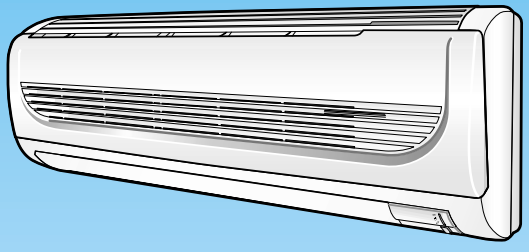
SAMSUNG

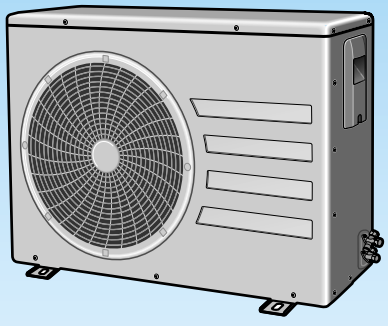
ROOM AIR CONDITIONER

INDOOR UNIT	OUTDOOR UNIT
AQ18WJWB	UQ18WJWB
AQ18WJWE	UQ18WJWE
AQT18WJWB	UQT18WJWB
AQT18WJWE	UQT18WJWE
AQ24W6WB	UQ24W6WB
AQ24W6WE	UQ24W6WE
AQT24W6WB	UQT24W6WB
AQT24W6WE	UQT24W6WE
SH18ZWJ	SH18ZWJX
SH24ZW6	SH24ZW6X

SERVICE *Manual*

AIR CONDITIONER





CONTENTS

1. Product Specifications

1-1 Table

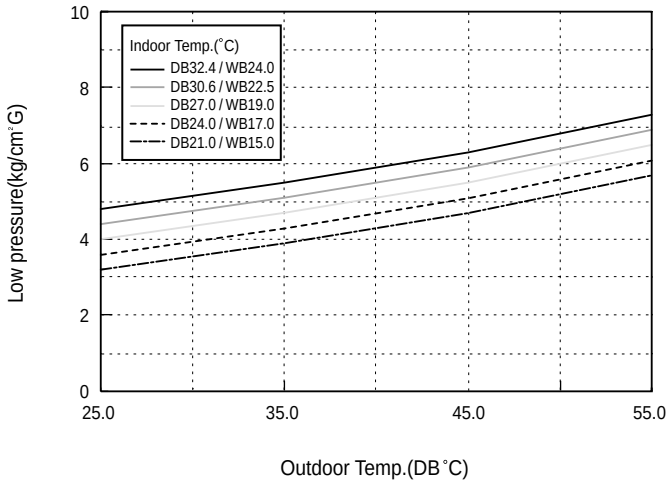
Item \ Model					AQ18WJWB AQT18WJWB		AQ24W6WB AQT24W6WB	
					Indoor unit	Outdoor unit	Indoor unit	Outdoor unit
Type					Wall-mounted		Wall-mounted	
Performance	Cooling			kcal/h[1]	4,000		5,050	
				BTU/h[2]	18,000		24,000	
	Heating			kcal/h	5,050		6,050	
				BTU/h	20,000		24,000	
	Dehumidifying			ℓ/h	1.9		2.7	
	Air Volume	Cooling		m^3/min	13.5	25	14.4	45
		Heating			14.7	25	15.0	45
	Noise	Cooling		dB	45/43/41	58/58	46/44/42	61/61
		Heating			45/43/41	58/58	46/44/42	61/61
	Energy Efficiency	Cooling		BTU/Wh[1]	7.01		7.05	
				BTU/Wh[2]	9.47		9.60	
		Heating		W/W	3.25		2.65	
				BTU/Wh	11.11		9.06	
	Power			ø-V-Hz	1-220-60		1-220-60	
	Power Consumption	Cooling		kW	2.25[1], 1.9[2]		2.85[1], 2.5[2]	
		Heating			1.8		2.65	
Power	Operating Current	Cooling		A	10.1[1], 8.8[2]		13.2[1], 11.5[2]	
		Heating			8.2		12.2	
	Power Factor	Cooling		%	98.0		98.0	
		Heating			98.0		98.0	
	Starting Current			A	47		65	
	Power Cord	Length		m	-		-	
		Number of Core Wire			-		-	
		Capacity		A	-		-	
Size	Outer Dimension	Width x Height x Depth		mm	1,065 x 298 x 218	790 x 548 x 285	1,065 x 298 x 218	880 x 638 x 310
				inch	41.9 x 11.7 x 8.6	31.1 x 21.6 x 11.2	41.9 x 11.7 x 8.6	34.6 x 25.1 x 12.2
	Weight			kg	13	39	13	64
	Refrigerant Pipe	Liquid		mm x L(m)	ø6.35 x 5		ø6.35 x 5	
		Gas		mm x L(m)	ø12.7 x 5		ø15.88 x 5	
	Drain Hose			D x L(mm)	ø18 x 2,000		ø18 x 2,000	
	Compressor	Type			Rotary		Rotary	
		Motor	Type		Induction Motor(PSC)		Induction Motor(PSC)	
			Rated Output		1,950		2,670	
	Oil Type				SUNISO-4GSD		SUNISO-4GSD	
	Blower	Type			Cross flow	Propeller	Cross flow	Propeller
		Motor	Type		steel	steel	steel	steel
			Rated Output	W	15	50	15	50
Heat Exchanger					2R0W 16 STEP	2ROW 24STEP	2R0W 16 STEP	2ROW 28STEP
Refrigerant Control unit					CAPILLARY TUBE		CAPILLARY TUBE	
Freezer Oil Capacity				cc	600		800	
Refrigerant to Change(R22)				g	1,100		1,500	
Protection Device(OLP)					MRA12068-12007		Internal	
Cooling Test Condition					[1]INDOOR UNIT : DB29˚C WB19˚C OUTDOOR UNIT : DB46˚C WB24˚C [2]INDOOR UNIT : DB27˚C WB19˚C OUTDOOR UNIT : DB35˚C WB24˚C			
Maximum Operation Condition		Cooling			INDOOR UNIT : DB32˚C WB23˚C OUTDOOR UNIT : DB54˚C WB24˚C			
		Heating			INDOOR UNIT : DB27˚C WB15˚C OUTDOOR UNIT : DB24˚C WB18˚C			

Table(cont.)

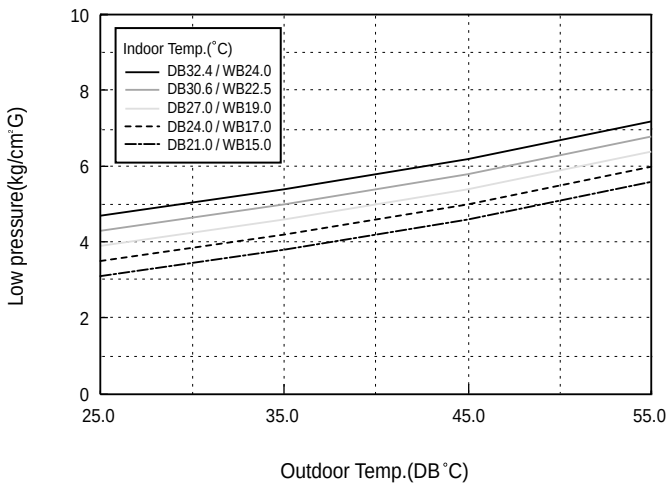
Item \ Model					AQ18WJWE AQT18WJWE SH18ZWJ		AQ24W6WE AQT24W6WE SH24ZW6	
					Indoor unit	Outdoor unit	Indoor unit	Outdoor unit
Type					Wall-mounted		Wall-mounted	
Performance	Cooling			kcal/h(1)	5.1		6.8	
				BTU/h(2)	18,000		24,000	
	Heating			kcal/h	5.6		7	
				BTU/h	20,000		24,000	
	Dehumidifying			ℓ/h	1.9		2.7	
	Air Volume	Cooling		m^3/min	13.5	25	14.4	45
		Heating			14.7	25	15.0	45
	Noise	Cooling		dB	45/43/41	58/58	46/44/42	61/61
		Heating			45/43/41	58/58	46/44/42	61/61
	Energy Efficiency	Cooling		W/W	2.68		2.72	
				BTU/Wh	9.47		9.60	
		Heating		W/W	2.95		2.64	
				BTU/Wh	10.53		9.06	
	Power			ø-V-Hz	1-220/240-50		1-220/240-50	
Power	Power Consumption	Cooling		kW	1.9		2.5	
		Heating			1.9		2.65	
	Operating Current	Cooling		A	9.5		12	
		Heating			9.5		12.5	
	Power Factor	Cooling		%	97		91.4	
		Heating			88.6		92	
	Starting Current			A	40		64.2	
	Power Cord	Length		m	-		-	
		Number of Core Wire			-		-	
		Capacity		A	-		-	
Size	Outer Dimension	Width x Height x Depth		mm	1,065 x 298 x 218	790 x 548 x 285	1,065 x 298 x 218	880 x 638 x 310
				inch	41.9 x 11.7 x 8.6	31.1x21.6x11.2	41.9 x 11.7 x 8.6	34.6 x 25.1 x 12.2
	Weight			kg	13	39	13	64
	Refrigerant Pipe	Liquid		mm x L(m)	ø6.35 x 5		ø6.35 x 5	
		Gas		mm x L(m)	ø12.7 x 5		ø15.88 x 5	
	Drain Hose			D x L(mm)	ø18 x 2,000		ø18 x 2,000	
	Compressor	Type			Rotary		Rotary	
		Motor	Type		Induction Motor(PSC)		Induction Motor(PSC)	
			Rated Output		2,120		2,740	
	Oil Type				SUNISO-4GSD		SUNISO-4GSD	
	Blower	Type			Cross flow	Propeller	Cross flow	Propeller
		Motor	Type		steel	steel	steel	steel
			Rated Output	W	15	50	15	50
Heat Exchanger					2R0W 16 STEP	2ROW 24STEP	2R0W 16 STEP	2ROW 28STEP
Refrigerant Control unit					CAPILLARY TUBE		CAPILLARY TUBE	
Freezer Oil Capacity				cc	600		900	
Refrigerant to Change(R22)				g	1,100		1,450	
Protection Device(OLP)					Internal		Internal	
Cooling Test Condition					INDOOR UNIT : DB27˚C WB19˚C OUTDOOR UNIT : DB35˚C WB24˚C			
Maximum Operation Condition		Cooling			INDOOR UNIT : DB32˚C WB23˚C OUTDOOR UNIT : DB54˚C WB24˚C			
		Heating			INDOOR UNIT : DB27˚C WB15˚C OUTDOOR UNIT : DB24˚C WB18˚C			

1-2 Pressure Graph

■ 18K BTU



■ 24K BTU



2. Operating Instructions & Installation

2-1 The Feature of Key in remote control

No	BUTTON	FUNCTION
1	POWER	On/Off button. Press the button to stop or run the air conditioner.
2	(UP)	Temperature adjustment button(UP). To increase the temperature by the pressing the temperature button.
	(DOWN)	Temperature adjustment button(DOWN). To decrease the temperature by the pressing the temperature button.
3	MODE	Mode selection button. Each time you press this button, Mode is changed in the following order. ▶ **In case of Heat pump model** Auto → → → → → ▶ **In case of Cooling only model** Auto → → → → Auto : Auto Mode : Fan Mode : Cool Mode : Heat Mode : Dry Mode
4	FAN SPEED	Fan speed adjustment button. Each time you press this button, FAN SPEED is changed in the following order. Automatic(rotated : → →) Low Medium High Turbo(Maximum)
5	FLAP	Flap button. It adjusts the airflow to upward and downward.
6	TURBO	Turbo button. The air conditioner cools or heats the room as quickly as possible. After 30minutes, the air conditioner is reset automatically to the previous mode.
7	ENERGY SAVING	Energy saving button. If you wish to save energy when using your air conditioner, select the Energy saving mode with the ENERGY SAVING button.
8	SLEEP	Sleep button. The sleep timer can be used when you are cooling or heating your room to switch the air conditioner off automatically after a period of 6 hours.

The Feature of Key in remote control(cont.)

No	NAMED OF KEY	FUNCTION OF KEY
9		On Timer button. The On Timer enables you to **switch on** the air conditioner automatically after a given period of time that is from 1 hour to 24 hours. To set the operating time, press the ON button one or more times until the required time display.
10		Off Timer button. The Off Timer enables you to **switch off** the air conditioner automatically after a given period of time that is from 1 hour to 24 hours. To set the operating time, press the OFF button one or more times until the required time display.
11		Timer Set/Cancel button. After setting On Timer or Off Timer, press the SET/CANCEL button to set it completely. And press the SET/CANCEL button again to cancel On Timer or Off Timer set.
12		Battery life indicator. If you want to check the battery life, press the BATTERY button. The longer will remain the battery life. If one battery life indicator remains, replace new batteries.

2-2 Details for Operation Property

1. AUTO MODE : In this mode, operation mode(COOL, HEAT) is selected automatically by the difference between the setting and room temperature.

   ▶ **In case of Heat pump model.**
   Cooling or heating operation is selected based on difference of Ts and Tr. Cooling and heating operation is automatically interchanged during an operation.

   ▶ **In case of Cooling only model.**

Operation Type	Room Temp.	
Cool Operation	Tr ≥ Ts+1.0°C	Compressor ON
	Tr ≤ Ts	Compressor OFF

   Ts : Setting temperature.

2. COOL MODE : The unit operates according to the difference between the setting and room temperature. (16°C~30°C)

3. HEAT MODE(In case of Heat pump model) :
   The unit operates according to the difference between the setting and room temperature.(16°C~30°C)
   *Prevention against cold wind : In order to prevent the cool air from flowing out at the heat mode, the indoor fan does not operate or operates very slowly in the following cases At this time, the indoor heat exchanger will be preheating.
   - For 3~5 minutes after the initial operation
   - For deicing operation
   - The operation of an indoor fan in accordance with the temperature of an indoor heat exchanger

The temperature of indoor heat exchanger	Indoor fan speed
below 28˚C	off
28˚C~below 34˚C	LL Speed
34˚C~below 40˚C	L Speed
above 40˚C	Setting Speed

   *High temperature release function : It is a function to detect an outdoor overload by the sensor of an indoor heat exchanger and to turn the outdoor fan or the compressor ON/OFF for safety.
   *Deice : Deicing operation is controlled by indoor unit's heat exchanger temperature and accumulating time of compressor's operation.
   Deice ends by sensing of the processing time by deice condition.

4. DRY MODE : Has 4 states, each determined by room temperature.
   The unit operates in DRY mode.
   *Compressor ON/OFF time is controlled compulsorily (can not set up the fan speed, always breeze).
   *Protective function : Low temperature release. (Prevention against freeze)

5. TURBO MODE : This mode is available in AUTO, COOL, HEAT, DRY, FAN MODE.
   When this button is pressed at first, the air conditioner is operated "powerful" state for 30 minutes regardless of the setting temperature, room temperature.
   When this button is pressed again, or when the operating time is 30 minutes, turbo operation mode is canceled and returned to the previous mode.
   *But, if you press the TURBO button in DRY or FAN mode that is changed with AUTO mode automatically.

6. SLEEP MODE : Sleep mode is available only in COOL or HEAT mode.
   The operation will stop after 6 hours.
   *In COOL mode : The setting temperature is automatically raised by 1°C each 1hour When the temperature has been raised by total of 2°C, that temperature is maintained.
   *In HEAT mode : The setting temperature is automatically dropped by 1°C each 1hour.
   When the temperature has been dropped by total of 2°C, that temperature is maintained.

7. FAN SPEED : Manual (3 step), Auto (4 step)
   Fan speed automatically varies depending on both the difference between setting and the room temperature.

8. COMPULSORY OPERATION :
   For operating the air conditioner without the remote control.
   *The operating is the same function that AUTO MODE in the remote control.

9. FLAP : BLADE-H is rotated vertically by the stepping motor.
   *Flap Set : Press the FLAP button under the remote control is displayed on LCD the and the blades move up and down. If the one more time press the FLAP button, blades location is stop.

10. SETTING THE ON/OFF TIMER. :
    *ON TIMER : The On Timer enables you to switch on the air conditioner automatically after a given period of time. You can set the period of time from 1 hour to 24 hours.
    *OFF TIMER : The Off Timer enables you to switch off the air conditioner automatically after a given period of time. You can set the period of time from 1 hour to 24 hours.

11. BUZZER SOUND : Whenever the On/Off button is pressed or whenever change occurs to the condition which is set up or select, the compulsory operation mode, buzzer is sounded "beep".

2-3 Installation

2-3-1 Before Installation

Keep the air conditioner drain hose outlet and inlet free from its surroundings.
In case of breakdown, keep the symmetry and fix it to prevent vibration.
The pipe length shall meet the standard as far as possible.

2-3-2 Installation Procedure

■ Location

Install the product in an area to guarantee the best cooling effect, convenience of piping and electric work, and inexistence of vibration or wind in the vicinity.

■ Wall Drilling

Drill the wall downward in a diameter of 60 to 65mm.

■ Fixing Indoor Unit & Outdoor Unit

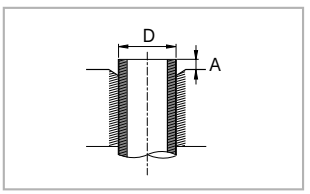
Fix the air conditioner hard enough so that it can not fall to the ground. On the roadside, the outdoor unit shall be installed 2m above ground and kept away from pedestrians to prevent direct exposure to hot wind.

