



# INSTALLATION & OPERATION MANUAL

## Gas Range with Convection Oven

**This manual contains important information regarding your purchased equipment. Please read the manual thoroughly prior to equipment set-up, operation, and maintenance.**

**Failure to comply with regular maintenance guidelines outlined in this manual may void the warranty. Please read and keep this manual for future reference after installation.**



MODEL: PT-RGR36C

## **FOR YOUR SAFETY**

THIS MANUAL HAS BEEN PREPARED FOR PERSONNEL QUALIFIED TO INSTALL GAS EQUIPMENT, WHO SHOULD PERFORM THE INITIAL FIELD START-UP AND ADJUSTMENTS OF THE EQUIPMENT AS COVERED BY THIS MANUAL.

### **IMPORTANT**

IN THE EVENT A GAS ODOR IS DETECTED, TURN OFF GAS AT MAIN SHUTOFF VALVE AND CONTACT THE LOCAL GAS COMPANY OR GAS SUPPLIER FOR SERVICE.

### **WARNING**

IMPROPER INSTALLATION, ADJUSTMENT, ALTERATION, SERVICE OR MAINTENANCE CAN CAUSE PROPERTY DAMAGE, INJURY OR DEATH. READ THE INSTALLATION, OPERATING AND MAINTENANCE INSTRUCTIONS THOROUGHLY BEFORE INSTALLING OR SERVICING THIS EQUIPMENT. IN THE EVENT OF A POWER FAILURE, DO NOT ATTEMPT TO OPERATE THIS DEVICE.

## **WARNINGS**

- Do not touch any hot surfaces.
- Do not use this range for anything other than the intended use.
- Do not use outdoors.
- Always use on a firm, dry and level surface.
- The manual shall be retained for future reference.
- Do not store or use gasoline or other flammable vapors or liquids in the vicinity of this or any other equipment.
- Improper installation, adjustment, alteration, service, or maintenance can cause property damage, injury, or death.
- Read the installation and maintenance instructions thoroughly before installing or servicing this equipment.
- Have the equipment installed by a qualified installer in accordance with all federal, state, and local codes.
- Do not install or use without all 4 legs or casters.
- This equipment is for use in non-combustible locations only.
- Do not obstruct the flow of combustion and ventilation air.
- Do not spray controls or the outside of the equipment with liquids or cleaning agents.
- Allow for hot parts to cool before cleaning or moving.
- This range should only be used on a flat, level position.
- Do not operate unattended.
- Any loose dirt or metal particles that are allowed to enter the gas lines on this equipment will damage the valve and affect its operation.
- If you smell gas, follow the instructions provided by the gas supplier. Do not touch any electrical switch; do not try to light the burner.
- Never attempt to move grates while cooking.

## **BEFORE INSTALLATION**

- Installation of this device should be performed by a professional licensed technician.
- Installation of this unit should conform to provisions of gas safety, installation, and usage.
- Check that the electrical data plate and the gas supply match the specifications on the rating plate located inside the kick panel of the unit. If the supply and equipment requirements do not match, do not proceed with the installation. Contact your dealer immediately.
- The range must be installed so that the flow of combustion and ventilation air will not be obstructed, ensure that there is an adequate supply of air in the room to allow proper combustion of gas at the burners.
- The range should be kept a minimum clearance of 12" from combustible materials at the sides and 10" at the rear, clearance from non-combustible materials is 6" sides and 6" at the back.

## **INSTALLATION**

- The installation of this equipment must conform with local codes, or with the National Gas Code, ANSIZ223.1/NFPA 54, or the Natural Gas and Propane Installation Code, CSA B149.1, as applicable.
- The equipment and its individual shutoff valve must be disconnected from the gas supply piping system during any pressure testing of that system at test pressures more than ½ psi (3.5 kPa).
- The equipment must be isolated from the gas supply piping system by closing its individual manual shutoff valve during any pressure testing of the gas supply piping system at test pressures equal to or less than ½ psi (3.5 kPa).

## **CLEARANCE AND POSITIONING AROUND THE RANGE**

- This equipment must be installed adjacent to non-combustible surfaces only with a minimum spacing of 6” from all sides. This equipment must be 6” from other equipment. The equipment must have the 4” legs or casters installed and be placed on a non-combustible surface.
- For a range with casters installed, the gas connection shall be made with a connector that complies with the Standard for Connectors for Movable Gas Appliances, ANSI Z21.69/CSA 6.16 and a quick-disconnect device that complies with the Standard for Quick-Disconnect Devices for Use with Gas Fuel, ANSI Z21.4/CSA 6.9. When installing the oven with casters and quick-disconnect hose, adequate means must be provided to limit the movement of the oven without depending on the connector and the quick disconnect device or its associated piping to limit the oven movement. Restraining cables may be attached to the vertical portion of the base frame in the rear of the oven.

