

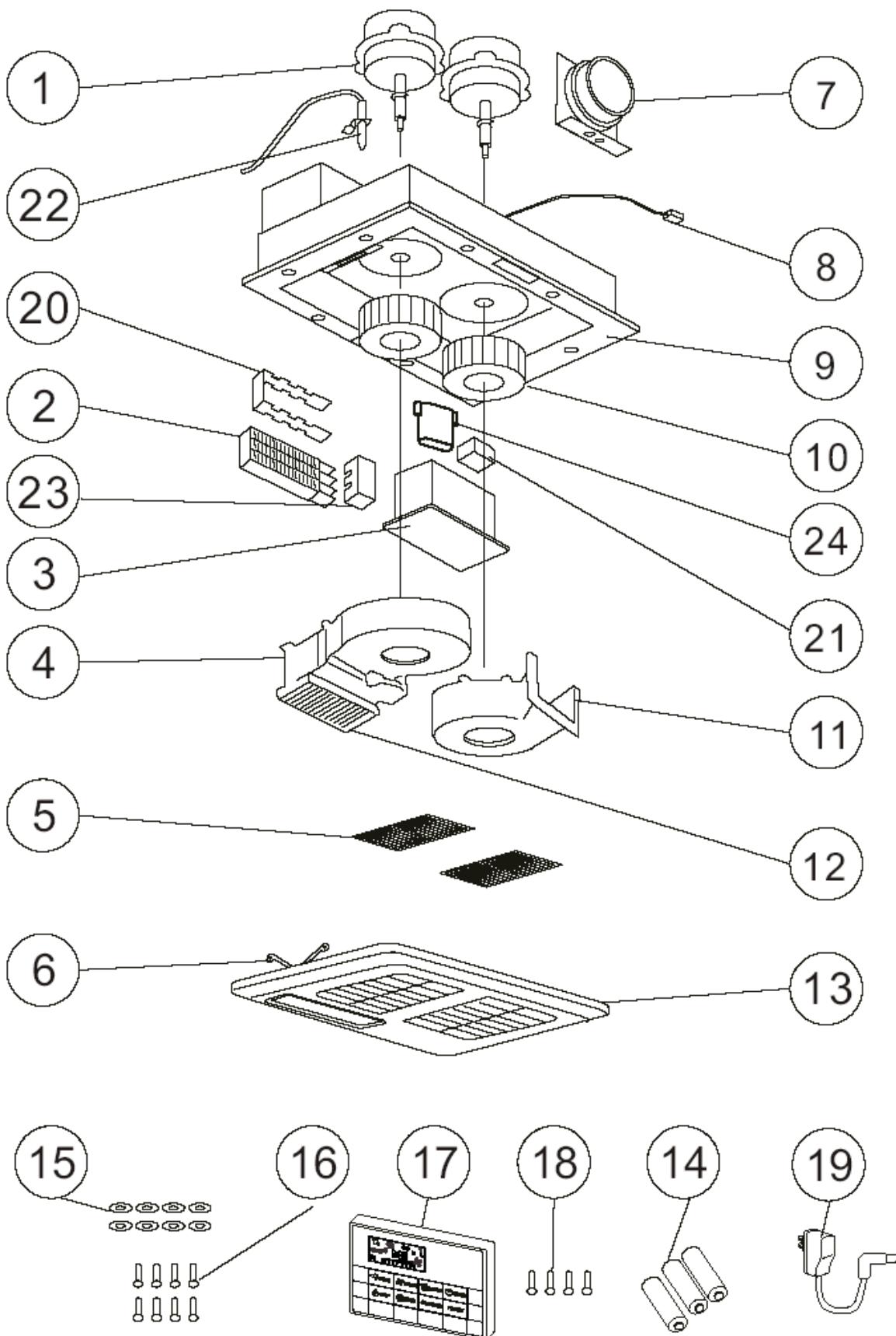
# RF Wireless Touch-Panel Multi-Function Dryer

## Installation and Operation Manual

### Precautions

- Before installation, please confirm whether the voltage is 110 V or 220 V.
- Before installation and operation, please read this manual carefully.
- After the installation is complete, please provide this manual to the customer.