■ Pipe Spooling & Connecting

You shall cut the pipe straightly with a pipe cutter and grind all the burrs of the cut surface.
Pipe expansion may continue until the pipe surface becomes uneven or torn apart.
Be sure to use a torque wrench to tighten pipes or flare nuts.

<Torque & Depth>

Outer Diameter(D)	Torque(kgf·cm)	Depth(A)
6.35mm(1/4")	140~170	1.3mm
12.70mm(1/2")	380~420	2.0mm
15.88mm(5/8")	440~480	2.2mm



■ Leak Test

Put an inert gas like nitrogen in the outdoor unit pipe and put soap bubbles or other test liquids on the pipe surface for the leak test.

■ Drain Hose Connecting

Install the drain hose downward to drain water naturally. Be sure to pour water into the hose to check if it drains well.

■ Electric & Earth Work

Electric and earth work shall meet the "Electric Facility Technology Standard" and the "Internal Wire Regulation" of the Electric Business Laws.

■ Inspection & Trial Run

Upon completion of the tests, you shall make a trial run while you explain the main functions of the air conditioner to finish the installation.

2-4 Installation Diagram of Indoor Unit and Outdoor Unit

2-4-1 Air-Purge Procedure

1) Connect each assembly pipe to the appropriate valve on the outdoor unit and tighten the flare nut.

2) Connect the charging hose of low pressure side of manifold gauge to the packed valve having a service port (3/8" Packed valve) as shown at the figure.

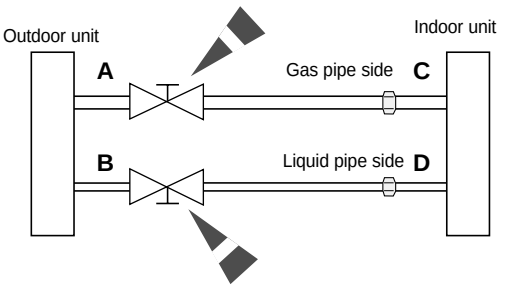
3) Open the valve of the low pressure side of manifold gauge counter-clockwise.

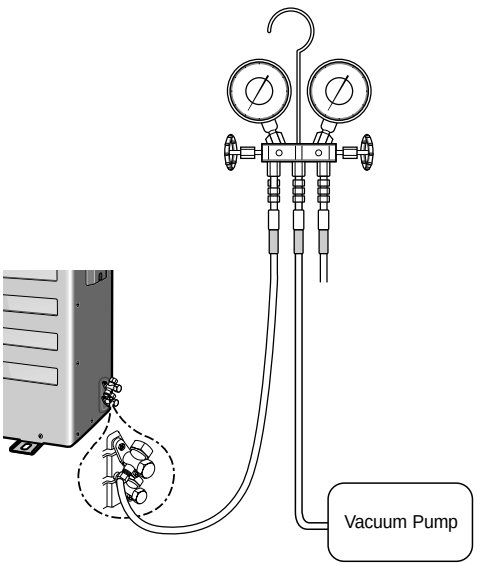
4) Purge the air from the system using vacuum pump for about 30 minutes.
   - After that, please recheck that pressure is stabilization.
   - Close the valve of the low pressure side of manifold gauge clockwise.
   - Remove the hose of the low pressure side of manifold gauge.

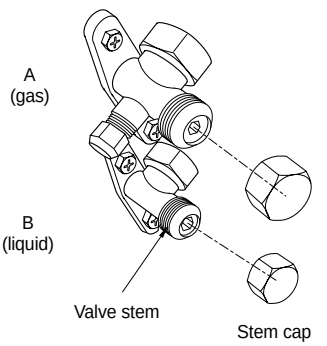
5) Set valve cork of both liquid side and gas side of packed valve to the open position.

6) Mount the valve stem nuts to the 2-Way and 3-Way valve. And mount the service port cap to 3-Way valve.

7) Check for gas leakage.
   - At this time, especially check for gas leakage from the 3-Way valve's stem nuts, and from the service port cap.







2-4-2 Refrigerant Refill(R22)

Refill an air conditioner with refrigerant when refrigerant has been leaked at installing or using.

1) Purge air(for new installation only).

2) Turn the 3-Way valve clockwise to close, connect the pressure gauge (low pressure side) to the service valve, and open the 3-Way valve again.

3) Connect the tank to refill with refrigerant.

4) Set the unit to cool operation mode.

5) Check the pressure indicated by the pressure gauge(low pressure side).

   *** Standard pressure is should be 4.5~5.5kg/cm² in a regular, high operation mode.**

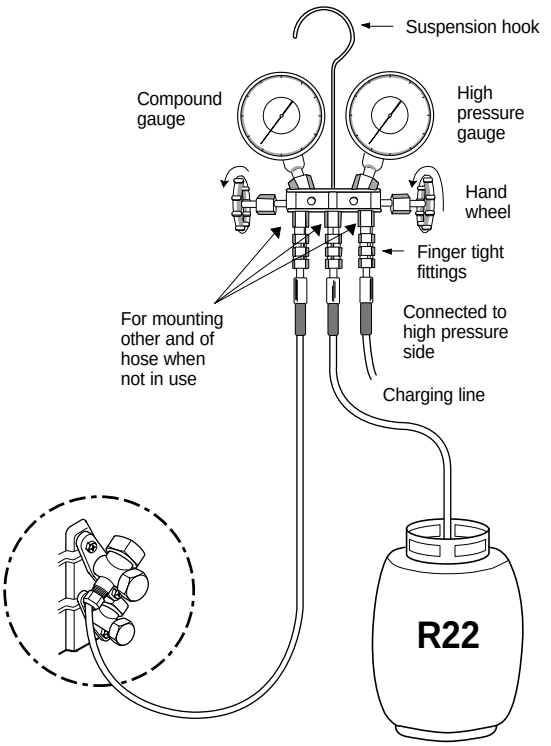
6) Open the refrigerant tank and fill with refrigerant until the rated pressure is reached.

   *** It is recommended not to pour the refrigerant in too quickly, but gradually while operating a pressure valve.**

7) Stop operation of the air conditioner.

8) Close the 3-Way valve, disconnect the pressure gauge, and open the 3-Way valve again.

9) Close the cap of each valve.



2-4-3 "Pump down" Procedure

Pump down will be carried out when an evaporator is replaced or when the unit is relocated in another area.

1) Remove the caps from the 2-Way valve and the 3-Way valve.

2) Turn the 3-Way valve clockwise to close and connect a pressure gauge (low pressure side) to the service valve, and open the 3-Way valve again.

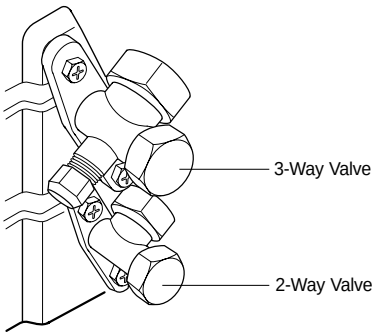
3) Set the unit to cool operation mode. (Check if the compressor is operating.)

4) Turn the 2-Way valve clockwise to close.

5) When the pressure gauge indicates "0" turn the 3-Way valve clockwise to close.

6) Stop operation of the air conditioner.

7) Close the cap of each valve.



Remarks

Relocation of the air conditioner

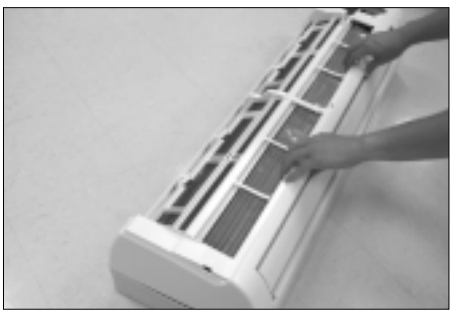
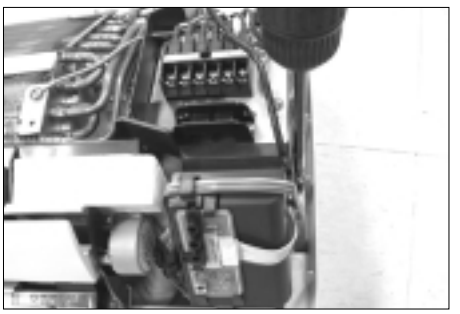
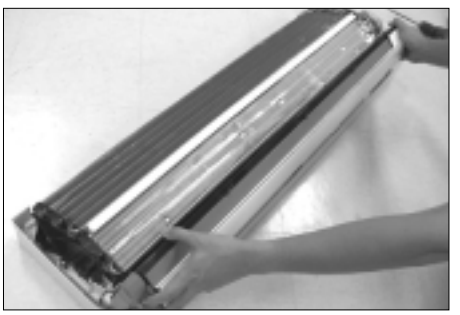
- Refer to this procedure when the unit is relocated.
- Carry out the pump down procedure (refer to the details of 'pump down').
- Remove the power cord.
- Disconnect the assembly cable from the indoor and outdoor units.
- Remove the flare nut connecting the indoor unit and the pipe.
- At this time, cover the pipe of the indoor unit and the other pipe using a cap or vinyl plug to avoid foreign material entering.
- Disconnect the pipe connected to the outdoor unit.
  At this time, cover the valve of the outdoor unit and the other pipe using a cap or vinyl plug to avoid foreign material entering.
- Make sure you do not bend the connection pipes in the middle and store together with the cables.
- Move the indoor and outdoor units to a new location.
- Remove the mounting plate for the indoor unit and move it to a new location.

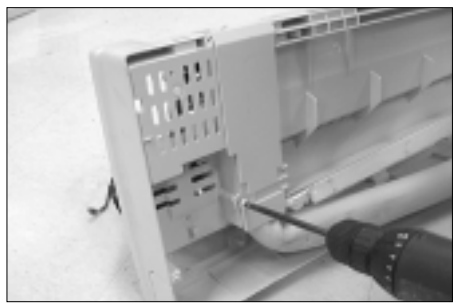
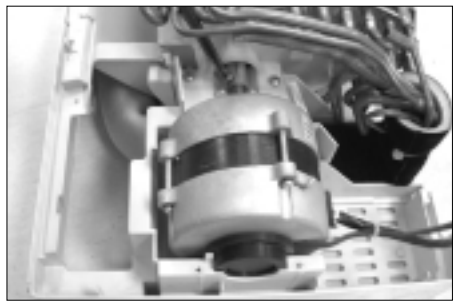
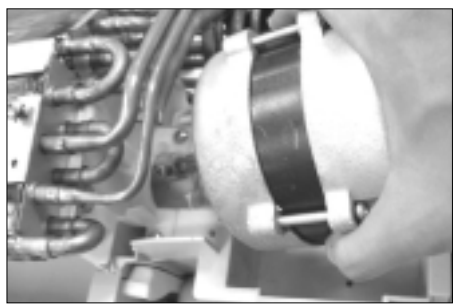
3. Disassembly and Reassembly

Stop operation of the air conditioner and remove the power cord before repairing the unit.

3-1 Indoor Unit

No	Parts	Procedure	Remark
1	Front Grille	1) Stop the air conditioner operation and shut off the main power.	
		2) Open the Front Grille by pulling right and left sides of the hook.	
		3) Loosen 1 of the right screw and detach the Terminal Cover. 4) Detach the thermistor from the Front Grille.	
		5) Loosen 3 fixing screws of Front Grille.	

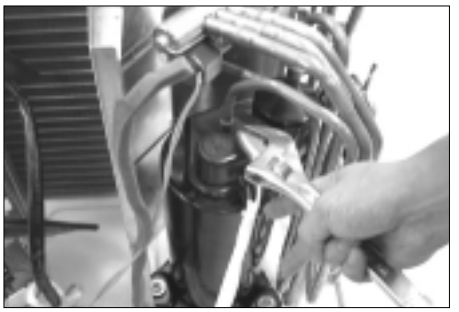
No	Parts	Procedure	Remark
		6) Unlock 3 hooks to fix Panel Front and Tray Drain.	
		7) Unlock 3 hooks to fix Panel Front and Back-Body.	
2	Control-In (Main PCB)	1) Take all the connector of PCB upper side out. (Inclusion Power Cord) 2) Detach the outdoor unit connection wire from the Terminal Block. 3) Loosen 4 fixing screws of Ass'y Control-In.	
3	Tray Drain	1) Pull Tray Drain out from the Back Body.	

No	Parts	Procedure	Remark
4	Heat Exchanger	1) Loosen 2 fixing earth screws of right side. 2) Detach the Connection Pipe. 3) Detach the Holder Pipe at the rear side.	
		4) Loosen the 4 fixing screws of right and left side. 5) Lifting the Heat Exchanger up a little to push the up side for separation from the indoor unit.	
5	Fan Motor & Cross Fan	1) Loosen the fixing screw. 2) Detach the Fan Motor from the Fan. 3) Detach the Fan From the left Holder Bearing.	
			

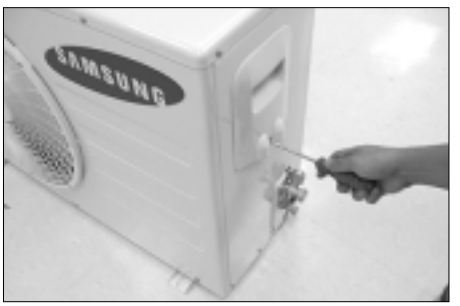
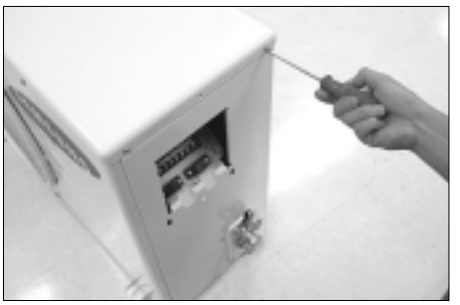
3-2 Outdoor Unit

■ 18K BTU

No	Parts	Procedure	Remark
1	Common Work	1) Loosen the fixing screw of the Cover Control.	
		2) Loosen the fixing screws on right and left, back Cabinet-Side edge and a fixing screw on the Cabinet-Front lower to detach the Cabinet-Front.	
		3) Loosen the fixing screws of the Ass'y-Control out.	
		4) Loosen the fixing screws of the Cabinet-Side RH.	
		5) Loosen the fixing screws of the Cabinet-Side LF.	

No	Parts	Procedure	Remark
2	Fan & Motor	1) Detach the Nut Flange.(Turn counterclock-wise because the screw is right-handed) 2) Detach the Fan. 3) Loosen 4 fixing screws to detach the Motor.	
3	Heat Exchanger	1) Loosen 3 fixing screws of the Bar Steel. 2) Loosen 2 fixing screws on both sides. 3) Disassemble the pipe in both inlet and outlet with welding torch. 4) Detach the Heat Exchanger.	
4	Compressor	1) Loosen the Terminal Cover nut to open the Terminal Cover. 2) Disassemble the cloth sound felt. 3) Disassemble the pipe in both inlet and outlet of the Compressor with welding torch. 4) Loosen the 3 bolts at the bottom. 5) Detach the Compressor.	 

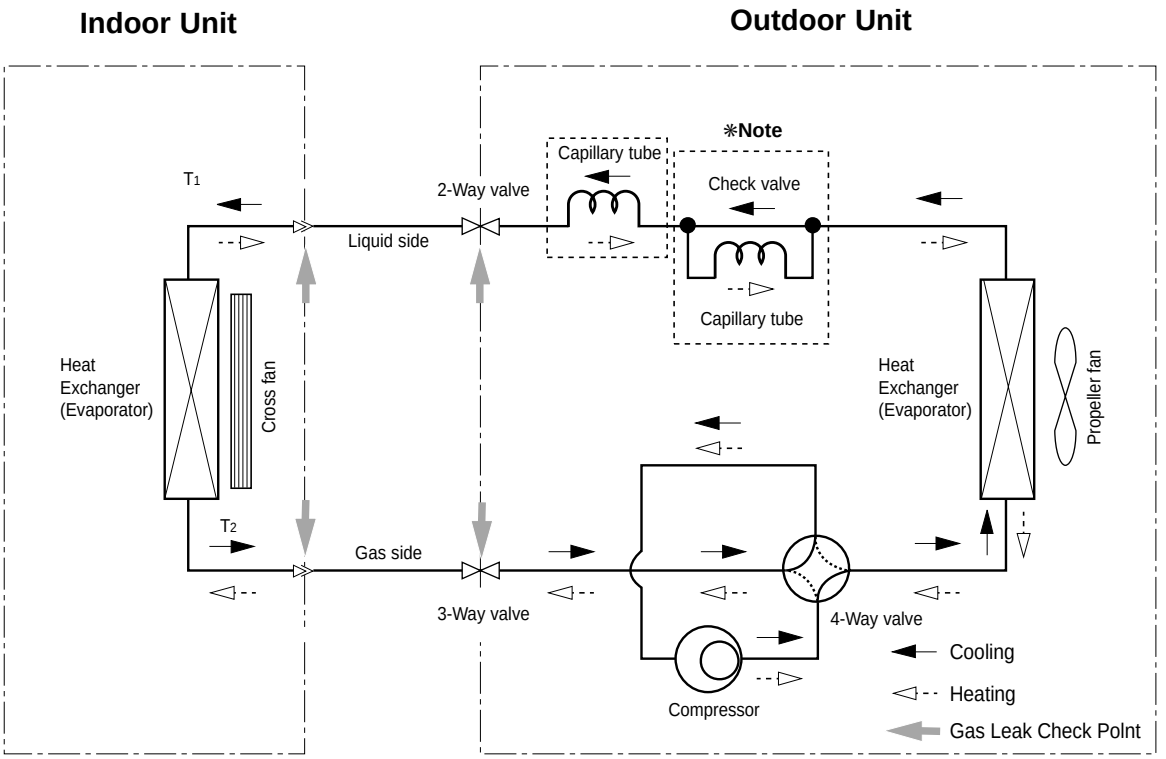
■ 24K BTU

No	Parts	Procedure	Remark
1	Common Work	1) Loosen the fixing screw of the Cover Control.	
		2) Loosen the fixing screws of the Cabinet-Upper.	
		3) Loosen the fixing screws of the Cabinet-Side RH.	
		4) Loosen the fixing screws of the Cabinet-Side LF.	
		5) Loosen the fixing screws of the Ass'y Control Out.	

