



Commercial Air Conditioners

Centralized Controller

Model: CE52-24/F(C)

Thank you for choosing commercial air conditioners. Please read this Owner's Manual carefully before operation and retain it for future reference.

If you have lost the Owner's Manual, please contact the local agent or visit www.gree.com or send an email to global@gree.com.cn for the electronic version.

To Users

Thank you for selecting Gree's product. Please read this instruction manual carefully before installing and using the product, so as to master and correctly use the product. In order to guide you to correctly install and use our product and achieve expected operating effect, we hereby instruct as below:

- (1) This appliance is not intended for use by persons (including children) with reduced physical, sensory or mental capabilities, or lack of experience and knowledge, unless they have been given supervision or instruction concerning use of the appliance by a person responsibility for their safety. Children should be supervised to ensure that they do not play with the appliance.
- (2) This instruction manual is a universal manual, some functions are only applicable to particular product. All the illustrations and information in the instruction manual are only for reference, and control interface should be subject to actual operation.
- (3) In order to make the product better, we will continuously conduct improvement and innovation. We have the right to make necessary revision to the product from time to time due to the reason of sales or production, and reserve the right to revise the contents without further notice.
- (4) For personal injury or property loss and damage caused by improper operation such as improper installation and debugging, unnecessary maintenance, violation of related national laws and rules and industrial standard, and violation of this instruction manual, etc., we will bear no liability.
- (5) The final right to interpret for this instruction manual belongs to Gree Electric Appliances, Inc. of Zhuhai.

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1 Safety Notices (Please be sure to abide)

	Warning: If not abide strictly, it may cause severe damage to the unit or the people.
	Note: If not abide strictly, it may cause slight or medium damage to the unit or the people.
0	This sign indicates that the operation must be prohibited. Improper operation may cause severe damage or death to people.
	This sign indicates that the items must be observed. Improper operation may cause damage to people or property.



This product can't be installed at corrosive, inflammable or explosive environment or the place with special requirements, such as kitchen. Otherwise, it will affect the normal operation or shorten the service life of the unit, or even cause fire hazard or serious injury. As for above special places, please adopt special product with anti-corrosive or anti-explosion function.

2 User Notice

- (1) All indoor units must be supplied with unified power.
- (2) Make sure communication cord is connected with the proper port, otherwise there may occur communication malfunction.
- (3) Never knock on, throw or frequently detach the centralized controller.
- (4) Never operate the centralized controller with wet hands.
- (5) Never scratch the screen of centralized controller by hard or sharp objects.
- (6) If the centralized controller is connected with the outdoor network or the last indoor unit of the indoor network, then a matching resistance must be connected between G1 and G2 ports.
- (7) the centralized controller Connect with L-CAC&Split unit, The indoor unit address must be set within the range from 1 to 36, communication way of L-CAC&Split unit set long-distance monitoring mode

3 INSTALLATION

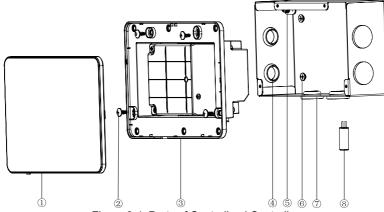


Figure 3-1 Parts of Centralized Controller

No.	1	2	3	4
Name Touch screen		Self-tapping screw ST4.2×9.5 MC (used to secure the rear cover of controller)	Rear cover of controller	Rubber band
QTY	1	4	1	6
No.	(5)	6	7	8
Name	Screw M4×12 (used to secure earthing wire)	Screw ST4.2×16 FA (used to secure electric box cover)	Electric box cover	Matching resistance
QTY	1	4	1	2

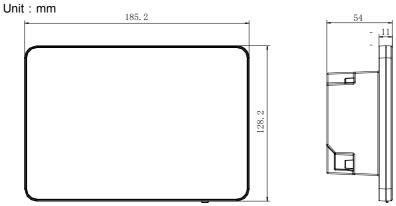


Figure 3-2 Dimension of Centralized Controller

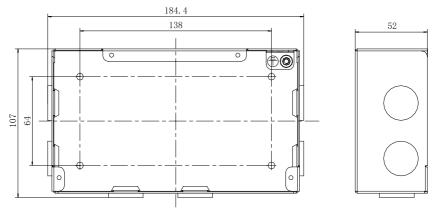


Figure 3-3 Dimension of Electric Box Cover

3.1 Installation Requirements

(1) Communication cord of the centralized controller and Multi-VRF(CAN Network) must be selected according to the table below. Never use the cable that is not in compliance with instructions of this manual.

Net	twork	Cord type	Cord standard	Cord size (mm²/ AWG)	Total length L (m/feet)	Remark
	door work	Light/ Ordinary polyvinyl chloride sheathed cord. (60227 IEC 52	IEC 60227- 5:2007	2×0.75~ 2×1.25 (2× AW G18~2×A WG16)	L≤1000m (L≤3280- 5/6feet)	If cord size is 2×1mm² (2×AWG16), communication cord can be stretched longer. But the total length can't exceed 1500m (4921-1/4feet).
	tdoor work	IEC 52 /60227 IEC 53)			L≤500 (L≤820-1/ 5feet)	Total length of communication cord can't exceed 500m (820-1/5feet).

Notice:

- 1) The cord shall be Circular cord (the cores shall be twisted together).
- 2) If unit is installed in places with intense magnetic field or strong interference, it is necessary to use shielded wire
- (2) Communication cord of the centralized controller and L-CAC&Split unit (Modbus net) must be selected according to the table below

Cord type	Cord size (mm2)	Cord standard	Note
Two_core five twisted pair	24AWG (2×0.6m m)	TIA/EIA- 568-A	When the communication distance exceeds 800m,the need to increase the photoelectric isolation repeter

- (3) Never install the centralized controller in the following places:
 - 1) Places with corrosive gas or serious dust, salt mist or oil smoke.
 - 2) Wet and damp places, with direct sunlight.
 - 3) Places near high temperature objects or places where units might be splashed by water.

