

ZonePlus

Operation Manual

Introduction

Congratulations on purchasing a ZonePlus Climate Control System.

ZonePlus brings the possibility of total indoor climate control. It allows you to optimize the performance of your Ducted Gas Heater or Dual Comfort System through customized comfort control.

Your specialist Rinnai Dealer has divided your home into zones that can be operated and controlled separately. The exact configuration of your ZonePlus system will determine the programming features that are enabled, as well as the number of zones that can be heated (or cooled) simultaneously. ZonePlus may be operated manually, or you can program your comfort schedule and let the system automatically do the rest.

Please take the time to review this guide and enjoy the benefits of your ZonePlus Climate Control System.

Application

ZonePlus may be used on the following Ducted Systems:

- StarPro Ducted Gas Heaters produced after 20 May 2013 (serial number greater than 995000)
- Dual Comfort Systems StarPro Heaters and ICE Refrigerated Cooling)
- StarPro Ducted Gas Heaters and Evaporative Cooling
- Zoning is not available during Evaporative Cooling mode
- The NC-6 Master Controller, or any other ZonePlus NC-6, where fitted, will operate a Evaporative cooler with all normal features and functionality

Note: ZonePlus systems should only be installed by authorised Rinnai Dealers who have successfully completed the ZonePlus Training Module.

Note: Your Rinnai Dealer has specified your ZonePlus System Configuration Summary in **Table 2**.

Specifications subject to change without notice.

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1.0 ZONEPLUS – AT A GLANCE

Zone

One room or a group of rooms, normally selected on the basis of usage or that have similar heating or cooling needs.

Controlled Zone

A zone that is separately controlled by its own zone sensor and zone damper. There are as many zone sensors in the home comfort system as there are Controlled Zones.

Common Zone

A zone that is not separately controlled by its own sensor and zone damper. It operates whenever heating or air conditioning is on.

Constant Zone

A predetermined zone, typically the largest and containing the return air, is designated the Constant Zone and functions as a Common Zone only during refrigerated cooling mode to ensure the minimum cooling airflow requirements are met.

Multi Temperature Set Point (MTSP) ZonePlus System

The zone temperature set point can be set independently across all Networkers and/or Temperature Sensors.

Single Temperature Set Point (STSP) ZonePlus System

The zone temperature set point is the same across all Networkers and/or Temperature Sensors.

NC-6 Networker Controller

Primary user interface with LCD display. Where multiple NC-6s are installed, the “**Master**” Networker Controller can be identified by the word “**Clock**” displayed adjacent to **Key “5”** when system is **OFF**.

NT-1 Remote Temperature Sensor

Zone temperature sensor with LED that blinks during communication with Master NC-6. Additional NC-6 Networkers can be used in place of up to 3x NT-1 sensors.

Sensor

Both the NC-6 and NT-1 function as zone (room) temperature sensors – in this context, the word “**sensor**” in this manual can apply to both.

System Configuration

Details of your system configuration and capabilities are summarized in **Table 2: ZonePlus System Configuration Summary**.

Comfort Schedule

The NC-6 Networker Controller of your ZonePlus System enables you to program up to five time periods and temperature settings per day, for each controlled zone, for both Heating and Refrigerated Cooling modes.

This manual separately details operation and functionality for:

- Multi Temperature Set Point (**MTSP**) systems (p.8)
- Single Temperature Set Point (**STSP**) systems (p.17)

1.1 ZonePlus Sensors / Components

Diagram 1. NC-6 Networker Controller

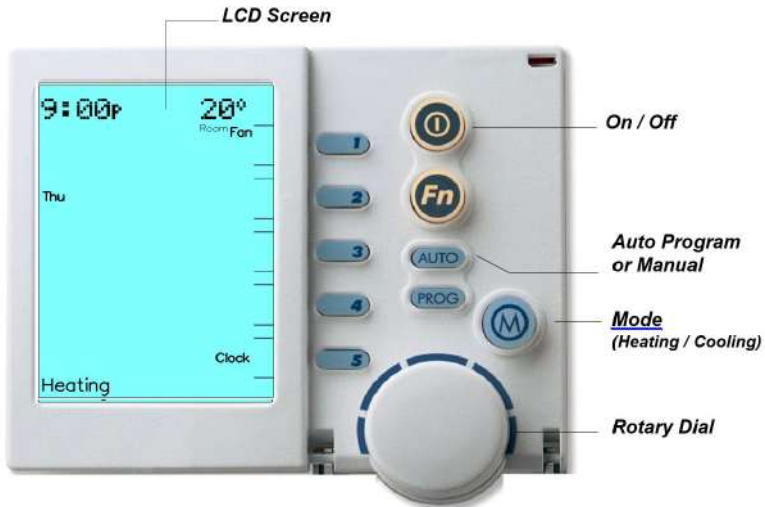
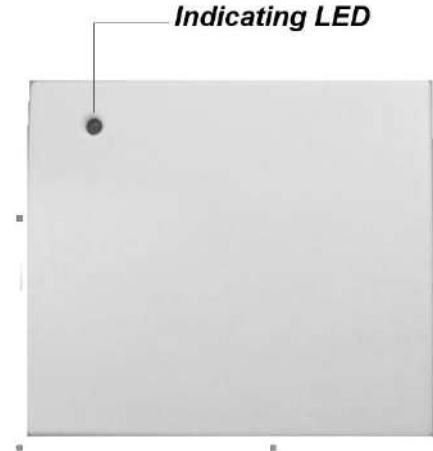


Diagram 2. NT-1 Remote Temperature Sensor



Note: These components do not require batteries.

Table 1: Networker NC-6 Functions














	<p>The On/Off Button This is the button to turn the Networker ON or OFF</p>
	<p>The Function Key The Function Key, when used in conjunction with Keys “1” & “2”, allows the user to perform specialised functions such as message repeating and Networker locking. The Fn button also activates the LED backlight.</p>
	<p>The Mode Key If both Heating and Cooling systems are connected to the Networker, this Key allows you to switch between them. When an appliance is selected, the mode will appear at the bottom of the screen e.g. “Heating” or “Cooling”</p>
	<p>Heartbeat A flashing heart icon in the bottom right hand corner indicates that the room temperature is being sensed from this Networker</p>
	<p>Program Key This control Key is used to set the Networker’s automatic program</p>
	<p>Auto Key The auto function allows the user to switch between the Auto Program and the Manual Operation.</p>
	<p>The Rotary Dial This Dial is used to change the settings and parameters</p>
	<p>Variable Keys The Keys numbered “1” - “5” vary their function depending on the program or mode displayed. They will only have a function if text appears on the screen beside the Key and in some cases a black rectangular box. Keys used for zone function may also display an Arrow.</p>

Table 1: Networker NC-6 Functions (Cont'd)

	<p>Flame Symbol</p> <p>The flame symbol will appear on the display when the heater is switched on. This symbol will flash during cool down at the end of the heating cycle</p>
	<p>Fan Symbol</p> <p>The fan symbol will appear on the display when the heater is switched on. This symbol will flash during cool down at the end of the heating cycle.</p>
	<p>Thermometer</p> <p>The thermometer on the display registers the current room temperature. Beside it is a small marker which indicates the temperature that the heater is currently set to maintain</p>
	<p>Padlock Symbol</p> <p>When the child-proof lock has been set, a padlock will appear on the screen. For more information, refer to the section on Locking the Networker.</p>
	<p>Snowman Symbol – Dual Comfort systems only (Add-On Air Conditioning)</p> <p>The snowman symbol indicates the refrigeration compressor is running. A flashing snowman indicates the compressor is in a safeguard time off period</p>

The NC-6 LCD Display Screen

- Displays information about the system. The screen shows the current time via a Digital Clock in the top left corner, the Day of the Week on the left-hand side, and the type of appliance selected at the bottom
- The display will also show scrolling messages across the top of the screen, which can display some of the appliance's operational states

1.2 ZonePlus System Configuration - Summary

Below is a summary of your system's configuration. A detailed version of this table (located in the **Appendix**) should also be completed by your installer and retained for future reference.