No	Parts	Procedure	Remark
2	Fan & Motor	1) Remove the Nut Flange (Turn to the clockwise). 2) Detach the Fan. 3) Loosen 4 fixing screws to detach the Motor.	
3	Heat Exchanger	1) Loosen 2 fixing screws on both side. 2) Disassemble the pipe in both inlet and outlet with welding torch. 3) Detach the Heat Exchanger.	
4	Compressor	1) Loosen the Terminal Cover to open the Terminal Cover. 2) Disassemble the Cloth Sound Felt. 3) Disassemble the pipe in both inlet and outlet of the Compressor with welding torch. 4) Loosen 3 bolts at the bottom. 5) Detach the Compressor.	 

4. Refrigerating Cycle Diagram

4-1 Refrigerating Cycle Diagram



4-2 Refrigerant Cycle Characteristic

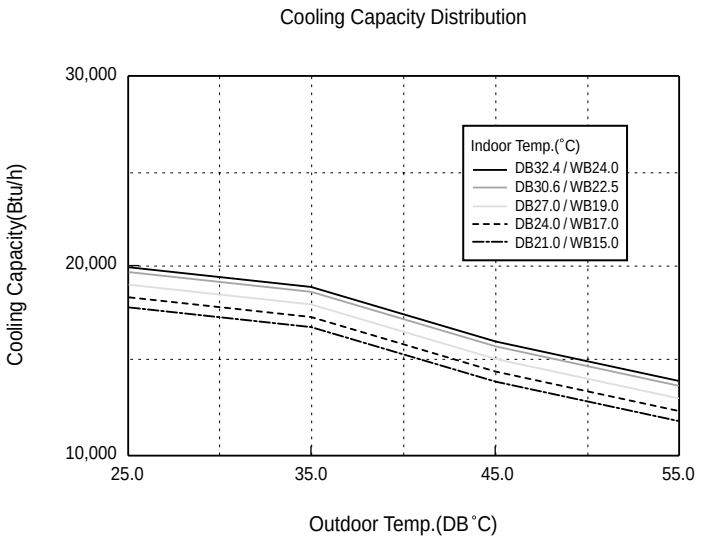
4-2-1 Capacity Distributions

Capacity Distributions according to indoor and outdoor temperature variation.

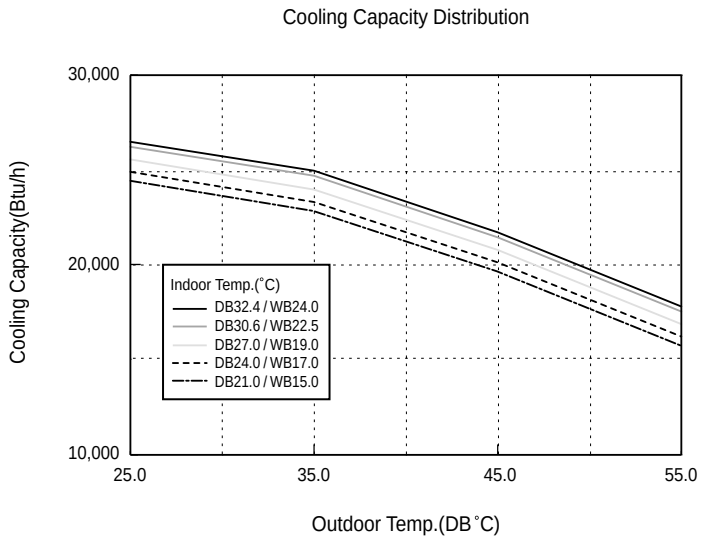
■ COOLING MODE

- Indoor Temp. Variation : 21.0˚C ~ 32.4˚C
- Outdoor Temp. Variation : 25.0˚C ~ 55.0˚C

■ **18K BTU**



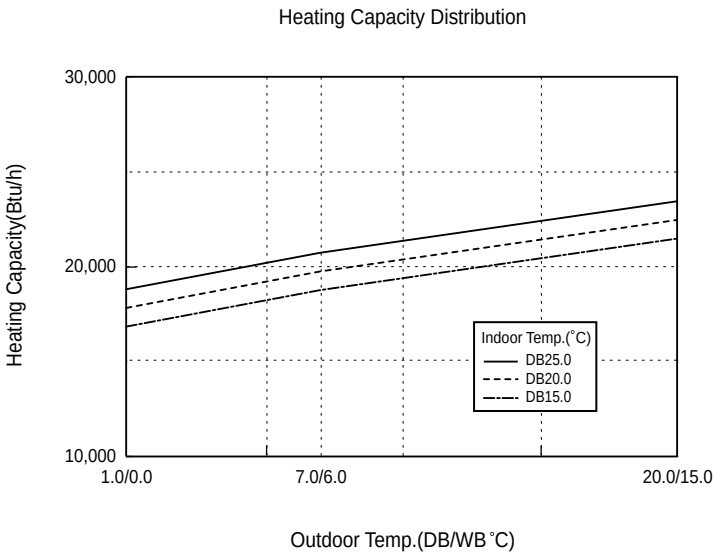
■ **24K BTU**



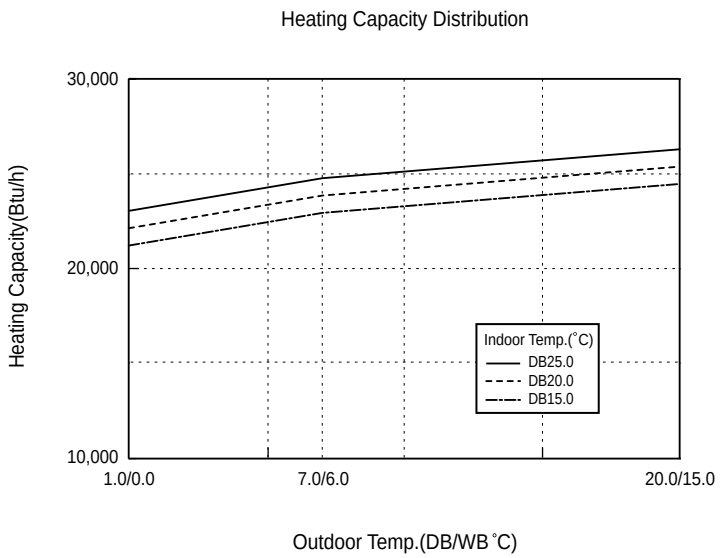
■ HEATING MODE

- Indoor Temp. Variation : 15.0˚C ~ 25.0˚C
- Outdoor Temp. Variation : 1.0˚C ~ 20.0˚C

■ 18K BTU



■ 24K BTU



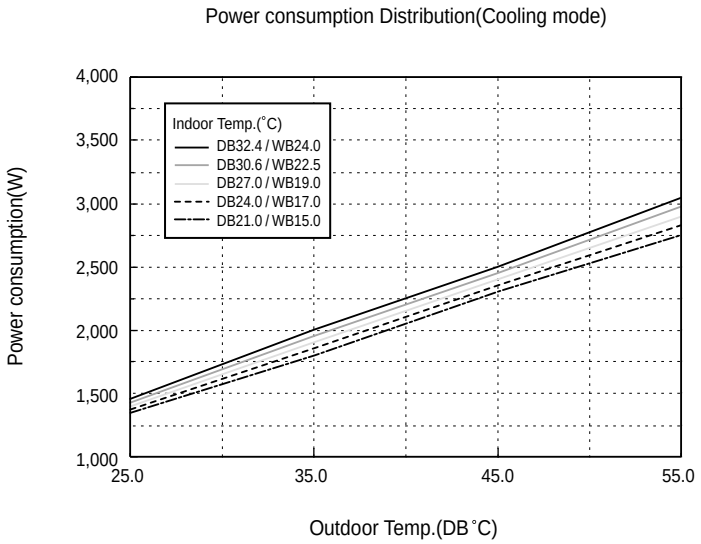
4-2-2 Power Consumption Distributions

Power Consumption Distributions according to indoor and outdoor temperature variation.

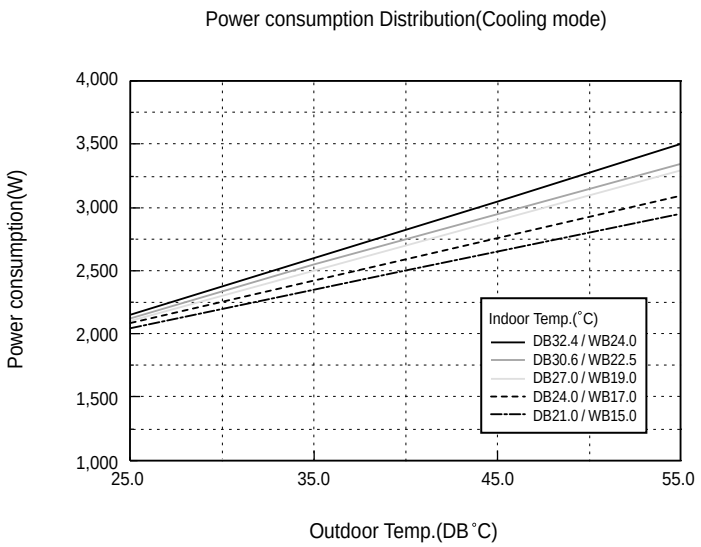
■ COOLING MODE

- Indoor Temp. Variation : 21.0˚C ~ 32.4˚C
- Outdoor Temp. Variation : 25.0˚C ~ 55.0˚C

■ 18K BTU



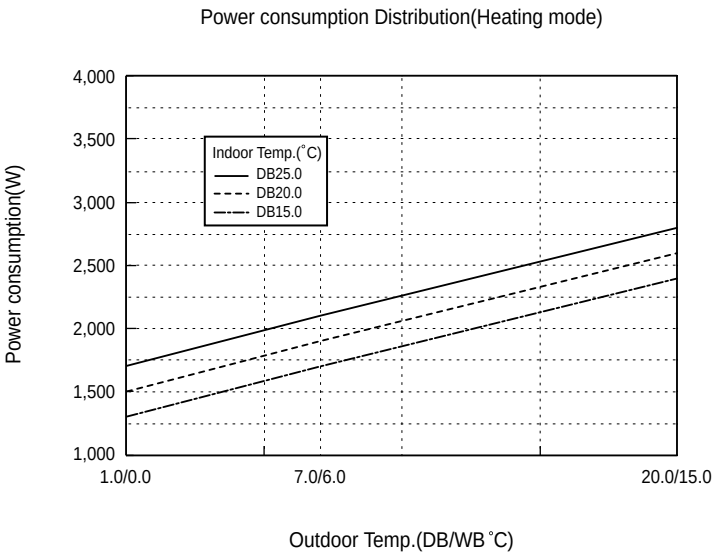
■ 24K BTU



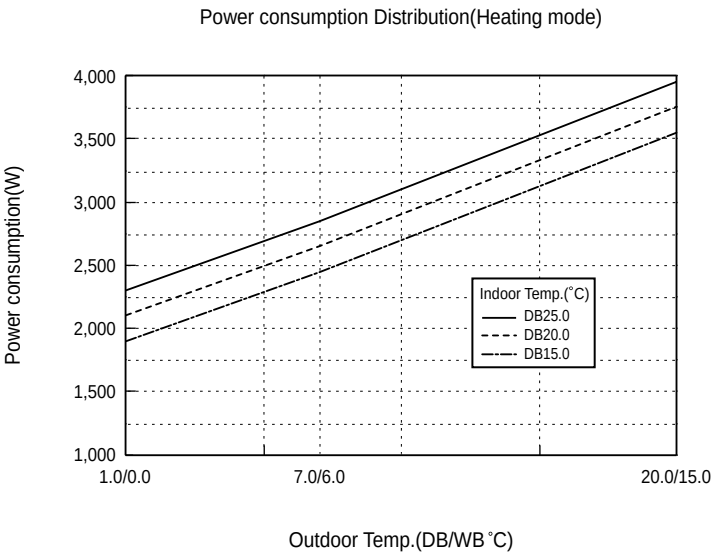
■ HEATING MODE

- Indoor Temp. Variation : 15.0˚C ~ 25.0˚C
- Outdoor Temp. Variation : 1.0˚C ~ 20.0˚C

■ 18K BTU



■ 24K BTU

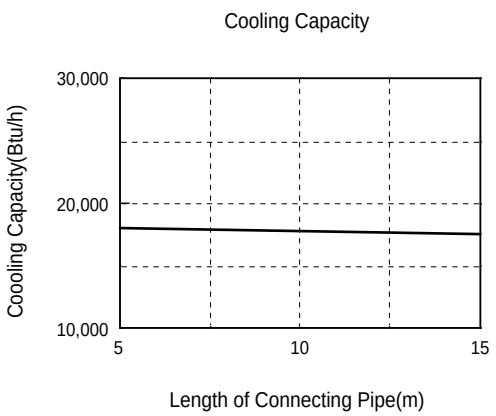


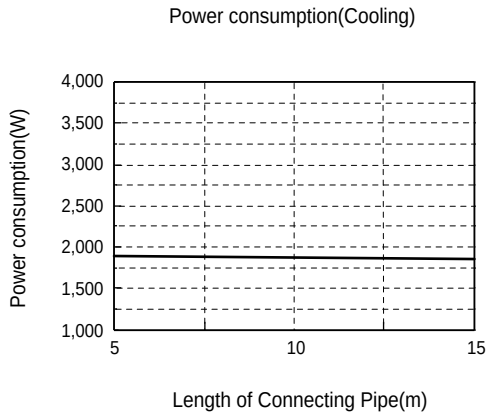
4-2-3 Capacity and Power Consumption Distributions

Capacity and power Consumption distributions according to the length of connecting Pipe between indoor unit and outdoor unit.

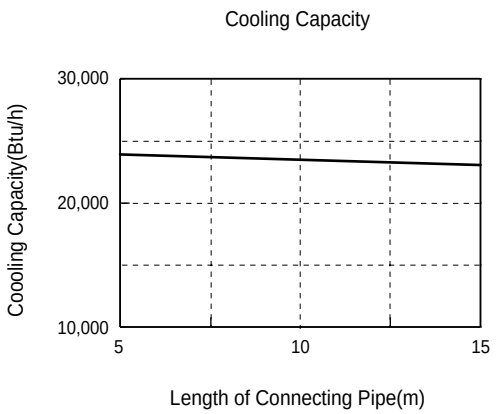
■ COOLING MODE

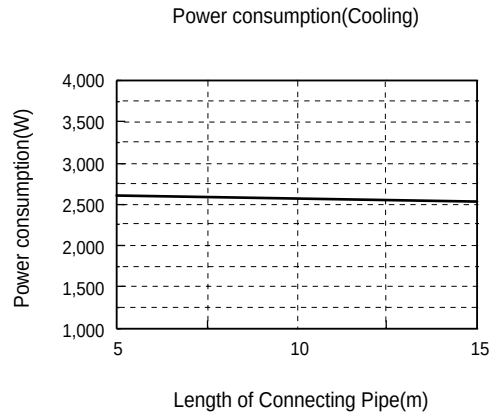
■ 18K BTU





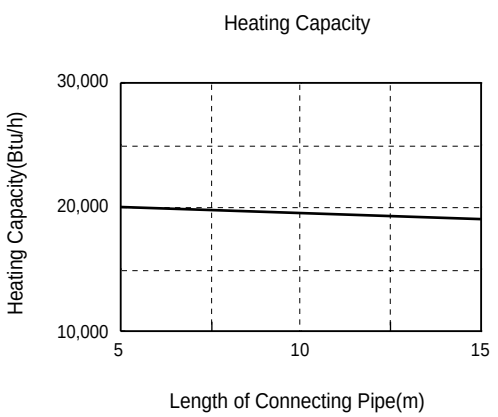
■ 24K BTU

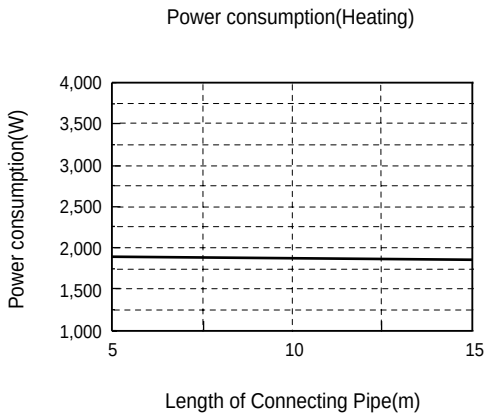




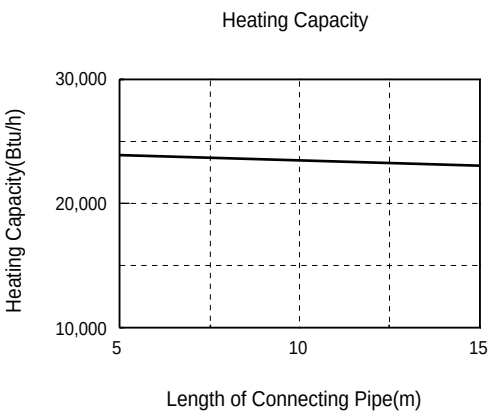
■ HEATING MODE

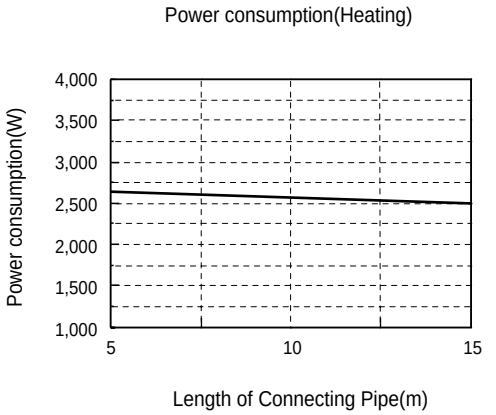
■ 18K BTU





■ 24K BTU





5. Set Up the Model Option

5-1 Setting Option Setup Method

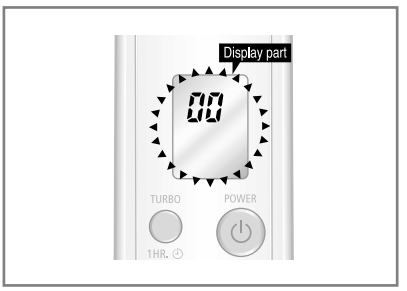
Option No. : 65 4d 5d 03 5 1 (AQT24W6WE)

Step 1 : **Enter the Option Setup mode.**

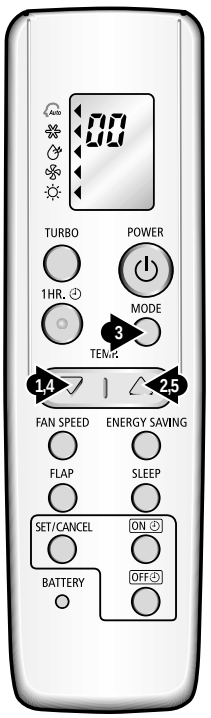
1st Take out the batteries of remote control.

