







Before You Begin

INSTALLERS - Start Here

Safety Instructions are on pages 4 to 10 and Installation Instructions are on pages 11 to 23.

Please perform these steps:

- 1. Read the safety instructions.
- 2. Read all instructions in the Installation section of this manual BEFORE installing the appliance.
- 3. Remove all packing materials from the oven before connecting the gas supply.
- 4. Observe all governing codes and ordinances.
- 5. When finished, make sure to leave these instructions with the consumer.
- 6. Installation is only to be done by a qualified technician, but ultimately proper installation is the responsibility of the installer.
- 7. Product failure due to improper installation is not covered under the Warranty.

CONSUMERS - Start Here

Safety Instructions are on pages 24 to 25 and Operating Instructions are on pages 26 to 33.

Please perform these steps:

- 1. Read the safety instructions.
- 2. Read all instructions in the manual BEFORE operating the appliance.
- 3. Remove all packing materials from the oven before using.
- 4. Observe all governing codes and ordinances.
- 5. Installation is only to be done by a qualified technician, but ultimately proper installation is the responsibility of the installer.
- 6. Product failure due to improper installation is not covered under the Warranty.





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Important Safety Information

READ ALL INSTRUCTIONS BEFORE USE

Read and follow all instructions before using your oven to prevent the risk of fire, electric shock, personal injury, or damage when using the appliance. This guide does not cover all possible conditions that may occur. Always contact your service technician or manufacturer about problems that you do not understand.



DANGER: When you see this symbol in the instructions, it indicates a hazardous situation which, if not avoided, could result in death or serious injury.



WARNING: When you see this symbol in the instructions, it indicates a hazardous situation which, if not avoided, could result in minor or moderate injury.

WHAT TO DO IF YOU SMELL GAS



- Open all windows starting with those closest to the appliance.
- DO NOT try to light any appliance.
- DO NOT touch any electrical switch or outlet.
- DO NOT use any phone in your home/building.
- Immediately call your gas supplier from a neighbor's phone. Follow the gas supplier's instructions.
- If you cannot reach your gas supplier, call the fire department.

INSTALLATION



- Remove all tape and packaging before using the appliance. Never allow children to play with packaging material.
- Dispose the carton and plastic bags after the appliance is unpacked. Cartons covered with rugs, bedspreads, or plastic sheets can become air-tight chambers.
- Remove all staples from the carton. Staples can cause severe cuts and destroy finishes if they come in contact with other appliances or furniture.
- Do not remove the model/serial plate attached to the appliance.
- Be sure your appliance is properly installed and grounded by a QUALIFIED TECHNICIAN in accordance with all local codes and ordinances and with the National Fuel Gas Code ANSI Z223.1—latest edition and the National Electrical Code ANSI/NFPA No. 70—latest edition in United States, or CAN/CGA B149.1, B149.2, and the Canadian Electrical Code, Part 1, in Canada.

WARNINGS

- Do not store or use gasoline, liquid propane cylinder or other flammable vapors and liquids in the vicinity of this or any other appliance.
- Gas leaks cannot always be detected by smell.
- Gas suppliers recommend that you use a gas detector approved by UL or CSA. For more information, contact your gas supplier.
- If a gas leak is detected, follow the "What to do if you smell gas" instructions on the previous page.
- Installation and service must be performed by a qualified installer, servicer or the gas supplier. Ask your dealer to recommend a qualified technician and an authorized repair service. Know how to shut off gas supply at the meter and disconnect the electrical power to the appliance at the circuit breaker or fuse box in case of an emergency. Have the installer show you the location of the appliance gas shut-off valve and how to shut it off if necessary.
- Do not repair or replace any part of the appliance unless specifically recommended in this manual. All other servicing should be done only by a qualified technician. This may reduce the risk of personal injury and damage to the appliance.
- **Proper Installation**: The appliance, when installed, must be electrically grounded in accordance with local codes or, in the absence of local codes, with the National Electrical Code, ANSI/NFPA 70. In Canada, the appliance must be electrically grounded in accordance with Canadian Electrical Code. Be sure the appliance is properly installed and grounded by a qualified technician.
- Disconnect power before servicing.
- Never modify or alter the construction of the appliance by removing panels, wire covers or any other part of the product.
- Injuries may result from the misuse of appliance doors such as stepping, leaning, or sitting on the doors.
- Overhead range hoods, which operate by blowing a downward air flow on to the appliance, shall not be used in conjunction with gas appliances other than when the hood and appliance have been designed, tested and listed by an independent test laboratory for use in combination with each other.
- If appliance is located near a window, NEVER hang long curtains or paper blinds on that window. They could blow over the surface burners and ignite, causing a fire hazard.