3.2 Wiring Instructions

3.2.1 Wiring Ports

Port print	G1, G2	F1, F2	A2, B2	A3, B3	L, N
Meaning	CAN comm. port	fire alarm port	[reserved port]	L-CAC&Split Unit port	Power port

3.2.2 Power Supply

- (1) The centralized controller shall use independent power supply.
- (2) The range of input voltage: 100 ~ 240 VAC; Frequency range: 50/60Hz
- (3) Select power cord according to the following table. Never use the power cord that is not in compliance with instructions of this manual.

Cord type	Cord standard	Cord size (mm²)
Single-cord soft conductiveunsheathed cord (60227 IEC 08)	IEC 60227-3:2007	1.5

3.2.3 Connection Method Of Multi-VRF(CAN Network)

There are three methods to connect centralized controller with the air conditioning system.

Method 1: Connect with indoor network

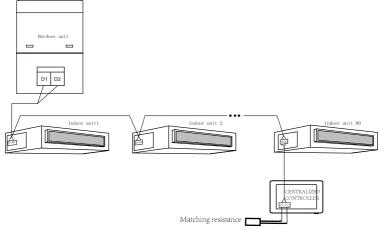


Figure 3-4 Centralized Controller Connected with Indoor Network

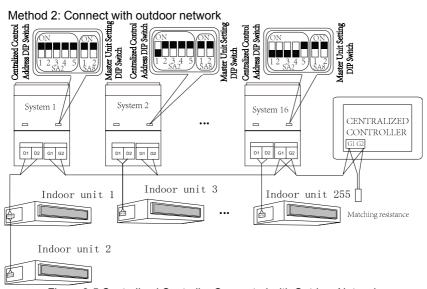
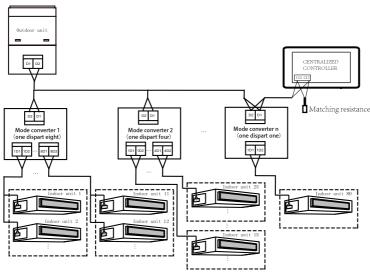


Figure 3-5 Centralized Controller Connected with Outdoor Network



Method 3: Connect with heat recollection mode converter Network

Figure 3-6 Centralized Controller Connected with Heat Recollection Mode Converter Network

Wiring Instructions:

- (1) The centralized controller is applicable to multi VRF units, connectable with network of indoor units or the network of outdoor units. One centralized controller can control up to 16 sets of outdoor system and up to 255 sets of indoor unit.
- (2) If the centralized controller is to be connected with the network of indoor units, connect according to fig.3–4. The centralized controller can only be connected with the terminal unit of indoor network. A matching resistance needs to be added with the communication cords at the G1 and G2 ports.
- (3) If the centralized controller is to be connected with the network of outdoor units, connect according to fig.3–5. The centralized controller can only be connected with the terminal system of the outdoor network. A matching resistance needs to be added with the communication cords at the G1 and G2 ports.
- (4) The centralized control address DIP switch (SA2_Addr-CC) indicates the centralized control address required when different refrigerating systems are controlled in a centralized manner. The default factory setting is "00000".

- (5) If the centralized controller is to be connected with the network of heat recollection, connect according to fig.3–6. The method 2 is also applicable to centralized controller switching in heat recollection network. If the centralized controller is to be connected with the network of outdoor units, set the DIP switch according to the following methods:
 - 1) The DIP switch must be set on the master unit and set the Master Unit Setting DIP Switch(SA8) to "00". Otherwise, the setting is invalid.
 - On the same refrigerating system, the centralized control address DIP switch (SA2_Addr-CC) on a non-master unit is invalid, and it is unnecessary to change the settings.
 - 3) The centralized control address DIP switch (SA2_Addr- CC) on the master unit of a refrigerating system must be set to "0000/", and this system is the master system.
 - 4) The centralized control address DIP switch (SA2_Addr- CC) on the master unit of other refrigerating systems must be set as follows: Note: The centralized control address switch of DIP5 invalidation

	SA2						
DIP1	DIP2	DIP3	DIP4	DIP5	Address NO.		
1	0	0	0	/	2		
0	1	0	0	1	3		
1	1	0	0	1	4		
0	0	1	0	1	5		
1	0	1	0	1	6		
0	1	1	0	1	7		
1	1	1	0	1	8		
0	0	0	1	1	9		
1	0	0	1	1	10		
0	1	0	1	1	11		
1	1	0	1	1	12		
0	0	1	1	1	13		
1	0	1	1	1	14		
0	1	1	1	1	15		
1	1	1	1	1	16		

5) The centralized control address DIP switch (SA2_Addr- CC) cannot be the same between different refrigerating systems. Otherwise, address conflicts may occur and the unit cannot run properly.

Note:

- 1 centralized control address DIP5 invalid
- ② If the centralized control address DIP switch (SA2_Addr-CC) on the master unit of one of VRF system is set to "1111X", The system is the master mode system, the indoor units of other systems can not set the mode of conflicting with the master mode system.

For example: When master mode system is set to cooling mode, the indoor unit of other systems can not set heating mode.