2nd Press the temperature ▽ | △ button simultaneously and insert the battery again.

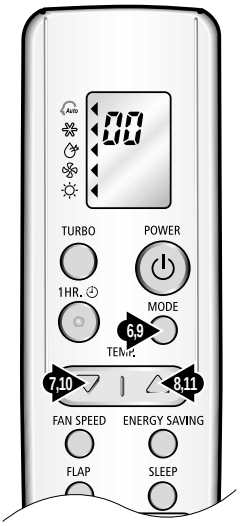
3rd Make sure the remocon display shown as  .

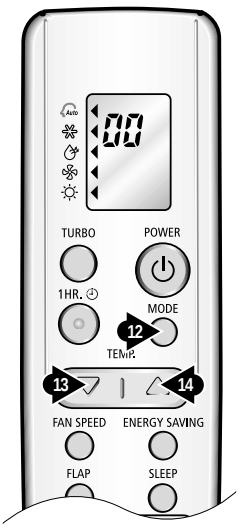


Step 2 : **Enter the Option Setup mode and select your option according to the following procedure.**



	Feature	Display
1	Setting Option SEG1. Push the ▽ button to set the display panel to 2. Every time you push the button, the display panel reads 0 ➡ 1 ➡ 2 ➡ 3 ➡ ··· 9 ➡ A ➡ b ➡ c ➡ d ➡ E ➡ F repeatedly.	
2	Setting Option SEG2. Push the △ button to set the display panel to 5. Every time you push the button, the display panel reads 0 ➡ 1 ➡ 2 ➡ 3 ➡ ··· 9 ➡ A ➡ b ➡ c ➡ d ➡ E ➡ F repeatedly.	
3	Change it into the set display of Option SEG3 and SEG4 with the MODE button.	
4	Setting Option SEG3. Push the ▽ button to set the display panel to 0. Every time you push the button, the display panel reads 0 ➡ 1 ➡ 2 ➡ 3 ➡ ··· 9 ➡ A ➡ b ➡ c ➡ d ➡ E ➡ F repeatedly.	
5	Setting Option SEG4. Push the △ button to set the display panel to 2. Every time you push the button, the display panel reads 0 ➡ 1 ➡ 2 ➡ 3 ➡ ··· 9 ➡ A ➡ b ➡ c ➡ d ➡ E ➡ F repeatedly.	





	Feature	Display
6	Change it into the set display of Option SEG5 and SEG6 with the MODE button.	00
7	Setting Option SEG5. Push the ▽ button to set the display panel to 5. Every time you push the button, the display panel reads 0 ➡ 1 ➡ 2 ➡ 3 ➡ · · · 9 ➡ A ➡ b ➡ c ➡ d ➡ E ➡ F repeatedly.	50
8	Setting Option SEG6. Push the △ button to set the display panel to 7. Every time you push the button, the display panel reads 0 ➡ 1 ➡ 2 ➡ 3 ➡ · · · 9 ➡ A ➡ b ➡ c ➡ d ➡ E ➡ F repeatedly.	5d
9	Change it into the set display of Option SEG7 and SEG8 with the MODE button.	00
10	Setting Option SEG7. Push the ▽ button to set the display panel to 0. Every time you push the button, the display panel reads 0 ➡ 1 ➡ 2 ➡ 3 ➡ · · · 9 ➡ A ➡ b ➡ c ➡ d ➡ E ➡ F repeatedly.	00
11	Setting Option SEG8. Push the △ button to set the display panel to 3. Every time you push the button, the display panel reads 0 ➡ 1 ➡ 2 ➡ 3 ➡ · · · 9 ➡ A ➡ b ➡ c ➡ d ➡ E ➡ F repeatedly.	03
12	Change it into the set display of Option SEG9 and SEG10 with the MODE button.	60
13	Setting Option SEG9. Push the ▽ button to set the display panel to 4. Every time you push the button, the display panel reads 0 ➡ 1 ➡ 2 ➡ 3 ➡ · · · 9 ➡ A ➡ b ➡ c ➡ d ➡ E ➡ F repeatedly.	60
14	Setting Option SEG10. Push the △ button to set the display panel to 0. Every time you push the button, the display panel reads 0 ➡ 1 ➡ 2 ➡ 3 ➡ · · · 9 ➡ A ➡ b ➡ c ➡ d ➡ E ➡ F repeatedly.	60

Step 3 : Upon completion of the selection, check you made right selections.

Whenever you press the MODE button, the set Option will be displayed.

Step 4 : Pressing the ON/OFF button ( )

When pressing the operation ON/OFF key with the direction of remote control for unit, the sound "Ding" is heard and the OPERATION LED lamp is flickering at the same time, then the input of option is completed. (If the "ding" sound isn't heard, try again pressing the ON/OFF button.)

Step 5 : Unit operation test-run

First, Remove the battery from the remote control.

Second, Re-insert the battery into the remote control.

Third, Press ON/OFF ( ) key with the direction of remote control for set.

• Error Mode

1st If all lamps of indoor unit are flickering, Plug out, plug in power plug again and press ON/OFF key to retry.

2nd If the unit is not working properly or all lamps are continuously flickering after setting the option code, see if the correct option code is set up for its model.

5-2 Table of the option Code

Model	Option Code									
	SEG1	SEG2	SEG3	SEG4	SEG5	SEG6	SEG7	SEG8	SEG9	SEG10
AQ18WJWB AQT18WJWB	6	6	0	d	5	7	0	2	2	E
AQ18WJWE AQT18WJWE SH18ZWJ	6	5	0	d	6	7	0	2	2	E
AQ24W6WB AQT24W6WB	6	5	2	d	4	d	0	3	6	2
AQ24W6WE AQT24W6WE SH24ZW6	6	5	4	d	5	d	0	3	5	1

6. Troubleshooting

Check the basic items first to judge if the problem was caused by breakdown or misuse. If none of the basic items are related to the problem, please scrutinize the machine according to the 'Breakdown Diagnosis by Symptoms' method.

6-1 Basic Breakdown Diagnosis Items

1. The input voltage should be rating voltage ±10% range.
   The airconditioner may not operate properly if the voltage is out of this range.

2. Is the link cable linking the indoor unit and the outdoor unit linked properly?
   The indoor unit and the outdoor unit shall be linked by 5 cables.
   Check the terminals if the indoor unit and outdoor unit are properly linked by the same number of cables.
   Otherwise the airconditioner may not operate properly.

3. When a problem occurs due to the contents illustrated in the table below it is a symptom not related to the malfunction of the airconditioner.

No	Operation of air conditioner	Explanation
1	The OPERATION indication LED(GREEN) blinks when a power plug of the indoor unit is plugged in for the first time.	It indicates power is on. The LED stops blinking if the operation ON/OFF button on the remote control unit is pushed.
2	In a COOL operation mode, the compressor does not operate at a room temperature higher than the setting temperature that the INDOOR FAN should operate. In a HEAT operation mode, the compressor does not operate at a room temperature lower than the setting temperature that indoor fan should operate.	In happens after a delay of 3 minutes when the compressor is reoperated. The same phenomenon occurs when a power is on. As a phenomenon that the compressor is reoperated after a delay of 3 minutes, the indoor fan is adjusted automatically with reference to a temperature of the air blew.
3	Fan speed setting is not allowed in DRY( ) mode.	The speed of the indoor fan is set to LL in DRY mode. Fan speed is selected automatically in AUTO mode.
4	Compressor stops operation intermittently in DRY( ) mode.	Compressor operation is controlled automatically in DRY mode depending on the room temperature and humidity.
5	Compressor of the outdoor unit is operating although it is turned off in a HEAT mode.	When the unit is turned off while de-ice is activated, the compressor continues operation for up to 9 minutes (maximum) until the deice is completed.
6	Timer LED(GREEN) of the indoor unit lights up and the air conditioner does not operate.	Timer is being activated and the unit is in ready mode. The unit operates normally if the timer operation is cancelled.
7	The compressor and indoor fan stop intermittently in HEAT mode.	The compressor and indoor fan stop intermittently if room temperature exceeds a setting temperature in order to protect the compressor from overheated air in a HEAT mode.
8	Indoor fan and outdoor fan stop operation intermittently in a HEAT mode.	The compressor operates in a reverse cycle to remove exterior ice in a HEAT mode, and indoor fan and outdoor fan do not operate intermittently for within 20% of the total heater operation
9	The compressor stops intermittently in a COOL mode or DRY mode, and fan speed of the indoor unit decreases.	The compressor stops intermittently or the fan speed of the indoor unit decreases to prevent inside/outside air frozen depending on the inside/outside air temperature.

6-2 Trouble check in the initial status

6-2-1 Diagnosis and marking of the part in trouble.

Please check the air conditioner operation status and write the check result in the chart in the room.

Description	LAMP		
	OPERATION	TIMER	TURBO
	≋	◷	TURBO
Indoor unit room temperature sensor error (open or short)	○	◑	○
Indoor unit heat exchanger temperature sensor error (open or short)	◑	◑	○
Indoor fan motor mal function	◑	○	◑
EEPROM error	○	◑	◑
Option error (option wasn't set up or option data error)	◑	◑	◑

○ : Lamp off ◑ : Lamp flickering

6-2-2 Operation with abnormal motion

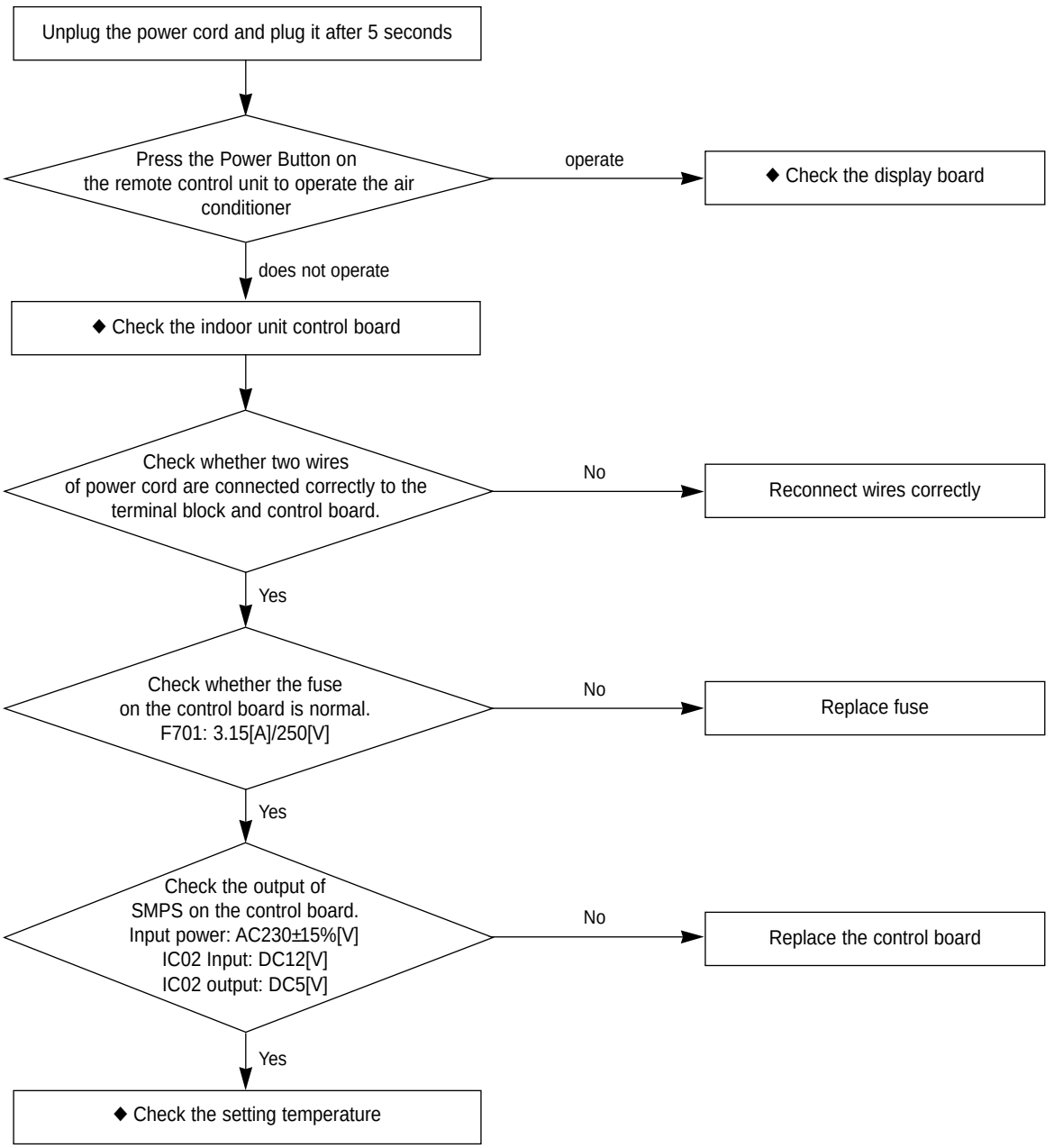
No	Abnormal condition	Inspection		Initial Diagnosis
1	No response from the remote control operation signal.	• Plug out and plug in 5 seconds later.	Able to operate the remote control.	OK
			Unable to operate the remote control.	Press the ⏻ button in the indoor unit. • If it operates, the remote control and indoor unit receiver are in trouble. • If not, the indoor unit is in trouble.
2	Unable to operate the outdoor unit	• Press the TURBO button with the remote control. • In 3 minutes, check the voltage between the indoor unit terminal block N1 and 1.	AC200V ~ AC240V	Problem with the outdoor unit or PCB
			No power source displayed.	Problem with the relay (RY71) or PCB

6-3 Breakdown diagnosis by symptoms

6-3-1 No Power (completely dead)-Initial diagnosis

1. Checklist :
   1) Is input voltage normal?
   2) Is AC power linked correctly?
   3) Is input voltage of DC regulator IC KA7805 (IC02) normal? (11VDC-12.5VDC)
   4) Is output voltage of DC regulator IC KA7805 (IC02) normal? (4.5VDC-5.5VDC)