- Ensure that the room is well ventilated by keeping the air intakes open and in good working order or by installing an extractor hood with discharge pipe. If the appliance is used intensively for a long time the effectiveness of the ventilation will have to be increased, for example by opening a window or increasing the power of any electric extractor fan.
- Flammable materials should not be stored on the appliance or near surface units. This includes paper, plastic and cloth items, such as cookbooks, plastic ware and towels, as well as flammable liquids. Do not store explosives, such as aerosol cans, on or near the appliance. Flammable materials may explode and result in fire or property damage.
- **Maintenance:** Keep appliance area clear and free from combustible materials, gasoline, and other flammable vapors and liquids.
- **Storage in or on the appliance**: Flammable materials should not be stored in an oven or near surface units.

IN THE STATE OF MASSACHUSETTS, THE FOLLOWING INSTALLATION INSTRUCTIONS APPLY:

- Installations and repairs must be performed by a qualified or licensed contractor, plumber, or gas-fitter qualified or licensed by the State of Massachusetts.
- If using a ball valve, it shall be a T-handle type.
- A flexible gas connector, when used, must not exceed three feet.

STATE OF CALIFORNIA PROPOSITION 65 WARNINGS:

- The California Safe Drinking Water and Toxic Enforcement Act requires the Governor of California to publish a list of substances known to the state to cause birth defects or other reproductive harm and requires businesses to warn customers of potential exposure to such substances.
- Gas appliances can cause minor exposure to three of these substances, namely, carbon monoxide, formaldehyde and soot, caused primarily by the incomplete combustion of natural gas or LP fuels. Properly adjusted burners, indicated by a bluish rather than yellow flame, will minimize incomplete combustion. Exposure to these substances can be minimized by venting with an open window or by using a ventilation fan or hood.

Important Safety Information

DANGER

- Do not store items of interest to children in the cabinets above the appliance or on the back splash of appliance. Children should not be left alone or unattended in the area where appliance is in use. Do not allow children to climb or play around the appliance. They should never be allowed to sit or stand on any part of the appliance. Children climbing on the appliance to reach items could be seriously injured.
- DO NOT TOUCH THE COOKING SURFACE, THE BURNERS, GRATES, OR ANY AREAS NEAR THEM. Surface burners or appliance may be hot even though flames are not visible. Areas near surface burners or appliance may become hot enough to cause burns. During and after use, do not touch, or let clothing or other flammable materials touch these areas until they have had sufficient time to cool.
- Do not wear loose-fitting or hanging garments while using the appliance. Do not let clothing or other flammable materials contact hot surfaces.
- Smother grease fires with a pan lid, or use baking soda, a dry chemical or foam-type extinguisher.
- Use an extinguisher ONLY if:
 - You know you have a Class A, B or C extinguisher, and you already know how to operate it.
 - The fire is small and contained in the area where it is started.
 - The fire department is being/has been called.
 - You can fight the fire with your back to an exit.
- When heating fat or grease, watch it closely. Fat or grease may catch fire if allowed to become too hot.
- Use only dry potholders. Moist or damp potholders on hot surfaces may result in burns from steam. Do not let potholders touch hot heating elements, the flame or burners. Do not use a towel or other bulky cloth instead of a potholder.
- Do not heat unopened food containers. Buildup of pressure may cause the container to burst and result in injury.
- Stepping, leaning or sitting on this appliance can result in serious injuries and also cause damage to the appliance.
- Never use this appliance as a space heater to heat or warm the room. Doing so may result in carbon monoxide poisoning and overheating.
- Know which knob controls which surface burner. Visually check that the burner has lit. Then adjust the flame so it does not extend beyond the edge of the pot/pan.