## Decomposition Diagram of the Product Components

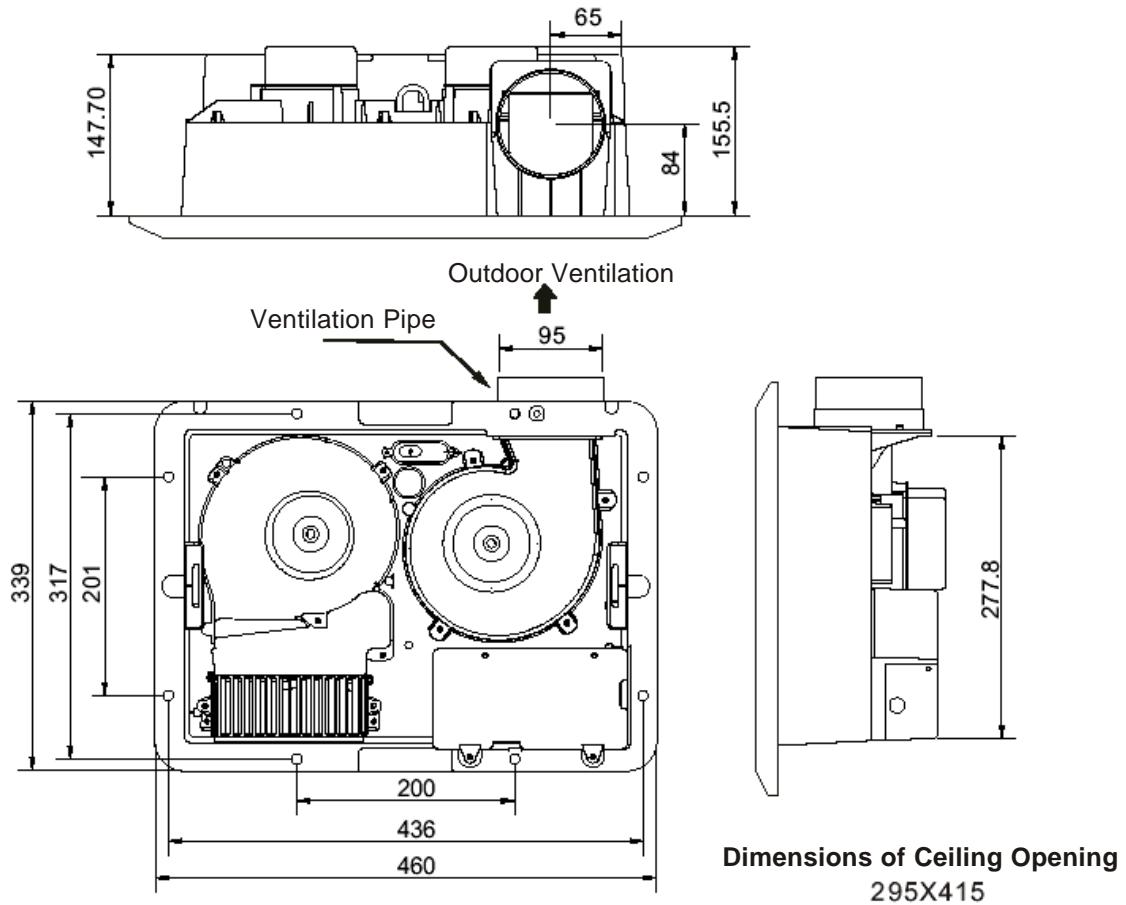


## Part List of the Product

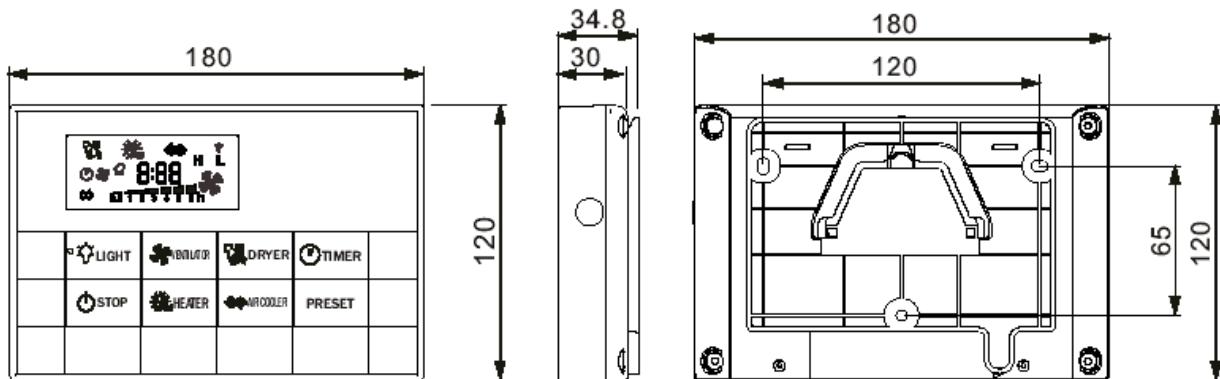
Item No.	Name	Specification	Quantity	Remark
1	Motor	Capacitor Induction Type	2	
2	Heater	Ceramic PTC	1	
3	Circuit Board Chassis	PP Fire-resistant Material	1	
4	Cover of Circulation Fan	PBT Reinforced Plastic Material	1	
5	Filter	ABS	2	
6	Spring Clamp	SUS	2	
7	Ventilation Pipe Connector	ABS	1	
8	Remote Control Cable	Length 30 cm	1	
9	Device Chassis	ABS Fire-resistant Material	1	
10	Fan	ABS Fire-resistant Material	2	
11	Cover of Air Renewal Fan	ABS	1	
12	Air Outlet	PBT Reinforced Plastic Material	1	
13	Panel	ABS	1	
14	Alkaline Batteries AA	AA SIZE 1.5V	3	
15	Washer	Stainless Steel	8	
16	Self-tapping Screw	5x25	8	
17	Remote Control	ABS	1	
18	Mount Screw	4.1x16	4	
19	Adapter	Electronic (DC6V)	1	
20	Mica Sheet	0.4 mm	1	
21	3P Terminal Block	300V 20A	1	
22	Thermal couple	NTC	1	
23	Heater Socket	PBT Reinforced Plastic Material	1	
24	RF Receiver	ABS	1	

## Outline Diagram with Dimensions

### Dryer

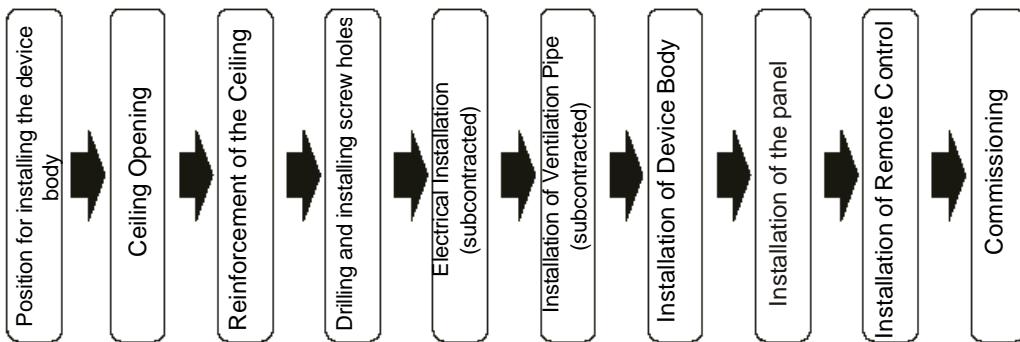


### Remote Control



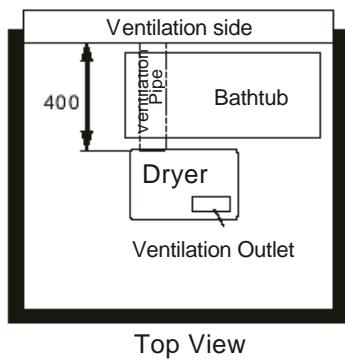
# Installation of Dryer

## Installation Procedure



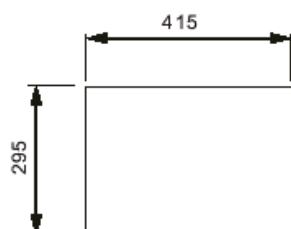
### 1. Position for installing the device

1. Install the ventilation pipe for the dryer according to the recommendation in the right figure. The connector can only be located in the direction toward the ventilation side.
2. If there is a ceiling beam in the room, the installation position should be changed. Nevertheless, the drying time will be longer, and the ventilation performance will be reduced.



### 2. Ceiling Opening

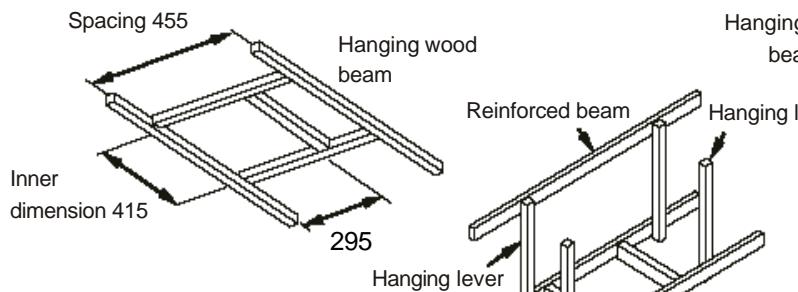
Make an opening on the ceiling with dimensions shown in the following figure.



### 3. Reinforcement of the Ceiling

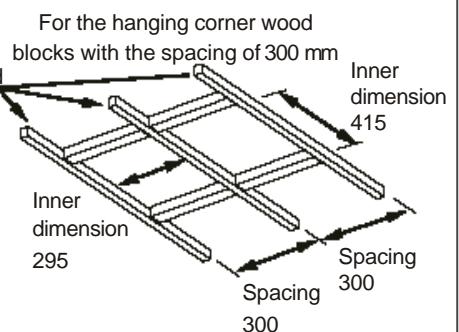
On the working site, a wood frame (inner dimension 290), the reinforced hanging corner wood blocks (40x40), etc can be used.

For the hanging corner wood blocks with the spacing of 455 mm



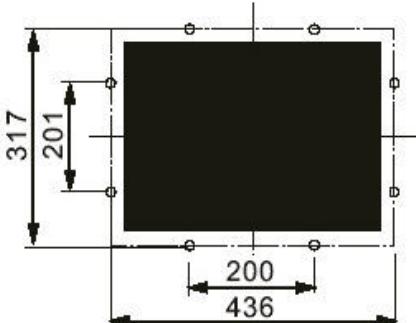
To prevent the hanging corner wood block from bending, it is necessary to use the hanging lever.

If the ventilation pipe is blocked by the wood frame, please partially cut the wood frame.

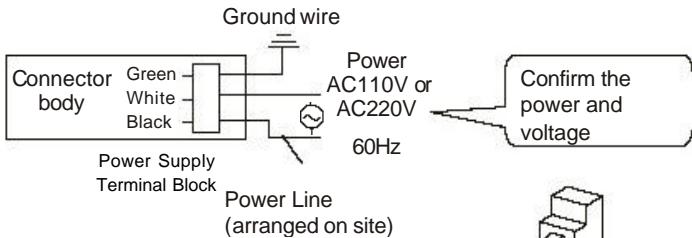


4. Drilling and installing the screw holes 5. Electrical Installation

Drill 8 screw holes (04.2) around the previous opening as shown in the following figure.