- 6) If the address conflict occurs, it will popup the address conflict page.
 - Note: There are three ways to solve address conflict.
 - Enter into an unoccupied address by manually for the conflict address, the address conflict can be solved after it set up success.
 - ② Press and hold the "Save" button for 5 seconds on the address conflict page, select reset all the IDU's address in the system, after entering the engineering password, system will reassign all the address.
 - ③ On the master unit of master system, press "SW3" to enter the to-be-selected status of function settings, press "SW1 (UP)" or "SW2 (-DOWN)" to select the function of "n5", press "SW7" to enter "n5" function settings, press "SW7" again to send the project number offset command.

3.2.4 Connection Method of L-CAC&Splitunit(Modbus network)

The centralized controller Connect with Umatch Unit (Modbus network) according to the below.

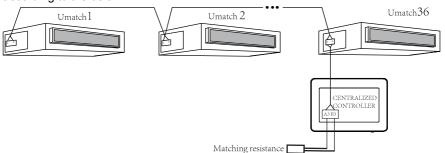


Figure 3-7 Centralized Controller Connected with Umatch Unit

Wiring Instructions:

- (1) The centralized controller is applicable to Umatch units, One centralized controller can control up to 36 Umatch units.
- (2) If the centralized controller is to be connected with Umatch units, connect according to fig.3–7. The controller must connect with terminal unit of Umatch system .Connect the centralized controller's A3 and B3 ports to COM_BMS port on the Umatch unitcorrespondingly with communication cords. A matching resistance needs to be added with the communication cords at the A3 and B3 ports. There are two COM_BMS ports (two core neilsbed and no polarity) on mainboard of Umatch unit, one for centralized controller and another for Umatch unit connection.

- Note: If the centralized controller is to be connected with U-match units , communication line (one end is two-core terminal, the other end is the bare wire. Code: 420400060252) need to be purchased separately. The quantity of communication line is the quantity of U-match units plus 1.
- (3) The indoor unit address must be set within the range from 1 to 36, and different from each other. Identicle addresses will lead to communication failure. Below is the address setting method:
 - 1) Under OFF status, press "Function" and "Mode" on the wired controller simultaneously for 5S to enter the address setting. Then the display panel will show its own address number on the temperature display zone. Adjust the number by pressing the "Up" and "Down" buttons.
 - 2) When setting is over, press "OK/Cancel" or "Swing/Enter" to save the setting and exit. Under the setting status, if no action is taken within 20 seconds, system will exit from the setting and return to the display mode of OFF status. Setting can't be saved in this case.
- (4) Communication method of umatch units must be long-distance monitoring mode, else can not communicate with centralized controller, set the way as follows.
 - Under OFF status, press "Function" and "Timer" on the wired controller simultaneously for 5S to enter the setting of long-distance monitor. Adjust by pressing the "Up" and "Down" buttons.
 - 2) When setting is over, press "OK/Cancel" or "Swing/Enter" to save the setting and exit. Under the setting status, if no action is taken within 20 seconds, system will exit from the setting and return to the display mode of OFF status. Setting can't be saved in this case.
 - Note: Address setting and long-distance monitor setting of unitary units can only be achieved through wired controllers.

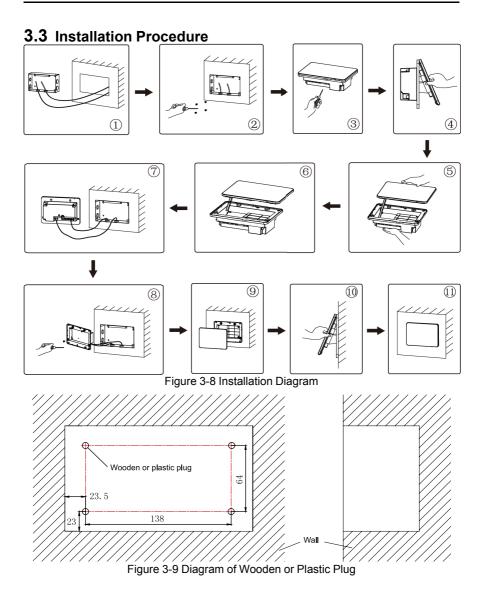


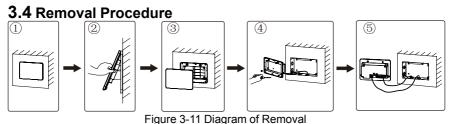


Figure 3-10 Installation Holes of the Electric Box Rear Cover

fig.3–8 is a simple installation procedure of centralized controller. Please pay attention to the following matters:

- (1) Before installation, first cut off the power supply of indoor unit. The power must be cut off during the whole installation process.
- (2) During the installation, be careful not to damage to touch screen.
- (3) Before installation, please make the following preparations:
 - In case that the centralized controller is installed on wall, dig a hole that is the size of 180mm×107mm×62mm and peg 4 wooden or plastic plugs on the wall according to fig.3–9.
 - In case that the centralized controller is installed inside the control
 cabinet, dig 4 installation holes on the surface of the control cabinet
 according to fig.3–10.
- (4) In step ①, pull out the power core and communication cord, and then lead them separately from the wire orifice of the electric box rear cover. Never lead the cords through a same orifice.
- (5) In step ①, pull out the power core and communication cord, and then lead them separately from the wire orifice of the electric box rear cover. Never lead the cords through a same orifice.
- (6) In step ® pull out the wire connecting the touch screen and controller's rear cover. Put the touch screen on a safe place.
- (7) In step ⑦, connect the communication cords to G1, G2 terminals, and connect the neutral wire and live wire to the N, L terminal; connect the

- ground wire to position on the electric box rear cover. Secure it with screw M4×12.
- (8) In step [®], locate the controller's rear cover onto the electric box rear cover with screw ST4.2×9.5 TC.
- (9) In step (9), connect the wire between touch screen and controller's rear cover.