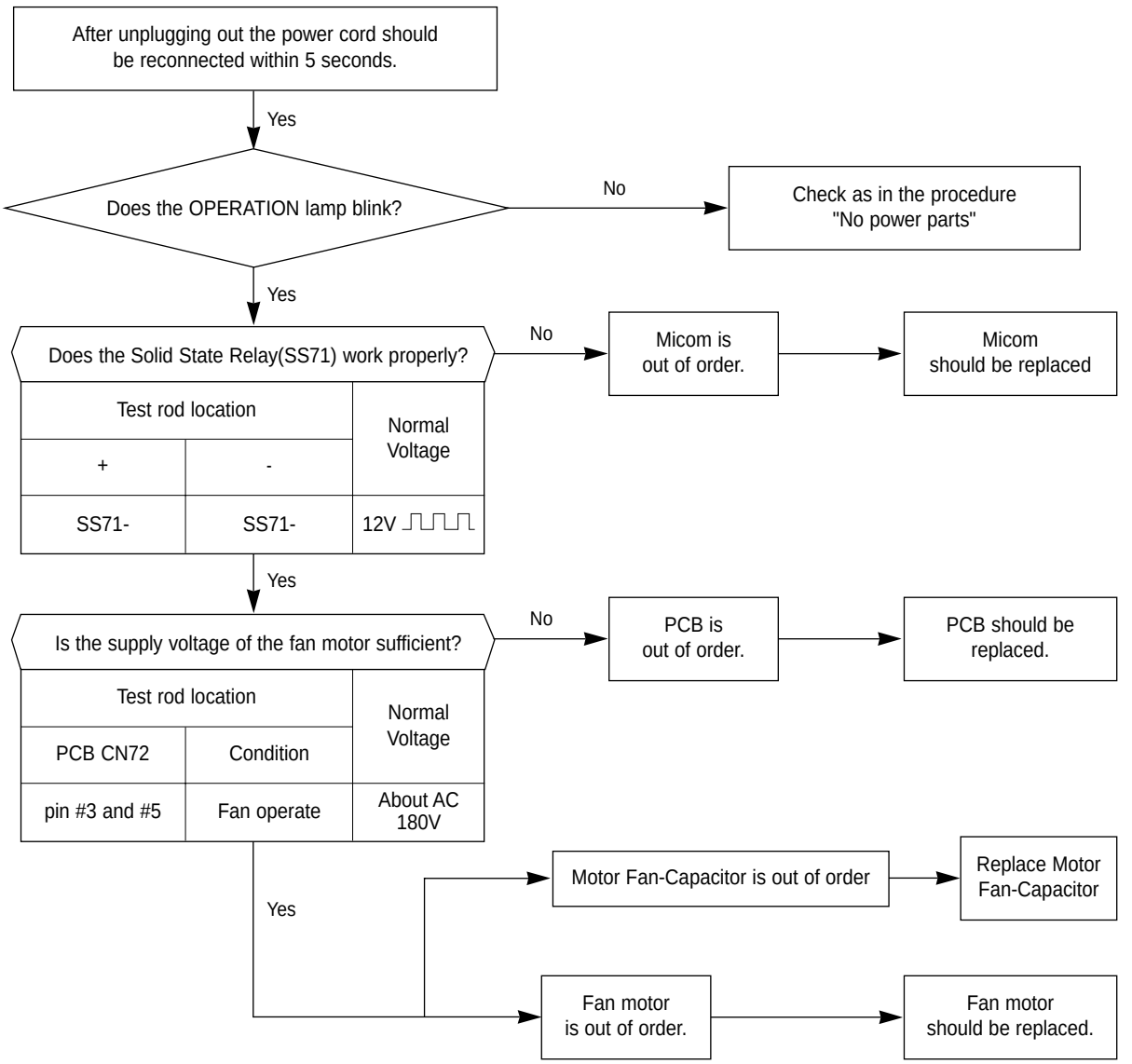
2. Troubleshooting procedure



6-3-2 When the Indoor Unit Fan Does Not Operate. (Initial Diagnosis)

1. Checklist :
   1) Is the indoor unit fan motor properly connected with the connector (CN72)?
   2) Is the AC voltage correct?
   3) Is HALL IC in indoor fan motor properly connected with the connector (CN44)?
   4) Is the running capacitor (CR71) properly connected with PCB board?

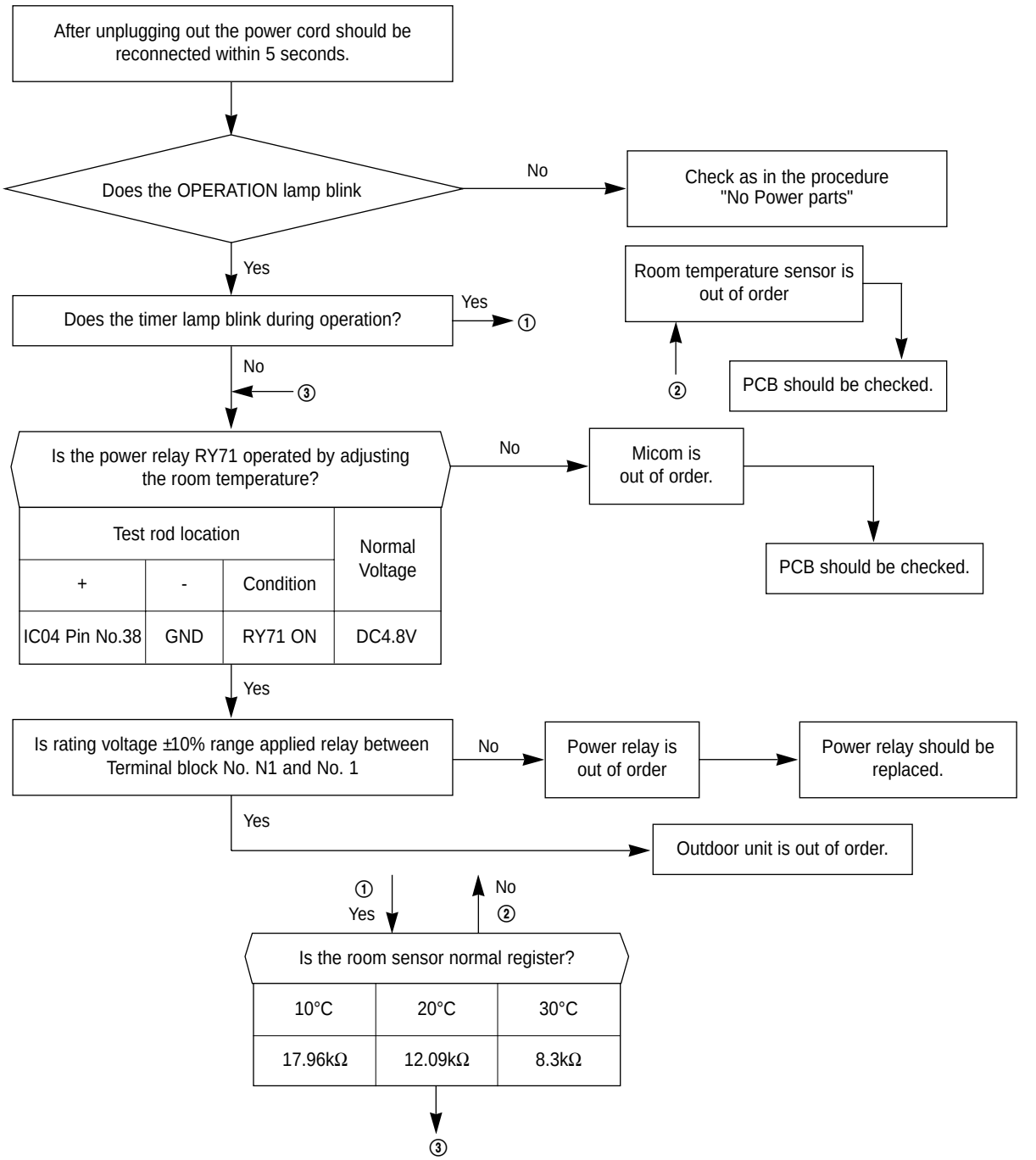
2. Troubleshooting procedure



6-3-3 When the Outdoor Unit Does Not Operate. (Initial Diagnosis)

1. Checklist :
   1) Is input voltage normal?
   2) Is the set temperature of the remote control higher than room temperature in COOL mode?
   3) Is the set temperature of the remote control lower than room temperature in HEAT mode?
   4) Is the POWER IN connector (CN71) linked correctly?
   5) Is the outdoor unit properly connected with the TERMINAL BLOCK connector(N1, L1, 1, 2, 3, 4)?

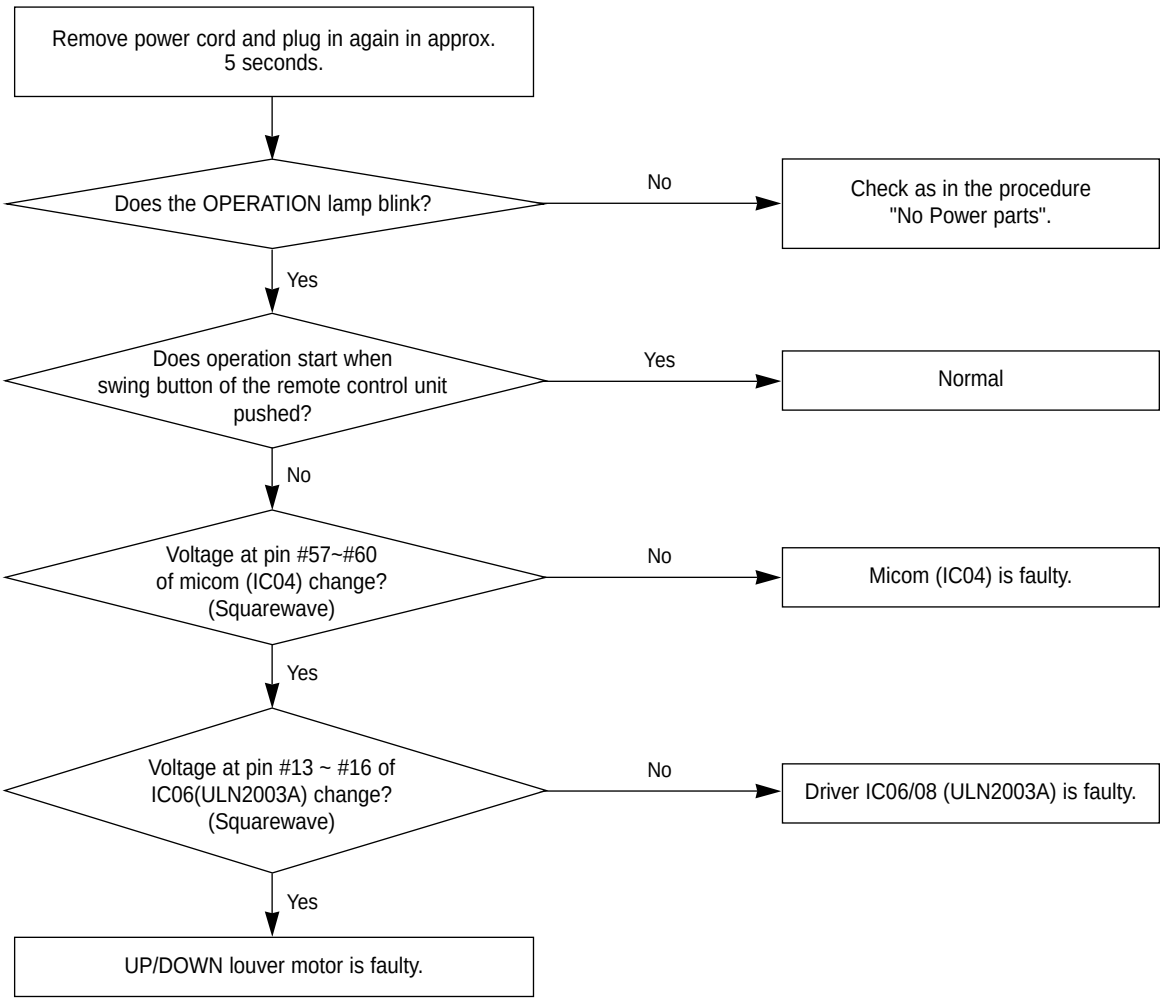
2. Troubleshooting procedure



6-3-4 When the UP/DOWN Louver Motor Does Not Operate. (Initial Diagnosis)

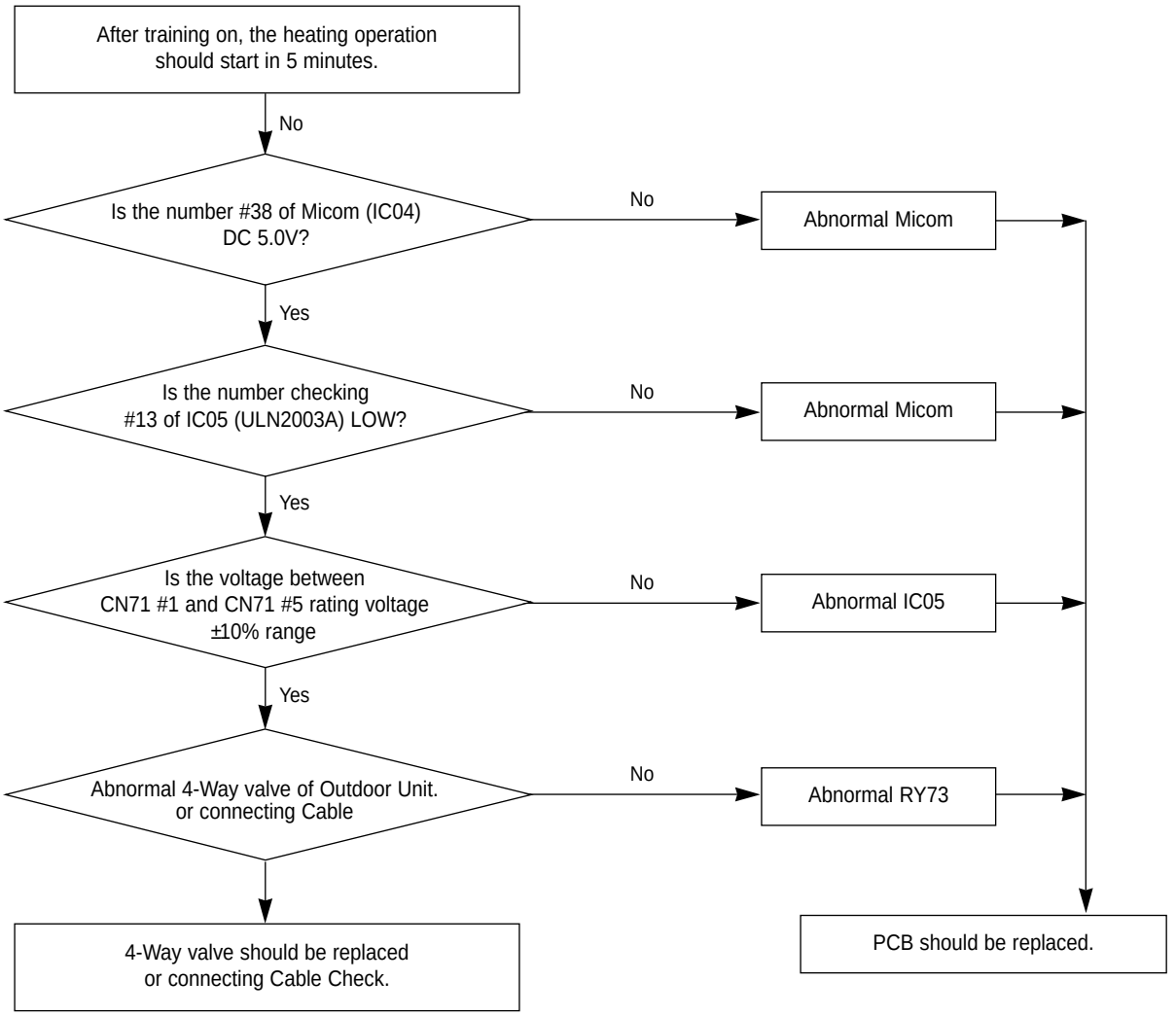
1. Checklist :
   1) Is input voltage normal?
   2) Is the UP/DOWN louver motor properly connected with the connector (CN61)?

2. Troubleshooting procedure



6-3-5 In the HEAT mode, When there is no warm air current. Check this fist;

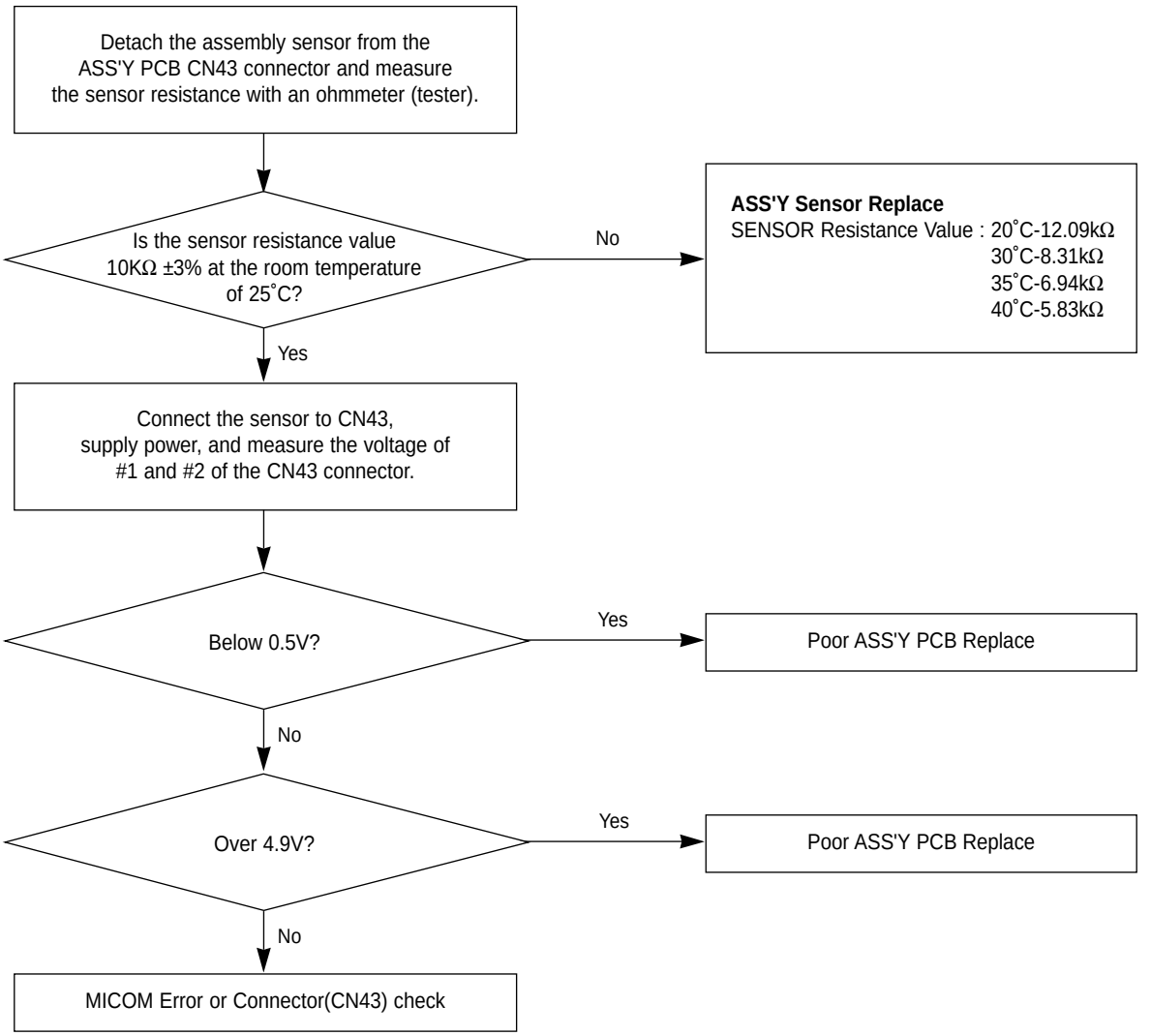
1) Is the set temperature of Remote Control lower than room temperature in Heat mode?
2) Is the Indoor PCB properly connected with the CN71 connector?



