

TT-2W+RA-2L

RF (Wireless), Fan coil Thermostat, 2PIPE

TT-2W is a surface-mounted transmitter unit and **RA-2L**, a receiver unit, is designed to control all kind of 2 pipe fancoils system efficiently with precise control.

Feature and Function:

- ✓ There are 3 fan speeds, LOW/Medium / High / Auto
- ✓ With easy one touch button to run Comfort, Economy and Away mode
- ✓ Temperature setting
Wireless operation range is up to 30 meters
- ✓ Easy operating for RF code setting and no interface by each nearby pair.(see installation)
- ✓ The backlight is brightly indicated in the dark environment

TT-2W (Transmitter Unit) Specification

1. Power supply: 1.5V AA Battery * 2pcs
Battery life: 1 year typical
2. Working frequency: 868 MHz
3. Temperature display resolution: 0.1°C
4. Temperature control range:
Heat: 5 °C- 34 °C
Cool: 6 °C- 35 °C
5. Cool Temp. Setpoint (Csp) \geq HEAT Temp Setpoint (Hsp) +1°C

7. Temperature Defaults

Comfort:	Economy:
HEAT: 21°C	HEAT: 14°C
COOL: 23°C	COOL: 26°C
Away:	
HEAT: 16°C	
COOL: 29°C	

8. Temperature adjustment scale:

0.5°C / step

9. Selectable Switching Differential (hysteresis):

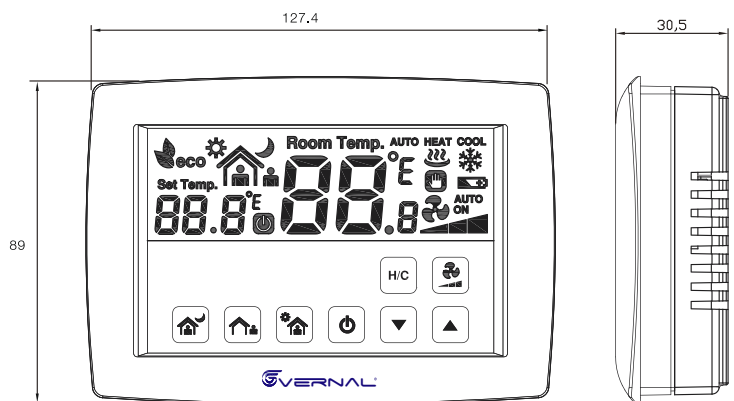
Celsius: 0.2~1.0°C

Default: 0.4°C

10. Temperature Sensor: NTC 10K Ohm@25°C

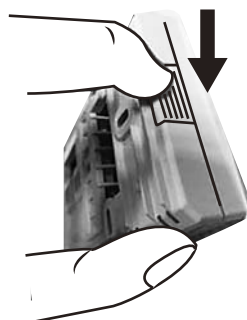
11. Sampling Resolution: 1 minute interval

12. Dimensions: 127.4mm x 89mm x 30.5mm



Installation

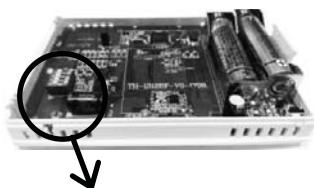
To open the front housing of thermostat and complete wiring complies with below procedure.



Push the groove of the thermostat housing











Pull down the front cover and take it apart












Set Dip Switch's RF Code
Then insert the batteries

4. You may set the different RF Code by the Tx's dip switch to prevent RF interference from other nearby transceiver sets and to match the Rx's code. Initial RF codes is 0000 (All pins are downward). You can select 16 different codes.
5. Note that Take battery off/reload or push reset button will reset the RF code

Key description


	Shortcut to the setpoint under Economy mode.
	Shortcut to the setpoint under Away mode.
	Shortcut to the setpoint under Comfort mode.
	Set the system into Stand-by mode.
	Press the key to increase the value.
	Press the key to reduce the value.
	Press the key to select heating cooling and off (fan only with close valve)
	Press the key to set Fan On (Select the fan speed to Low, Med, or High level)/ Fan AUTO


Icon description

	System Fan is ON
	Fan 3-speed indicator, Low/Med/High Level.
	Battery power indicator.
	Means the system is in heat mode
	Means the system is in heating status.
	Means the system is in heat mode
	Means the system is in cooling status.
	Means the system is in manual setting mode.
	Means the system is running at eco-friendly temperature setpoint(Heating Temp setpoint $\leq 16^{\circ}\text{C}$, Cooling Temp setpoint $\geq 27^{\circ}\text{C}$)

Operating Instruction

1. Three Present Mode

There are three preset temperature modes on the control panel . Select one key (mode) which you want to preset the temperature

Press $\Delta+$ or $\nabla-$ to set the resent value
Press the mode button  to save it immediately or wait 3 seconds to save it automatically


2. Manual Setting

Press $\Delta+$ or $\nabla-$ and the LCD will show a flashing temperature with "Set Temp" symbol