4 DISPLAY AND WORKING INSTRUCTIONS

10:14 03.30.2017 Thursday 2 3 VRF Unit All-Control Group Schedule L-CAC&Split

Figure 4-1 Main Page

4.1 Main Page Display and Buttons

No.	Name	Instructions
1	Time zone	The present date, week and time
2	Help button	Press this button to enter Help Info page
3	Setting button	Press this button to enter setting page
4	L-CAC&Split Unit button	Press this button to enter L-CAC&Split unit page
5	Touch button	Press the Touch Button to turn on/off the screen of centralized controller. Press and hold the Touch Button for 5sec to restart to centralized controller.
6	Schedule button	Press this button to enter schedule page
7	Group button	Press this button to enter group page
8	All-Control button	Press this button to enter All-Control page
9	VRF Unit button	Press this button to enter indoor unit or water/floor units controller page

4.2 General Buttons

Display	Name	Meaning	Display	Name	Meaning
<	Return	Press this button to return to the previous page	×	Cancel	Press this button to cancel the current setting and return to the previous page
\	Save	Press this button to save the current setting and return to the previous page	+	Add	Press this button to add schedule
220	Group Control	Press this button to enter Group control page	1	IDU Sort	Press this button to enter IDU sort page
	Edit	Press this button to edit the group or schedule		Delete	Press this button to delete group or schedule

<<	Up	Press this button to increase value or select the previous option		Down	Press this button to decrease value or select the next option
<	Press this button to return back to previous page		>	Right	Press this button to the next page
«	Forward Page Shift	On the IDU sort page, Press this button to move the selected IDU forward one page	>>	Backw ard Page Shift	On the IDU sort page, Press this button to move the selected IDU backward one page
<	Forward Shift	On the IDU sort page, Press this button to move the selected IDU forward one place	>	Backw ard Shift	On the IDU sort page, Press this button to move the selected IDU backward one place
i	Info	Press this button to enter Info page		Shield	Press this button to conduct shield function of wired controller to nullify such operation

4.3 Buttons Working Instructions

The centralized controller uses a capacitive touch screen so that user can operate the units by just touching the screen.

Buttons on the screen are presented in the following ways:

(1) Icon

Icon button can be operated directly. See section 4.2 for more details.

(2) Icon + Text

According to the meaning of words, turn on or off or select a certain function, or enter a certain page. This type of button has 2 or 3 kinds of status based on the specific function.

Meaning of status (take Sleep Button as an example):

Thin light indicates invalid/not selectable. Sleep function is invalid and can't be selected. Different cases for models.

Light indicates off/not selected. Sleep function is off. Pressing the grey sleep button can turn on the sleep function.

Dark indicates on/selected. Sleep function is on. Pressing the orange sleep button can turn off the sleep function.

(3) Sliding

Sliding up/down to slide the group and setting page up&down.

(4) Sliding bar

Press and hold the sliding bar to drag up/down or left/right and to adjust the value. For example the backlight setting, etc.

(5) Zone button

On the management pages of schedule, as indicated in fig.4–2 (the home page of schedule), each rectangle frame constitutes a zone button.

Press the zone button, then the turning on/off of corresponding function or the corresponding page will pop in.



Figure 4-2 Zone Buttons on the Homepage of Schedule

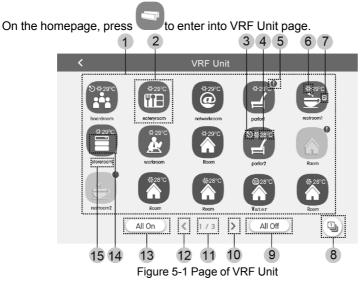
5 FUNCTIONS DESCRIPTION

5.1 Help Info

On the homepage, press to enter into help info page.

User can view the information of the simple operation manual.

5.2 VRF Unit



Nο Name Instructions Display in separate page the list of indoor units or water/ IDU display 1 floor units that are controlled by the centralized controller. Press the button to enter the page of indoor units or water/floor units control. 2 IDU icon Light icon indicates that IDU is on while the dark icon indicated that IDU is off. This icon will be displayed when indoor unit is the Master IDU 3 master indoor unit of the system. When indoor unit is on, set temperature will be Set temperature 4 displayed here. Error icon will be displayed if indoor unit is 5 Frror status malfunctioning. When indoor unit is on, the current operation mode will be displayed: Auto *Cooling Dry Fan * Operation mode 6 Heating Floor heating Space heating 3D heating This icon will be displayed when indoor unit is in shield 7 Shield status 8 **IDU Sort** Press the button to enter into the idu sort page.

9	All Off button	Press this button to turn off VRF units conditioning equipment.
10	Right page button	Press this button to show the next page idu list.
11	Current page	The total pages of the controlled indoor unit and the current page.
12	Left page button	Press this button to show the previous page idu list.
13	All On button	Press this button to turn on VRF units conditioning equipment.
14	IDU icon	Display the icon of the VRF units.
15 IDU name		Display the name of the VRF units.

Press the button to enter the IDU sort page.

Select one indoor unit, press the left or right button at the bottom of the screen to switch the display of the indoor units.

5.3 Single Unit Control

On the Page of VRF Unit page or group page, press the icon of indoor unit to enter the single unit control.

Press the icon of indoor unit for 5 seconds to pop up the name set of the selected indoor unit.

Parameters of single unit control include parameters of general control and advanced control.

5.3.1 General Control Parameters

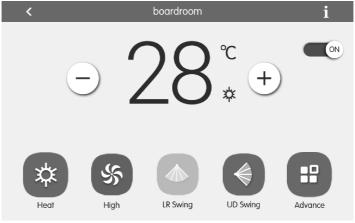


Figure 5-2 Control Page of Single IDU

(1) ON/OFF

Press the on/off button to turn unit on or off.

