# Rinnai

### ATTENTION: INSTALLING PERSONNEL

# KEY POINTS FOR A SUCCESSFUL INSTALLATION



# **BEFORE PROCEEDING**



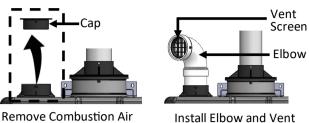
**Read the Installation and Operation** Manual before you proceed.

- Use the Installation Checklist in the Installation and **Operation Manual** after completing the installation.
- Refer to the "Water Quality Guidelines" section in the manual for important water quality information.
- Pay close attention when unpacking the water heater carton box as the packing includes additional components.
- · Confirm all included parts are located inside the water heater carton box (refer to the water heater manual for a full list of parts).

# **VENTING** (For Indoor Models Only)

- Ensure vent pipe slopes 1/4" per ft. toward the water heater. • Ensure vent system doesn't exceed maximum length allowed.

• Room air installations: Remove the combustion air vent cap and install elbow and vent screen (see below).



Refer to the Installation and Operation Manual for complete details on the above information.

Screen

Vent Cap

### **GAS**

- Purge gas line of air and foreign material; this is especially critical for new propane gas tank installations.
- Confirm inlet gas pressure is within the listed value on the rating plate.

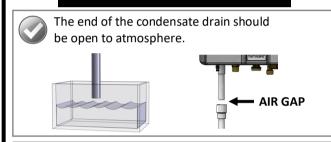


# **ISOLATION VALVES**

- Purge water line of air and foreign material by closing the hot isolation valve and opening the cold isolation valve and its drain valve.
- Debris will damage the water heater.



# **CONDENSATE**





**DO NOT** install an external condensate

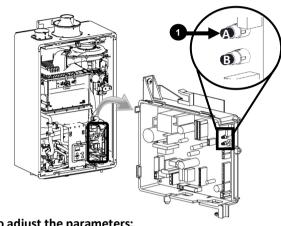


# TYPICAL INSTALL

Example Internal (Indoor) Unit



# PARAMETER SETTINGS

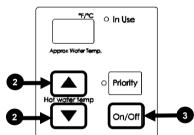


#### To adjust the parameters:

- 1. Press the "A" button for 1 second.
- 2. Use the  $\nabla$  and  $\triangle$  button on the controller to select a setting number (See Parameter Settings Table below).
- 3. Once the desired setting number is selected, use the "On/Off" button on the controller to change the selection for the setting number.

Example: Display will change from 01A to 01b for Maximum Temperature setting.

To exit the parameters, press the "A" button on the PC board for 1 second.



# **RECIRCULATION PUMP**

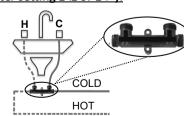
SE+ Series Featuring ThermaCirc360™ RUR199i/e and RUR160i/e Models Only

Select the appropriate recirculation mode (Dedicated or crossover) in the parameter settings. Dedicated mode (parameter setting 미니b):

Determine maximum pipe length.									
	Maximum Pipe Length								
	Pipe Diameter	3/4"	1/2"						
	Total	400 Ft	100 Ft						

#### Crossover mode (parameter setting DMC or DMd):

Install crossover valve at the furthest fixture from the tankless water heater.



Determine if the plumbing system has a short or a long circulation loop then set the appropriate parameter

Pipe Diameter	Short Loop	Long Loop
	Parameter 🖫 ЧЫ	Parameter 04C
1/2"	Up to 50 Ft	From 51 to 100 Ft
3/4"	Up to 200 Ft	From 201 to 400 Ft

Remove the <u>Bypass Plug</u> and replace it with the <u>Bypass Filter</u>.



### Parameter Settings Table<sup>2</sup>

Parameter Settings Table									
SETTING	SETTING DESCRIPTION	SELECTION							
#		A	ь	С	Ч				
01	Maximum Set Temperature	Residential: 120°F Commercial: 140°F	Residential: 140°F Commercial: 185°F						
02	High Altitude (Installation Location)	0 - 2,000 ft (0 - 610 m)	2,001 - 5,400 ft (610 - 1,646 m)	5,401 - 7,700 ft (1,646- 2,347 m)	7,701 - 10,200 ft (2,347 - 3,109 m)				
03	Service Soon	Disabled	0.5 Year	1 Year	2 Years				
	Recirculation Settings	No Recirculation	Recirculation						
04			Dedicated Mode	Crossove	r Mode				
				Long Loop	Short Loop				
05	Recirculation Mode	Economy	Comfort	Commercial <sup>3</sup>					
06	Control Switch	BMS	Air Handler (AH)						
2	Units in Standby (EZ Connect)	2	1						
08	Cascade	Secondary	Primary						
09	Units in Standby (Cascade)	1	2	3	4				
10	Gas Type (Factory Set)	NG	LPG						
11	Maximum Flow Rate	Standard	High						
15	Factory Set	Without Pump	With Pump						
13	Values Not	199 (3237)	180 (2934)	160 (2530)	130 (2024)				
14	Adjustable	Internal (Indoor)	External (Outdoor)						
15	Low Activation Mode	On	Off						

- Some parameter settings are not available for all models. Refer to the installation and operation manual for complete modelspecific parameter settings.
- Commercial mode should not be used for residential applications. Application of commercial mode may result in excessive machine wear and energy consumption.

# TEMPORARY PUMP OPERATION

Models with an integrated pump (RUR models) require installation of the control •r™ Wi-Fi Module or MC-195T-US controller to operate scheduled recirculation. <sup>1</sup>





MC-195T-US

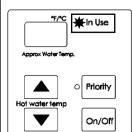
If the control •r™ Wi-Fi Module or MC-195T-US controller are not installed, temporary pump operation can be initiated for 60 seconds by resetting power to the appliance.

Note: Recirculation parameter setting 04 must be set to your circulation mode. See "Parameter Settings" section in this document for more information.

DO NOT install the control •r™ Wi-Fi Module and MC-195T-US together as they are NOT compatible accessories.

### "IN USE" LIGHT

The integrated controller "In Use" light flashes based on the operation status of the water heater and integrated pump.



### **SOLID LIGHT**

Indicates ignition and water flow.









Indicates pump operation with no ignition.