Table 2: System Configuration Summary

ZONEPLUS SYSTEM CONFIGURATION - TO BE COMPLETED BY INSTALLER		
HEATING ONLY <input type="checkbox"/>	DUAL COMFORT <input type="checkbox"/>	HEATING & EVAPORATIVE COOLING^ <input type="checkbox"/>
MULTI TEMPERATURE SET POINT <input type="checkbox"/>	SINGLE TEMPERATURE SET POINT <input type="checkbox"/>	
SYSTEM DESIGN CONDITIONS		
Maximum no. of Zones for HEATING:		Max. no. of Zones for REFRIGERATED COOLING:
ZONE	ROOM(S)	SENSOR TYPE^^ (NC-6 / NT-1)
ZONE A		
ZONE B		
ZONE C		
ZONE D		
COMMON (If applic)		--
CONSTANT (MTSP - If applic)	ZONE: A B C D NIL (circle one only)	--

^^NC-6 Master Controller displays 'Clock' indicator when OFF.

^Zoning is not available during Evaporative Cooling mode.

1.3 The Comfort Schedule

NC-6 Networker Controllers and NT-1 Remote Temperature Sensors are programmed from factory with a default “**Comfort Schedule**” times and temperatures detailed in **Table 3**.

In **MTSP** systems the “**Comfort Schedule**” settings for each zone sensor is unique, i.e. four zones require four Comfort Schedules. This provides you with ultimate flexibility, allowing you to vary your Periods, Times and Temperatures for each zone.

In **STSP** systems the “**Comfort Schedule**” operates within the same Period, time and temperature setting for all zones; i.e. up to four zones will require one Comfort Schedule, with zones activated or deactivated as required.

Use the templates located in the **Appendix** to customize your personal “**Comfort Schedule**”.

First you need to decide what time you want each of the Periods to begin for the Day Block selected, i.e. the “**Wake**” Period for Monday to Friday. For **MTSP** systems this time can vary for all zones while for **STSP** systems there can only be one time for all zones.

Second, select the desired Heating temperatures for winter operation. Then select the Time and Temperatures for each of the remaining Periods and days as required.

You may also program your Refrigerated Cooling (if fitted) “**Comfort Schedule**”.

- Refer to **Table 3** for the default **Comfort Schedule**
- Refer to **Table 4** for an example of a **MTSP** Comfort Schedule
- Refer to **Table 5** for an example of a **STSP** Comfort Schedule

Table 3. Default Comfort Schedule Times and Temperatures

	Wake			Leave			Return			Pre-Sleep (Optional)			Sleep		
	Time	Heat°	Cool°	Time	Heat°	Cool°	Time	Heat°	Cool°	Time	Heat°	Cool°	Time	Heat°	Cool°
Mon - Fri	6.00	20	20	9.00	--	--	4.00	20	20	9.30	20	20	10.00	--	--
Sat - Sun	6.00	20	20	9.00	--	--	4.00	20	20	9.30	20	20	10.00	--	--

Table 4. MTSP Comfort Schedule Example (2 zone system example is shown)

	Wake			Leave			Return			Pre-Sleep (Optional)			Sleep		
	Time	Heat°	Cool°	Time	Heat°	Cool°	Time	Heat°	Cool°	Time	Heat°	Cool°	Time	Heat°	Cool°
Mon - Fri	7.00	19	24	8.00	--	28	5.00	21	24				10.30	--	--
Sat - Sun	8.00	20	24	8.00	21	24	6.00	21	24				11.00	--	--

	Wake			Leave			Return			Pre-Sleep			Sleep		
	Time	Heat°	Cool°	Time	Heat°	Cool°	Time	Heat°	Cool°	Time	Heat°	Cool°	Time	Heat°	Cool°
Mon - Fri	6.00	19	24	8.00	--	28	6.00	21	24				8.30	--	--
Sat - Sun	8.00	20	24	9.00	18	24	6.00	21	24				9.00	--	--

Table 5. STSP Comfort Schedule Example (2 zone system example is shown)

	Wake			Leave			Return			Pre-Sleep (Optional)			Sleep		
	Time	Heat°	Cool°	Time	Heat°	Cool°	Time	Heat°	Cool°	Time	Heat°	Cool°	Time	Heat°	Cool°
Mon - Fri	7.00	20	24	8.00	--	28	5.00	21	24				11.00	--	--
Zone A		ON	ON		OFF	ON		ON	ON					OFF	OFF
Zone B		ON	ON		OFF	OFF		OFF	OFF					OFF	OFF

	Wake			Leave			Return			Pre-Sleep (Optional)			Sleep		
	Time	Heat°	Cool°	Time	Heat°	Cool°	Time	Heat°	Cool°	Time	Heat°	Cool°	Time	Heat°	Cool°
Sat - Sun	6.00	20	24	9.00	20	24	6.00	21	24				11.00	--	--
Zone A		ON	ON		ON	ON		ON	ON					OFF	OFF
Zone B		OFF	OFF		OFF	OFF		ON	ON					OFF	OFF

Note: “- -” in the temperature location indicates the zone has been set to “OFF”

2.0 MULTI TEMPERATURE SET POINT SYSTEMS (MTSP)

A **MTSP** system provides you with ultimate conditioning flexibility, allowing you to set the temperature of each zone independently. **MTSP** does not apply to Evaporative Cooling (if fitted).

2.1 MTSP Quick Start Guide

The following quick start procedure enables you to use your ZonePlus before you learn all the details of the system's operation.

Please ensure your dealer has provided you with details on zone identification, the capabilities of your heating and cooling system, and the maximum or minimum number of zones that can be operated simultaneously for heating or cooling design conditions (see **Table 2**).

Quick Start Guide: Heating

1. Press the **Mode Key "M"** until **"Heating"** is displayed at the bottom of the screen
2. Press **Key "3"** until **"A"** appears in the top right hand corner of the screen, indicating Zone **"A"** access
3. Press the **On/Off** button to turn on and call for Heating
4. Increase the desired temperature set point to above the room temperature by turning the rotary dial clockwise
5. Press **Key "3"** to gain access to Zone **"B"**
6. Increase the desired temperature set point to above the room temperature by turning the rotary dial clockwise
7. Repeat steps 5 & 6 for Zone **"C"** and Zone **"D"** (if installed)

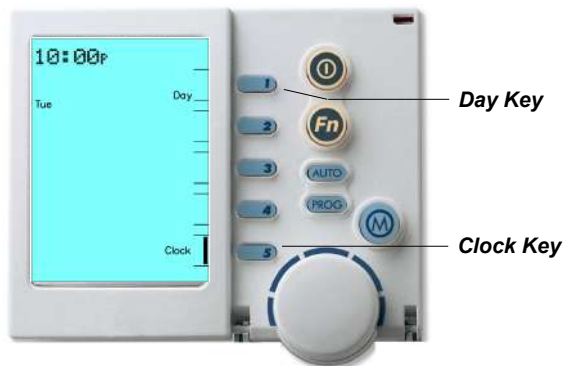
Quick Start Guide: Refrigerated Cooling

1. Press the **Mode Key "M"** until **"Cooling"** is displayed at the bottom of the screen
2. Press **Key "3"** until **"A"** appears in the top right hand corner of the screen, indicating Zone **"A"** access
3. Press the **On/Off** button to call for Cooling
4. Decrease the temperature set point to below room temperature by turning the rotary dial anticlockwise
5. Press **Key "3"** to gain access to zone **"B"**.
6. Decrease the temperature set point to below room temperature by turning the rotary dial
7. Repeat steps 5 & 6 for Zone **"C"** and Zone **"D"** (if installed)

2.2 Setting the Time & Day

This is to be done at the NC-6 Master Controller, identified by the word **"Clock"** opposite **Key "5"** or the **Clock Key**.

Diagram 4: NC-6 Setting the Time & Day Display



1. Press the **On/Off** button to turn the system OFF
2. Press **Key "5"**, **Clock Key**, and the screen will display the message **"Clock setting mode"**, then the Digital Clock will flash
3. Use the **Rotary Dial** to set the correct time
4. To set the day, press **Key "1"**, the **Day Key** until the correct day of the week appears on the left of the screen, e.g. **"Tue"**
5. Press **Key "5"** the **Clock Key** again to save your new settings

Note: If multiple NC-6 Networker Controllers are installed, only the Master NC-6 Controller has the ability to set the Clock Time and Day. The Master NC-6 Controller can be identified by the word **"Clock"** beside **Key "5"**, when the ZonePlus system is in the **OFF** position.

