

# ROLINE-L



# HYGROCLIP<sup>®</sup>

## Humidity goes Digital



## HVAC Humidity and Temperature Transmitter

- Relative humidity and temperature measurement
- 2-wire loop powered or 3-wire circuit type
- Well proven, durable humidity and temperature sensors
- Potentiometer-free digital calibration
- On-site validation and calibration with HygroPalm 3 calibrator
- Available as %rh and temperature, %rh only, or temperature only transmitters
- Swiss made

# rotronic<sup>®</sup>

LEADING IN HUMIDITY MEASUREMENT

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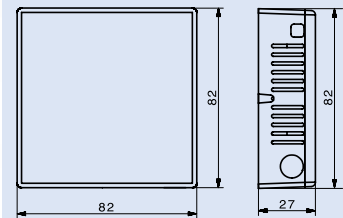
## Product Summary & Technical Data



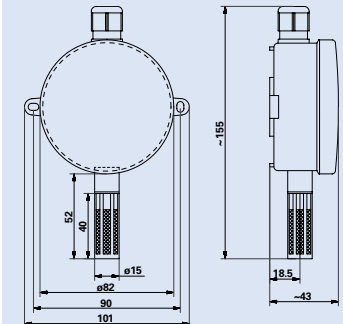
The ROLINE L transmitters are designed for HVAC applications that require a low maintenance, stable humidity sensor at a moderate price. Using ROTRONIC's industry leading sensor technology along with state-of-the-art electronics, the ROLINE L brings a level of reliability to HVAC market not previously available. Ask your local dealer for a special OEM solution.

SPECIFICATIONS	L12	L13
Humidity sensor	ROTRONIC Hygromer®AC-1 thin film capacitive	
Temperature sensor	Pt100 1/3 DIN	
Circuit type	2-wire loop powered	3-wire
Output signal type	4...20 mA, loop powered	0...1/5/10 V / 0/4...20 mA
Operating limits at probe	0...100 %rh and -40...60 °C	
Operating limits at transmitter	0...99%rh non condensing, -40...60 °C	
Standard output range	0...100 %rh / 0...50 °C	
Accuracy at 20...25 °C	±3 %rh / ±0.5 °C	
Repeatability	±0.3 %rh and better than ±0.1 °C	
Humidity sensor stability	Better than 1 %rh over a year	
Supply voltage	18...28 VDC; 18 V + 0.02 x load	10 (15*)...35 VDC 12...24 VAC
Current consumption	20 mA/output	< 50 mA
Max. load current outputs	250 Ohm	250 Ohm
Min. load voltage output	-	1000 Ohm
Electrical connections	W and D models: screw terminal and cable grip S model: Screw terminal	
Sensor protection	PVC foam filter	
Housing material	ABS	
Protection grade	W and D models: IP65; S model: IP33	
Weight	200 g	

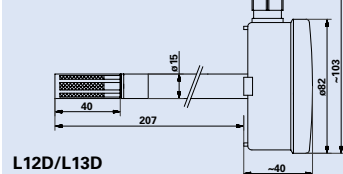
**Accessories:** Using a HygroPalm 3 plus one of the service cables listed below allows the reading of the analogue output signals and a digital calibration of the RH and T sensors



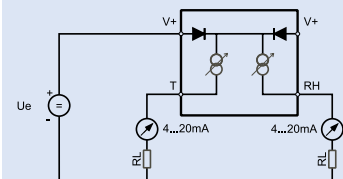
L12S/L13S



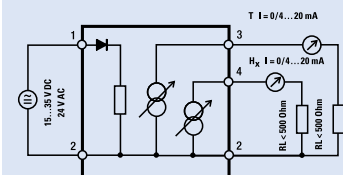
L12W/L13W



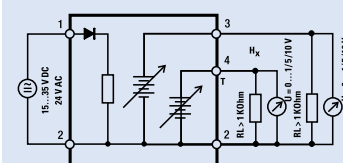
L12D/L13D



2 wire loop powered outputs



3 wire current outputs



3 wire voltage outputs

FEATURES	1	2	3	4	5	6	7
ROLINE-L types with integrated probes	L	1					
Type of connection			2				
			3				
Mounting				D			
				W			
				S			
Output parameters					H	T	
					H	X	
					T	X	
Output signal type	0...20 mA (not for L12)						1
	4...20 mA						2
	0...1 V (not for L12)						3
	0...5 V (not for L12)						4
	0...10 V (not for L12)						5

\* for 0/4...20 mA and 0...10 V outputs

DESCRIPTION	ACCESSORIES
HygroPalm 3	Handheld calibrator, single or multipoint adjustment
HygroClip S	Humidity and temperature probe for HygroPalm 3
MOK-01-B5	Reference probe cable – HygroClip S to HygroPalm 3
AC1625	Service cable for space mount type
ACRLXB5	Service cable for wall and duct mount