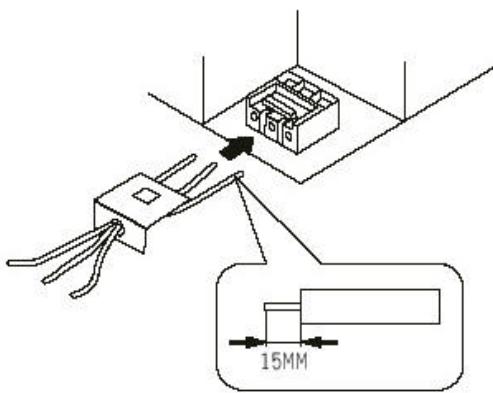
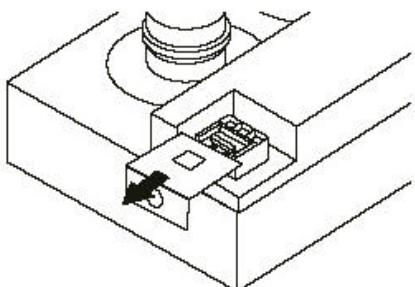
## Wiring diagram



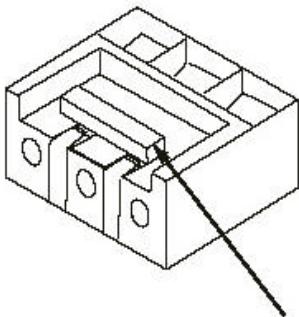
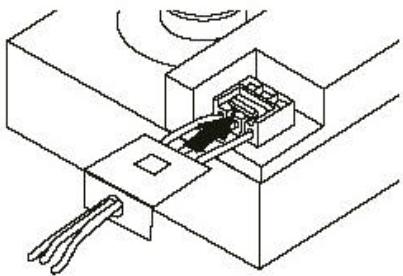
It is necessary to install a dedicated earth leakage circuit breaker (20A). Please use the power cord with 0.2 mm single core (VVF cable).



## Earth leakage circuit breaker



Remove the cover of the terminal block



Pass the core of the wire (Ø 2mm) through the cover of the terminal block and then inset it into the terminal block

Close the cover of the terminal block

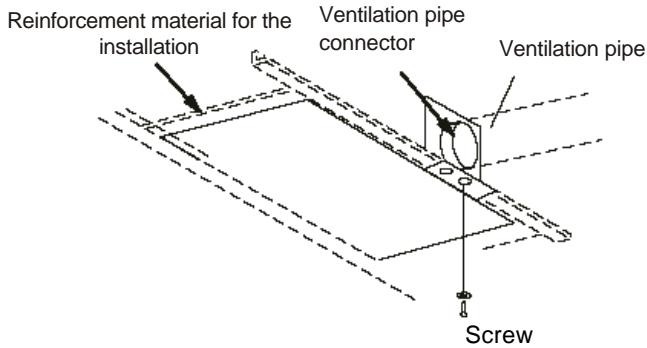
While removing the power cord, please use a screwdriver for electrical work to press the locking clamp.

### Caution:

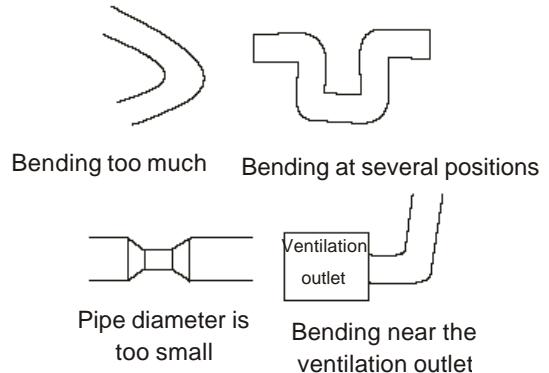
1. Before the operation, please confirm whether the power is AC110V or AC220V.

## 6. Installation of the Ventilation Pipe (subcontracted)

Mount the ventilation pipe connector on the reinforcement material, and then connect the ventilation pipe.

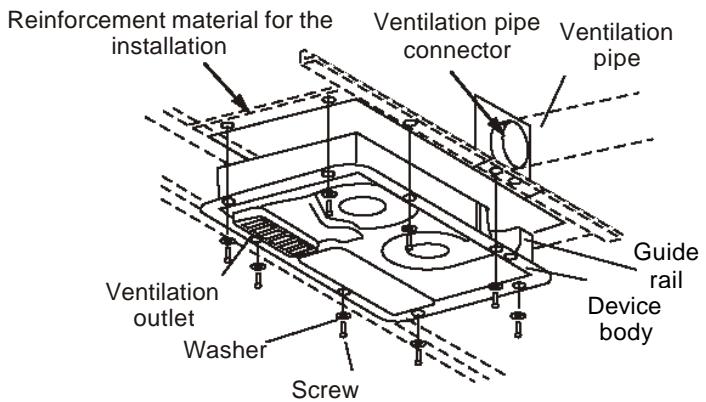


While installing the ventilation pipe, the following situations should be avoided.



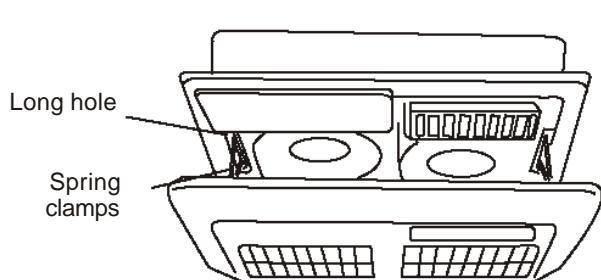
## 7. Installation of the device body

1. Carefully insert the guide rail of the ventilation pipe connector on the device body to the ventilation pipe connector.
2. Make sure that the device body and the ventilation pipe connectors are closely attached and then fasten the screws.



## 8. Installation of the panel

Press the spring clamps with two hands, insert it into the long hole on the device body and then release the clamps to complete the installation.

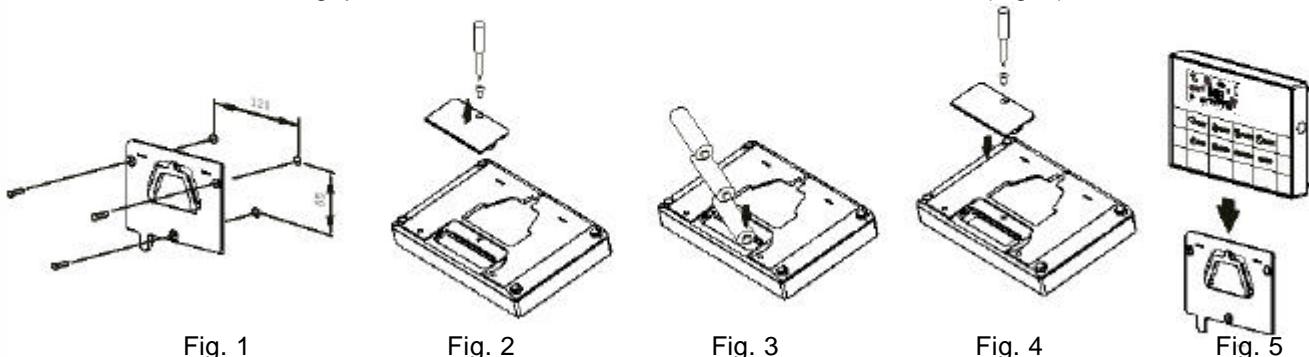


## 9. Installation of the remote control

The remote control must be installed outside the bathroom so as to avoid damage to the remote control by the high temperature and high humidity. The remote control can be optionally powered by the batteries or the adapter. First, make three circular holes (120 × 65) outside the room and then install the remote control according to the following figure.

