



INTRODUCTION

The RTcom™xxx-1DT is a proven and highly cost effective modern alternative to manually recording process, freezer, pipe and refrigerator temperatures. The -1DT combines integrated digital temperature probe with battery management and state-of-the-art ASIC wireless technology.

The transmitter body is protected from the outside world by a food safe plastic jacket and the probe cable is manufactured from PTFE. Both are fully encapsulated making the assembly resistant to most chemicals and solvents. This makes the -1DT ideal for use wherever food and pharmaceuticals are being processed, stored or transported.



The advantage of the -1DT over cable based systems are numerous. Aside from the speed and simplicity of installation through the elimination of long cable runs, the transmitters unique addressing system permits the transmitter to double as a RFID tag, identifying the trailers and pallets into which it is buried or attached.

In practice the wireless communication distance / range can be anything from many tens of meters to over 200m. The 2m probe cable can also be used to an advantage permitting the transmitter body

to be mounted outside the refrigerator, cold room or transport container. Where range requires enhancement a low cost booster station is available.

Specification

- 50C to + 125C operation
- 0.5C Accuracy -10 to + 85C (2C elsewhere)
- Sealed for life IP68 construction
- Digital transducer with 2m PTFE probe
- Integrated antenna in transmitter body
- Measures 115 or 170 x 36 x 40 mm
- Unique address/serial number
- High reliability Wide Band FM modulation
- Low power radio - 100% EMC safe
- Radio Approvals EN-300-220-1
- Integrated cable tie / mounting bracket
- 3-Years to 10-years battery life dependant upon sample / transmission rate selected.

The -1DT is fully compatible with our Radio Data Loggers, or PC based Serial Data Receivers and Cellular Hub GPRS Data Concentrators and Repeater Stations.

Battery life is typically from between 3 and 10-years depending upon the read and transmission rate ordered. Low battery warning is included and the receivers offer transmitter failure alarms and high/low alarms. Data output from our receivers is in an open protocol ASCII format suitable for import into MS Excel.

Order Code Examples

RTcom™-xxx-1DT - (col) - (ln) - (s)
 Where xxx = operating frequency
 col = colour WH = White, BL = Blue. Other colours to order.
 ln = length of transmitter + antenna: 115mm or 170mm
 s = transmit repetition rate: 1m, 5m, 15hr

Accessories Available

- Plastic 12mm Stand-off Wall Mounting Clip
- Stainless Steel 150mm Wall clip
- Repeater / Booster Stations
- Radio Data Loggers & PC Receivers with CSV file generation software

Custom pipe, tank, rail clamps, water probes are available to order

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Issue 2/05