## **AIR SUPPLY AND VENTILATION**

- The area in front and around the range must be kept clear to avoid any obstruction of the flow of combustion and ventilation air.
- Adequate clearance must be always maintained in front of and at the sides of the equipment for servicing and proper ventilation.

## **TO INSTALL**

1. Level the range with a level gauge. The height can be adjusted by the adjustable feet. The range should not sway or tilt during operation. Units that are not level will experience operational problems.
2. The mounting position should be well-ventilated with proper hood exhaust system.
3. Codes require that a gas shut off valve should be installed upstream the device where it is easily reached during operation.
4. Make sure you are using the correct gas supply that is specified for this model. If the gas supply is not intended for this model, do not proceed with installation.
5. This range is applicable to low pressure regulating valves only. High pressure regulating valves and medium pressure regulating valves are not to be used.
6. Check to make sure the connection pipe to the unit has no leaks and that all connections and pipe joint compound used are resistant to the action of propane gases.
7. A pressure regulator must be installed with this unit. Ensure that the regulator type agrees with the rating plate gas supply. The regulator must be upright after installation. If regulator is not level during operation, performance problems may result.
8. After connecting the appliance to the gas system, check for leaks at joints and pipe fittings; to do so, use soapy water or a leak detector spray.
9. Check the gas supply pressure after installation.
10. Gas supply pressure can be measured with a liquid-filled pressure gauge (e.g., a U-shaped pressure gauge, minimum scale division 0.1mbar) or a digital gauge. Procedure as follows:
  - Ensure gas is turned off
  - Remove the panel and unscrew the screw on the pressure port
  - Place the pressure gauge
  - Start up the appliance by following the instructions in this owner’s manual
  - Check supply pressure. Pressure must agree with rating plate requirement when the unit is in full operation
  - After the check, turn off gas and remove the pressure gauge
  - Replace the sealing screw

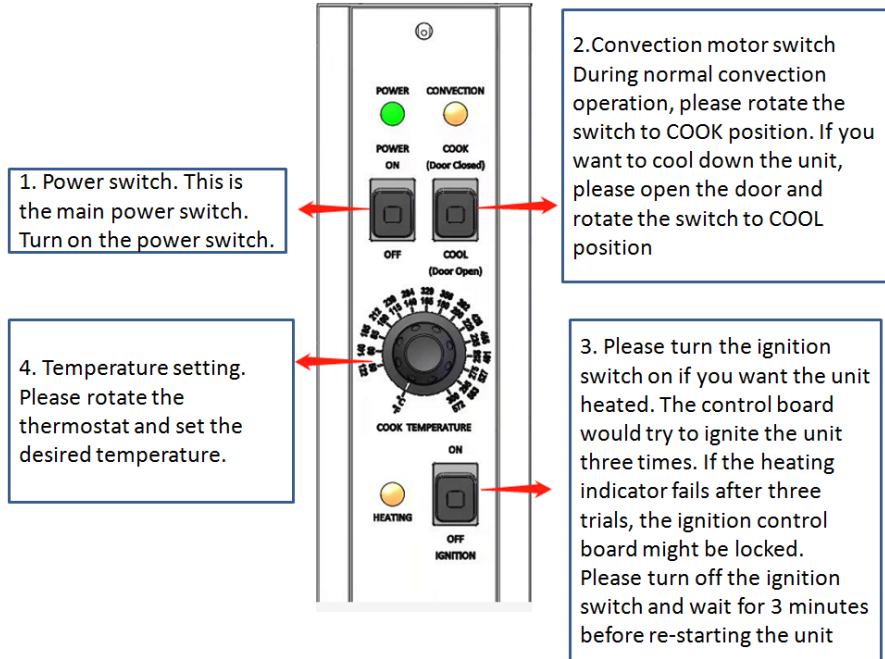
## **OPERATING INSTRUCTIONS AND CONTROLS**

- When turning on for the first time please be advised that it might take a little longer to ignite due to the air existing in the pipe.