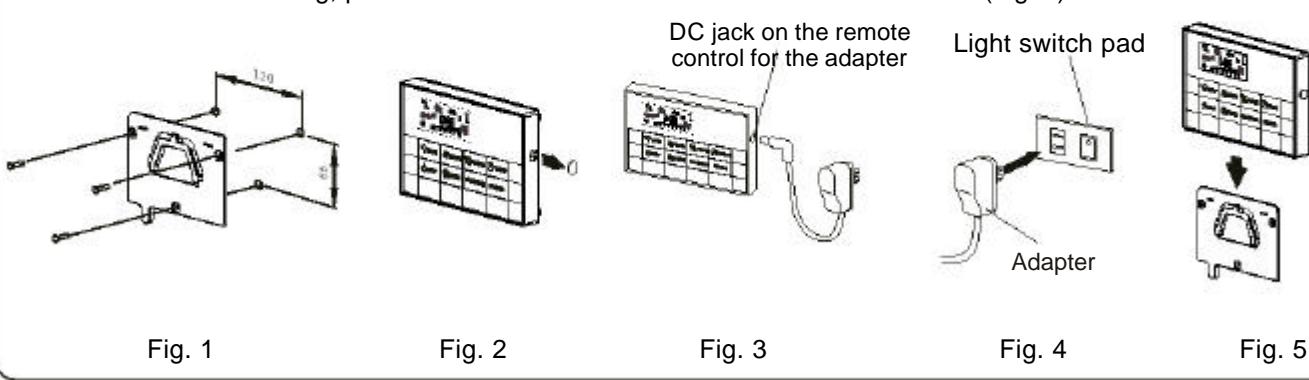
### Installation procedure (for batteries)

1. Make three circular holes (120 × 65) on the wall according to dimensions shown the figure. (If there is an existing switch box, this step can be skipped.) Then screw the remote control socket to the wall. (Fig. 1)
2. Open the lid of the battery compartment on the remote control. Note the opening direction (as shown in Fig. 2). Insert 3 AA alkaline batteries, (Fig. 3), and then close and screw the lid of the battery compartment. (Fig. 4)
3. After the commissioning, place the remote control in the remote control socket. (Fig. 5)



### Installation procedure (for adapter)

1. Make three circular holes (120 × 65) on the wall according to dimensions shown in the figure. (If there is an existing switch box, this step can be skipped.) Then screw the remote control socket to the wall. (Fig. 1)
2. Take out the plug of the DC jack on the remote control (Fig. 2), insert the DC connector of the adapter (Fig. 3) and then plug the power cord to the electrical outlet adjacent to the light switch pad outside the bathroom. (Fig. 4)
3. After the commissioning, place the remote control in the remote control socket. (Fig. 5)



#### Caution:

- (1) The remote control may be powered by 3 AA alkaline batteries or by the adapter. While not in use, the batteries should be removed to avoid the damage to the components and malfunction due to the battery leakage. If the adapter is to be installed, please do not install the batteries.
- (2) Please do not install the remote control near metal objects (such as metal shelf) so as to avoid affecting the receiving sensitivity of the remote control.

## Commissioning

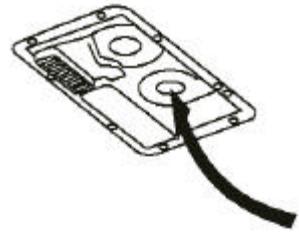
### 1. Ventilation (Strong / Standard)

Press the  button to enter the mode . After the ventilation fan rotates, the wind starts coming out.

Press the  button again to enter the mode . Please confirm the wind level.

Press the  button to set the operating time interval.

For stopping the operation, Press the  button.



### 2. Heater

Press the  button, the symbol  blinks and the system enters the preheating mode . The fan starts to generate wind. After approx. 10 seconds, the wind becomes warm.

Press the  button again, the symbol  blinks and the system enters the mode . Please confirm the wind level.

Press the  button to set the operation time interval.

For stopping the operation, press the  button.



### 3. Air Cooler

Press the  button, the system enters the mode  for the circulation fan operation. After the ventilation fan rotates, the wind starts coming out.

Press the  button again, the system enters the mode . Please confirm the wind level.

Press the  button to set the operation time interval.

For stopping the operation, press the  button.



### 4. Dryer (Cloth drying)

Press the  button, the system enters the dryer mode .

The circulation fan and the ventilation fan rotate and the wind starts coming out.

After approx. 10 seconds, it becomes warm.

Press the  button to set the operation time interval.

For stopping the operation, press the  button.



### 5. Preset

Press the  button, the preset start time symbol  blinks.

Press the  button to set the preset time (the time till the operation starts)

Select the operation mode. For example, select the  mode;

meanwhile, the preset operation time symbol  blinks.

Press the  button to set the operation time. (The operation time for the selected operation mode).

Press the  button again to complete the preset operation. The symbol  appears, and the timer starts counting down. For stopping the operation in the midway, Press the  button.



## Setting the ID Code (Configured in the factory before delivery):

Only when the button on the remote control is pressed but there is no corresponding action, or the remote control is replaced, it is necessary to set the ID code of the remote control.

1. After the Dryer is supplied with power, press and hold the Reset button on the RF receiver for 3 seconds (Fig. 1). When the slowly blinking green light of LED turns into slowly blinking red light, the system enters the ID setting mode (as shown in Fig. 2). (In the setting mode, the operation should be completed within 60 seconds. It is necessary to perform the setting on the remote control within 60 seconds. If the operation is not successfully completed, it will automatically exit the ID setting mode.)

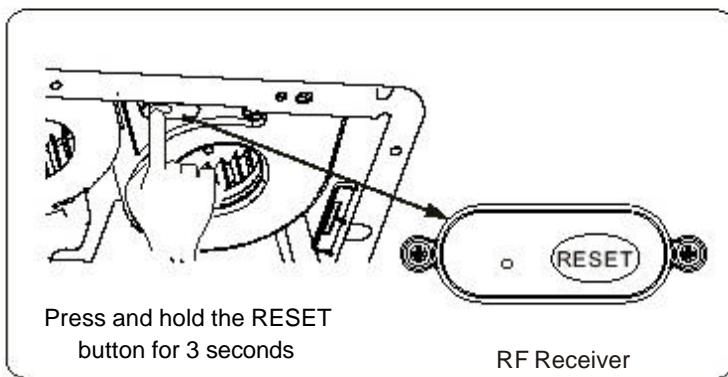


Fig. 1

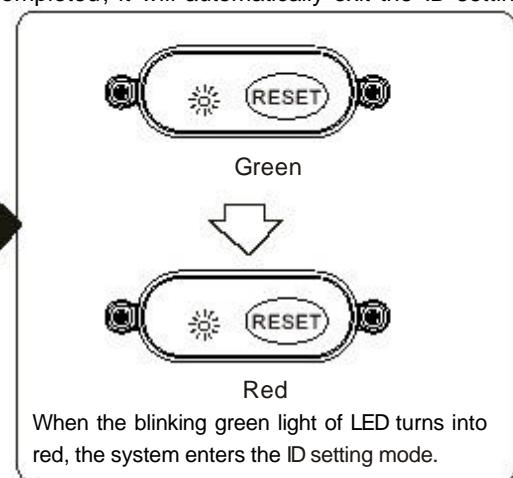


Fig. 2

2. The adapter of the remote control must be unplugged and then plugged in again (Fig. 1). If it is powered by the batteries, it is necessary to remove the batteries and then replace them (Fig. 2). As the LCM shows the "Version" screen (Fig. 3), press the "TIMER" button and the "PRESE" button at the same time (Fig. 4) to enter the setting operation. This operation procedure should be completed within 60 seconds after the RF receiver enters the ID setting mode. Otherwise, an error (Err) will occur (Fig. 6). Now, press the RESET button of the dryer to complete the operation. If the setting operation is successfully completed, it will display "GOD" and the last 3 digits of the set ID code at this time (Fig. 5). After the screen is cleared, normal operations can be performed. If the setting operation fails, it will display "Err" (Fig. 6)