- Clean the appliance regularly to keep all parts free of grease that could catch fire. Exhaust fan ventilation hoods and grease filters should be kept clean. Do not allow grease to accumulate on hood or filter. Greasy deposits in the fan could catch fire. When cooking food, turn the hood fan on. Refer to hood manufacturer's instructions for cleaning.
- Pot/pan handles should be turned inward and not extend over adjacent surface burners. To reduce the risk of burns, ignition of flammable materials, and spillage due to unintentional contact with the pot/pan, the handle of the utensil should be positioned so that it is turned inward, and does not extend over adjacent surface burners.
- Never leave surface burners unattended at high heat settings. Boilovers cause smoke and greasy spillovers that may ignite, or a pan that has boiled dry may melt.
- Do not use aluminum foil to line any part of the appliance. Use aluminum foil only to cover food during cooking. Improper installation of these liners may result in risk of electric shock or fire.
- Only certain types of glass, glass/ceramic, ceramic, earthenware, or other glazed utensils are suitable for appliance service without breaking due to the sudden change in temperature. Check the manufacturer's recommendations for appliance use.
- Do not use decorative surface burner covers. If a burner is accidentally turned on, the decorative cover will become hot and possibly melt. You will not be able to see that the burner is on. Burns will occur if the hot covers are touched. Damage may also be done to the appliance or burners because the covers may cause overheating. Air will be blocked from the burner and cause combustion problems.
- Always use proper flame size. Adjust flame size so it does not extend beyond the edge of the pot/pan. The use of undersized pots/pans will expose a portion of the burner flame to direct contact and may result in ignition of clothing. Proper relationship of pot/pan to flame will also improve efficiency.
- Top burner flame size should be adjusted so it does not extend beyond the edge of the cooking utensil.

CALIFORNIA PROPOSITION 65 WARNING:

This product contains a chemical known to the state of California to cause cancer, or birth defects or other reproductive harm.

DANGER

- Use the proper pot/pan sizes. This appliance is equipped with surface units of different sizes. Select pots/pans having flat bottoms large enough to cover the surface unit. The use of undersized utensils will expose a portion of the surface heating unit to direct contact and may result in ignition of clothing. Proper relationship of utensil to the surface unit will also improve efficiency.
- Do not use stove top grills on your gas appliance. If you use a stove top grill on a sealed gas burner, it will cause incomplete combustion and can result in exposure to carbon monoxide levels above allowable current standards. This can be hazardous to your health.
- Remove all packaging materials from the appliance before operating it. These materials can ignite, causing smoke and/or fire damage.

TIPPING DANGER

- TIPPING RANGES CAN CAUSE SERIOUS PERSONAL INJURY OR DEATH.
- TO REDUCE THE RISK OF TIPPING OF THE RANGE, THE RANGE MUST BE SECURED WITH A PROPERLY INSTALLED ANTI-TIP DEVICE.
- FAILURE TO PROPERLY INSTALL THE ANTI-TIP BRACKET COULD RESULT IN THE DEATH OF A CHILD OR ADULT.



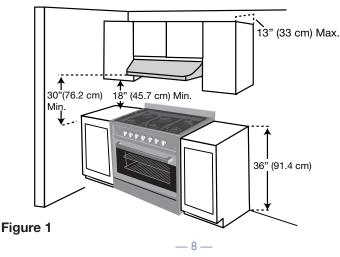
- To check if the device has been properly installed, slide range forward, look for anti-tip bracket securely attached to floor or wall then slide range back so rear range foot is under anti-tip bracket.
- Carefully pull on the range from the rear. If the bracket is installed correctly, the range will not tip more than 4 inches from the wall. If it tips forward more than 4 inches, the anti-tip device has not been has not been installed correctly.
- CAUTION: DO NOT TIP THE RANGE MORE THAN 4 INCHES FROM THE WALL AS IT COULD TIP OVER AND CAUSE INJURY.
- If the range is pulled from the wall for any reason, always repeat this procedure to verify the range is properly secured by the anti-tip bracket.
- Never completely remove the leveling legs or the range will not be secured to the anti-tip device properly.
- NEVER step or sit on the door.
- The range will not tip during normal use. However, without a properly fastened anti-tip bracket, the range can tip if too much force or weight is applied to the open door.
- Do not operate the range without the anti-tip bracket in place.
- Before removing label, ensure anti-tip bracket is properly installed.
- See page 22 for instructions on how to install the Anti-Tip Bracket.

