



Above:
Optional wall mounting security bracket

Below:
RH remote lead

The ML4114 is part of the 4000 range of advanced temperature and humidity radio transmitters. They allow wire-free monitoring of a site, with real time alarm notification and historical analysis of data. Each ML4114 unit reads its on-board sensors providing accurate and reliable information about environmental conditions. This data is transmitted, at user-defined intervals, to the Radiolog system where it is filed for analysis.

The ML4114 has a precision temperature sensor and a high quality humidity sensor. These sensors are housed in a remote probe for discrete mounting in a showcase. The sensors can be mounted in the case in two ways. The sensor can be supplied with an integral plug or cable mounted via a cable gland. Using the integral plug version a matching socket can be fitted to the base plate of the showcase. Using the cable mounted version the sensor can be fed in from beneath the case through a standard tank fitting. Both methods provide an air tight solution. The sensors can easily be removed for calibration, using the cable mounted method usually means that the sensor can be removed without opening the case.

The ML4114 probe along with improved accuracy has been reduced in size assisting users with easier access into display cabinets and show cases.

Transmitter ID number and transmission rate are set in the ML4114 using a simple software program (free to download) and a USB cable. Each unit has an LCD screen simultaneously displaying the most recent readings taken and the predicted battery life.

The ML4114 is powered by a single 3.6V AA Lithium battery, which can be fitted by the user. The battery life will be dependent on the transmission rate set. An indicator on the LCD will warn when the battery is low, and the ML4114 maintains a record of when the battery was last changed.

The moulded case allows easy access to the battery and USB socket, as well as having slots to fit onto secure wall brackets and a plain front panel to hide the LCD if more discreet monitoring of public areas is desired.

The ML4000 range has been designed to comply with the RoHS and WEEE EU directives, and carries the CE mark.



Temperature & humidity

Product Code ML4114
Series ML4000

Typical Applications

Monitoring in:
° Showcases
° Interface to building management systems

Instrument

Dimensions: 110 x 80 x 35 mm
Weight: 200 grams
Power Supply: 3.6 Volt AA Lithium battery
Battery Life: 18 months
Case Materials: ABS & PC
Memory Capacity: 100,000 readings

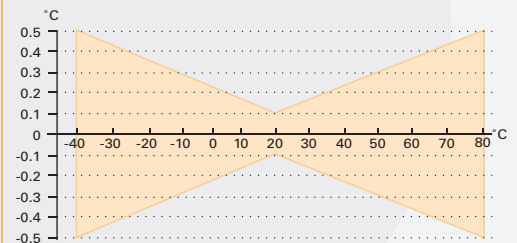
N.B. Instrument operating range -10 to +50°C in a 0-100% non-condensing RH environment

Sensors

EE07 probe: 11.8 mm x 83 mm

Temperature

Sensor type: Pt1000 (tolerance class A)
Range: -40 to +60°C
Resolution: 0.1°C
Accuracy: (at 20°C: ±0.1°C) elsewhere see chart



Humidity

Sensor type: Capacitive polymer
Range: 0-100% RH non-condensing
Accuracy: +/- 2% 0-90% RH
+/- 3% 90-100% RH
Resolution: 0.1%RH
Temp Dependence: $< (0.025 + 0.0003 \times RH) \left[\frac{\%RH}{^{\circ}C} \right]$

Radio

*Radio Frequency: 434.075MHz, 433.920MHz (fixed), 433.875 - 434.650MHz in 25KHz increments (synthesised)
Radio Power: 10 mW
Radio Range: 3 km over open ground

Accessories

Y055 Setup communications cable
G129 Replacement 3.6V Lithium AA battery
CAL-S 3 point calibration certificate
Y421-3 3 mtr RH remote lead
Y421-5 5 mtr RH remote lead
Y119 Wall mounting security bracket