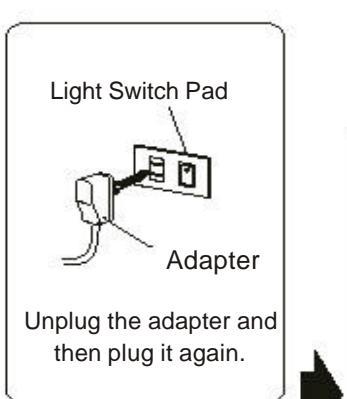


Fig. 1

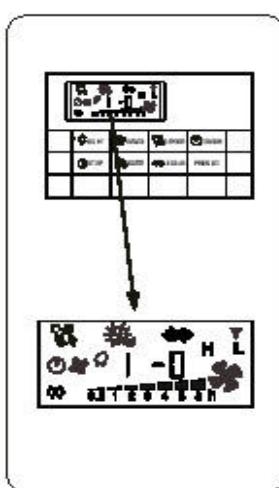


Fig. 3

LCM shows the "Program Version" for approx. 3 seconds

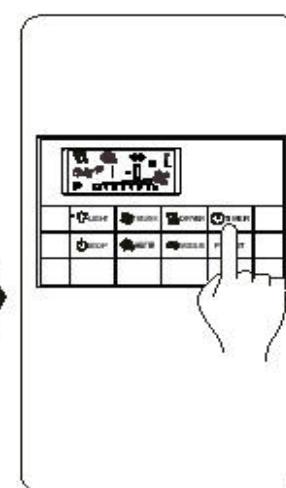


Fig. 4

It is necessary to press the "Timer" button and the "PRESET" button at the same time while the "Version" screen is displayed.

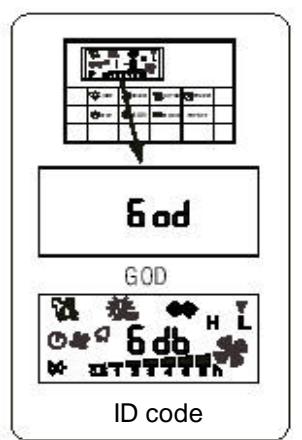


Fig. 5

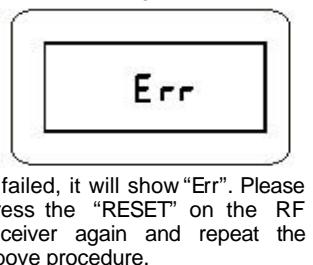


Fig. 6

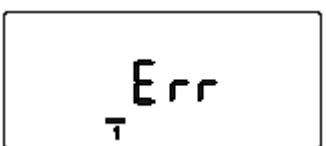
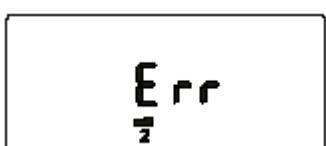
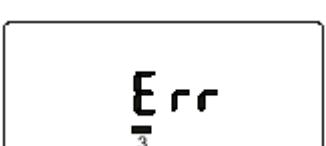
Note: If the ID code setting operation is not successfully completed, please check the following conditions.

1. Whether the RF receiver entered the ID setting mode or not
2. Whether the remote control setting is completed within the 60 second time limit for the ID setting mode or not
3. When the remote control shows the "Version" screen, whether the "TIMER" button and the "PRESET" button are pressed at the same time (other buttons should not be touched)

## Troubleshooting for the Dryer

Malfunction	Reason for the malfunction	Solution
Can not turn on the power	Is the dryer connected to the power?	Re-connect the power
	Is the power cord connected with the circuit breaker on the power distribution panel?	Reconnect the wires
Abnormal noise	Is the dryer firmly installed on the ceiling?	Please re-install
	Is the fan jammed?	Remove the external object.
No response while pressing the buttons on the remote control	Is the ID code different from that in the dryer?	Re-set the ID code (see "Setting the ID Code").
	Are two buttons pressed at the same time?	Please press the center of the button.
	Does the DC jack for the power supply have poor contact or are the batteries running out of electricity?	Firmly plug the connector into the DC jack or replace the batteries.
Dryer is not responding to the button operation of the remote control	Is the ID code different from that in the dryer?	Re-set the ID code.
	Are two buttons pressed at the same time?	Please press the center of the button.
	Is the distance between the remote control and the dryer too far?	Please re-install.

## Trouble Shooting for the Remote Control

Error displayed on the RF receiver	Reason for the malfunction	Solution
Once quick blink of the red light	Communication error	Break or malfunction in the internal wiring
		The problem remains even the above treatment is performed
Two quick blinks of the red light	Thermostat error	Stop the operation → contact the specialized technician for service. After the problem is solved, press the Reset button on the RF receiver.
		Stop the operation → contact the specialized technician for service. After the problem is solved, press the Reset button on the RF receiver.
Three quick blinks of the red light	Temperature error	Is the fan jammed?
		The problem remains even the above treatment is performed
Four quick blinks of the red light	Circuit board error	Remove the external object
		Stop the operation → contact the specialized technician for service. After the problem is solved, press the Reset button on the RF receiver.
		Contact the specialized technician for service.

## Product Feature

The operation of this bathroom dryer is performed in the following operation modes. Please use the remote control for the operation.

**Dryer mode**  This indicates the dryer mode. The cloth can be warmed and dried rapidly. Half way through the preset time, the amount of ventilation will be reduced.

**Air Cooler Mode**  This indicates the air cooler mode. In summer, this mode can be used when the indoor temperature is high. This mode can also be used for drying clothes in summer.

**Strong Ventilation Mode**  This indicates the strong ventilation mode. The amount of ventilation is large. This mode can be used for a large bathroom or for rapid ventilation. It can be used to control the mist in the bathroom and the water drops on the device body. It is recommended to perform the ventilation operation three hours after taking a bath.

**Standard Ventilation Mode**  This indicates the standard ventilation mode, which is similar to the strong ventilation mode. However, the amount of ventilation is less than that of the strong ventilation mode, the operation noise is lower. It is suitable for ventilation while taking a bath.

**Bathroom Pre-Heating Mode**  It is recommended to start this operation 15 minutes before taking a bath. During the pre-heating operation of 15 minutes, the symbol will blink.

**Bathroom Heating Mode**  15 minutes after the operation starts, the amount of warm air automatically decreases and the symbol becomes constantly lit. In winter, this operation can be used to control the amount of water vapor in the bathroom.

### Preset Mode

For the preset operation, please refer to page 13.

It is very convenient to use the preset function while being out, for drying washed clothes at night, for warming the bathroom in the morning, etc.



It is possible to set the end time for the operation of each mode.

- Once the end time is reached, the operation automatically stops so that it can be used to avoid the unwanted operation when the user forgets to turn off the switch.

## Operation of the Remote Control

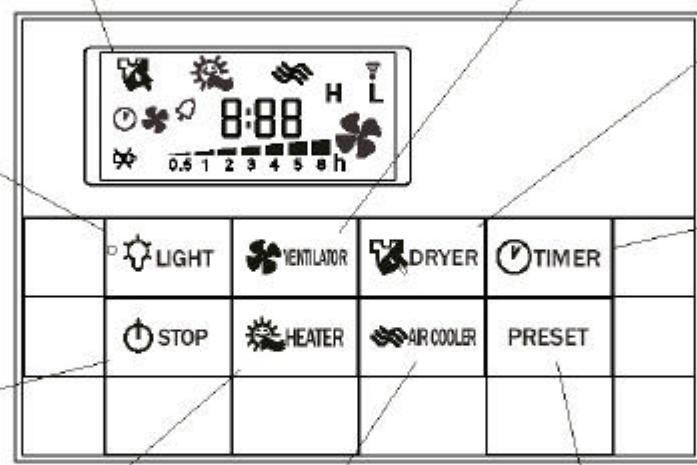
**8:88** Remaining time of the timer

It represents the remaining time of the timer. When the symbol indicating the operation mode appears, it will display the remaining time till the end of the operation. When the preset  symbol appears, it displays the remaining time till the operation starts...