2.3 User Settings

Accessing the user settings allows you to customise certain features on the NC-6 display and modify **"Auto Program"** functions; these include:

- Clock displayed in either 12hr or 24hr time
- Temperature displayed in either °C or °F
- Day grouping (3 options) when in **"AUTO"** mode
- Enable or disable the **"Pre Sleep"** option

Diagram 5: NC-6 User Settings in Heating Operation Display



To access and change the user settings at the NC-6 Master Controller:

1. Press **Key "5"** and release
2. Press and hold **Key "4"** until the following message begins to scroll across the top of the screen. **"User setting mode"**
3. You now have access to the user settings. Please refer to **Table 6** for user setting options and change as required

4. Press the **On/Off** button to save and exit user setting

Table 6: User Setting Options

User Input	Option
Key “1”	Changes the day grouping to one of the following: <ul style="list-style-type: none"> - Individual days: Selected when each day flashes individually and sequentially - Week day and weekend Block: Selected when Mon to Fri flash and then Sat-Sun flash - All week days: Selected as one group when Mon to Sun are all displayed at once
Key “2”	Enables and disables the “ Pre Sleep ” option
Key “3”	Displays the temperature in either °C or °F
Key “5”	Displays the time in either 12hr or 24hr format

2.4 Zone Identification

Your Rinnai Dealer has divided your home into zones that can be operated and controlled separately. The exact configuration of your ZonePlus system will determine the programming features that are enabled, as well as the number of zones that can be heated (or cooled) simultaneously. You may operate your ZonePlus system in either “**Auto Program**” or “**Manual**”.

Diagram 6: NC-6 Heating Operation Display



Only the zones that have been installed and configured by the installer will be displayed. For **MTSP** systems when the system is **OFF** the available zones can be viewed by pressing **Key “3”**.

With a four zone system the NC-6 Controller will cycle through zones “**A**”, “**B**”, “**C**” & “**D**” when **Key “3”** is pressed. The zone in view can be identified in the top right hand corner of the screen. When the system is **ON** the installed zones are displayed adjacent to **Keys “4”** & “**5**”, as shown in **Diagram 6**.

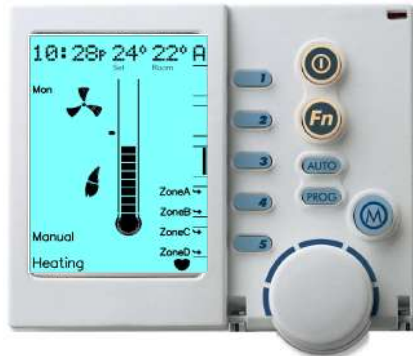
The zone Arrow indicators:

- **Solid** indicates the associated zone is Heating (or Cooling) as the zone set temperature has not been satisfied
- **Flashing** indicates the associated zone set temperature has been satisfied

2.5 Manual Operation

Operating your system in “Manual” will require you to turn zones **ON** and **OFF** as desired and adjust zone temperature set points independently.

Diagram 7: NC-6 Manual Operation Display



To operate your system in “Manual”:

1. Use the **On / Off** button to turn the Networker **OFF**
2. If you have multiple appliances on the Network, press the **Mode Key “M”** until the word “Heating” or “Cooling” appears (as required) at the bottom of the screen. If you have the Networker **ON** while switching between appliances you could start the wrong one inadvertently

3. Turn the Networker **ON** and press the “**AUTO**” Key until “**Manual**” appears in the bottom left-hand corner of the screen
4. The Zone (“**A**” in **Diagram 7**) **Set Temperature** (24°C in **Diagram 7**) will now appear at the top of the screen. The current zone (**Room**) temperature (22°C in **Diagram 7**) is still visible in the top right hand corner of the screen beside the associated zone “**A**”
5. This **Set Temperature** is the temperature the system is required to maintain for the nominated zone
 - To **increase** the Set Temperature, rotate the dial clockwise
 - To **decrease** the Set Temperature, rotate the dial anti-clockwise
6. To view and or adjust the set point of another zone in the system press **Key “3”**. Review the associated zones temperature set point and adjust if required by rotating the dial to the desired temperature – the zone being accessed will flash in the top right hand corner of the LCD display
7. To turn the zone **OFF** change the Set Temperature to “**0**” ; the Set Temperature will display “- -”
8. Repeat the above steps for other zones as required
9. To turn the entire system **OFF**, press the **On / Off** button

The system will operate until all zone set temperatures are satisfied, at which time it will shut off.

Once the temperature set point for a zone is satisfied the zone description (i.e. “**Zone A**”) and an Arrow, both adjacent to **Key “4”** & “**5**”, will flash. If the zone set point is not satisfied the zone description and Arrow will remain solid.

Note: The Networker remembers your last settings, and reverts back to them the next time you select “**Manual**” operation.

2.6 Automatic Operation

The Networker allows you operate your system automatically in accordance with a predetermined “**Comfort Schedule**” (also known as the “**Auto Program**”).

The Networker has a pre-set (default) Comfort Schedule for Heating and Cooling already stored in its memory. This “**Auto Program**” covers the entire week and is based on the average operating time of the unit with all temperatures for Heating and Cooling set to 20°C. The “**Auto Program**” default settings are detailed in **Table 3**.

Diagram 8: NC-6 Auto Program Display



2.6.1 Programming Your Comfort Schedule

You may alter the default “**Auto Program**” to suit your requirements.

This will require you to enter the Period start time, desired Heating (and Cooling) temperatures for each “**Period**”, “**Day**” Block and zone. For an example of this please refer to **Table 4**. Take a few moments to complete the **MTSP Comfort Schedule** template in the **Appendix** prior to accessing the “**Auto Program**”.

Note: A **MTSP ZonePlus** system can operate zones in either “**Auto**” or “**Manual**” simultaneously.

Note: When accessing the Comfort Schedule of another zone, the “**Set Temperature**” value (22° in **Diagram 8**) on the LCD may temporarily display “??”.

Diagram 9: NC-6 Programming Comfort Schedule Display



Note: If at any time you wish to reset the entire Comfort Schedule (Time & Temperature for all Periods) for the associated zone, press **Key “4”**, the “**Reset**” Key.

Programming the Comfort Schedule:

1. Turn the Networker **OFF** and confirm you are in your desired **Mode**, either Heating or Cooling. If not, press the **Mode Key "M"** until the word "**Heating**" or "**Cooling**" appears in the bottom of the screen
2. Please note Heating and Cooling program changes must be completed independently for each zone. Also, when changing **Mode** from "**Heating**" to "**Cooling**" and vice-versa, this must be conducted prior to entering the programming screen
3. Press the "**PROG**" **Key** and you will notice the word "**Auto Program**" appear at the bottom of the screen. The Digital Clock (e.g. "**10:28p**", **Diagram 9**) at the top of the screen will also begin to flash.
4. Select the Day Block (e.g. "**Mon to Fri**")
Press **Key "1"** to select the Block you want to change settings to. This selects either the Weekday Block or the Weekend Block. These were previously set up in Section 1.3 **User Settings**
5. Select the Period (e.g. "**Wake**")
Press **Key "2"** (Period) until the required Period is displayed.
6. Setting the Period Start Time
Press **Key "3"** until the time begins to flash. Rotate the dial to set the desired Start Time for the selected "**Period**" and "**Day**" Block
7. Setting the Period Temperature
Press **Key "3"** to change from time to temperature. Rotate the dial to set the desired Temperature for the selected "**Period**", "**Day**" Block and "**Time**"
8. Change Period
Press **Key "2"** (Period) until the next Period is displayed.
Repeat steps 6 and 7 until all Periods are complete for the selected "**Day**" Block and zone
9. Change Day Block
If there is more than one Day Block (e.g. "**Mon-Fri**" & "**Sat-Sun**")
Press **Key "1"** to select the next Block and repeat steps 5 to 8

10. Change Zone

When programming of the first zone is complete (typically "**A**") you will need to now program the remaining zones. To enter another zone for programming, please refer to the below steps:

- Press **Key "PROG"** to exit the programming screen
- Press **Key "3"** and cycle to the next zone (typically "**B**")
- Press **Key "PROG"** to enter the programming screen of the next zone. Repeat steps 4 to 9

11. Save and Exit

Press the "**PROG**" **Key** to Save and Exit

Note: To turn a zone **OFF**, change the set temperature to "**0°C**". The display will show "- ." in the "**Set**" temperature location.

