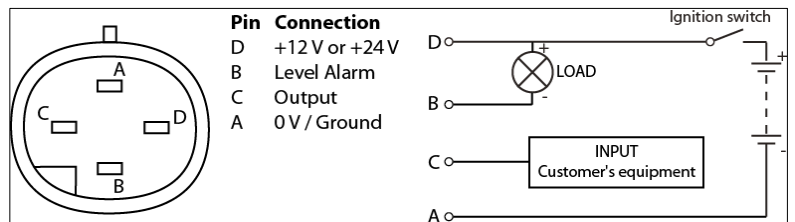
Empty Point (if required):

1. Fill tank to required level or, for Min. Empty Level, remove from tank and shake to remove excess liquid.
2. Disconnect power.
3. Depress "CAL" button then reconnect power whilst depressing calibration button. Continue to depress for a further 5 seconds to set empty point. Release button. Check output for empty point.

Standard part numbers and options

TLL15 X	XX	XXXX	XX
Type	Thread	Length	Output
0 Resistive, Ω	5B ½" BSPT	0500 500 mm	70 10 - 180 Ω
1 Voltage, V	1B 1" BSPT	1000 1000 mm	71 240 - 32 Ω
	5N ½" NPT		01 0 - 5 VDC
	1N 1" NPT*		

*Available Sept, 2019



ALCYON
ÉLECTRONIQUE
commercial@alcyonelectronique.fr

Hermes Close | Tachbrook Park | Warwick | CV34 6UF | United Kingdom
Tel: +44 (0)1926 466700 | Fax: +44 (0)1926 450473 | sales@fozmula.com

www.fozmula.com

E. & O. E. © Fozmula Limited.

Since the suitability of these products depends upon a wide range of factors not in our control, Fozmula Limited expects and understands that you will conduct the testing and evaluation necessary to determine that these products are suitable for your application. Whilst every effort is made to ensure the above details are correct at the time of printing, Fozmula Limited reserves the right to make material changes, and or technical changes without notification.

JP 16-Mar-18 3.11 rev 2