 Ventilation operation button  
When this button is pressed, the symbol appears, and the ventilation operation starts. Press this button again to change the operation mode

 Light button  
When this button is pressed, the bathroom light is lit. Press it again, the light goes off. Switch on/off the light.

 Stop button  
Press this button to stop the operation



 Drying operation button  
When this button is pressed, the symbol appears and the drying operation starts.

 Timer setting button  
When this button is pressed, the remaining time indicator moves to the right. When it reaches 8h, it will re-start from 0.5h.

 Heating operation button  
When this button is pressed, the symbol appears and the pre-heating operation starts. Press this button again for changing the operation mode.

 Air cooling operation button  
When this button is pressed, the symbol appears and the operation starts.

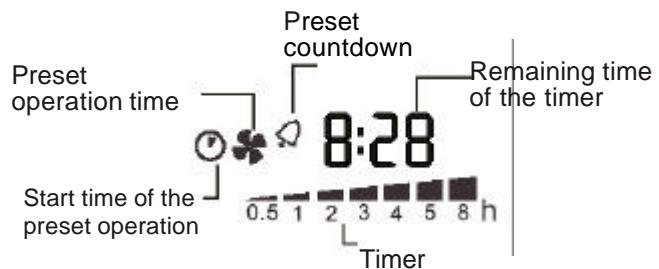
 Preset confirmation button  
This button is used for setting the preset operation time. When this button is pressed, the preset symbol blinks for entering preset time setting mode. When the preset operation mode button is pressed, the operation time indication blinks for entering the operation time setting mode. Finally, press the button again to complete the preset time setting.

In order to ensure the normal operation of the machine, it requires approx. 3 seconds for switching between each operation mode.

When the operation is recovered after the power outage, it will reset to the default settings (Dryer 3 hours, Air cooler 1 hour, Ventilator 3 hours, Heater 1 hour).

For changing the operation time, press the  button

The operation time setting for each mode can be up to 8 hours (as shown in the figure). The time setting of the timer can be 30 minutes, 1 hour, 2 hours, 3 hours, 4 hours, 5 hours and 8 hours.



Once the operation time is set, it will be stored in the computer. When operating the next time by pressing the operation mode button, the previously set time will be displayed. (While setting the preset operation, it will also display the previously set operation time.)

## Operation Method

### Dryer

#### 1. Select the operation mode

Press the  button, the symbol  light and the drying operation starts.

#### 2. Set the operation time

Press the  button for setting the operation time. Once the operation time is reached, the operation stops immediately.

#### 3. Stop.

For stopping the operation midway, press the  button.

Note: After the drying operation stops, in order to protect the heater, the machine will automatically cooling for 10 seconds.

### Ventilator

#### 1. Press the button, it enters the mode . After the ventilation fan rotates, the wind comes out.

Press the  button, again, it enters the mode .

Please confirm the wind level. Press the  button for setting the operation time. For stopping the operation, press the  button.

#### 2. Set the operation time.

Press the  button for setting the operation time. When the operation time is reached, the operation stops.

#### 3. Stop

For stopping the operation midway, press the  button.

Note: After taking a bath, in order to reduce mist, it is recommended to use the Strong or Standard mode for the ventilation operation (more than 3 hours).

In winter, de-humidification of the ventilator is less effective. It is recommended to perform the ventilation operation for a longer time.

For the ventilation operation during a bath in winter, the dryer may collect water drops due to the condensed vapor.

### Air Cooler

#### 1. Press the button, the symbol appears, and the air cooler starts the operation.

#### 2. Set the operation time

Press the  button for setting the operation time. When the operation time is reached, the operation stops.

#### 3. Stop

For stopping the operation midway, press the  button.

#### Note:

If there is operation noise.

During the air cooling operation, press the  button again, the fan level and the operation noise will be reduced and the symbol .

Press the  button again, it will return to the previously set fan level and the symbol  appears.

## Heater

### 1. Select the operation mode

Press the  button, the symbol  blinks and the pre-heating operation starts. It is recommended to start the operation 15 minutes before taking a bath.

During such a “pre-heating” process (15 minutes after the operation starts), the operating noise will be high due to the strong ventilation and heating fan rotation.

At this moment, the symbol  blinks and the symbol  spears on the screen.

For approx. 15 minutes after the operation starts, the warm fan and the operation noise will decrease. During a bath, the heater operation can reduce the cold and warm the body.

At this moment, the indication symbol  lights and the symbol  appears.

Method for quick starting the operation during a bath.

During the pre-heating process (with the symbol ), press the  button for switching to the Bath heating mode.

Press the button again for switching back.

When the operation stops, press the button two times continuously, it immediately switches to the Bath heating mode.

### 2. Set the operation time

Press the  button for setting the operation time. When the operation time is reached, the operation stops.

### 3. Stop.

For stopping the operation in the midway, press the  button.

After the heating stops in the heating operation mode, the machine will automatically cool down 10 seconds.

## Preset

### 1. Set the Preset time

Press the  button, the preset start time indication symbol  starts blinking.

Press the  button for setting the preset time (the time till the operation starts)

### 2. Select the operation mode

After selecting the Preset operation mode, the preset operation time symbol  blinks.

### 3. Set the operation time

Press the  button for setting the operation time (the operation time for the selected operation mode). Press the  button again to complete the Preset setting.

(If the  button is not pressed, the system will automatically complete the preset setting operation after 60 seconds)

The Preset countdown symbol  lights and the preset start time set previously in step 1 will be activated.

### 4. Stop/Re-set

For stopping the operation midway or re-setting, press the  button. (During the operation, it is not possible to use the remote control to make a preset operation.)

## Example of the Preset Operation

Example: The current time is 7 o'clock in the morning.

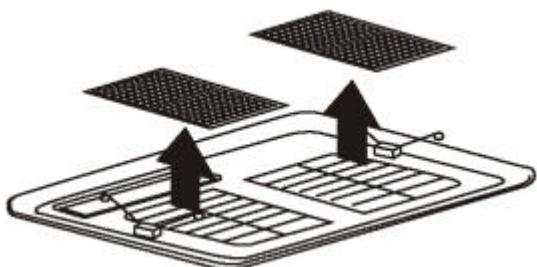
The user wants to make the preset operation starting from 9 am to 12 pm (3 hours) for the drying operation.



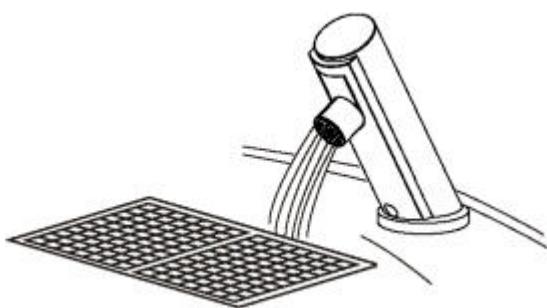
1. Press the **PRESET** button.
2. The preset operation start indicating symbol starts blinking.
3. Press the **P TIMER** button, the preset time is set as 2:00 (as shown in the above figure).
1. Select the **DRYER** button.
2. The preset operation time symbol blinks.
3. Press the button to set the operation time as 3:00(as shown in the above figure).
4. Finally, press the **PRESET** button to complete the setting
5. The preset countdown symbol  lights, the timer starts to count down.