2.6.2 Operating in “Auto”

1. Determine the desired Mode, either Heating or Cooling, by pressing the **Mode Key** marked “M”. The bottom of the screen will read “Heating” or “Cooling” (if installed)
2. Select the zone you want to operate in “Auto” by pressing **Key “3”**
The zone can be identified in the top right hand corner of the screen
3. Turn the system **ON** by pressing the **On/Off** button
4. Press the “**AUTO**” **Key** until “Auto Program” appears on the LCD screen (if not already in “Auto Program”)
5. Cycle through all zones by pressing **Key “3”** and at each zone repeat step 4 to set the zone into “Auto”

Note: A MTSP ZonePlus system can operate separate zones in either “Auto” or “Manual” simultaneously.

2.6.3 Temporarily Overriding “Auto”

If the “Auto Program” temperature settings do not suit your immediate requirements, you may want to temporarily override each zone.

This modification must be completed for each zone independently and it is not a requirement to temporarily override all zones; i.e. you may want to temporarily increase or decrease the temperature of zone “B” only.

Note: The Networker will revert to “Auto Program” at the next scheduled Time Period.

Diagram 10: NC-6 MTSP Temporary Override Display



To temporarily override “Auto Program”:

1. With the unit **ON** and in the “Auto Program” select the zone you wish to modify the pre-set room temperature of by pressing **Key “3”**, refer to **Diagram 10**, currently in Zone “C”
2. Use the Rotary Dial to increase or decrease the current temperature setting
3. While in override, the word “**Temporary**” will flash at the bottom of the screen until the current Period ends, or the “**Cancel**” Temporary Override (**Key “2”**) is pressed to return to the normal program; refer to **Diagram 10**
4. To temporarily change the set temperature of another zone press **Key “3”** until the desired zone is displayed in the top right hand corner of the screen and repeat step 2

2.6.4 Advancing the Current “Auto Program” Period

You may wish to skip to the next Period, e.g. advance from “Wake” to “Leave”.

1. With the unit **ON** and in “Auto Program”, press **Key “2”** to advance the Period
2. **Key “2”**, normally the “Adv Period” **Key**, has now become the “Cancel Adv Period” **Key**. Press this **Key** to return to the normal program
3. To advance the Period of another zone, press **Key “3”** until the desired zone is displayed in the top right hand corner of the LCD screen and repeat step 1

Note: The Networker will revert to “Auto Program” after the current period ends.

3.0 SINGLE TEMPERATURE SET POINT SYSTEMS (STSP)

A **STSP** system provides you with the capability of setting one temperature for Heating and another temperature for Cooling. The zone temperature set point is the same across all Networkers and/or Temperature Sensors.

3.1 STSP Quick Start Guide

The following quick start procedure enables you to use your ZonePlus before you learn all the details of the system's operation.

Please ensure your dealer has provided you with details on enabling zones, the capabilities of your Heating and Cooling system, and the maximum or minimum number of zones that can be operated simultaneously for Heating or Cooling design conditions (see **Table 2**).

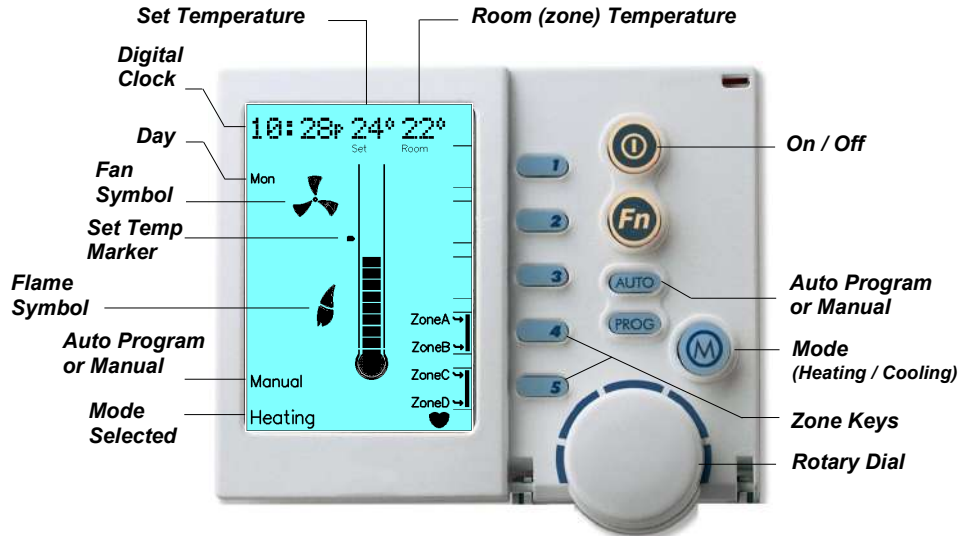
Quick Start Guide: Heating

1. Press the **Mode Key "M"** until **"Heating"** is displayed at the bottom of the screen
2. Press the **On/Off** button to turn the system on
3. Increase the desired temperature set point to above the room temperature by turning the rotary dial clockwise
4. Press **Key "4"** to enable and disable zones **"A"** & **"B"** for heating. An Arrow will appear adjacent to **Key "4"** on the screen to inform you that the zone is enabled
5. Press **Key "5"** to enable and disable zones **"C"** & **"D"** (if installed) for heating. An Arrow will appear adjacent to **Key "5"** on the screen to inform you that the zone is enabled

Quick Start Guide: Cooling

1. Press the **Mode Key "M"** until **"Cooling"** is displayed at the bottom of the screen
2. Press the **On/Off** button to turn the system on
3. Decrease the desired temperature set point to above the room temperature by turning the rotary dial anticlockwise
4. Press **Key "4"** to enable and disable zones **"A"** & **"B"** for cooling. An Arrow will appear adjacent to **Key "4"** on the screen to inform you that the zone is enabled
5. Press **Key "5"** to enable and disable zones **"C"** & **"D"** (if installed) for cooling. An Arrow will appear adjacent to **Key "5"** on the screen to inform you that the zone is enabled

Diagram 11. STSP NC-6 Networker Controller



3.2 Setting the Time & Day

Please refer to section 2.2

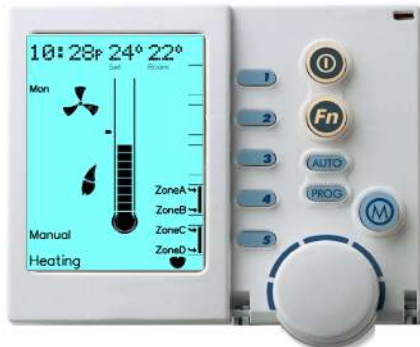
3.3 User Settings

Please refer to section 2.3

3.4 Zone Identification

Your Dealer has divided your home into zones that can be operated and controlled separately. The exact configuration of your ZonePlus system will determine the programming features that are enabled, as well as the number of zones that can be heated (or cooled) simultaneously. You may operate your ZonePlus system in either “**Auto Program**” or “**Manual**”.

Diagram 12: NC-6 Heating Operation Display



When the system is **ON**, only the zones that have been installed and configured by the installer will be displayed on the screen adjacent to **Keys “4” & “5”**, as shown in **Diagram 12**.

The zone Arrows:

- **Solid** indicates the associated zone is Heating (or Cooling) as the zone set temperature has not been satisfied
- **Flashing** indicates the associated zone set temperature has been satisfied

Note: The room temperature of a zone containing a NT-1 Sensor cannot be viewed on a NC-6 Networker Controller in STSP systems.

3.5 Manual Operation

Operating your system in “**Manual**” will require you to turn zones **ON** and **OFF** as desired, all set to a single temperature set point.

Diagram 13: NC-6 Manual Operation Display



To operate your system in “Manual”:

1. Use the **On / Off** button to turn the Networker **OFF**
2. If you have multiple appliances on the network, press the **Mode Key “M”** until the word “**Heating**” or “**Cooling**” appears (as required) at the bottom of the screen. If you have the Networker **ON** while switching between appliances you could start the wrong one inadvertently
3. Turn the Networker **ON** and press the “**AUTO**” Key until “**Manual**” appears in the bottom left-hand corner of the screen.
4. The system’s **Set Temperature** (24°C in **Diagram 13**) will now appear at the top of the screen. The current zone temperature (22°C in **Diagram 13**) is visible in the top right hand corner of the screen
5. This **Set Temperature** is the temperature the system is required to maintain for all enabled zones
 - To increase the set temperature, rotate the dial clockwise
 - To decrease the set temperature rotate the dial anti-clockwise
6. Press **Key “4”** to enable and disable zones “**A**” & “**B**” as required. Press **Key “5”** to enable and disable zones “**C**” & “**D**” (if installed) as required
7. To turn the system **OFF**, press the **ON / OFF**

The system will operate until all zone set temperatures are satisfied, at which time it will shut off.

