Temperature/RH Datalogger

800054 & 800055

SPER
SCIENTIFIC

Environmental Measurement Instruments

TABLE OF CONTENTS

QUICK START GUIDE CE

***For detail operation procedure, please download the manual from software CD!**
***While power is low, completely turn off the logger and replace with new battery.**

INSTALL THE SOFTWARE

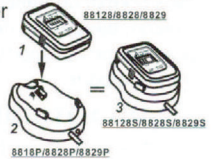
Insert the datalogger software CD then the installation program should start automatically.

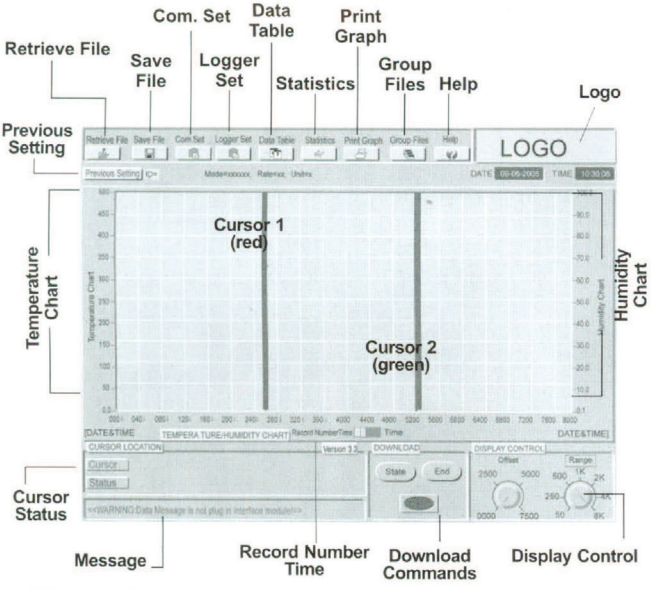
A. Install Software : Run the installation program
B. Website : Visit our website
C. Browse CD-ROM : Browse the CD-ROM through Windows.
D. Manual : Detail operation procedure in PDF format
E. USB Driver : Driver for USB type interface
F. Exit : Exit the installation

ATTACH THE INTERFACE & LOGGER

Fit the cable (RS232 port or USB port) to your computer by connecting it to the serial port COM1 or COM2 of your PC or Notebook. To use USB port interface, be sure to install USB driver first.

Fit the loggers (88128/8828/29/8813/14/15/8833/34/35/88335/345/355) to your interface by sliding the datalogger onto interface and make the metal points of the interface & datalogger contacted well. While the datalogger contacts well with interface, the ID information of the datalogger will appear on main screen. If not, **<< WARNING: Data Logger is not plug in interface module!>>** message will appear on screen.



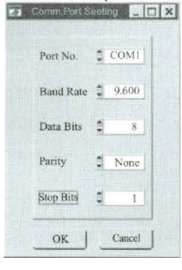


COM. PORT SETUP

Select icon for **"Com. Port Setting"**. Set correct COM port, Baud rate, Data bits, Parity and Stop bits. Usually, it's **COM1** for most PC. Select up to **COM 8** for special systems. Select **OK** to accept setting changes, **Cancel** to abort and to exit com. port setting.

Note:

Always remember to select 9600 baud rate.



LOGGER SETTING

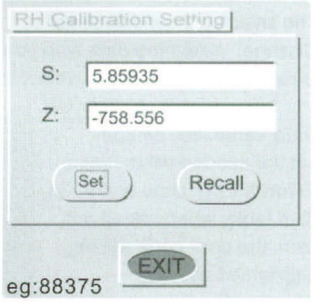
Select "Logger Set" button from main screen to set logger sampling parameters.

To make sure the time of datalogger is correct, always remember to press "OK " at Clock Setting to make the time frame of logger is same as your local time. **NOTE: The time of your PC must be correct.**

The needed parameters are sample points, sample rate, start mode, unit and ID. If "Schedule" is selected as start mode, then start date and time need to be set as well. High/Low alarm setting are optional.