When unit is turned off, mode, temperature, fan speed and swing can't be set

(2) Mode setting

Press the Mode buttons to set umatch unit operation mode.

Modes for indoor units of different series are not all the same.

If a certain mode is not available in the indoor unit, the icon of the corresponding mode cannot be selected.

Note:

- 1) Auto mode can only be set in the master indoor unit.
- 2) Heat recollection system have no master indoor unit. When the indoor unit of the same branch is connected into one indoor unit, the auto mode can be set; when the quantity of indoor unit in the same branch is more than one set, the auto mode cannot be set; other modes can be freely switched.

(3) Temperature setting

Press the up or down buttons to adjust temperature. Each time pressing the button will increase/decrease the temperature by 1. Holding down the button can increase/decrease temperature continuously.

Pressing the button can display the "indoor temp" and "outdoor temp".

(4) Fan speed setting

Press the fan speed button to set umatch unit fan speed.

Note: Unit defaults to low fan speed in drying mode. Fan speed cannot be set in drying or floor heating mode.

(5) Swing setting

Pressing the button "Up&Down Swing" or "Left&Right Swing" can turn on or off the swing function.

Note: Swing types for indoor units of different series are not all the same.

(6) Malfunction View

When indoor unit fails to function well, the will turn red. then press the button to view the information of malfunctions.

5.3.2 Advanced Control Parameters

Press Advance Button to enter the advance page.

Press icon buttons to turn on or off the corresponding function.

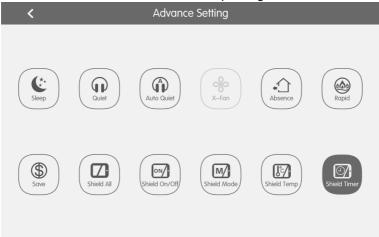


Figure 5-3 Advance Page

- (1) Functions of Sleep, Quiet, Auto Quiet, X-Fan, Absence, Rapid and Save can only be effective when unit is turned on.
- (2) When sleep function is on, auto quiet function will be turned on subsequently. Sleep function will not be effective under auto, fan or floor heating mode.
- (3) Absence function can only be turned on in heating mode. When absence function is on, set temperature is 8°C.
- (4) Rapid cool function can only be effective in cool mode. Likewise, rapid heat function can only be effective in heat mode.
- (5) When shield all function is on, other shield buttons will be invalid.
- (6) Note: When centralized controller is matching with different units, some functions will also be different for different unit.

5.4 Water/Floor control

On the Page of VRF Unit, press the icon of water/floor unit to enter the water/ floor control interface. Press the icon of water/floor unit for 5 seconds to pop up the name set of the selected indoor unit.

Water/Floor control parameters include water heating control parameter and floor heating control parameter. It can be switched via button.

Notes:

- (1) When there is only one function can be selected (water or floor), it can only display the water heating or floor heating function interface, and cannot be switched to another interface;
- (2) Only when it is connected to hot water generator, water heating and floor heating functions are applicable, the interface can be switched and displaced according to the above instructions;

5.4.1 Water Control Parameter



Figure 5-4 Page of Water heating Control

(1) On/Off

Press the on/off button to trun unit on or off.

When the unit is off, it cannot set the mode, temperature and preset function, while it can set the sterilization function.

(2) Mode Setting

Press the Mode buttons to set unit's operation mode.

There are three modes: HotWater, Booking, Night. These three modes can not be simultaneously conducted, it can only choose one of the modes.

HotWater mode: the water tank or hot water generator will start up or stop heating water according to the current set water temperature.

Booking mode: book the water heating time, the water tank or hot water generator will start up the unit in advance according to the actual water temperature, and will decide the on and off of water tank or hot water

generator according to the temperature difference between actual water temperature and the setting water temperature. The water tank or hot water generator will close down the unit 1~4 hours later after the preset time. Once this mode is set, it will circularly operate every day.

Night mode: the fixed period for providing hot water is from 00:00 to 06:00, the water tank or hot water generator will start up in this period, and will decide the on and off of water tank or hot water generator according to the temperature difference between actual water temperature and the setting water temperature. If it is not within this period, the water tank or hot water generator will close down the unit. Once this mode is set, it will circularly operate every day.

(3) Temperature Setting

It displays the current temperature of hot water as default. The temperature value will turn to the setting temperature and can be adjusted by pressing

the temperature value will increase or decrease by every pressing the button for once. The temperature value will be continuously increased or decreased by long pressing the button. After 5 seconds without any action, the temperature value will turn back to the current temperature. Under the standard HotWater, Booking and Night modes, the temperature setting range is: 35°C ~ the maximal adjustable temperature 55°C, the acquiescence maximal temperature is 50°C.

(4) Available Hot Water Volume

The water volume can be display in real time, there are five sections of water volume: 100%, 80%, 60%, 40%, 20%, when the water volume is less than 20%, it will flicker.

(5) Function Setting of Water Heating

Under on /off status of water heating, the following functions can be set:

Water On/Off	Functions
Start-up Water mode	Sunflower, Auto, Sterilization, Fast, Shield
Start-up Booking mode	Auto, Sterilization, Fast, Shield

Start-up Night mode	Auto,Sterilization, Fast, Shield
Water heating off	Sterilization, Shield

Sunflower function: find the highest outdoor temperature by recording the history data of outdoor temperature to define the time to heat the water, so as to achieve energy saving.

Auto function: the setting temperature of water heating will be automatically provided by water heater according to the outdoor ambient temperature, there is no need to set by the user, and the water temperature cannot be adjusted via + or - buttons.

