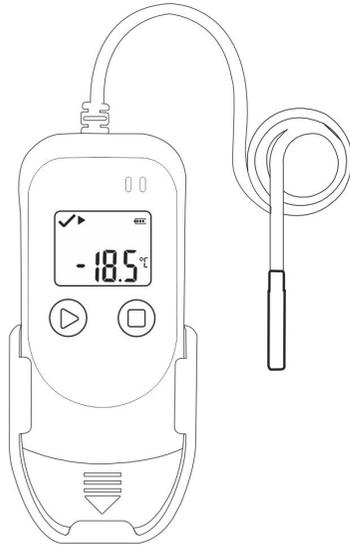# Temp&RH Data Logger

User Manual

1 Product introduction

This device is a simple and portable LCD screen temperature and humidity data logger. It uses external sensor, This product is mainly used to monitor and record the temperature and humidity data during transportation and storage. It's widely used in all aspects of warehouse, cold chain logistics, such as refrigerated containers, refrigerated trucks, refrigerated distribution boxes and cold storage laboratories. It's easy to read data and configure parameters through the USB interface, and the data report can be easily and automatically generated and obtained without any extra drivers to be installed in computer.

2 Technical parameters

Project	Parameter
Temperature Scale	℃ or ℉ [Default: ℃]
Probe Measuring Range	Humidity 5% ~ 95%RH, Temp -40℃ ~ 85℃
Accuracy	±3%(10% ~ 90%), ±5%(other); ±0.3℃(0 ~ 60℃), ±0.6℃(other)
Resolution	0.1%RH typically, 0.1℃
Data Capacity	34560pcs
Usage	Multiple times
Start Mode	Button Start or Timed Start [Default: Button Start]
Recording Interval	Programmable (10 seconds ~ 99 hours) [Default: 10 minutes]
Start Delay	Programmable (0 ~ 72 hours) [Default: 30 minutes]
Alarm Range	Programmable high or low alarm limit for each channel [Default: <2℃ or >8℃, <40%RH or >80%RH]
Alarm Type	Single type, Cumulative type
Alarm Delay	Programmable (0 ~ 99 hours) [Default: 10 minutes]
Form of Report	PDF and CSV format data report
Interface	USB2.0 Interface
Protection Level	IP65
Product Size	100mm*43mm*12mm
Product Weight	85g
Battery Shelf life	2 years (Normal temperature 25℃)
Time Zone	Programmable [Default:UTC +0:00]

3　Operating instructions

1）Start recording

Long press the start button more than 3s until the "▶ "or the "WAIT" symbol appears on the screen, indicating that the device has successfully started recording.

2）Stop recording
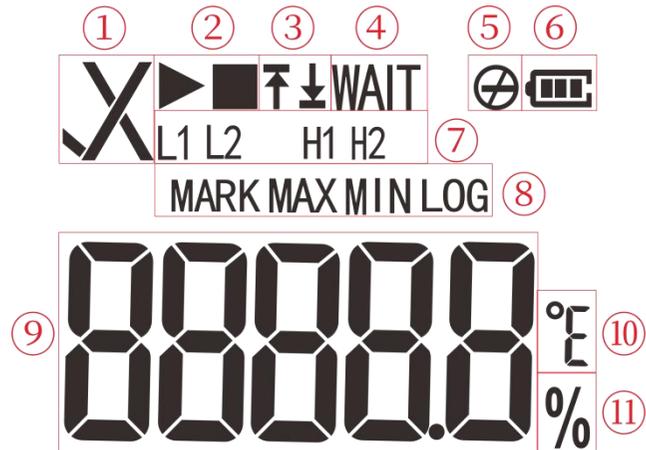
Long press the stop button more than 3s until the "■" symbol appears on the screen, indicating that the device stops recording.

3）Get report

After recording, connect the device with USB port of PC, it will automatically generate PDF and CSV report, click open to view the data report.

Note: If the logger is stopped during the status of start delay, there will be a PDF Report but no data.

4　LCD display description

1	√ Normal × Alarm	6	Battery power
2	▶ In recording status ■ Stop recording status	8	Interface indication
3 and 7	Alarm area: ↑ H1 H2 (high temperature&humidity alarm) ↓ L1 L2 (low temperature&humidity alarm)	9	Temperature value Humidity value
4	Start delay status	10	Temperature unit
5	Button stop mode invalid	11	Humidity unit

Short press the start button to switch the display interface in turn

Real time temperature interface → Real time humidity interface → Log interface → Mark number interface → Temperature maximum interface→ Temperature minimum interface → Humidity maximum interface → Humidity minimum interface.

① Real time temperature interface (initialization status)

② Real time humidity interface (initialization status)

③ Log interface (record status)

④ Mark number interface (record status)

⑤ Temperature max interface
(record status)

⑥ Temperature minimum interface
(record status)

⑦ Humidity max interface
(record status)

⑧ Humidity minimum interface
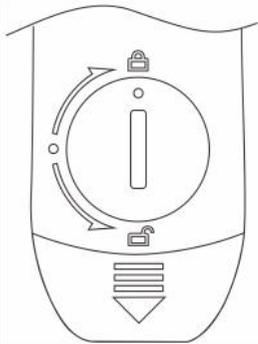(record state)

5   LED indicator description

Button	Indicator light	Status
Press and hold the start button for 3 seconds for the first time.	The green light is lighting for 3 seconds.	Start Recording
After turning on, press and hold the stop button for 3 seconds.	The red light is lighting for 3 seconds.	Stop Recording

Status	Operating	Indicator status
Inactivated	Short press the button	The green light (normal) and the red light (alarm) will flash simultaneously.
Activated		LED will flash every 10 seconds automatically during the recording process. If it's green light flashing every 10 seconds, it means temperature/humidity is not over limit. If it's red light flashing every 10 seconds, it means temperature/humidity is over limit. Note: As long as over-temperature/humidity is found during the recording process, the green light will no longer flash.
Stopped	No button press	The green light and red light won't flash.
	Short press the button	The green light flashes, indicating no over-temperature/humidity during the recording process.
		The red light flashes, indicating over-temperature/humidity during the recording process.

6　Description of battery status display

Power Display	Capacity
▉ (full)	40％～100％
▉	15％～40％
▉	5％～15％
▢	＜5％

7　Battery replacement

Step 1: Turn the battery cover counter clockwise to open it.

Step 2: Take off the battery cover.

Step 3: Remove the battery.

Step 4: Replace the battery.

(Please note the positive and negative terminals.)

Step 5: Please install the battery cover.

Step 6: Turn the battery cover clockwise to close it.

Note:

It is recommended to check the battery status before restarting the device to ensure that the remaining battery power could finish the recording.

8　Management software download

Download address of the management software for parameters configuration:

http://d.tzonedigital.com/TM.aspx

9　Notes

1. For the first time use, please connect the device to computer for parameter configuration to synchronize the system time.

2. After reconfiguration, the previously recorded data will be cleared. Please read and save the historical data before configuring the device parameters.

3. If there is no button operation for one minute, the device will automatically turn off the screen. Click the button to light up the screen again.

4. Please do not remove the battery during the device recording.

5. When the battery icon is not a full icon, do not use it for long-distance transportation.