If the temperature set point for a zone is satisfied the zone description (e.g. “**Zone A**”) and an Arrow, both adjacent to **Key “4”** & “**5**”, will flash. If the zone set point is not satisfied the zone description and Arrow will remain solid.

Note: The Networker remembers your last settings and reverts back to them the next time you select “**Manual**” operation.

3.6 Automatic Operation

The Networker allows you operate your system automatically in accordance with a predetermined “**Comfort Schedule**” (also known as the “**Auto Program**”).

The Networker has a pre-set (default) Comfort Schedule for Heating and Cooling already stored in its memory. This “**Auto Program**” covers the entire week and is based on the average operating time of the unit with all temperatures for Heating and Cooling set to 20°C. The “**Auto Program**” default settings are detailed in **Table 3**.

Diagram 14: NC-6 AUTO Operation Display



Note: A **STSP** ZonePlus system will operate ALL zones in “Auto” or ALL in “Manual”.

3.6.1 Programming Your Comfort Schedule

You may alter the default “Auto Program” to suit your requirements. This will require you to enter the Period start time, desired Heating (and Cooling) temperatures for each “Period” and “Day” Block. An example of this can be found in **Table 5**.

Take a few moments to complete the **STSP Comfort Schedule** template in the **Appendix** prior to accessing the “Auto Program”.

Diagram 15: NC-6 Programming Display



Programming the “Auto Program”:

1. Turn the Networker **OFF** and confirm you are in your desired conditioning mode, either Heating or Cooling. If you are not, press the mode **Key “M”** until the word “Heating” or “Cooling” appears at the bottom of the screen
2. Please note Heating and Cooling program changes must be completed independently. Also, when changing **Mode** from

“Heating” to “Cooling” and vice-versa, this must be conducted prior to entering the programming screen

3. Press the “**PROG**” **Key** and you will notice the word “**Auto Program**” appear at the bottom of the screen and the Digital Clock (e.g. “6:00A”, **Diagram 15**) at the top of the screen will begin to flash
4. Select the Day Block (e.g. “Mon to Fri”)
Press **Key “1”** to select the Block you want to change settings to. This selects either the Weekday Block or the Weekend Block. To change your day options from the Weekdays Block to Individual Days or an All Week Days Block please refer to **Section 1.3 User Settings**
5. Select the Period (e.g. “Wake”)
Press **Key “2”** (Period) until the required Period is displayed
6. Setting the Period Start Time
Press **Key “3”** until the time begins to flash. Rotate the dial to set the desired start Time for the selected “Period” and “Day” Block
7. Setting the Period Temperature
Press **Key “3”** to change from Time to Temperature. Rotate the dial to set the desired Temperature for the selected “Period”, “Day” Block and “Time”
8. Select the Zones
Press **Key “4”** to enable and disable zones “A” & “B” for the selected Period
Press **Key “5”** to enable and disable zones “C” & “D” (if installed) for the selected Period
9. Change Period
Press **Key “2”** (Period) until the next Period is displayed. Repeat steps 6 to 8 until all Periods are complete for the selected Day Block
10. Change Day Block
If there is more than one day Block (e.g. Mon-Fri & Sat-Sun) Press **Key “1”** to select the next Block. Repeat steps 5 to 9
11. Save and Exit
Press the “**PROG**” **Key** to save and exit

3.6.2 Operating in “Auto Program”

1. Determine the desired **Mode**, either Heating or Cooling by pressing the **Mode Key** marked “M” to select. The bottom of the screen will read “Heating” or “Cooling” (if installed)
2. Turn the system **ON** by pressing the **On / Off** button
3. Press the “**AUTO**” **Key** until “Auto Program” appears on the screen (if not already in “Auto Program”)

3.6.3 Temporarily Overriding “Auto”

If the “Auto Program” temperature setting does not suit your immediate requirements, you may want to temporarily override. This temperature modification will become the new set temperature for all zones.

Diagram 16: NC-6 STSP Temporary Override Display



To temporarily override the “Auto Program”:

1. The unit must be **ON** and in “Auto Program”
2. To initiate the temporary override:
 - a. Use the Rotary Dial to increase or decrease the current temperature setting
 - b. Press **Keys “4” & “5”** to turn zones ON and OFF
3. The word “**Temporary**” will flash at the bottom of the screen until the current Period ends, refer to **Diagram 16**
4. Press **Key “4”** to open or close zones “A” and “B”
5. Press **Key “5”** to open or close zones “C” and “D” if installed
6. **Key “2”** normally the “Adv Period” **Key**, has now become the “**Cancel Temporary Override**” **Key**. Press this **Key** to return to the default program

Note: The Networker will revert to “Auto Program” at the next scheduled Time Period.

3.6.4 Advancing the Current Program Period

You may wish to skip to the next Period, i.e. Advance from “Wake” to “Leave”. This can be done by completing the following steps:

1. With the unit **ON** and in the “Auto Program” press **Key “2”** to advance the Period
2. **Key “2”** normally “Adv Period”, has now become the “**Cancel Adv Period**” **Key**. Press this **Key** to return to the normal program

Note: The Networker will revert to “Auto Program” after the current period ends.

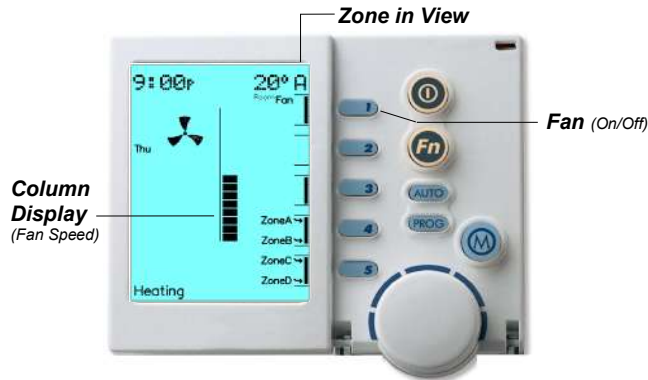
4.0 OPERATING THE FAN ONLY - MTSP & STSP

Another benefit of a ZonePlus system is its capability to turn on the main circulation fan only to assist with the circulation of air.

To turn the fan on only:

1. Press the **On/Off** button to turn the system **OFF**
2. Press **Key “1”** (Fan). A small rotating **Fan Symbol** and a Column Display, that indicates the fan's speed, will appear.
3. Now use the Rotary Dial to increase or decrease the fan speed
4. Open or close the zones by pressing **Keys “4” & “5”**

Diagram 17: NC-6 Display When Operating Fan Only



5.0 NETWORKER - SECURITY

To prevent any unwanted alterations being made to the Heating or Cooling settings, the Networker can be locked using a 4-digit PIN.

In the case of multiple Networkers, if one is locked, all are locked.

If multiple Networkers are installed, the user PIN can only be set from the NC-6 Master Controller. Other NC-6 Networkers can lock and unlock the system but cannot access the PIN numbers.