Sterilization function: it will conduct high temperature sterilization when the water temperature in the water tank is heated to 65~70°C (adjustable) within the required set time. Press the button to enter the sterilize page, when the high temperature sterilization is set to be "once", then the sterilization will be valid for once; when the high temperature sterilization is set to be "circular", the sterilization will be circularly valid, then it can set the circulated days and presetting sterilization time. When the sterilization function is activated, the icon will flicker.

Fast function: start up the compressor and electric heating water under the

allowable conditions of outdoor unit, it displays ,the fast water heating function can be set to be valid for once, when the water tank/hot water generator has reached to heat preservation status, it displays ,the fast water heating function will be cancelled for energy saving. After the water heating is closed down, the fast water heating function is cancelled. Shield function: it can conduct shield function by pressing of wired controller to nullify such operation.

(6) Malfunction View

When the water heater fails to function well, press to view the information of malfunctions.

5.4.2 Floor control parameter

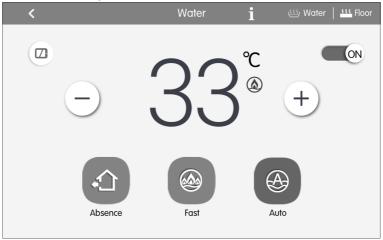


Figure 5-5 Page of Floor Heating Control

(1) On/off

Press the on/off button to trun unit on or off.

When the unit is off, the mode and temperature cannot be set.

(2) Temperature Setting

It displays the current water yielding temperature as default. The temperature value will turn to the setting temperature and can be adjusted by pressing $\stackrel{+}{-}$ and $\stackrel{-}{-}$ buttons; the temperature value will increase or decrease by every pressing the button for once. The temperature value will be continuously increased or decreased by long pressing the button. After 5 seconds without any action, the temperature value will turn back to the current water yielding temperature.

Floor heating water yielding temperature range: 25°C~the highest water yielding temperature of floor heating 45°C.

(3) Function Setting of Floor Heating

Under the on/off status of floor heating, the functions can be set as below:

Floor on/off	Function	Remarks
Floor on	Auto, Fast, Absence, Shield	
Floor off	Absence, Shield	It will be valid only when the indoor unit is set together with shunt valve

Auto function: the floor heating water yielding temperature will be automatically provided by hot water generator according to the outdoor ambient temperature, there is no need to set by the user, and the water temperature cannot be adjusted via $\stackrel{+}{\longrightarrow}$ or $\stackrel{-}{\longrightarrow}$ buttons.

Fast function: start up the compressor and electric heating under the allowable conditions of outdoor unit.

Absence function: when the user is absence, it will maintain certain degree of water temperature to prevent the pipelines from being frozen up and prevent the indoor equipment from being destroyed.

Shield function: it can conduct shield function by pressing \square of wired controller to nullify such operation.

(4) Malfunction View

When the floor heating fails to function well, press **1** button to view the information of malfunctions.

Note: The water/floor only support single unit control. Central, group and schedule control can't be supported at present.

5.5 All-Control Function

On the homepage, press enter into the page of All-Control.

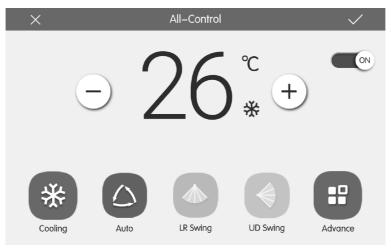


Figure 5-6 All-Control Page

All-Control Function can operate all indoor units as below:

(1) ON/OFF

Press ON/OFF button to turn on or turn off all units.

When turning off the unit, the setting for mode, temperature, fan speed and swing is unavailable.

(2) Mode setting

Press mode button to set operation mode.

(3) Temperature setting

Press UP or Down button to adjust temperature. Press this button once to increase or decrease temperature 1°C. Press or hole this button and the temperature will increase or decrease continuously.

(4) Fan speed setting

Press or drag the sliding bar of fan speed to set fan speed.

Note: Fan speed defaults at low speed under drying mode and it can't be adjusted.

(5) Swing setting

Press "left&right" swing or "up&down" swing button to turn on or turn off swing function.

(6) Send order

Press button \checkmark to send out the All-Control order.

5.6 Group Control

On the homepage, press to enter into the page of group function.



Figure 5-7 Group Page

No.	Name	Instructions
1	Group display	Display in separate page the list of groups that are controlled by the centralized controller. Sliding up or down can turn over the page.
2	Group names	Display the names of every group.
3	Add group button	Press the button to add a group.
4	Group control button	Press the button to enter the group control page.
(5)	Group edit button	Press the button to enter the group edit page.
6	IDU sort button	Press the button to enter the group sort page.

(1) Group control

Press the button to enter the page of group control. Control parameters are the same as single unit control.

(2) Edit group

Press to enter the page of group editing.

Use can set the group name and add indoor units to the group.

Press ✓to save the setting.

Note:1 set of indoor unit can be set in up to 5 groups

(3) IDU sort

Press the button to enter the IDU sort page.

Select one indoor unit, press the left of right button at the buttom of the screen to switch the display of the indoor units.

(4) Add group

Press the button to add new groups. Then the page of group editing will pop in. User can set the group name and add indoor units to the group.

(5) Delete group

Press to delete the selected group.

5.7 Schedule Management

On the homepage, press button to enter into the page of schedule management.



Figure 5-8 Page of Schedule

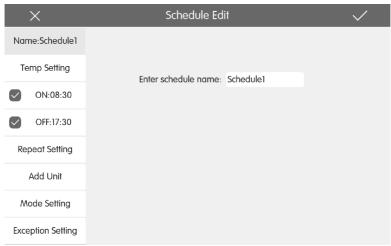


Figure 5-9 Page of Schedule Editing

(1) Open the schedule

Press the zone button to open or close the schedule.