6-3-6 Room temperature sensor failure

Description	LAMP		
	OPERATION	TIMER	TURBO
Indoor unit room temperature sensor error(open or short)	○	◑	○

○ : Lamp off ◑ : Lamp flickering



6-3-7 Room Pipe sensor failure

Description	LAMP		
	OPERATION	TIMER	TURBO
	≋	⏱	TURBO
Indoor unit heat exchanger temperature sensor error (open or short)	◑	◑	○

○ : Lamp off ◑ : Lamp flickering

1. Check the assembly condition of the sensor connector(CN43) on the indoor unit Main PCB and if not assembled, reassemble the connector accurately.

2. Detach the room pipe sensor connector(CN43) and check the resistance between connector 3 and 4.

Temperature(˚C)	Resistance Value(Kohm)	Temperature(˚C)	Resistance Value(Kohm)	Others
15	14.68	30	8.31	The data tolerance is ±3%.
20	12.09	35	6.94	
25	10	40	5.83	

   If the above data is not met, replace the room pipe sensor.

3. Assemble the room pipe sensor to PCB, plug in, and check the voltage of connector 3 and 4. If the resistance is below 0.5V or over 4.9V, replace the indoor Main PCB. (short or disconnected in the PCB board)

6-3-8 When the remote control is not receiving.

1. Check if the connector was normally assembled.

2. Put the set in operation and check the voltage of No. 3(+) and No. 2(-) of the main PCB CN91 while operating the remote control. When the voltage descends below 3V, the assembly module PCB is normal and the main PCB is poor. Then replace the main PCB.

3. Replace the assembly display PCB because the module PCB is poor if the voltage between No. 2~3 of CN91 maintains 5V after the remote control starts operation.

6-4 PCB Inspection Method

6-4-1 Pre-inspection Notices

1. Check if you pulled out the AC power plug when you eliminate the PCB or front panel.
2. Don't hold the PCB side not impose excessive force on it to eliminate the PCB.
3. Don't pull the lead wire but hold the whole housing to connect or disconnect a connector to the PCB.

6-4-2 Inspection Procedure

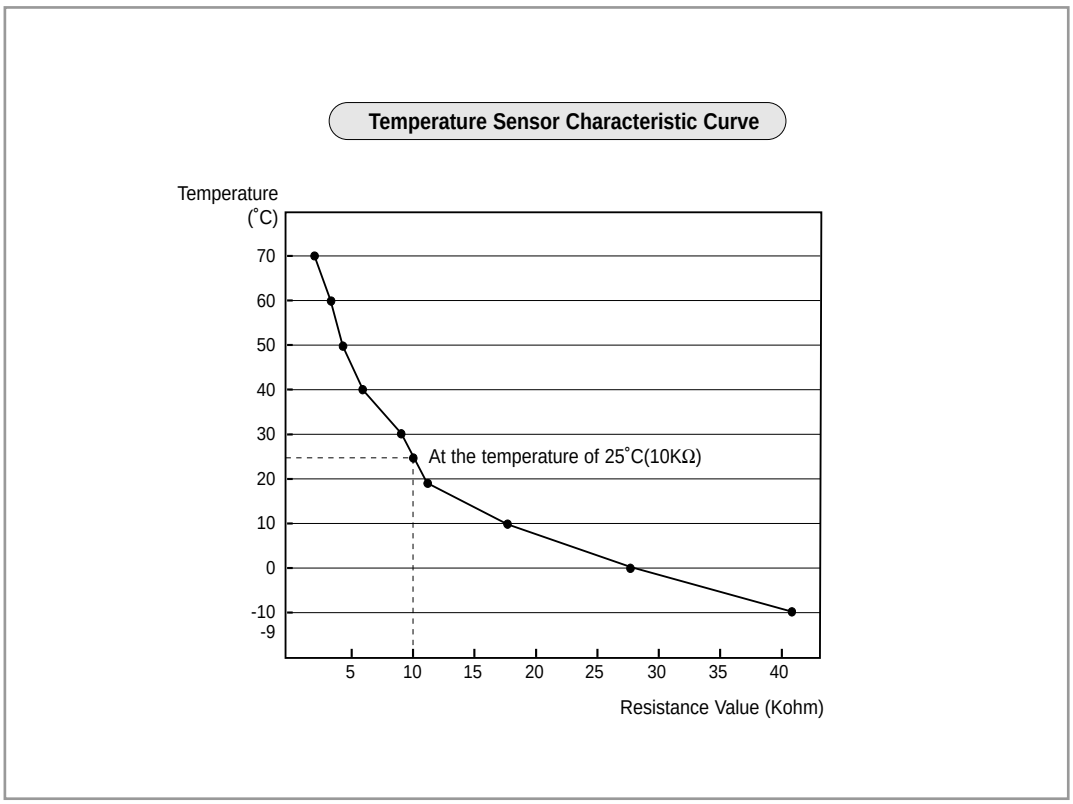
1. Check connector connection and peeling of PCB or bronze coating pattern when you think the PCB is broken.
2. The PCB is composed of the 3 parts.
   - **Main PCB Part** : MICOM and surrounding circuit, relay, room fan motor driving circuit and control circuit, sensor driving circuit, power circuit of DC12V and DC5V, and buzzer driving circuit.
   - **Display part** : LED lamp
   - **Switch part** : Switch

6-4-3 Detailed Inspection Procedure

No	Procedure	Inspection Method	Cause
1	Plug out and pull the PCB out of the electronic box. Check the PCB fuse.	1) Is the fuse disconnected? (F701)	• Overcurrent • Indoor Fan Motor Short • AC Part Pattern Short of the MAIN PCB
2	Supply power. If the operating lamp twinkles at this time, the above 1)~3) have no relation.	Checking the power voltage.	
		1) Is the DB71input voltage AC200V~AC240V?	• Power Cord is fault, Fuse open. Wrong Power Cable Wiring, AC Part is faulty.
		2) Is the voltage between both terminals of the C102 on the 2nd side of the transformer AC12V ±0.5V?	• Switching Trans or Power Circuit is faulty
		3) Is the voltage between both terminals of OUT and GND of IC02(KA78L05) DC5V ±0.5V?	• Power Circuit is faulty, Load Short
3	Press the ON/OFF button and operate TURBO mode. But, exclude the RESERVE operation.	Checking the power voltage.	
		1) Check the voltage of the relay(RY71) coil(IC05 PIN #11 and GND : 0V, PIN#6 and GND : 5V) during operation(3 minutes after TURBO operation).	• Relay(RY71) Coil Disconnection, IC05 is faulty
		2) Check the voltage of both terminals of terminal block 1 and N1 after 3 minute operation.: AC220V	• Relay(RY71) Contact is faulty
4	Press the ON/OFF button. 1. FAN Speed [High] 2. Continuous Operation	1) Is the voltage over AC180V being imposed on terminal #3 and #5 of the fan motor connector(CN72)?	• Fan Motor of the indoor is faulty
		2) The fan motor of the indoor unit doesn't run.	• Fan Motor Connector(CN72) is faulty
		3) The power voltage between terminal #3 and #5 of the connector(CN72) is 0V.	• ASS'Y Main PCB is faulty • Connection is faulty

6-4-4 Temperature Sensor Feature Conversion Table(Room Temperature Sensor); 103AT

Temperature [˚C]	Sensor Resistance [Kohm]	Temperature [˚C]	Sensor Resistance [Kohm]	Temperature [˚C]	Sensor Resistance [Kohm]	Temperature [˚C]	Sensor Resistance [Kohm]
70	2.229						
69	2.296	49	4.300	29	8.622	9	18.700
68	2.365	48	4.444	28	8.944	8	19.480
67	2.437	47	4.594	27	9.281	7	20.290
66	2.512	46	4.749	26	9.632	6	21.150
65	2.589	45	4.912	25	10	5	22.050
64	2.669	44	5.080	24	10.380	4	22.990
63	2.752	43	5.256	23	10.780	3	23.900
62	2.838	42	5.439	22	11.200	2	25.030
61	2.928	41	5.630	21	11.630	1	26.130
60	3.021	40	5.828	20	12.090	0	27.280
59	3.116	39	6.033	19	12.560	-1	28.470
58	3.216	38	6.246	18	13.060	-2	29.720
57	3.319	37	6.468	17	13.570	-3	31.040
56	3.426	36	6.699	16	14.120	-4	32.430
55	3.537	35	6.941	15	14.680	-5	33.890
54	3.652	34	7.192	14	15.280	-6	35.430
53	3.772	33	7.455	13	15.900	-7	37.050
52	3.897	32	7.729	12	16.550	-8	38.760
51	4.026	31	8.015	11	17.240	-9	40.560
50	4.161	30	8.313	10	17.960		

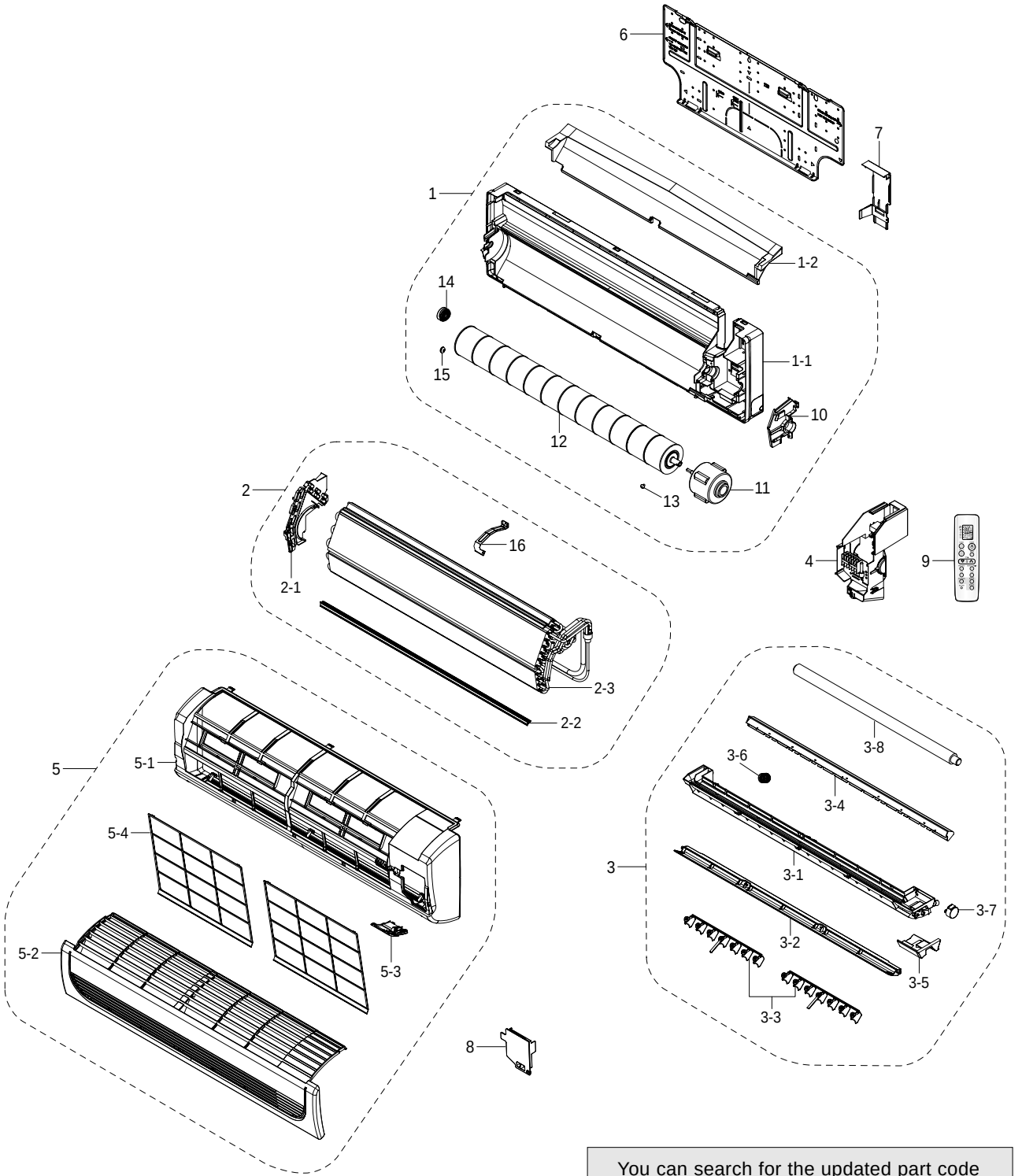


6-5 Main Part Inspection Method

<table>
<tr><th>Part</th><th colspan="2">Breakdown Inspection Method</th></tr>
<tr><td rowspan="3">Room Temperature Sensor</td><td colspan="2">Measure resistance with a tester</td></tr>
<tr><td>Normal</td><td>At the normal temperature 37kΩ~ 8.3kΩ(-7˚C~+30˚C) *Refer to Table 6-4-4.</td></tr>
<tr><td>Abnormal</td><td>∞, 0Ω · · · Open or Short</td></tr>
<tr><td rowspan="3">Room Fan Motor</td><td colspan="2">Measure the resistance between terminals of the connector (CN72) with a tester.</td></tr>
<tr><td>Normal</td><td>At the normal temperature (10˚C ~ 30˚C)
<table>
<tr><th>Compare terminal</th><th>Resistance</th><th>Remark</th></tr>
<tr><td>Yellow, Blue</td><td>404.4Ω ± 10%</td><td>Main</td></tr>
<tr><td>Yellow, Red</td><td>340Ω ± 10%</td><td>Sub</td></tr>
</table></td></tr>
<tr><td>Abnormal</td><td>∞, 0Ω · · · Open or Short</td></tr>
<tr><td rowspan="3">Outdoor Fan Motor</td><td colspan="2">Measure the resistance between motor wires with a tester.</td></tr>
<tr><td>Normal</td><td>At the normal temperature (10˚C ~ 30˚C)
<table>
<tr><th>Compare terminal</th><th>Resistance</th><th>Remark</th></tr>
<tr><td>Yellow, Red</td><td>360Ω ± 10%</td><td>Main</td></tr>
<tr><td>Black, Yellow</td><td>328Ω ± 10%</td><td>Sub</td></tr>
</table></td></tr>
<tr><td>Abnormal</td><td>∞, 0Ω · · · Open or Short</td></tr>
<tr><td rowspan="3">Stepping Motor</td><td colspan="2">Measure the resistance between the red wire and each terminal wire with a tester.</td></tr>
<tr><td>Normal</td><td>About 300Ω at the normal temperature (20˚C ~ 30˚C)</td></tr>
<tr><td>Abnormal</td><td>∞, 0Ω · · · Open or Short</td></tr>
</table>

7. Exploded Views and Parts List

7-1 Indoor Unit



You can search for the updated part code number through the ITSELF.