5.1 Setting the PIN

Diagram 18: NC-6 Display When Setting PIN



To set the PIN:

1. Press the Function **“Fn”** button, followed immediately by **Key “2”**. The screen will then display **“Enter Your PIN number to lock the system”**. DO NOT enter numbers at this stage, please continue to the next step
2. Press the **Mode Key “M”** once. The screen will now display **“User PIN reset - Enter master PIN”**. DO NOT enter numbers at this stage, please continue to the next step
3. Press the **Mode “M” Key** once again. The screen will now display the message **“User PIN number 1 alteration - Enter current PIN”**. If this is the first time for setting the PIN, the current PIN will be **“1111”**. If the PIN has been previously altered, then enter your current PIN
4. The screen will then display the message, **“Enter the new PIN”**
5. Enter your new 4-digit PIN number using a combination of **Keys “1-5”**. The screen will now display, **“Repeat the entry of the new PIN”**
6. Providing you re-enter the new PIN correctly, the screen will now display **“Valid PIN - PIN altered”**
7. If an incorrect number is entered press the **“AUTO” Key** to clear all digits, then re-enter your user PIN number
8. To exit this area at any time, press the **On/Off Key**

5.2 Locking the Networker

1. Press the Function **“Fn”** button, followed immediately by **Key “2”**. The screen will now display **“Enter Your PIN to lock the system”**
2. Enter your current user PIN to lock the Networker. The screen will now display **“System locked out!”**
3. If an incorrect number is entered, press the **“AUTO” Key** to clear all digits, then re-enter your PIN
4. A flashing padlock icon indicates that the Networker is locked

5.3 Unlocking the Networker

1. Press the Function **“Fn”** button followed immediately by **Key “2”**. The screen will now display **“Enter Your PIN to unlock the system”**
2. Enter your current user PIN to unlock the Networker. The screen will now display the message **“System unlocked!”**
3. If an incorrect number is entered press the **“AUTO” Key** to clear all digits, then re-enter your PIN

Note: If an invalid PIN is entered, the message **“Invalid PIN entered - try again”** will scroll across the screen. The user has three attempts at entering a valid PIN. On the third failed attempt the message **“Invalid PIN entered!”** will be displayed. At this point the Networker will abort the PIN entry screen, and return to its original screen . You will then need to repeat the process.

6.0 ERROR MESSAGES

While your system is operating, the Networker monitors and controls every aspect of the system's performance. On-board diagnostics help determine the source of a fault. If a fault is detected the system may turn off completely, or in some cases attempt to automatically restart.





When a fault persists, the Networker may display, for example, **“Heater Fault”** and the  (spanner  symbol). The message will vary depending on the nature of the fault and the type of heating or cooling system (see **Diagram 19**).

Diagram 19: NC-6 Fault Display



Note: When a fault occurs, the  may appear together with a scrolling message – e.g. **"Heater Fault - H01 Code ??? For assistance call 1300 BRVIS"**. Please refer to the Appendix for a list of Error Codes.

6.1 Fault Message Retrieval


When the  only appears, to retrieve the last scrolling message, press the Function **"Fn"** button then **Key "1"** quickly after to repeat the message.

Note: If no message appears it means the event has passed. The message(s) that may have been displayed could be advising past appliance operations or faults.

6.2 System Reset

After an unexpected interruption to system's operation, the word **"Reset"** could appear beside **Key "4"**, while a message scrolls across the top of the screen.

Press **Key "4"** to re-start the system. If the system does not resume normal operation or the error message re-appears, contact Service.

If the system operates but the Networker is showing an error message with the  symbol, press **"Reset" Key "4"** to clear the fault. If the error is not cleared, use the **On/Off** button to turn the Networker **OFF**, and then wait two minutes before turning the Networker back **ON**. This should reset the system and restore it back to normal operation.

If the fault still persists, turn **OFF** the power supply to the appliance (heater or cooler) at the power point or electrical isolator located adjacent to the appliance. Leave this **OFF** for approximately one minute and then turn the power back **ON**. If normal operation still does not resume, please call Service and inform them of the nature of your problem, the error code, model and type of appliance.

7.0

TROUBLESHOOTING

Before contacting your Installer, please consult the Troubleshooting Guide below, and also the Owner's Manuals accompanying your heating or cooling equipment.

Table 7: Troubleshooting Guide

Problem / Condition	Potential Cause / Remedy
An error message appears on the Networker	Refer to the section on Error Codes and follow the check lists.
Display shows "Fan run hours indicate it is time for a service call – For assistance call xxxx"	When the operating hours logged for an appliance exceeds the predetermined period, the NC-6 displays this message. - "Contact Brivis to have your equipment serviced". - Press Key "4" while message is scrolling to reset.
'Spanner' icon flashes once every second	
The Networker display is blank	No batteries are required. Check that the Heater is plugged in and power is available.
The system turns on and/or off when I don't want it to	- Check if the "Auto Program" is activated. You may need to change the "Auto Program setting or change to "Manual" operation'
The fan runs continuously	- Check that the 'fan only' option has not been selected on the Networker - Check that sufficient vents are open - Check that return air and/or filter has been cleaned - Check the ductwork has not been crushed and/or collapsed.
There is no air coming out of some vents	It is highly probable that this is an installation related issue - please contact your installer in the first instance
The padlock appears on the screen	This indicates that the child proof lock has been activated. Refer to the section on "Unlocking the Networker"
The refrigerated air conditioning outdoor unit continually turns Off and On	This cycling may be normal operation to prevent the system from freezing during periods of low airflow. Check to ensure adequate airflow: - ensure minimum number of zones or outlets are operating - check and clean filter - ensure system minimum airflow design requirement with installer – fan speed may be set too low

Appendix

Table 8: MTSP Comfort Schedule - Zones A & B

Comfort Schedule

ZONE A	Wake			Leave			Return			Pre-Sleep (Optional)			Sleep		
	Time	Heat°	Cool°	Time	Heat°	Cool°	Time	Heat°	Cool°	Time	Heat°	Cool°	Time	Heat°	Cool°
Mon															
Tue															
Wed															
Thu															
Fri															
Sat															
Sun															

ZONE B	Wake			Leave			Return			Pre-Sleep (Optional)			Sleep		
	Time	Heat°	Cool°	Time	Heat°	Cool°	Time	Heat°	Cool°	Time	Heat°	Cool°	Time	Heat°	Cool°
Mon															
Tue															
Wed															
Thu															
Fri															
Sat															
Sun															

Table 8: (cont'd) – Zones C & D

ZONE C	Wake			Leave			Return			Pre-Sleep (Optional)			Sleep		
	Time	Heat°	Cool°	Time	Heat°	Cool°	Time	Heat°	Cool°	Time	Heat°	Cool°	Time	Heat°	Cool°
Mon															
Tue															
Wed															
Thu															
Fri															
Sat															
Sun															

ZONE D	Wake			Leave			Return			Pre-Sleep (Optional)			Sleep		
	Time	Heat°	Cool°	Time	Heat°	Cool°	Time	Heat°	Cool°	Time	Heat°	Cool°	Time	Heat°	Cool°
Mon															
Tue															
Wed															
Thu															
Fri															
Sat															
Sun															

Table 9: STSP Comfort Schedule

	Wake			Leave			Return			Pre-Sleep (Optional)			Sleep		
	Time	Heat°	Cool°	Time	Heat°	Cool°	Time	Heat°	Cool°	Time	Heat°	Cool°	Time	Heat°	Cool°
Mon - Fri															
Zone A		On / Off	On / Off		On / Off	On / Off		On / Off	On / Off		On / Off	On / Off		On / Off	On / Off
Zone B		On / Off	On / Off		On / Off	On / Off		On / Off	On / Off		On / Off	On / Off		On / Off	On / Off
Zone C		On / Off	On / Off		On / Off	On / Off		On / Off	On / Off		On / Off	On / Off		On / Off	On / Off
Zone D		On / Off	On / Off		On / Off	On / Off		On / Off	On / Off		On / Off	On / Off		On / Off	On / Off

	Wake			Leave			Return			Pre-Sleep (Optional)			Sleep		
	Time	Heat°	Cool°	Time	Heat°	Cool°	Time	Heat°	Cool°	Time	Heat°	Cool°	Time	Heat°	Cool°
Sat - Sun															
Zone A		On / Off	On / Off		On / Off	On / Off		On / Off	On / Off		On / Off	On / Off		On / Off	On / Off
Zone B		On / Off	On / Off		On / Off	On / Off		On / Off	On / Off		On / Off	On / Off		On / Off	On / Off
Zone C		On / Off	On / Off		On / Off	On / Off		On / Off	On / Off		On / Off	On / Off		On / Off	On / Off
Zone D		On / Off	On / Off		On / Off	On / Off		On / Off	On / Off		On / Off	On / Off		On / Off	On / Off