When the icons and texts turn bule indicating the schedule is open.

When the icons and texts turn grey indicating the schedule is closed. . .

When schedule is open, centralized controller will send out the control order automatically according to the time and parameters set by the schedule.

(2) Edit schedule

Press to enter the page of schedule editing.

Press√to enter the page of schedule editing.

 Setting method of schedule control parameters is the same with that of the single indoor unit control.

2) Add equipment

Press the "Add Unit" button to enter the page of equipment selection. User may set the indoor unit that works according to the current schedule. Note: schedule of Centralizwd Controller can add Umatch units. For a same indoor unit, different schedules can be set at the same time. In this case, unit will work according to the schedule setting that is previously energized.

3) Repeat schedule

Press "Repeat Setting" button to enter the setting page. User can set the schedule work repeatedly according to weeks.

4) Time setting

Press the "ON Time" or "OFF Time" button to enter the page of time setting.

User can set the time for unit to turn on/off automatically.

Note: The time to activate or stop unit can be set at the same time, but they must not be the same.

5) Add exception

Press the "Exception Setting" button to enter the setting page of schedule exception.

The calendar will pop in, user can select the date to activate or cancel exception. Press \checkmark to save the selected date.

Notes: When schedule exception has been set, air conditioner will not execute the control order on the exception date set by the schedule.

User may add several exception dates.

(3) Add schedule

Press to add new schedules. Then the schedule editing page will pop in for user to set relevant parameters.

Note: User may add up to 28 schedules.

(4) Delete schedule

Press X to delete the selected schedule.

5.8 L-CAC&Split Unit

5.8.1 L-CAC&Split Unit Control

On the homepage, press to enter the Control Page.

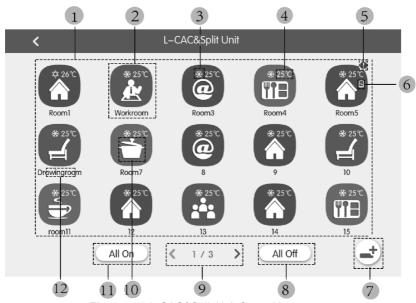


Figure 5-10 L-CAC&Split Unit Control homepage

No.	Name	Instructions
1	L-CAC&Split unit display zone	Display the list of units controlled by the central controller.
2	L-CAC&Split unit icon buttons	Press the button to enter the control page of a single unit. Bright icon indicates the corresponding unit is ON and dark icon indicates the corresponding unit is OFF Press and hold the icon to enter the page of name and icon settings.
3	Icon of running mode	When indoor unit is ON, its running mode will be displayed in the following way auto cool dry fan heat
4	Icon of set temperature	Display when the unit is ON. It means set temperature of the device.
5	Icon of malfunction	If the unit is with trouble, this icon will be shown.
6	Icon of sheidling status	If the unit is in shielding status, this icon will be shown.
7	L-CAC&Split unit registration icon	Press the icon to enter the registration page for the unit.
8	All off button	Press the icon to turn off all the units.
9	Page turning	Press this icon to turn pages.
10	All on button	Press the icon to turn on all the units. Then units will run according to memories.

11	L-CAC&Split unit icon	Display the current L-CAC&Split unit icon
12	L-CAC&Split unit name	Display the current L-CAC&Split unit name

Before using, press the registration icon and enter the registration page. Register the L-CAC&Split units that are going to be controlled. Centralized controller can support the control of 36 units at most.

Press and hold L-CAC&Split unit icon for 5S to enter the page of settings. Then you may set the name and icon for the unit.

L-CAC&Split unit control parameters include general control parameters and advanced control parameters.

Note:

- (1) The functions of group control and engineering setting of the Centralized controller are only applicable to multi VRF units. L-CAC&Split unit do not have the above functions
- (2) when in the fuction of All-central control, all the Mulit-VRF unit and L-CAC&Split unit are controllered, but L-CAC&Split unit not controllered by advance seting.

5.8.2 General Control Parameters

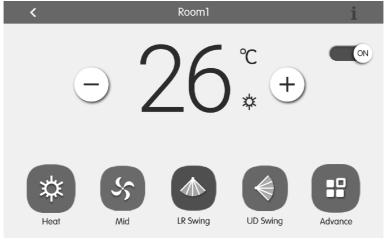


Figure 5-11 Control Page of Single umatch unit

(1) ON/OFF

Press the on/off button to turn unit on or off.

When unit is turned off, mode, temperature, fan speed and swing can't be set.

(2) Mode setting

Press the Mode buttons to set umatch unit operation mode.

Modes for indoor units of different series are not all the same.

If a certain mode is not available in the indoor unit, the icon of the corresponding mode cannot be selected.

Note:

- 1) Auto mode can only be set in the master indoor unit.
- 2) Heat recollection system have no master indoor unit. When the indoor unit of the same branch is connected into one indoor unit, the auto mode can be set; when the quantity of indoor unit in the same branch is more than one set, the auto mode cannot be set; other modes can be freely switched.

(3) Temperature setting

Press the up or down buttons to adjust temperature. Each time pressing the button will increase/decrease the temperature by 1. Holding down the button can increase/decrease temperature continuously.

Pressing the **1** button can display the "indoor temp" and "outdoor temp".

(4) Fan speed setting

Press the fan speed button to set umatch unit fan speed.

Note: Unit defaults to low fan speed in drying mode. Fan speed cannot be set in drying or floor heating mode.

(5) Swing setting

Pressing the button "Up&Down Swing" or "Left&Right Swing" can turn on or off the swing function.

