



# DTP-L

## Digital temperature pipe sensor

The DTP-L series are digital temperature water pipe sensors powered over Modbus with 3,3 VDC via an RJ12 connector. They are intended for mounting onto metal pipes and are compatible with various temperature control systems. Thanks to the copper contact plate, we can ensure fast response times and faster response time and a more accurate temperature measurement of the media within the pipe.

### Key features

- Wide temperature range: 0–85 °C
- Modbus RTU communication
- Easy wiring via an RJ12 socket
- Quick and easy mounting via a cable tie
- Copper plate for enhanced thermal conductivity
- Heat resistant cable tie 300 x 4,8 mm included
- Thermal pad for a more accurate temperature measurement included (19 x 14 x 1,5 mm)

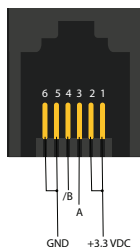
### Technical specifications

Supply voltage	3,3 VDC, Power over Modbus	
Current consumption	Maximum: 0,026 W	
	Nominal: 0,025 W	
	I <sub>max</sub> : 8 mA	
Sensor range	0–85 °C	
Accuracy	±1 °C	
Protection standard	IP65	
Ambient conditions	Temperature	-30–85 °C
	Rel. humidity	5–95 % rH (non-condensing)

### Wiring and connections

#### RJ12 socket (Power over Modbus)

Pin 1	3,3 VDC	Supply voltage
Pin 2		
Pin 3	A	Modbus RTU communication, signal A
Pin 4	/B	Modbus RTU communication, signal /B
Pin 5		
Pin 6	GND	Ground, supply voltage



### Article codes

Article code	Supply
DTP-L	3,3 VDC, PoM

### Area of use

- Measuring temperature in metal water pipes

### Wiring RJ12



RJ12 socket




Plug the communication and power cable into the socket



# DTP-L

Digital temperature pipe sensor

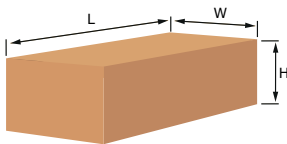
## Standards

- EMC directive 2014/30/EU: 
- EN 61326-1:2013 Electrical equipment for measurement, control and laboratory use - EMC requirements - Part 1: General requirements
- EN 61326-2-3:2013 Electrical equipment for measurement, control and laboratory use - EMC requirements - Part 2-3: Particular requirements - Test configuration, operational conditions and performance criteria for transducers with integrated or remote signal conditioning
- EN 61326-2-5:2013 Electrical equipment for measurement, control and laboratory use - EMC requirements - Part 2-5: Particular requirements - Test configurations, operational conditions and performance criteria for devices with field bus interfaces according to IEC 61784-1

• WEEE Directive 2012/19/EU

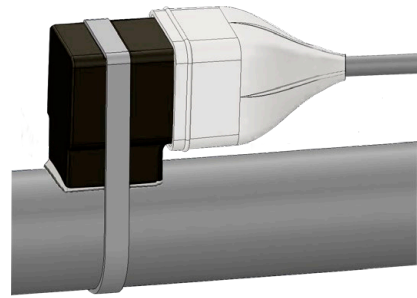
• RoHS Directive 2011/65/EU

## Packaging



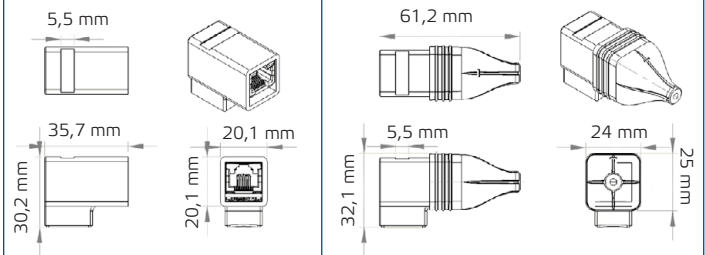
Article	Packaging	Length [mm]	Width [mm]	Height [mm]	Net weight	Gross weight
DTP-L	Unit (1 pc.)	110	76	28	0,024 kg	0,05 kg
	Carton (24 pcs.)	492	182	84	0,58 kg	1,3 kg
	Box (144 pcs.)	510	410	270	3,46 kg	7,9 kg

## Fixing and dimensions



Without protective cover

With protective cover



# DTP-L

Digital temperature pipe sensor



## Application example