Proceed and press $\Delta+$ or $\nabla-$ to set a desired temperature. The temperature will be increased 0.5°C by per step and press $\nabla-$ will decrease temperature value by 0.5°C
When completed setting of desired temperature, please wait for 3 seconds until the LCD stops flashing and the thermostat starts to operate

3. Speed Fan and Auto mode



Press  to enter Fan Auto/ON mode

The system will enter the FAN AUTO -> FAN ON LOW->> FAN ON MED ->>> FAN ON HIGH -> FAN AUTO by pressing  alternately

FAN AUTO mode means the system will automatically select different speed of fan according to the temperature differential

FAN ON LOW  mode means select the fan works with low speed,
FAN ON MED  mode mean select the fan works with medium speed and
FAN ON HIGH mode  mean select the fan works with high speed.

4. System Switch Mode

Press  to enter System Switch mode
The system will enter the HEAT ->> COOL ->>> OFF-mode by pressing  alternately

The **HEAT** mode means system enter heating setting mode, the LCD will show **HEAT**

The **COOL** mode means system enter cooling setting mode, the LCD will show **COOL**

5. Advance Setting (Temperature calibration)

Press and hold $\Delta+$ and $\nabla-$ keys at the same time for 5 seconds to enter Advance Setting
You will see -0.0°C on the screen. If so, you are in "Temperature Calibration" setting

Pressing $\Delta+$ to tune the calibration value
ou may tune this up to -9.0°C
Wait for 10 Seconds and the Temperature Calibration value will save automatically and the screen will return to normal operation.

Differential" Setting

Press and hold $\Delta+$ and $\nabla-$ keys at the same time for 5 seconds to enter Advance Setting
When you see the first screen, this should be the temperature calibration screen.
press ⏻ to access the Differential Setting.
To check that you can see 0.4°C on screen.

Press $\Delta+$ or $\nabla-$ key to change value (0.2°C/ 0.4°C/ 0.6°C/ 0.8°C/ 1°C, the default value is 0.4°C)

Press ⏻ will return to normal mode.

Standby mode

Press ⏻ will enter "Stand-by" mode

Press the key again will disable the "Stand-by" mode and return to normal mode.

Override function

Override function is to override the current preset mode temperature settings

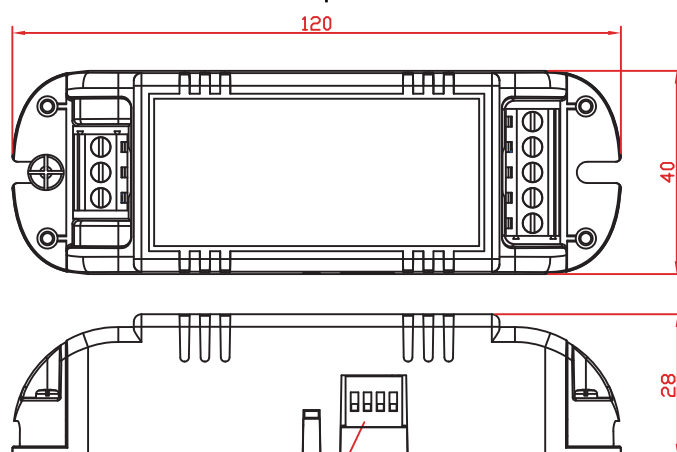
Press $\nabla-$ or $\Delta+$ key to change the temperature setting

Adjustable temperature range is from 5°C to 35°C, with 0.5°C resolution per step

The LCD will show the icon ⏻ if the manual override setting is different from the existing preset setting

The system will automatically run the new setting after 3 seconds

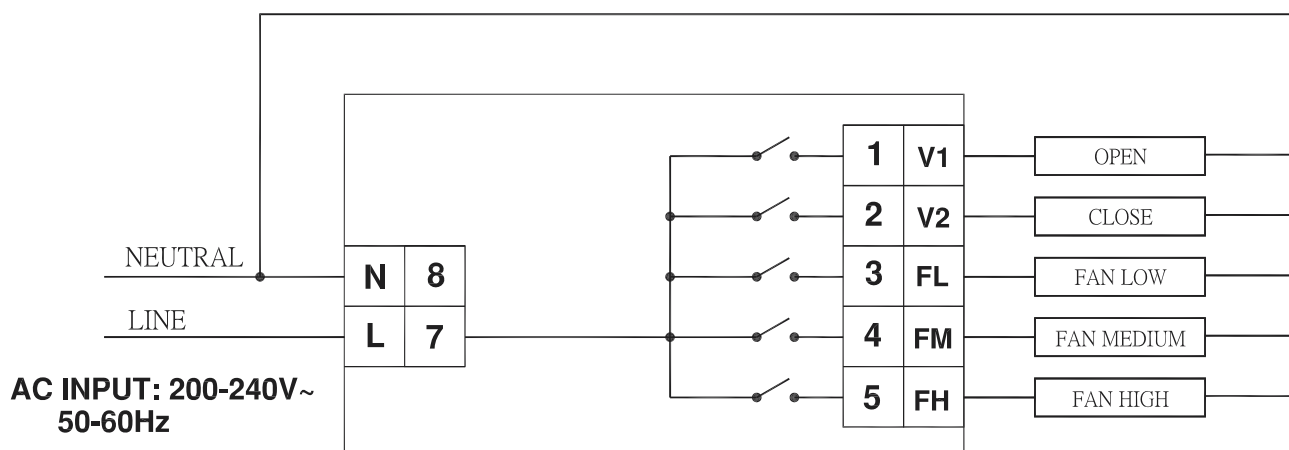
Press any Preset Temperature (⏻ ⏻ ⏻) to cancel the Temporary Override function and returns to normal operation