Note: Swing types for indoor units of different series are not all the same.

(6) Malfunction View

When indoor unit fails to function well, the will turn red. then press the button to view the information of malfunctions.

5.8.3 Advanced Control Parameters

Press the advanced button to enter the advanced page.

Press the icons to turn on or off related functions.

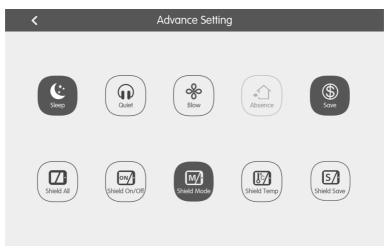


Figure 5-12 L-CAC&Split unit advanced page

- (1) The functions of Sleep, Quiet, Blow, Absence, Energy Saving are only effective under ON status.
- (2) Absence function can only be enabled in Heat mode. When Absence function is enabled, set temperature is 8°C.
- (3) When All Shield function is enabled, other shield buttons are ineffective.

5.9 Local Setting

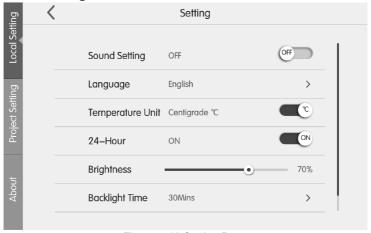


Figure 5-13 Setting Page

On the homepage,press button to enter into the setting page.

Press the "Local Setting" button to switch to the setting options of the current unit.

Select the needed option at the left side column. Sliding up and down can turn over the page.

Set the corresponding content at the right side.

Local setting includes:

 Sound, temperature unit, time format, mutual exclusion Press the button to select one kind of setting.

(2) Language

Press the button can select system language, such as English, Simplified Chinese, Traditional Chinese, Spanish, French, Portuguese, German, Turkish.

(3) Time setting

Set the date and time of the centralized controller system, can also set the VRF unit time if needed and Set the date and time of daylight saving time (DST).

(4) User password

Press the button can activate or inactivate user password.

When password is activated, it can be set or changed in 4~10 numbers or characters. Original password is blank.

Press the button \checkmark to save the password.

Note: I If user password is activated, user needs to input password to enter the control page when centralized controller is turned on or activated.

(5) Backlight setting

Pressing this button can set the timeout period of screen backlight. Screen will be shut off and the centralized controller will enter sleep mode when the timeout period is over.

Note: When centralized controller is in sleep mode, use can wake it up by touching any part of the touch screen or the touch button at the right bottom of the screen.

(6) Brightness

Pressing or dragging the sliding bar can adjust the backlight degree.

(7) Customer Service

User can set the name and phone number of the local customer service center for the convenience of acquiring immediate solutions and technical support.

Press the \sqrtbutton to save the setting.

(8) Restore default settings

Press the "Reset" button to restore local setting, e-Control setting, group setting, schedule setting, names and icons of indoor units, and other relevant ex-factory default settings.

- 1) When switching between indoor network and outdoor network, or reset unit IP, restore the ex-factory setting for centralized controller.
- After debugging for the centralized controller is finished, connect in to the network. If connect the centralized controller to the network during debugging process, it needs to restore the defaulted ex-factory setting.

5.10 Engineering Setting

On the home page, press to enter into setting page.

Press the "Project Setting" button to switch to engineering setting, the operation method is the same as the setting of this unit.

(1) Indoor unit register

Enter into the indoor unit register interface, select the chosen indoor unit according to the displayed engineering No. of indoor unit icon, and then press \checkmark to save, it will display the registered indoor unit in the indoor unit page.

Notes:

- 1) There are 255 sets of indoor units can be registered at most.
- If internal or external main boards are replaced or outdoor unit SA2 address dial code is changed.it need to re-register indoor units.

(2) Name&Icon setting

Switch to name&lcon setting interface to select the engineering No., and set the name and icon of indoor unit

Figure 5-14 Setting Page of Indoor Unit

Press the Engineering No. to select the required indoor unit that needs to be set.

- 1) Name: can input number or letter (it should not be over 10 letters)
- 2) Icon: press to select the preset icon.
- 3) Engineering No.: it can be set to be 1-255.
- 4) Press ✓ button to successfully save the setting. Then the indoor unit list in the home page will display the new name and icon of indoor units.

(3) Advanced Project Settings

Press and hold the "Project Setting" button for 5 seconds to display the advanced project settings when "Local Setting" button is checked on the setting page.

Functions of advanced project setting are below:

- Indoor & Outdoor Unit Setting
 Change parameters of indoor or outdoor unit.
- IDU & ODU Parameter View
 View parameters of indoor or outdoor unit, including setting and running parameter.

IDU & ODU Error Check
 Check the error log of indoor or outdoor unit

4) View Project NO.

When the view project No. switch is on, indoor address number will display on the wired controller or display panel on indoor unit.

Project Password setting
 Project password is need by most of advanced project settings. The default password is "123456".

6) Emergency

All of the air conditioner units will stop while occuring emergency. The centralized controller support On/Off Signal device connect to F1/F2(fire alarm port) port, DC Voltage 24V~5V is required

7) Data Transmit

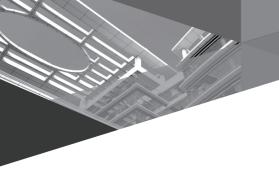
Related information of error can be exported to TF card; the configuration files of data base can be exported to the TF card and then export the configuration files of data base to the central controller from the TF card.

5.11 About

On the home page, press to enter into setting page.

Press the "About" button to switch to about page. The operation method is the same with that of the local setting.

On the page of about, user can view the information of the local unit, customer service information and other notices.





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