

# CERTIFICATE OF CALIBRATION



Issued by: **Gemini Data Loggers (UK) Ltd**  
Date of Issue: **2011-08-24**  
Certificate Name: **TCAL-625866-103**  
Operator Name: **Mike Goodsell**  
Procedure: **PRG11 issue 4**  
Customer Name: **Stockport Acute Services NHS Trust**  
Instrument: **TGU-4500 Tinytag Ultra 2 Internal Temp/RH**  
Serial Number: **625866**  
Order Number: **49747**

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## Method of Calibration

The unit under test was set to record data and placed in a controlled environmental chamber, which was held at a constant 25°C while the relative humidity was varied. After the chamber had been stabilised for a period of not less than 20 minutes at each setting, the humidity of the chamber was measured using the laboratory standard. At the end of the calibration the corresponding readings from the unit under test were recorded.

The overall expanded uncertainty estimate for the calibration process is  $\pm 0.9\%RH$  at 20%RH,  $\pm 1.2\%RH$  at 50%RH, and  $\pm 1.5\%RH$  at 80%RH

## Laboratory Standard

Rotronic I-3007 relative humidity meter S/N 9585 001 (TH 37) with UKAS calibration certificate number 2011060243, dated 2011-06-21 from accredited calibrator number 0478. The calibration of this standard expires on 2012-06-21.

## Measurements

### Measurements Before Adjustments

Channel	Applied	Measured	Error
Humidity	28.22 %RH	28.15 %RH	-0.07 %RH
Humidity	79.73 %RH	79.48 %RH	-0.25 %RH

The measurements were all taken on **2011-08-23**

### Measurements After Adjustments

Channel	Applied	Measured	Error
Humidity	28.22 %RH	28.66 %RH	0.44 %RH
Humidity	79.73 %RH	79.76 %RH	0.03 %RH

The measurements were all taken on **2011-08-23**

Certified by:

This product is calibrated by Gemini Data Loggers (UK) Ltd registered to BS EN ISO 9001:2000 (Certificate No. 6134)

Notes:

1. Calibration uncertainties quoted are for a confidence probability of not less than 95%
2. Indicated values on the laboratory standard were corrected where necessary using data from the calibration certificate. Linear interpolation between calibration points is assumed.
3. This certificate may only be reproduced in full.