URL : http://itself.sec.samsung.co.kr

■ Parts List

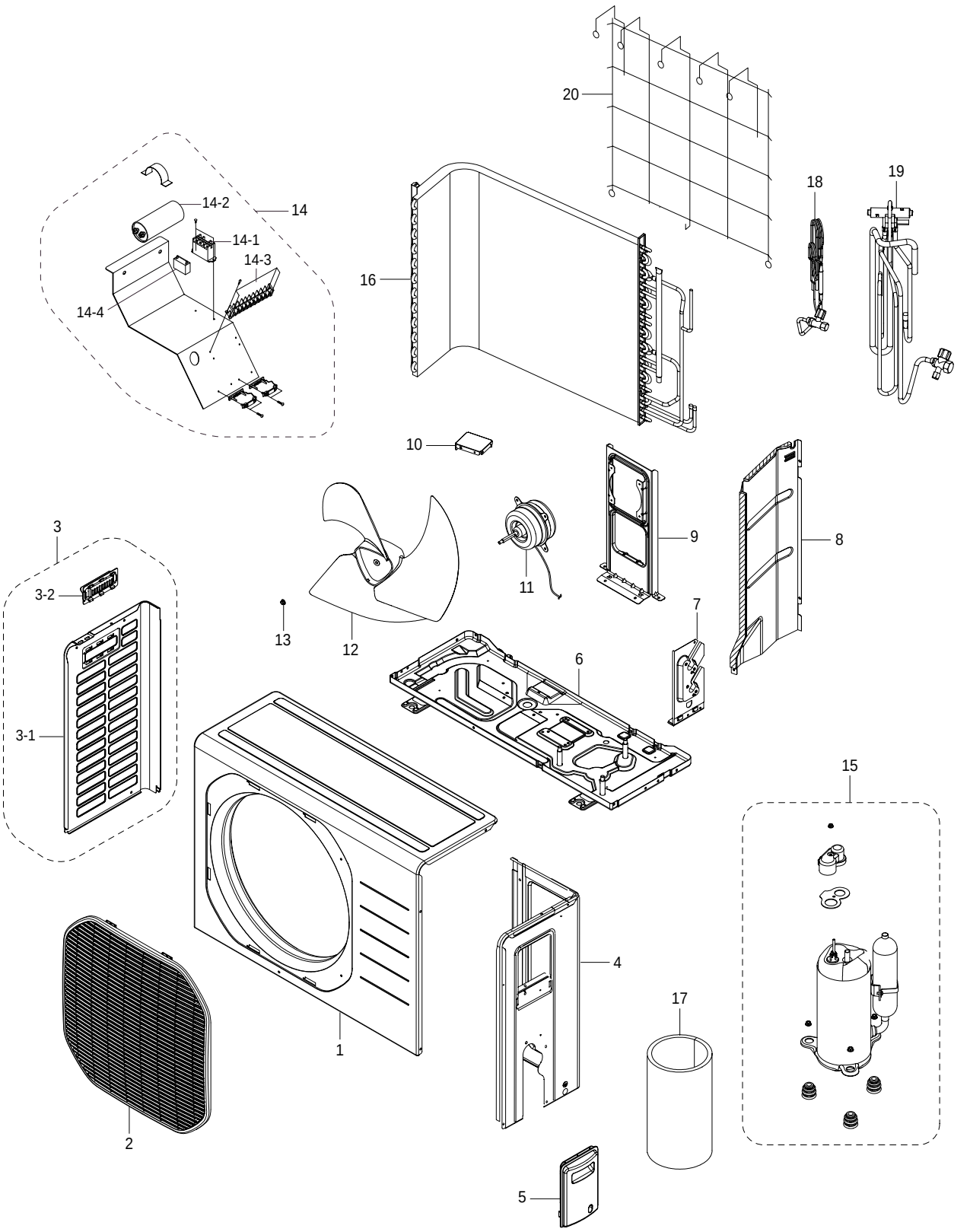
No.	Code No.	Description	Specification	Q'TY		
				AQ18WJWB AQ18WJWE	AQT18WJWB AQT18WJWE	AQ24W6WB AQ24W6WE
1	DB94-00615A	ASS'Y BACK BODY	ASS'Y	1	1	1
1-1	DB61-01974A	BODY BACK	HIPS	1	1	1
1-2	DB69-01039A	CUSHION-BACK BODY	FO-PS	1	1	1
2	DB96-03913A	ASS'Y CYCLE IN	ASS'Y	1	1	-
	DB96-03809A	ASS'Y CYCLE IN	ASS'Y	-	-	1
2-1	DB63-01065A	COVER-BEARING	ABS	1	1	1
2-2	DB60-00192A	SPACER-EVAP LOW	PVC	1	1	1
2-3	DB96-03754D	ASS'Y EVAP	1.5 SLIT 2x16	1	1	-
	DB96-03754C	ASS'Y EVAP	1.3 SLIT 2x16	-	-	1
3	DB94-00616B	ASS'Y TRAY DRAIN	ASS'Y	1	1	1
3-1	DB63-01071A	TRAY-DRAIN	HIPS	1	1	1
3-2	DB61-01975B	BLADE-H	ABS	1	1	1
3-3	DB61-01976A	BLADE-V	PP	2	2	2
3-4	DB63-01066A	TRAY-STABILIZER	HIPS	1	1	1
3-5	DB69-01024A	INSU TRAY RH	FO-PS	1	1	1
3-6	DB73-00180A	RUBBER-CAP DRAIN	GUM-EPM	1	1	1
3-7	DB31-00285A	MOTOR-STEPPING BLADE	MSFCC20A01	1	1	1
3-8	DB94-00458B	ASS'Y DRAIN-HOSE	ASS'Y	1	1	1
4	DB93-02830F	ASS'Y CONTROL IN	ASS'Y	1	1	-
	DB93-02830G	ASS'Y CONTROL IN	ASS'Y	-	-	1
5	DB92-00632E	ASS'Y PANEL FRONT	ASS'Y	-	1	-
	DB92-00632F	ASS'Y PANEL FRONT	ASS'Y	1	-	1
5-1	DB64-01184B	PANEL FRONT	ABS	1	1	1
5-2	DB64-01182B	GRILLE-INLET	ABS	1	1	1
5-3	DB93-02867B	ASSY DISPLAY	ASS'Y	1	1	1
5-4	DB63-01186A	GUARD-AIR FILTER	PP	-	1	-
	DB63-01186C	GUARD-AIR FILTER	PP	1	-	1
6	DB70-00505A	PLATE-HANGER	SGCC-P	1	1	1
7	DB61-01981A	HOLDER-PIPE	HIPS	1	1	1
8	DB63-01063A	COVER-CONTROL	HIPS	1	1	1
9	DB93-02532B	ASS'Y REMOCON	ASS'Y	1	1	1
10	DB96-03817A	ASS'Y EVAP-SUPPORT	ASS'Y	1	1	1
11	DB31-00267A	MOTOR FAN	YFK 40 4C	1	1	1
12	DB94-00456B	ASS'Y-CROSS FAN	ASS'Y	1	1	1
13	DB97-02075A	ASS'Y-BOLT SPECIAL	M5xL6	1	1	1
14	DB73-00181A	RUBBER-BEARING	RUBBER	1	1	1
15	DB94-40007A	ASS'Y BEARING-MOTOR	ASS'Y	1	1	1
16	DB61-01977A	BRACKET-EVAP	SGCC-M	1	1	1

■ Parts List

No.	Code No.	Description	Specification	Q'TY		
				AQT24W6WB AQT24W6WE	SH18ZWJ	SH24ZW6
1	DB94-00615A	ASS'Y BACK BODY	ASS'Y	1	1	1
1-1	DB61-01974A	BODY BACK	HIPS	1	1	1
1-2	DB69-01039A	CUSHION-BACK BODY	FO-PS	1	1	1
2	DB96-03913A	ASS'Y CYCLE IN	ASS'Y	-	1	-
	DB96-03809A	ASS'Y CYCLE IN	ASS'Y	1	-	1
2-1	DB63-01065A	COVER-BEARING	ABS	1	1	1
2-2	DB60-00192A	SPACER-EVAP LOW	PVC	1	1	1
2-3	DB96-03754D	ASS'Y EVAP	1.5 SLIT 2x16	-	1	-
	DB96-03754C	ASS'Y EVAP	1.3 SLIT 2x16	1	-	1
3	DB94-00616B	ASS'Y TRAY DRAIN	ASS'Y	1	1	1
3-1	DB63-01071A	TRAY-DRAIN	HIPS	1	1	1
3-2	DB61-01975B	BLADE-H	ABS	1	1	1
3-3	DB61-01976A	BLADE-V	PP	2	2	2
3-4	DB63-01066A	TRAY-STABILIZER	HIPS	1	1	1
3-5	DB69-01024A	INSU TRAY RH	FO-PS	1	1	1
3-6	DB73-00180A	RUBBER-CAP DRAIN	GUM-EPM	1	1	1
3-7	DB31-00285A	MOTOR-STEPPING BLADE	MSFCC20A01	1	1	1
3-8	DB94-00458B	ASS'Y DRAIN-HOSE	ASS'Y	1	1	1
4	DB93-02830F	ASS'Y CONTROL IN	ASS'Y	-	1	-
	DB93-02830G	ASS'Y CONTROL IN	ASS'Y	1	-	1
5	DB92-00632E	ASS'Y PANEL FRONT	ASS'Y	1	-	-
	DB92-00632C	ASS'Y PANEL FRONT	ASS'Y	-	1	1
5-1	DB64-01184B	PANEL FRONT	ABS	1	1	1
5-2	DB64-01182B	GRILLE-INLET	ABS	1	1	1
5-3	DB93-02867B	ASS'Y DISPLAY	ASS'Y	1	1	1
5-4	DB63-01186A	GUARD-AIR FILTER	PP	1	-	-
	DB63-01186C	GUARD-AIR FILTER	PP	-	1	1
6	DB70-00505A	PLATE-HANGER	SGCC-P	1	1	1
7	DB61-01981A	HOLDER-PIPE	HIPS	1	1	1
8	DB63-01063A	COVER-CONTROL	HIPS	1	1	1
9	DB93-02532B	ASS'Y REMOCON	ASS'Y	1	1	1
10	DB96-03817A	ASS'Y EVAP-SUPPORT	ASS'Y	1	1	1
11	DB31-00267A	MOTOR FAN	YFK 40 4C	1	1	1
12	DB94-00456B	ASS'Y-CROSS FAN	ASS'Y	1	1	1
13	DB97-02075A	ASS'Y-BOLT SPECIAL	M5xL6	1	1	1
14	DB73-00181A	RUBBER-BEARING	RUBBER	1	1	1
15	DB94-40007A	ASS'Y BEARING-MOTOR	ASS'Y	1	1	1
16	DB61-01977A	BRACKET-EVAP	SGCC-M	1	1	1

MEMO

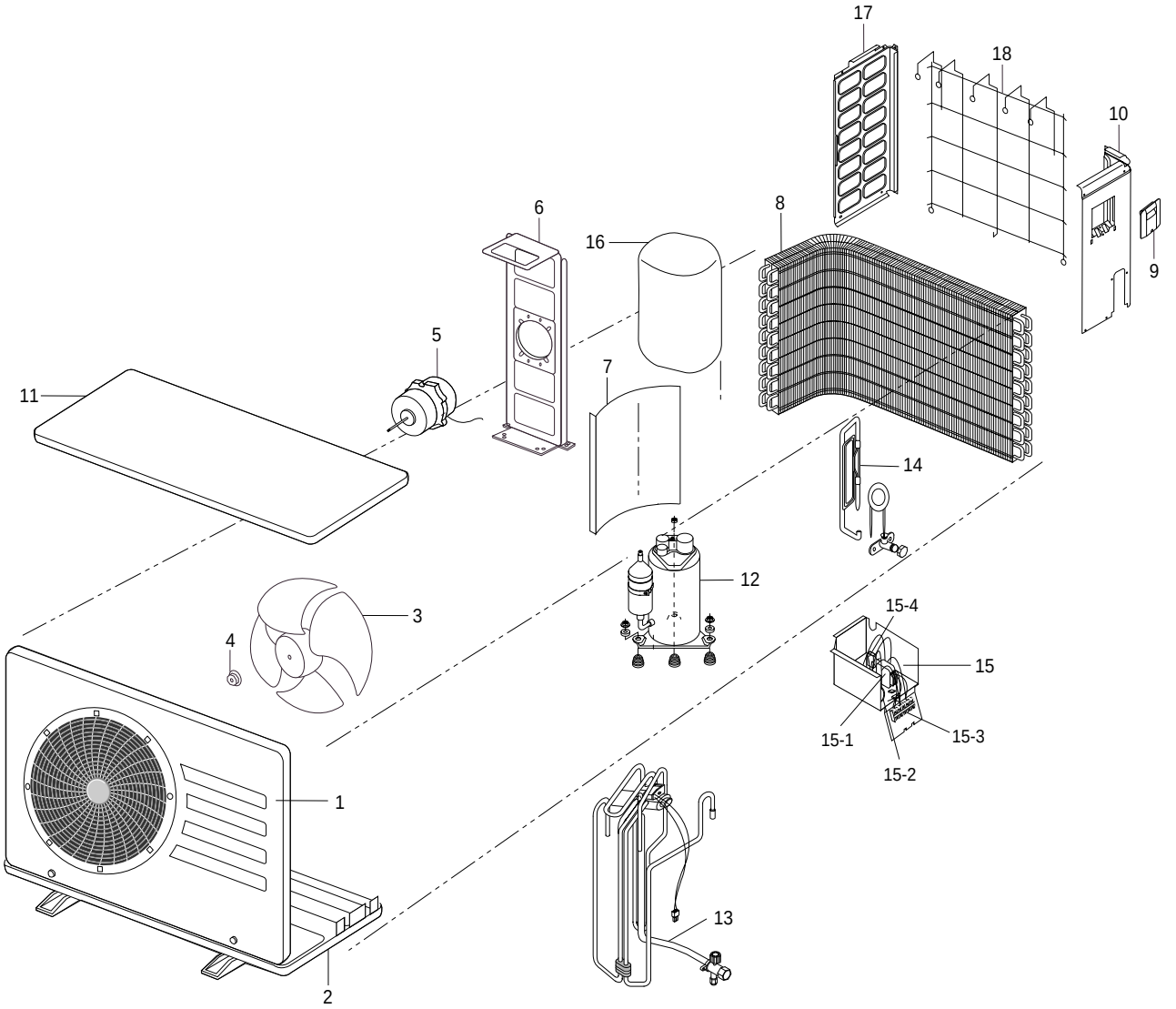
■ 18K BTU



■ **Parts List**

No.	Code No.	Description	Specification	Q'TY	
				UQ18WJWE UQT18WJWE SH18ZWJX	UQ18WJWB UQT18WJWB
1	DB90-01711A	ASS'Y-CABI FRONT	ASS'Y	1	1
2	DB63-00847A	GUARD FAN	HIPS	1	1
3	DB90-01713A	ASS'Y-CABI SIDE LF	ASS'Y	1	1
3-1	DB64-00982A	CABINET-SIDE LF	SECC-P	1	1
3-2	DB64-00992A	HANDLE-LF	PP	1	1
4	DB90-01712A	ASS'Y-CABI SIDE RH	ASS'Y	1	1
5	DB63-01172A	COVER-CONTROL	ABS V0	1	1
6	DB90-01681A	ASS'Y BASE OUT	ASS'Y	1	1
7	DB61-02068A	BRACKET-VALVE	SECC-P	1	1
8	DB94-00638A	ASS'Y PARTITION	ASS'Y	1	1
9	DB61-01644A	BRACKET MOTOR	SGCC-M	1	1
10	DB97-02225B	ASS'Y SUPPORT-PLATE B/M	ASS'Y	1	1
11	DB31-00265E	MOTOR FAN	YDK95-45-4-1	1	-
	DB31-00265F	MOTOR FAN	YDK95-45-6-1	-	1
12	DB67-00238A	FAN-PROPELLER	AS+GF20%	1	1
13	DB60-30020A	NUT-FLANGE	M6	1	1
14	DB93-02904A	ASS'Y CONTROL OUT	ASS'Y	1	-
	DB93-02904B	ASS'Y CONTROL OUT	ASS'Y	-	1
14-1	DB35-00040A	RELAY	T92S7A22-240	1	1
14-2	2501-001240	C-OIL	50uF/450VAC	1	-
	2501-001239	C-OIL	45uF/450VAC	-	1
14-3	DB65-00164D	TERMINAL BLOCK	8P	1	1
14-4	2301-001370	C-FILM	2.5uF/450VAC	1	1
15	48B200JT1EH-SS	ROTARY COMPRESSOR	ASS'Y	1	-
	48D190IT1EH-SS	ROTARY COMPRESSOR	ASS'Y	-	1
16	DB96-03873A	ASS'Y COND	ASS'Y	1	1
17	DB62-03032A	INSULATION-SOUND	FELT	1	1
18	DB99-00567A	ASS'Y VALVE CHECK	ASS'Y	1	-
	DB99-00567B	ASS'Y VALVE CHECK	ASS'Y	-	1
19	DB99-00566A	ASS'Y VALVE 4WAY	ASS'Y	1	-
	DB99-00566B	ASS'Y VALVE 4WAY	ASS'Y	-	1
20	DB71-00093A	BAR-STEEL	HSWR	1	1