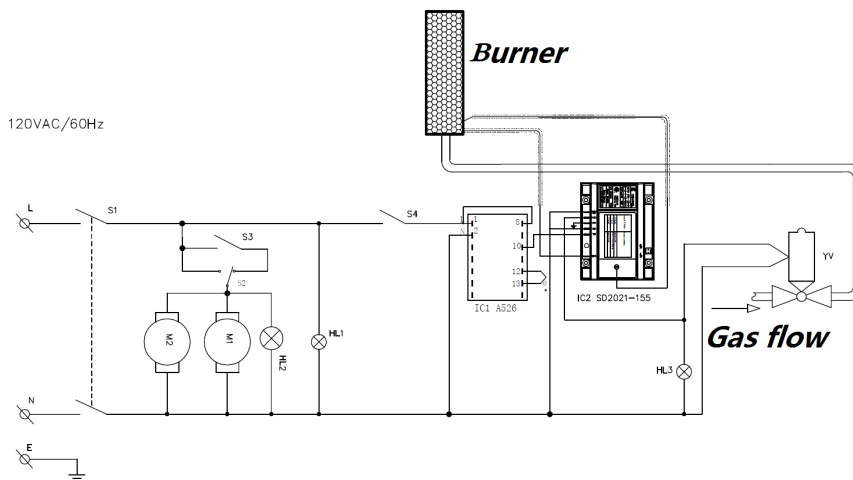
## BURNERS

- Turn on the gas supply and ignite the pilot flame with a lighter. If the unit hasn't been used in a while or if this is the first lighting, ignition might take a little longer (about two or three minutes).
- Press the corresponding valve knob of burner and turn 90 degrees counterclockwise. The burner will be ignited, and the flame will be at Max. To set the flame to Min, rotate counterclockwise another 90 degrees.
- When finished turn off main burner by rotating the knob clockwise to off position. Pilot should remain lit.
- For complete shutdown, ensure that all burner knobs are turned to the off position, and then turn main gas supply off.

## CONVECTION OVEN



## Wiring diagram



- |                            |                            |
|----------------------------|----------------------------|
| HL1-----Power indicator    | HL2-----Motor indicator    |
| HL3-----Ignition indicator | S1-----Power on/off switch |
| S2-----COOK/COOL switch    | S3-----Micro switch        |
| S4-----Gas ignition switch | IC1-----Digital thermostat |
| IC2-----Ignition module    | YV-----Solenoid valve      |
| M1/M2-----Motor            |                            |

## GAS CONVERSION

Conversion from Natural Gas (NG) to Liquid Propane (LP) or vice versa may only be performed by an authorized service agent.

## CLEANING

It is important to clean and check the range daily. Cleaning and checking the range regularly can avoid serious accidents. Stop using if user feels that there is a problem with the range.

1. Before cleaning, turn off all gas valves.
2. Clean the burners and drip tray of all debris and spillage daily. A complete cleaning every day will ensure a good service and extend the service life of the range.
3. Clean the stainless steel surface with warm soapy water every day and rinse it completely. Do not saturate range with water, excessive water will cause operational issues. During cleaning, do not clean the stainless steel surface with abrasive detergents, brushes, scraper etc. The residual iron scale may cause rusting.
4. Do not clean the surface with chlorine cleanser (bleach, dish detergent, hydrochloric acid etc.). Do not clean the floor where the device locates with corrosive substance.
5. Do not change the burner shutter settings.
6. Accumulation of substances containing salt or acidic ingredients, e.g., vinegar, lemon juice, spices, salt etc. can cause corrosion. Please do not allow these substances to have long contact with the unit.
7. After cleaning, ensure that the ports of the burners are open and clear of any residue.
8. Clean cast iron top grates with a mild soap and water solution. Rinse thoroughly and dry with a clean towel. Immediately after drying, season grates lightly with liquid vegetable oil. After seasoning, replace grates on range and turn burners on LOW, allow grates to heat for 15 minutes before using pots or pans on the range top. Failure to season grates after cleaning will result in rust.
9. If the range sits idle for a significant period, please turn off the gas valve upstream the range.