## Cleaning Method

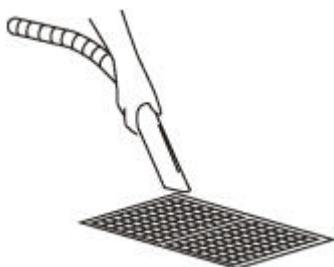
1. Remove the filters



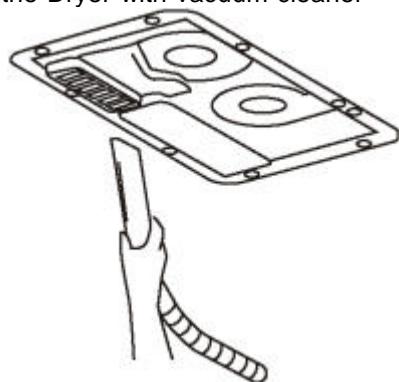
3. Wash the filters with hot water containing neutral detergent. Do not use brush to clean the filters



2. Clean the filters with the vacuum cleaner.



4. Clean the Dryer with vacuum cleaner



## Caution

This product is designed for embedding into the ceiling of the bathroom, it should not be installed at other locations (the dimension of the opening on the ceiling: 415 x295mm\height > 20.5cm). The height for the installation of this product should be at least 2.3 meters.

If possible, place the warm fan outlet at the center of the bathroom ceiling. It is recommended to avoid installing the machine at the location where the fan will directly blow to the human body or in the range where the filters may be drawn out (the filters should be cleaned every month).

This product should use a dedicated No Fuse Breaker of 20A and a separate circuit which should not be shared with other electrical appliances.

During the operation, please do not remove the cover, touch the heater, or insert an external object. Otherwise, it may cause electric shock or burn injury.

Do not sprinkle the dryer with water.

While performing maintenance work, please do not turn off the power.

Always firmly fix the panel.

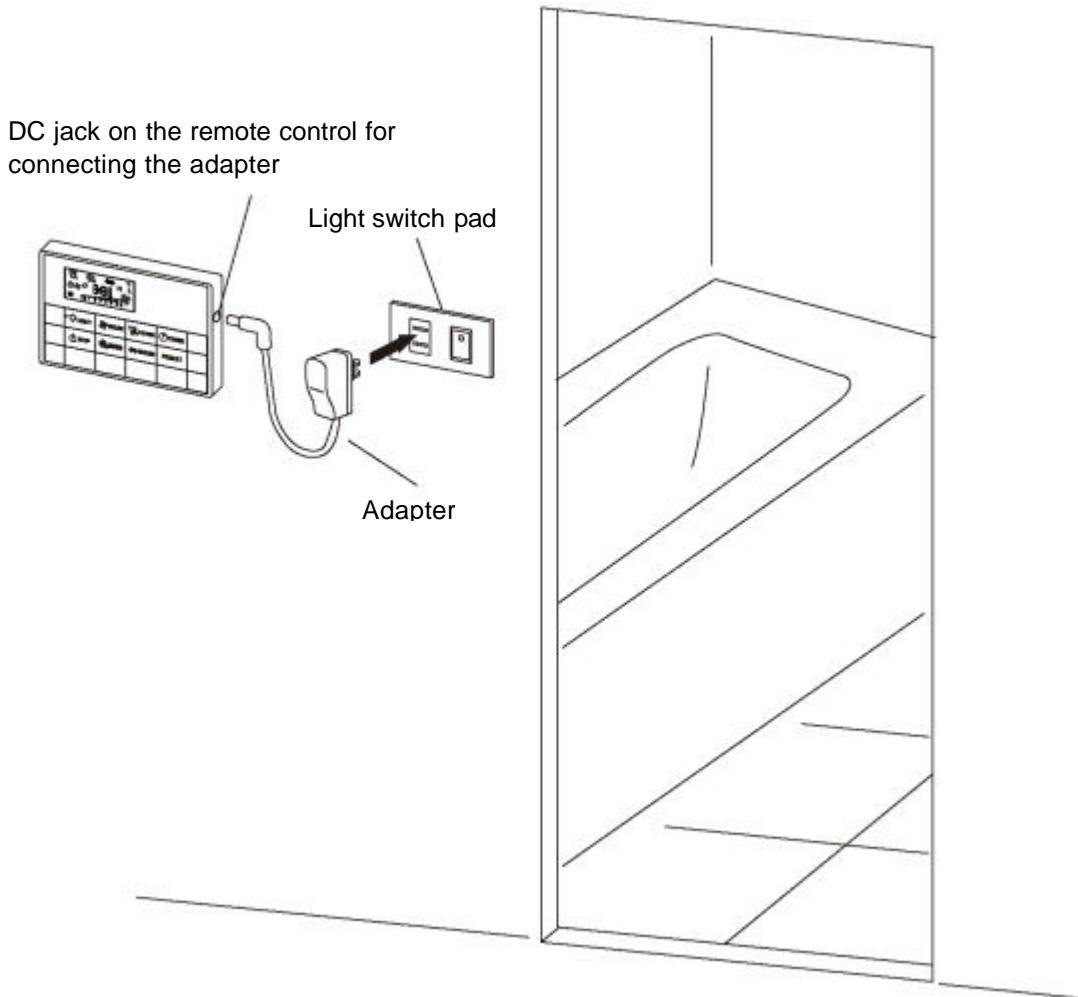
Do not wipe the dryer with chemicals. Otherwise, it may deteriorate the machine.

Do not mount other objects on the filters. Otherwise, it may cause dryer malfunction.

## Caution

While installing the adapter, there should be a power outlet on the light switch pad outside the bathroom for installing the adapter.

If the adapter is to be installed, please do not install the battery at the same time.



**Caution:** The remote control can be powered by 3 AA alkaline batteries or by the adapter. While not in use, the batteries should be removed to avoid the damage to the components and malfunction due to the battery leakage.

## Specifications

Voltage (V) 60Hz	Power (W)	Ampere (A)	Wind Flow (M <sup>3</sup> /h)	Noise (dB)	Weight (Kg)	Installation Dimensions (mm)
110	1230	11.2	135	48	7.1	415x295
220	1230	5.6	135	48	7.1	415x295

Distributor

Date of Purchase:

Seal by Distributor (Company name, Address and Telephone):



## Cautions Installation Procedure (Adapter)

The remote control must be installed outside the bathroom so as to avoid the damage to the remote control by the high temperature and high humidity. The remote control can be optionally powered by the battery or the adapter. First, make three circular holes (120x65) outside the room and then install the remote control according to the following figure.

1. Make three circular holes (120 x 65) on the wall according to dimensions shown the figure. (If the is an existing switch box, this step can be skipped.) Then screw the remote control socket to the wall. (Fig. 1)
2. Take out the plug of the DC connector on the remote control (Fig. 2), plug the DC jack of the adapter (Fig. 3) and then plug the power cord to the electrical outlet adjacent to the light switch pad outside the bathroom. (Fig. 4)
3. After the commissioning, place the remote control in the remote control socket. (Fig. 5)