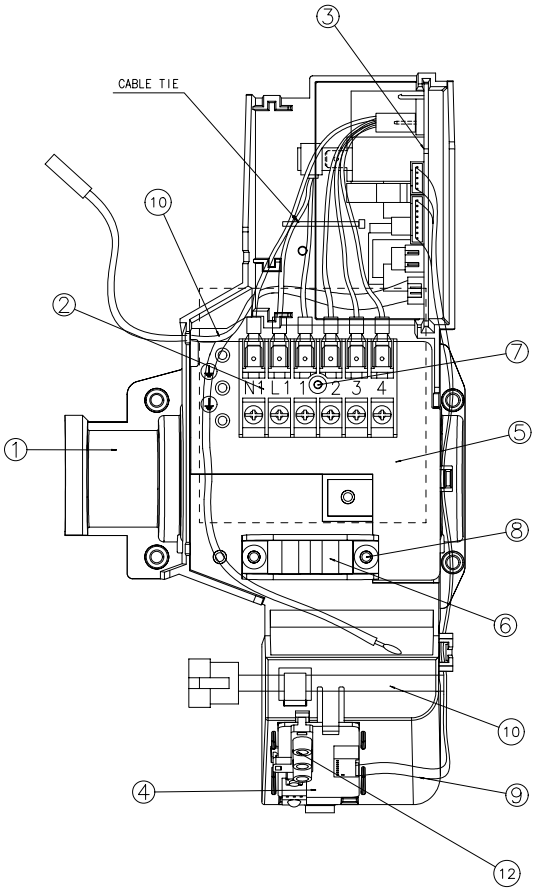
■ 24K BTU

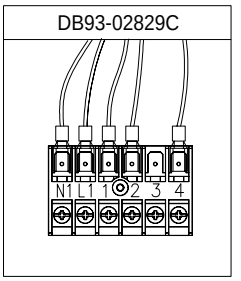


■ Parts List

No.	Code No.	Description	Specification	Q'TY	
				UQ24W6WE UQT24W6WE SH24ZW6X	UQ24W6WB UQT24W6WB
1	DB90-01146C	ASS'Y-CABI FRONT	ASS'Y	1	1
2	DB90-00970J	ASS'Y BASE OUT-PART	ASS'Y	1	1
3	DB67-00142A	FAN-PROPELLER	AS+GF20%	1	1
4	DB60-30020A	NUT-FLANGE	M6	1	1
5	DB31-00264D	MOTOR FAN	YDK95-60-4-1	1	-
	DB31-00264C	MOTOR FAN	YDK95-60-6-1	-	1
6	DB61-00686A	BRACKET MOTOR	SGCC-M	1	1
7	DB94-00649A	ASS'Y PARTITION	ASS'Y	1	1
8	DB96-03337B	ASS'Y COND	ASS'Y	1	1
9	DB90-40176B	ASS'Y COVER-CONTROL	ASS'Y	1	1
10	DB90-01651A	ASS'Y-CABI SIDE RH	ASS'Y	1	1
11	DB90-10616G	ASS'Y CABI-UP	ASS'Y	1	1
12	55B260JT1EM-SS	ROTARY COMPRESSOR	ROTARY	1	-
	55A260IT1EM-SS	ROTARY COMPRESSOR	ROTARY	-	1
13	DB96-03811A	ASS'Y TUBE-4WAY VALAE	ASS'Y	1	-
	DB96-03811B	ASS'Y TUBE-4WAY VALAE	ASS'Y	-	1
14	DB96-03810A	ASS'Y TUBE-CHECK V/V	ASS'Y	1	-
	DB96-03810B	ASS'Y TUBE-CHECK V/V	ASS'Y	-	1
15	DB93-03236A	ASS'Y CONTROL OUT	ASS'Y	1	-
	DB93-03236D	ASS'Y CONTROL OUT	ASS'Y	-	1
15-1	3501-000305	RELAY	EL200/240A1-F	1	1
15-2	2501-001239	C-OIL	45uF/450VAC	1	-
	2501-001240	C-OIL	50uF/450VAC	-	1
15-3	DB65-00164A	TERMINAL BLOCK	8P	1	1
15-4	2301-001379	C-FILM	4uF/450VAC	1	1
16	DB72-00630C	INSULATION-SOUND	FELT	1	1
17	DB90-01351A	ASS'Y CABINET-LF	ASS'Y	1	1
18	DB71-00088A	BAR-STEEL	MSWR	1	1

7-3 Ass'y-Control In



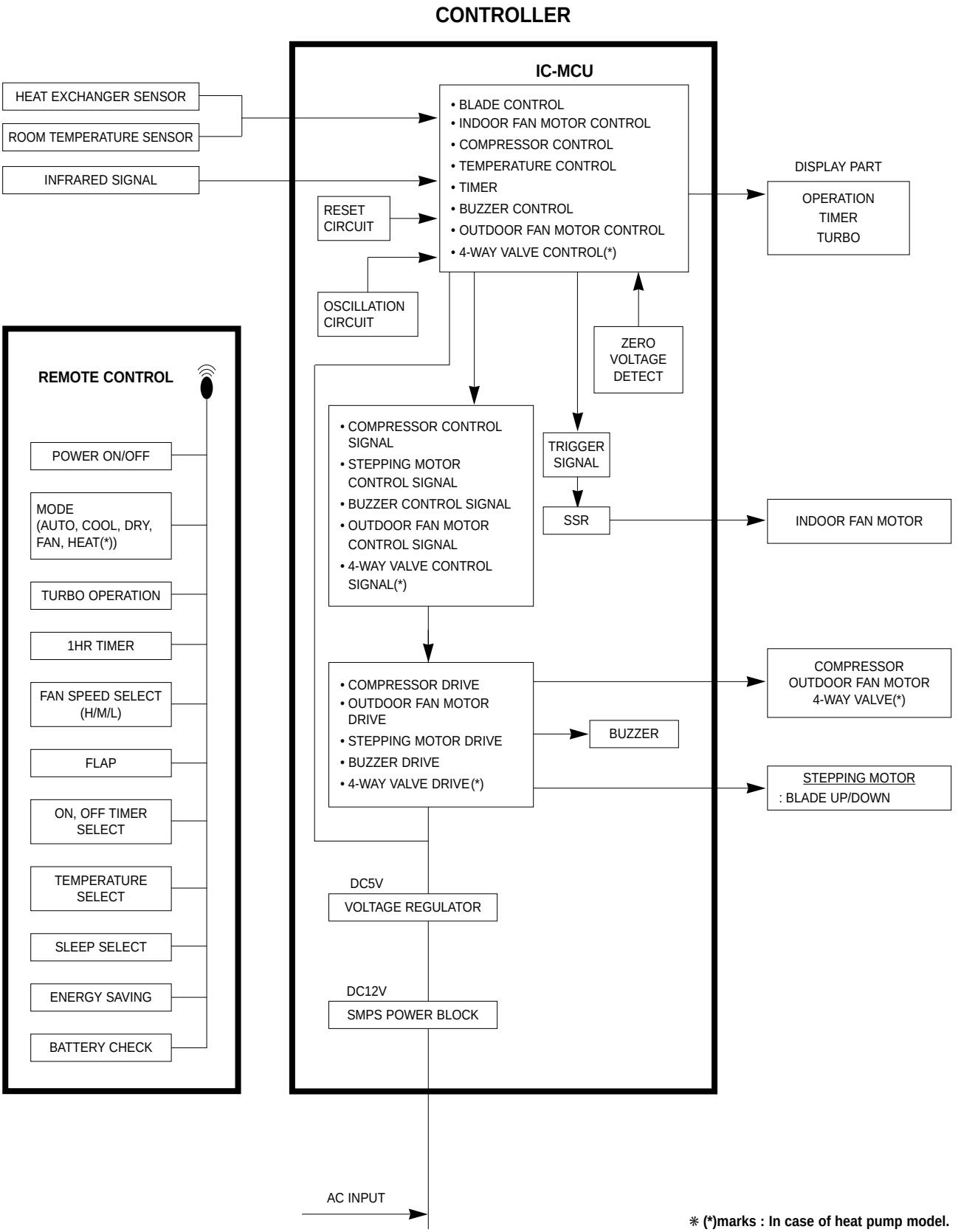


N1	NATURAL
L1	LIVE
1	COMPRESSOR
2	FAN HIGH
3	FAN LOW
4	4-WAY VALVE

■ **Parts List**

No.	Code No.	Description	Specification	Q'TY	Remark
1	DB61-01979A	CASE-CONTROL	ABS	1	
2	DB93-02829A	ASS'Y TERMINAL BLOCK	ASS'Y	1	24K
	DB93-02829C			1	18K
3	DB93-02788A	ASS'Y MAIN PCB	ASS'Y	1	24K
	DB93-02788E			1	18K
4	DB93-02793A	ASS'Y-S/W & DISPLAY PCB	ASS'Y	1	
5	DB70-00507A	PLATE-TERMINAL LOW	SGCC-M, T1.2	1	
6	DB61-01980A	HOLDER-WIRE CLAMP	ABS	1	
7	6001-000929	SCREW-MACHINE	PH M3xL22	1	S/N
8	6001-001054	SCREW-MACHINE	TH M4xL10	3	S/N
9	DB39-01046A	ASS'Y-C/W DISPLAY PCB	ASS'Y	1	
10	DB39-00147A	C/W STEP MOTOR UP/DOWN	ASS'Y	1	
11	DB32-00020D	ASS'Y-THERMISTOR	4P(103AT)	1	
12	DB63-00851A	COVER LAMP	ABS	1	

8. Block Diagram

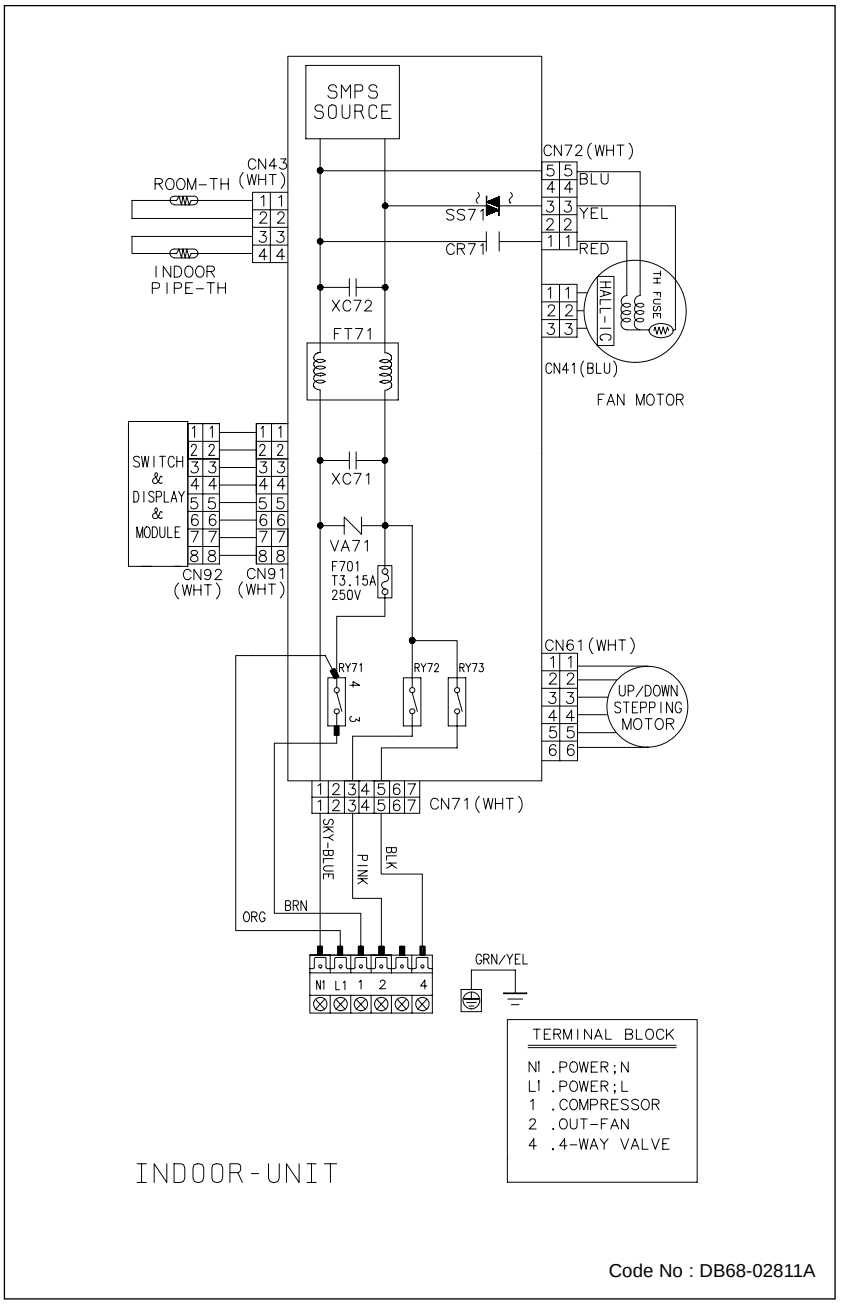


✻ **(*)marks : In case of heat pump model.**

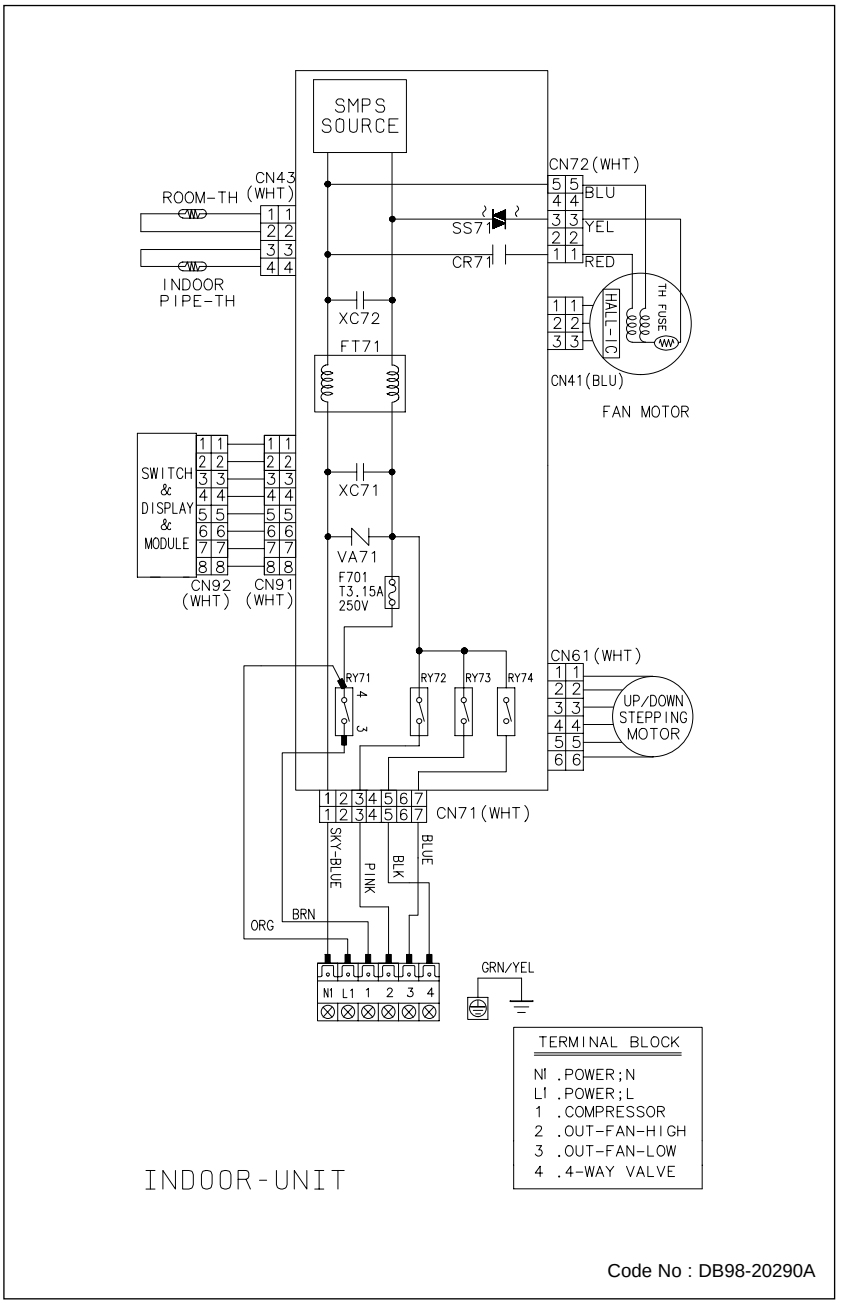
9. Wiring Diagram

9-1 Indoor Unit

■ **18K BTU**



■ 24K BTU



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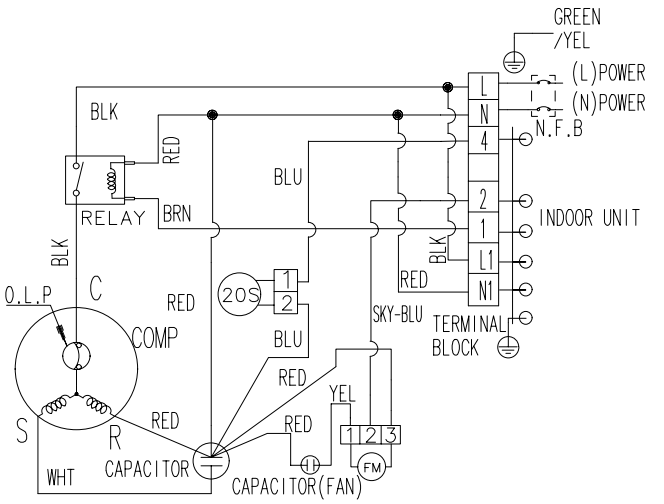

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20S	SOLENOID COIL	FM	FAN MOTOR

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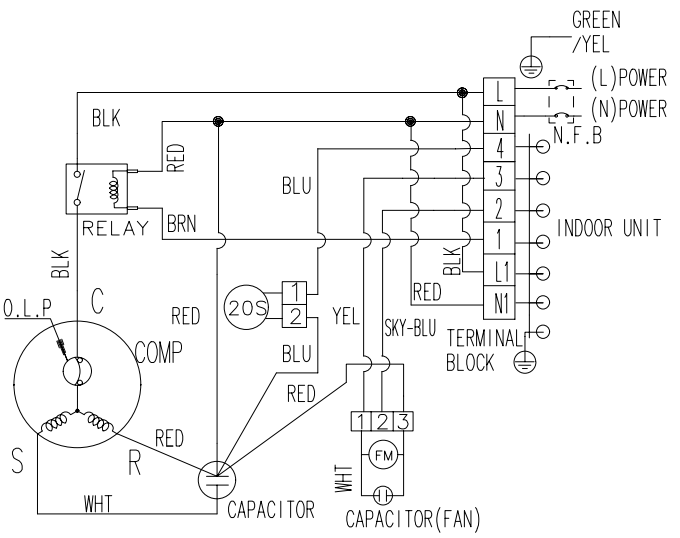
■ 24K BTU



MARK	NAME	MARK	NAME
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