## TROUBLESHOOTING

Problem	Possible Causes	Solution
The pilot flame can't be ignited	The gas pressure is too low	Adjust the relieve valve to increase pressure
The pilot flame can't be ignited	The nozzle is clogged	Unclog the nozzle
The pilot flame can't be ignited	Connection of the thermocouple is loose	Tighten the thermocouple
The pilot flame can't be ignited	The thermocouple is defective	Replace the thermocouple

Problem	Possible Causes	Solution
The pilot flame can't be ignited	The gas control valve is malfunctioning	Replace the gas control valve
The pilot flame is on, but the main burner can't be ignited	The gas pressure is too low	Adjust the relieve valve to increase pressure
The pilot flame is on, but the main burner can't be ignited	The main burner nozzle is clogged	Unclog the nozzle
The pilot flame is on, but the main burner can't be ignited	The gas control valve is defective	Replace the gas control valve
Problem	Possible Causes	Solution
It has a light back sound when the gas supply is turned off	Wrong orifice size for the gas supply	Install proper orifice
It has a light back sound when the gas supply is turned off	The air shutter is too open	Adjust the damper
It has a light back sound when the gas supply is turned off	Gas pressure too low	Increase the gas pressure
It has a light back sound when the gas supply is turned off	Gas pressure too low	Increase the gas pressure
Problem	Possible Causes	Solution
It has a yellow flame and black smoke	Wrong orifice size for the gas supply	Install proper orifice
It has a yellow flame and black smoke	The air shutter is closed too far	Adjust the air shutter
It has a yellow flame and black smoke	Running out of gas/propane	Replace tank/ increase gas
It has a yellow flame and black smoke	High elevation	Install proper orifices for elevation
It has a yellow flame and black smoke	Bad air/gas mixture	Increase air flow/gas to the unit

MODEL	STYLE	Electric rating	Open burner	Oven	Griddle/Broiler
PT-RGR36C	6 burners with convection oven	120VAC, 60HZ	30,000BTU/pc*6	31,000BTU/pc	N/A



Patriot warrants its equipment against defects in materials and workmanship, subject to the following conditions:

Patriot gas equipment is warranted for two (2) years, effective from the date of purchase by the original owner. A copy of the original receipt or other proof of purchase is required to obtain warranty coverage. This warranty applies to the original owner only, and is not assignable.

The stainless steel fry tank has a five (5) year limited tank warranty. If during the first year, the tank is found to have a leak and is verified by an authorized service company, the entire fryer will be replaced. During years two through five, a new tank will be given.

Should any product fail to function in its intended manner under normal use within the limits defined in this warranty, at Patriot's discretion, such product will be repaired, replaced with a refurbished unit, or replaced with a new unit by Patriot, after defective unit has been inspected and defect has been confirmed. Patriot does not assume any liability for extended delays in replacing any item beyond its control. This warranty does not apply to rubber and non-metallic synthetic parts that may need to be replaced due to normal usage, wear or lack of preventative maintenance.

This warranty covers products shipped into the 48 contiguous United States, Hawaii, and metropolitan areas of Alaska and Canada. Warranty coverage on products used outside the 48 contiguous United States, Hawaii and metropolitan areas of Alaska and Canada may vary.

The following conditions are not covered by warranty:

- Equipment failure relating to improper installation, improper utility connection or supply and problems due to improper ventilation.
- Equipment that has not properly been maintained, damage from improper cleaning, and water damage to controls.
- Equipment that has not been used in an appropriate manner, or has been subject to misuse, neglect, abuse, accident, alteration, negligence, damage during transit, delivery or installation, fire, flood, riot, or act of God.
- Equipment that has the model number or serial number removed or altered.
- Equipment on which the security seal has been broken.

If the equipment has been changed, altered, modified, or repaired without express written permission from Patriot, then the manufacturer shall not be liable for any damages to any person or to any property, which may result from the use of this equipment thereafter.

This equipment is intended for commercial use only and this warranty is void if equipment is used in other than a commercial application.

For warranty issues and technical support call Patriot Cooking at 888-585-9440. Please have your model number, serial number and proof of purchase ready. For non-warranty related issues call 800-458-5593.

"THE FOREGOING WARRANTY IS IN LIEU OF ANY AND ALL WARRANTIES EXPRESSED OR IMPLIED INCLUDING ANY IMPLIED WARRANTY OF MERCHANTABILITY OR FITNESS FOR PARTICULAR PURPOSES AND CONSTITUTES THE ENTIRE LIABILITY OF PATRIOT. IN NO EVENT DOES THE LIMITED WARRANTY EXTEND BEYOND THE TERMS STATED HEREIN."

**Please register your product online at [Patriotcooking.com](http://Patriotcooking.com)**