Table 10: ZonePlus System Configuration

<i>ZonePlus SYSTEM CONFIGURATION</i>					
HEATING ONLY <input type="checkbox"/>		DUAL COMFORT <input type="checkbox"/>		HEATING & EVAPORATIVE COOLING ^A <input type="checkbox"/>	
MULTI TEMPERATURE SET POINT (MTSP) <input type="checkbox"/>			SINGLE TEMPERATURE SET POINT (STSP) <input type="checkbox"/>		
<i>SYSTEM DESIGN CONDITIONS & PARAMETERS</i>					
Maximum no. of Zones for HEATING:			Maximum no. of Zones for REFRIGERATED COOLING:		
ZONE	ROOM(S)	SENSOR TYPE (NC-6 / NT-1)	SENSOR ID (n01 - n04)	HEAT FAN SETTING (1-16)	COOL FAN SETTING (1-16)
ZONE A					
ZONE B					
ZONE C					
ZONE D					
COMMON (STSP - If applic)		--			
CONSTANT (MTSP - If applic)	ZONE: A B C D NIL <small>(circle one only)</small>	--	--	--	--
<i>EQUIPMENT DETAILS</i>					
HEATER	Model No.		Serial No.		
ICE OUTDOOR	Model No.		Serial No.		
ICE INDOOR	Model No.		Serial No.		
EVAPORATIVE COOLER	Model No.		Serial No.		
DEALER	Tel:			Installation Date:	
<i>INSTALLER: Please complete this information for future reference.</i>					

Table 11: Networker Error Codes

Error Code	Potential Cause / Remedy
“40”, “41”, “42” & “43”	<p>These errors indicate that an overheat condition has occurred on the heater. The heater's fan will be forced to operate at maximum speed.</p> <ol style="list-style-type: none"> 1. Check there are sufficient outlets or zones open 2. Check that the floor/ceiling register and balancing damper is not restricting air movement 3. Check the return air filter (if fitted) is sized correctly, clean and no obstructions have been placed in front of the return air intake
“46”, “47” & “55”	<ol style="list-style-type: none"> 1. Check the gas supply is turned ON at the meter, and at the appliance gas cock 2. Check if other gas appliances are operating such as Gas Cooker and Hot Water Service (if installed) 3. Check the gas cylinders have gas, and the cylinder valve is open (LPG only) 4. Check that there is gas supply to your home. Contact your gas provider to confirm this. There may be works in your area or a problem with the supply 5. The heater may require a general service
“50”	<p>This error indicates the heater has locked out after 4 ignition attempts. This error can be reset using the “Reset” button to restart the heater, but the unit may lockout again if the condition has not been rectified (see 6.1).</p> <ol style="list-style-type: none"> 1. Refer checklist for error 46, 47 & 55.
“56”	<p>Error 56 indicates a lockout has occurred on the heater combustion fan pressure switch, usually caused by too much restriction on the flue pipe or condensate drain on condensing furnaces.</p> <ol style="list-style-type: none"> 1. Check the flue pipe for Blockages 2. Check the condensate piping for Blockages
Any other Error Codes that appear on the screen could indicate the system is not operating due to a malfunction or fault with an electronic control module. This error may be reset at the power supply.	
If the fault continues to appear, promptly contact Brivis with the error code, model and serial number of your system.	

Terms of Warranty – Australia

Rinnai Australia Pty Ltd. ABN: 74 005 138 769, 100 Atlantic Drive, Keysborough VIC 3173

NOTICE TO CONSUMERS UNDER AUSTRALIAN CONSUMER LAW

Our goods come with guarantees that cannot be excluded under the Australian Consumer Law. You are entitled to a replacement or refund for a major failure and compensation for any other reasonable foreseeable loss or damage. You are also entitled to have the goods repaired or replaced if the goods fail to be of acceptable quality and the failure does not amount to a major failure.

The benefits provided by this Warranty are in addition to any other rights and remedies of a consumer under the Australian Consumer Law and any other law which may apply to the Product.

2 Definitions

The terms listed below shall have the following meanings:

1. **“Authorised Service Representative”** means an independent service contractor authorised by Rinnai or Rinnai service personnel.
2. **“Rinnai”** means Rinnai Australia Pty Ltd (ABN 74 005 138 769) and any related company.
3. **“Certificate(s) of Compliance”** means certificate(s) issued by licensed personnel (including plumbers, refrigeration mechanics, electricians or other relevant tradespeople) to certify that any prescribed works comply with applicable regulatory requirements.

4. **“Certificate(s) of Occupancy”** means certificate(s) issued by the local government authority (or similar organisation) which certifies that a home can be occupied.
5. **“Installation Site”** means the site at which the Product is originally installed.
6. **“Normal Business Hours”** means 8:30am to 5:00pm Monday to Friday, excluding public holidays.
7. **“Operating/Installation Instructions”** means the user manual or other documentation which provides detailed instructions on the proper operation and maintenance of the Product.
8. **“Other Applications”** means any Product used for purposes other than Residential & Light Commercial Applications. Other Applications may include but are not limited to factory, IT/Server room, telephone exchange, processing area (e.g. bakery, kitchen, warehouse, swimming pool, agricultural facilities such as a nursery). Any Product which has been installed, for whatever purpose, as a retrofit component to an existing system, will also be classed as being part of an "Other Application" regardless of the purpose of use of the existing system into which such product has been installed.
9. **“Purchaser”** means the end user of the Product, the person named as owner in the Warranty certificate, the holder of the Proof of Purchase or the holder of a property transfer document where the Product is included as part of the chattels.
10. **“Product”** means the equipment purchased by the Purchaser and described in Section 2 of this document.
11. **“Proof of Purchase”** means a Tax Invoice or Receipt in respect of the Product. In the case of new constructions, a Certificate of Occupancy or a Certificate of Compliance that details the date of installation or commissioning will suffice.

12. **“Qualified Installer”** means the qualified installation contractor who is responsible for performing the installation work in the manner prescribed by local and statutory regulations, including compliance with any relevant and to Rinnai specifications, including Australian Standards.
13. **“Residential & Light Commercial Applications”** means any Product for use in residential or light commercial applications where
 - a) the Product is solely used for the purpose of human comfort; and
 - b) the ambient temperature of the space the Product is intended to heat or cool is influenced solely or primarily by natural exterior weather conditions rather than by man-made or mechanical heat sources.Examples of Residential & Light Commercial Applications include, homes, offices, hotels, apartments, nursing homes, hospitals, health care premises, shopping centres, and retail stores.

3 Terms of Warranty

- 3.1 Subject to the Terms of Warranty set out in this document, effective from the date of purchase by the Purchaser, the Product is warranted to be free from defects in materials & factory workmanship for the period set out in table below:

	PRODUCT GROUPS	PARTS	LABOUR
Residential & Light Commercial	Evaporative Coolers & Ducted Gas Heaters (excluding Compact Classic Series)	5 Years *Extended 4 Years Option	5 Years *Extended 4 Years Option
	Ducted Gas Heaters - Compact Classic Series	3 Years	3 Years
	Refrigerated Airconditioning Products	5 Years	5 Years
	Ducted Gas Heaters - Heat Exchangers & Burners Evaporative Coolers - Structural components only	10 Years	N/A
	Portable Airconditioning	2 Years	N/A
	All Product Groups	1 Year	1 Year
Other Applications			
After Market	Spare Parts	1 Year	N/A
*Extended Warranty Option	Up to 4 year extended warranty (in addition to the standard warranty period listed above) applies on selected products when you opt in to the Rinnai Service Advantage program. This program has terms and conditions, including the requirement for scheduled servicing of the product by Rinnai. To participate in the program you must register your product online at: www.rinnai.com.au/support-resources/warranty-registration/ within the first 12 months of the product being installed.		

- 3.2 Rinnai will determine in its sole discretion, which classification the Product fits into and the corresponding Warranty that shall apply.

- 3.3 An Authorised Service Representative will repair or replace, at its option, the Product or any part of the Product that its examination shows to be defective. The repair or replacement shall be performed during Normal Business Hours by an Authorised Service Representative. Repair by persons other than an Authorised Service Representatives may void the Warranty.
- 3.4 Alternatively, to clause 2.3 above, Rinnai can at its discretion elect to pay you an amount equivalent to the cost of repairing or replacing the Product.
- 3.5 If Rinnai provides you with either the replacement costs or replacement product, ownership of the original Product shall immediately transfer to Rinnai.
- 3.6 Rinnai is responsible for reasonable costs associated with legitimate warranty claims, including call-out of an Authorised Service Representative to inspect the Product. Rinnai is not responsible for:
- a) costs for tradespeople engaged by you that are not Rinnai Authorised Service Representatives.
 - b) any costs, including call out costs for a Rinnai Authorised Service Representatives, associated with a Product which is determined upon inspection not to be covered by this warranty.
- 3.7 Rinnai will reimburse any reasonable costs associated with making a legitimate warranty claim against Rinnai which are not otherwise specified above.
- 3.8 The Warranty of the Product requires that, in addition to all other conditions, the Purchaser conducts regular and/or preventative maintenance as may be specified by the Operating/Installation Instructions or otherwise directed by Rinnai and required by the level of usage and the usage environment, including the use of correct and uncontaminated refrigerants and lubricants. Refrigeration, plumbing and electrical works must be undertaken by licensed personnel.