To select "Sleep" mode could make the logger LCD automatically turn off after sampling is finished. The selectable time frame is from 1 sec. to 12 hours.

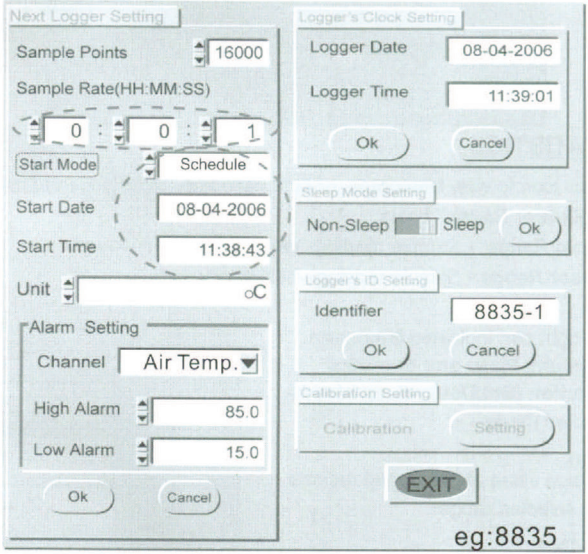
For few models, the external probe calibration data need to be keyed into logger through computer before start recording. The calibration data will be printed in a small note enclosed with goods. Please keep the note well. Please enter the values printed on the note into PC (see right photo) and then press "SET" to save the values.



Model	Calibration ?
88335/ 88345/ 88355	Need external temp. probe calibration
88375	Need external RH probe calibration

Please refer to below table for the available start mode of each type dataloggers.

	Immediate	Magnetic	Schedule	On-line	Key Start	Repeat
88128/8828 /8829	●	●	●			
8813/8814 /8815	●		●		●	
8833/8834 /8835	●		●	●	●	●
88335/8834 5/88355	●		●	●	●	●



RETRIEVE FILE

Click on icon to retrieve and to load a data file into this program.
This program is designed to log up to 4K, 8K or 16K Sample readings.

SAVE FILE

To select a folder and name to save the data. The windows **" Save File "** dialog box allows you to specify the file format to save the data, the file name to be called and where the file to be saved to.

DATA TABLE

Press icon to view detailed data table which includes 1000 sample readings. Print out the data table to either a printer or a fax /internet application depending on available facilities.

Click on the right mouse button anywhere over the table control to activate a menu which contains **Goto** and **Find** menu items.

Goto You can specify a target cell to go to, using its row and column indices.

Find You can search all numeric and text cells in the entire table, or in a selection range.

The software also offers data selection function so you could set the conditions first and then press **"GO"** key to highlight the database. The selectable conditions are :

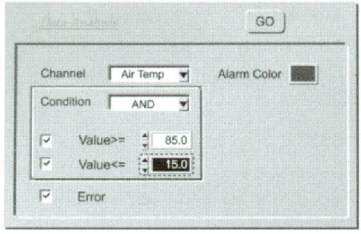
Channel: select the data type you could like to analysis.

Data Selection: **AND/OR,** select to decide the range selected below is AND or OR.

Data Value: tick off and set the needed value range.

Error: if Error code appear in data table, when tick off this item, the error code will be highlighted as well.

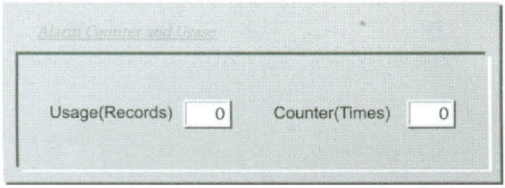
Alarm color: pick up a color to highlight the selected data.



Besides the data table will be highlighted, below two information will be counted automatically to help user doing detail analysis.

Usage(Records): The software could help to count how many records is within the range you set.

Counter (Times): Help to count how many runs the data out of the selected range and then come back again.