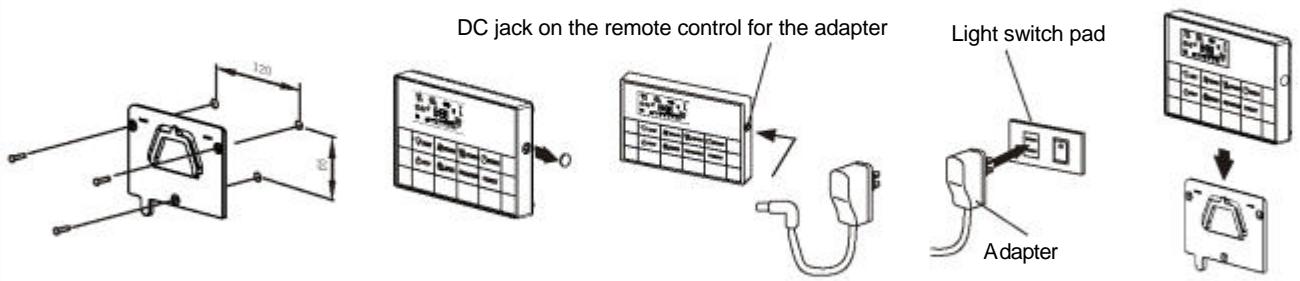


Fig. 1

Fig. 2

Fig. 3

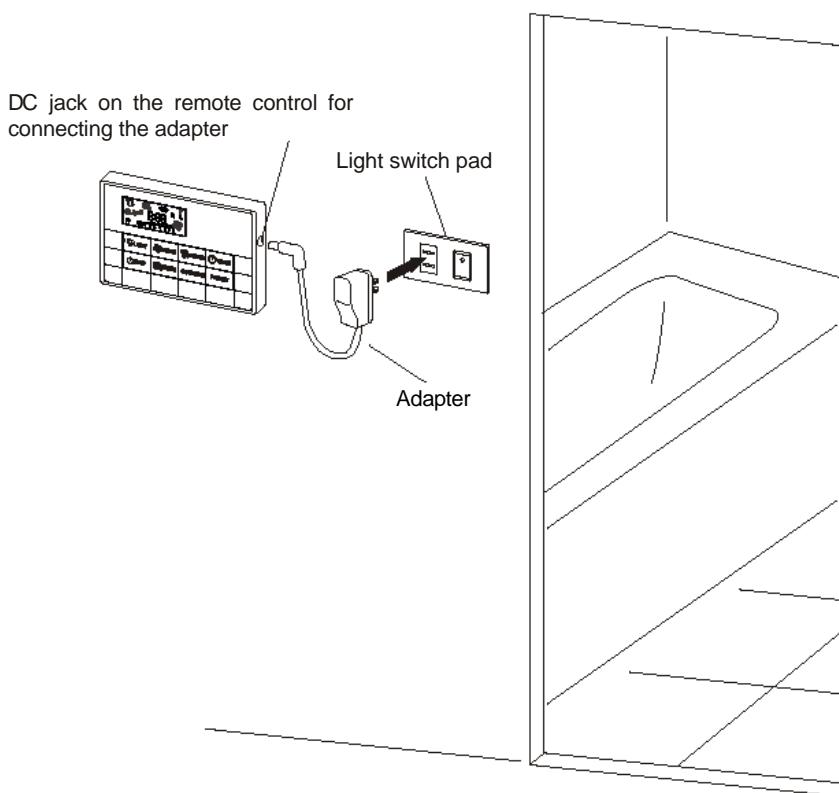
Fig. 4

Fig. 5

Note: The remote control can be powered by 3 AA alkaline batteries or by the adapter. While not in use, the batteries should be removed to avoid the damage to the components and malfunction due to the battery leakage.

While installing the adapter, there should be a power outlet on the light switch pad outside the bathroom for installing the adapter.

If the adapter is to be installed, please do not install battery at the same time.



Only when the button on the remote control is pressed but there is no corresponding action, or when the remote control is replaced, it is necessary to set the ID code of the remote control (please refer to "Setting the ID Code" in this manual, p9).



## Cautions Installation Procedure (Battery)

First, make three circular holes (120 × 65) outside the room and then install the remote control according to the following figure.

1. Make three circular holes (120 × 65) on the wall according to dimensions shown the figure. (If the is an existing switch box, this step can be skipped.) And then screw the remote control socket to the wall. (Fig. 1)
2. Open the lid of the battery compartment on the remote control. Note the opening direction (as shown in Fig. 2). Insert 3 AA Alkaline batteries (Fig. 3), and then close and screw the lid of the battery compartment. (Fig. 4)
3. After the commissioning, place the remote control in the remote control socket. (Fig. 5)

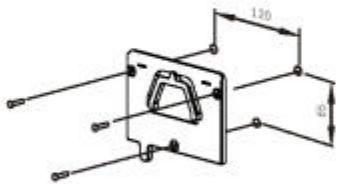


Fig. 1

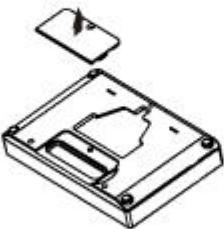


Fig. 2

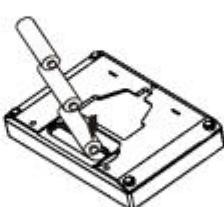


Fig. 3

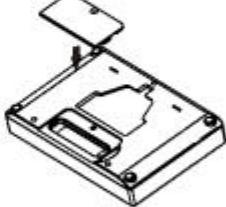


Fig. 4

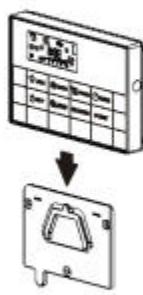
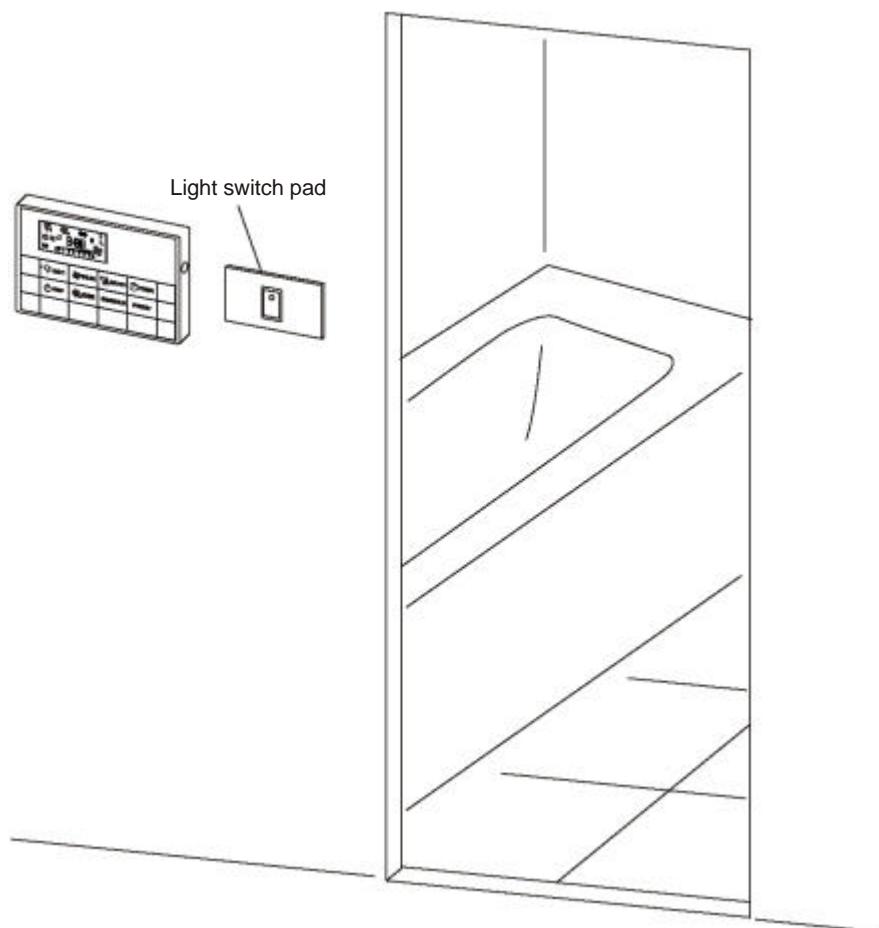


Fig. 5

Note: The remote control can be powered by 3 AA alkaline batteries or by the adapter. While not in use, the battery cells should be removed to avoid the damage to the components and malfunction due to the battery leakage.

The remote control must be installed outside the bathroom so as to avoid the damage to the remote control by the high temperature and high humidity.



Only when the button on the remote control is pressed but there is no corresponding action, or when the remote control is replaced, it is necessary to set the ID code of the remote control (please refer to "Setting the ID Code" in this manual, p9).