- 3.9 Where a Product or failed component is replaced under warranty, the time remaining on the original Product warranty period will continue to apply and the replacement product or part will be subject to the original warranty period only.

4 Conditions of Warranty

- 4.1 The Purchaser may only obtain the benefit of the Warranty if the Purchaser:
- a) maintains and has the Product serviced in accordance with the instructions set out in the service section of the relevant Service or Owner's Manual;
 - b) complies with clause 8 below (titled "Purchaser's Responsibilities");
 - c) notifies Rinnai within 30 days of a defect occurring or, in the case of a latent defect, becoming apparent, that a claim is being made under this Warranty; and
 - d) provides, in support of the claim made under this Warranty, a Proof of Purchase.
- 4.2 This document (and any statutory consumer guarantees) represents the only Warranty given by Rinnai in respect of the Product. No other person or organisation is authorised to offer any alternative warranty on behalf of Rinnai.
- 4.3 If the date of purchase cannot be established to Rinnai's satisfaction, the date shall be deemed to be 2 months after the date of manufacture or the date of sale by Rinnai, whichever is the latter.
- 4.4 This warranty applies to Products which are manufactured on or after the date of publication of this warranty but before the next date of publication of this warranty.

5 Exclusions

- 5.1 This Warranty **does NOT** cover:

- a) damage, problems or failure resulting from improper operation and/or inadequate maintenance by the Purchaser (refer Purchaser's Responsibilities section below);
- b) damage, problems or failure resulting from improper or faulty installation. The Product must be installed by a Qualified Installer in accordance with applicable regulations. Where applicable, Certificate(s) of Compliance must be obtained by the purchaser from the Qualified Installer and presented to the Authorised Service Representative;
- c) damage, problems or failure caused by factors external to the Product including, but not limited to, faulty or poor external electrical wiring, incorrect or faulty power supply, voltage fluctuations, over voltage transients or electromagnetic interference, inadequate or faulty gas, drainage services, or water services, including water pressure, and non-potable water;
- d) damage, problems or failure caused by acts of God, fire, wind, lightning, flood, storm, hail storm fallout, vandalism, earthquake, war, civil insurrection, misuse, abuse, negligence, accident, pests, animals, pets, vermin, insects, spiders/bugs or entry of foreign objects or matter into the Product such as dirt, debris, soot or moisture;
- e) damage, problems or failure caused by environmental conditions including, but not limited to, excessive moisture, salt or other corrosive substances or atmospheric conditions;
- f) Product which has been installed in a portable or mobile building, structure or application including, but not limited to, a caravan, boat or trailer;
- g) Product which has been re-installed at a location other than the original site;
- h) any consumable item supplied with the Product including, but not limited to, an air filter, battery, fan belt, igniter or cooler pad;

- i) installation of third-party components that may be attached to the Product. These include, but are not limited to, control wiring, ducting, return air filter(s) grille, register, diffuser, zone motors, controls/thermostats, pipe work and fabricated or added components. These items remain solely the responsibility of the Qualified Installer;
- j) installations where electrics/electronics may be subjected to moisture/chemicals (e.g. swimming pools or nurseries);
- k) any repair, which is needed as a result of an accident, misuse, abuse or negligence;
- l) Product that is utilised in an environment (indoor and outdoor) outside its specified operating range; and
- m) fair wear and tear to the Product.
- n) On-site labour warranty on portable (non-fixed installation) Products – In respect of such Products the Purchaser must return the Product to the supplier for repair or replacement).

6 Limitations

1. Third parties are often involved in providing advice to consumers about the climate control solutions best suited to the consumer's needs. Any advice or recommendations given by such parties, including advice about Product fitness for purpose and overall system design, sizing and application are not the responsibility of Rinnai. This includes but is not limited to the heat load calculations, airflow and system balancing.
2. This Warranty does not apply to any Product installed at an Installation Site which is outside Australia.

3. Except where inconsistent with the purchaser's statutory rights and the rights given by this Warranty, all liabilities of Rinnai for any direct, special, indirect or consequential loss or damage, any damage or expense for personal injury or any loss or destruction of property, arising directly or indirectly from the use or inability to use the Product or any of its parts and/or servicing the Product, are expressly excluded.

7 Travel, Transport & Access Costs

- 7.1 The Purchaser must pay freight charges, in-transit insurance expenses and travelling costs for repairs/replacements under this Warranty, that are required to be performed 50km from the nearest Rinnai branch or Authorised Service Representative.
- 7.2 Subject to clause 7.3, Rinnai will pay freight charges, in-transit insurance expenses and travelling costs for repairs/replacements that are required to be performed less than 50km from the nearest Rinnai branch or Authorised Service Representative, subject to the following:
 - a) Rinnai will arrange for such repairs/replacements and make any payment directly to the third party to provide the freight, in-transit insurance or travel services; or
 - b) if Rinnai considers appropriate, it will authorise the Purchaser in writing to pay for the relevant freight charges, in-transit insurance expenses or travelling costs and then, upon provision by the Purchaser to Rinnai of a tax invoice showing those costs have been incurred, reimburse the Purchaser for such costs which are within the terms of the authorisation. If the Purchaser pays for the relevant freight charges, in-transit insurance expenses or travelling costs without written authorisation from Rinnai, Rinnai will not reimburse the Purchaser for such costs.

- 7.3 The Purchaser must pay all costs and expenses in respect of:
- a) any service call out fee if the Product is not accessible for service
 - b) making the Product accessible for service, for example, restricted access or working at heights, or the labour cost for an additional person due to OHS requirements.
 - c) providing a safe working environment for installation, service, maintenance or repair of the Product;
 - d) any surcharge applicable in respect of supplying replacement parts outside Normal Business Hours; and
 - e) any other costs and expenses in relation to claiming the Warranty that is not covered by clause 7.2.

8 Purchaser's Responsibilities

- 8.1 The Purchaser must operate and maintain the Product in accordance with the Operating Instructions and service maintenance schedule, including conducting an appropriate number of services to the unit during the Warranty period, based on usage and the usage environment including but not limited to;
- a) regularly cleaning the air filter(s) and replacing them where necessary;
 - b) replacing expired batteries or other consumables as required;
 - c) ensuring that the condensate drain is kept clean and clear of obstructions;

How to make a warranty claim:

If you wish to make a warranty claim in respect of any Portable Product, please return it to the place of purchase, or if that is not possible, contact Rinnai to enquire about alternative arrangements.

If you wish to make a warranty claim in respect of any fixed Product, please contact Rinnai on the details set out below to make arrangements for an Authorised Service Representative to inspect the product.

As per clause 2.6 of the Terms and Conditions of Warranty, purchasers are responsible for the costs of any repair and/or call out fee where, on inspection, the alleged defect is found by Rinnai's Authorised Service Representative not to be covered by this warranty or any statutory consumer guarantee applicable to the Product.

The Terms and Conditions of Warranty contain important information about your rights and obligations under this warranty. Please read them fully and carefully before making a claim.

National Help Line:

Phone 1300 555 545*

Fax: 1300 555 655*

**Cost of a local call higher from mobile or public phones.*

Email: enquiry@rinnai.com.au

For further information visit: www.rinnai.com.au

Notes:

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Notes:

Rinnai Australia Pty Ltd

ABN 74 005 138 769 | AU24752

100 Atlantic Drive, Keysborough, Victoria 3173

P.O. Box 460, Braeside, Victoria 3195

Tel: (03) 9271 6625

Fax: (03) 9271 6622

National Help Line

Tel: 1300 555 545* Fax: 1300 555 655

Monday to Friday, 8.00 am to 5.00 pm EST.

**Cost of a local call higher from mobile or public phones.*

For further information visit **www.rinnai.com.au**
or email **enquiry@rinnai.com.au**

Rinnai has a Service and Spare Parts network with personnel who are fully trained and equipped to give the best service on your Rinnai appliance. If your appliance requires service, please call our National Help Line.

With our policy of continuous improvement, we reserve the right to change, or discontinue at any time, specifications or designs without notice.