DipSwitch (for setting RF-ID)

Note: Wiring properly to avoid damage the product or cause a hazardous condition.

RA-2L- Wiring diagram

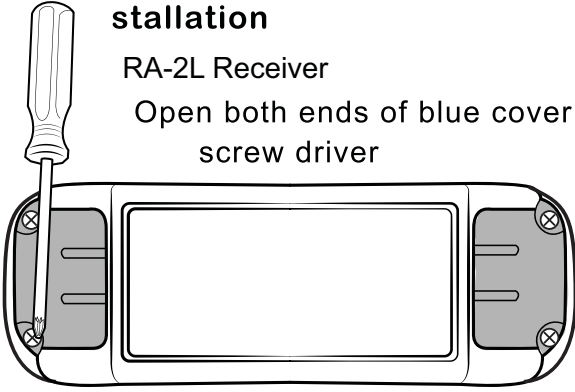


Contact Rating: 5A Total Max Load

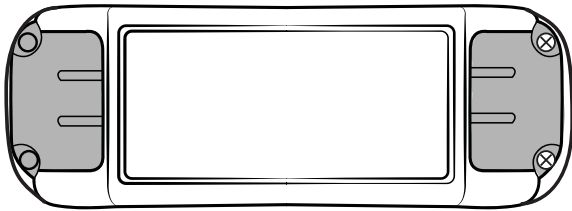
Installation

RA-2L Receiver

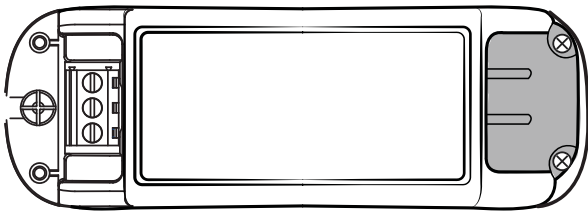
Open both ends of blue cover by screw driver



Pull up the blue cover

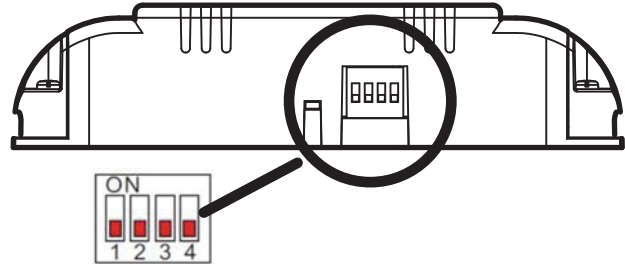


You can screw the wire on the terminal now after taking off cover



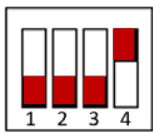
Operating struction

RF code (ID) setting

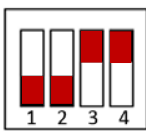


1. Check RF code to match with the transmitter's RF code. Initial code setting is 0000 (All pins are downward)
2. RF LED indicator (on the right next to reset) :
 - A. RF signal is transmitting to RA-2L When TT-2W operates the instructions
 - B. Disconnecting (no operation) -> LED off (RED)
 - C. Connecting when operating the instruction > LED flash 3 sec and then off

Different Selectable Codes



(1)



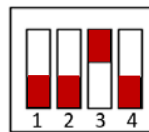
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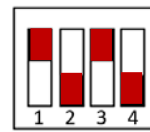
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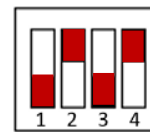
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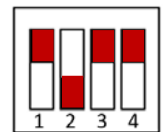
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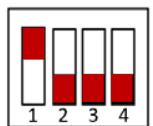
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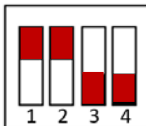
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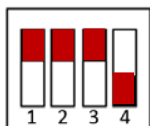
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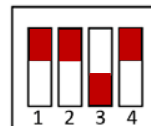
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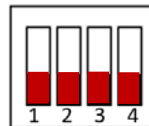
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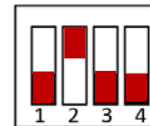
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(12)



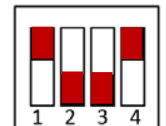
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(14)



(15)



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