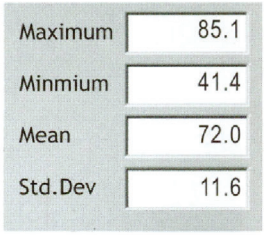
STATISTICS

Press icon to view histograms of data based on **"*Whole Range*"** basis or **"*Cursor Range*"** basis.

Whole Range **-** Sample readings which have been logged.

Cursor Range **-** Sample readings between two cursors.

The right part indicates **Maximum, Minimum, Mean and Standard Deviation (Std.Dev)** values from the selected range.



Mean:
Average value of the logged records from selected range.

Std. Dev.:
Calculate each deviation between each value and Mean value; then, get an average figure from totalism deviation.

GROUP FILES

Click on its icon to view **"Multi-Logger Monitor"**, which is designed to view and to compare different data files. You may select and change the color of curve to refer to the file you retrieve by clicking the color block. You can print the screen data by clicking the printer icon at the right top corner.

DISPLAY CONTROL

Offset - To set up from which sample reading you would like to start. Full range of 0000 to 7500 are selectable.

Range - To set up the range of sample reading you would like to cover in the chart. There are **50, 250, 500, 1K, 2K, 4K, 8K** for selection.

SPECIFICATION

SPECIFICATIONS	88128	8828	8829	8813	8814	8815	8833 88335	8834 88345	8835 88355
TEMP. RANGE	-40~85°C (-40~185°F)			-30~70°C (-22~158°F)			-40~85°C (INTERNAL), -40~100°C (EXTERNAL,8833~5) 10~150°C (EXTERNAL,88335~355)		
HUMIDITY RANGE			0~100% RH						0~100%RH
SHAPE									
POWER BAT.	ER3 lithium battery x1			CR2032 x 1			ER3 lithium battery x1		
ACCURACY	Temp.:± 0.6°C(-20~50°C) ±1.2°C(-40~-20°C,51~85°C) RH%: ±3% (at 25°C,10-90%), ±5% at others			Temp.:± 0.6°C(-20~50°C) ,±1.2°C(-30~-20°C,51~70°C)			Temp.:± 0.6°C(-20~50°C) ,±1.2°C(-40~-20°C,51~85°C) RH% ±3% at 25°C		
BAT LOW DISPLAY	"Lo" DISPLAY			"bAt" FLASH			"Battery icon" DISPLAY		
SAMPLE DATA	Up to 16000			Up to 4000		8000	Up to 8000		15999
SAMPLE POINTS	1K/2K/4K/8K/12K/16K			1K/2K/4K		1K/2K/4K/8K	1K/2K/4K/8K		1K/2K/4K/8K/16K
LCD DISPLAY	SIZE:12 x 25.5 mm			SIZE:12 x 25.5 mm			SIZE:12 x 25.5 mm		
HOUSING	WATERPROOF		WATER RESISTANT	WATERPROOF			WATERPROOF		
DIMENSIONS(mm)	80(L)x55(W)x22(T)			80(L)x55(W)x22(T)			72(L)x56(W)x21(T)		
LED SIGNAL	Red (HI,LO Alarm) /Yellow(Record)			Red (HI,LO Alarm) /Yellow(Record)			Red (HI,LO Alarm) /Yellow(Record)		
RESOLUTION	0.1°C (0.1°F)			0.1°C (0.1°F)			0.1°C (0.1°F)		

WARRANTY

Sper Scientific warrants this product against defects in materials and workmanship for a period of **one (1) year** from the date of purchase, and agrees to repair or replace any defective unit without charge. If your model has since been discontinued, an equivalent Sper Scientific product will be substituted if available. This warranty does not cover probes, batteries, battery leakage, or damage resulting from accident, tampering, misuse, or abuse of the product. Opening the meter to expose its electronics will void the warranty.

To obtain warranty service, ship the unit postage prepaid to:

SPER SCIENTIFIC LTD.
8281 E. Evans Rd., Suite 103
Scottsdale, AZ 85260

The defective unit must be accompanied by a description of the problem and your return address. Register your product online at www.sperwarranty.com within 10 days of purchase.

CE

08/2015