Important Safety Information

VENTILATION WARNINGS

- The appliance should have proper ventilation in order to keep the unit operating properly and maintain the temperature of immediate surroundings within safe limits. Check your local building codes as they may vary from the general rules outlined in this guide.
- Observe all governing codes and ordinances. Do not obstruct flow of combustion and ventilation air.
- It is the installer's responsibility to comply with installation clearances specified on the model/serial rating plate.
- For proper operation of a gas appliance, the air necessary for the combustion of the gas must be able to flow into the room naturally. The air must flow into the room directly through openings in the outside walls. These openings must have an unobstructed crosssection not less than 2m3/h for each kw of power (see total power in kw on the appliance).
- This opening must be constructed so that it will not be obstructed from inside or outside, and not be constructed close to the floor. The opening is recommended to be on the side opposite to that on which the flue gases are discharged.
- The appliance should be located for convenient use in the kitchen.
- Recessed installations must provide complete enclosure of the sides and rear of the range.
- It is recommended that the unit be operated with an oven head, vented exhaust hood of sufficient size and capacity.
- To eliminate the risk of burns or fire by reaching overheated surface units, cabinet storage space located above the surface units should be avoided. If cabinet storage is to be provided, the risk can be reduced by installing a range hood or microwave hood combination with minimum 600 CFM that projects horizontally a minimum of 5" (12.7 cm) beyond the bottom of the cabinets.

- If a range hood is installed above the appliance, maintain a 30" minimum clearance between cooking surface and bottom of range hood. The range hood must be connected directly to flues or to the outside.
- Avoid placing cabinetry directly above the appliance when possible. If cabinetry is used above the cooking surface, use cabinets no more than 13" deep. Make sure the wall coverings, countertop and cabinets around the appliance can withstand heat up to 200° F (93°C) generated by the appliance.
- Cabinet opening dimensions that are shown must be used. Given dimensions are minimum clearances.
- Working areas adjacent to the appliance should have 18" minimum clearance between countertop and cabinet bottom (see Figure 1).
- All openings in the wall or floor where appliance is to be installed must be sealed.
- Contact a qualified floor covering installer to check that wall coverings, countertops and cabinets around the appliance can withstand at least 200°F (93°C).
- Use an insulated pad or 1/4" (0.64 cm) plywood under range if installing range over carpeting.
- The floor anti-tip bracket must be installed. To install the anti-tip bracket shipped with the range, see "Install Anti-Tip Bracket" section on page 22.
- Grounded electrical supply is required. See "Connect to AC" section on page 22, as well as the safety precautions on page 10.
- Proper gas supply connection must be available. See "Gas Connection" section on pages 17 and 18, as well as the safety precautions on page 9.
- It is the responsibility of the installer to make certain that the appliance is properly adjusted at the time of installation. Situations caused by improper adjustments or improper installation are not covered under the warranty.





INSTALLATION WARNINGS

To avoid damage to your cabinets, check with your builder or cabinet supplier to make sure that the materials used will not discolor, delaminate or sustain other damage.

MOBILE HOME - ADDITIONAL INSTALLATION REQUIREMENTS:

The installation of this appliance must conform to the Manufactured Home Construction and Safety Standard, Title 24 CFR, Part 3280 (formerly the Federal Standard for Mobile Home Construction and Safety, Title 24, HUD Part 280).

When such standard is not applicable, use the Standard for Manufactured Home Installations, ANSI A225.1/NFPA 501A, ANSI A119.2.2–1982, or with local codes.

In Canada, the installation of this range must conform with the current standards CAN/CSA-A240-latest edition, CAN/CGA Z240.4.2, or with local codes.

MOBILE HOME INSTALLATIONS REQUIRE:

When this range is installed in a mobile home, it must be secured to the floor during transit. Any method of securing the range is adequate as long as it conforms to the standards listed above.

The installation of appliances designed for recreational park trailers must conform with state or other codes or, in the absence of such codes, with the standard for recreational park trailers, ANSI A119.5.

GAS DANGER



- Explosion hazard conditions will exist unless you perform ALL of the following:
- Use a new CSA International approved gas supply line.
- Install a shut-off valve. .
- Securely tighten all gas connections.
- If connected to LP, have a gualified person make sure gas pressure does not exceed 10" (25 cm) (range tops)/14" (36 cm) (ranges) water column.
- Examples of a qualified person include: •
 - Licensed heating personnel
 - Authorized gas company personnel
 - Authorized service personnel

Failure to do so can result in death, explosion, or fire.

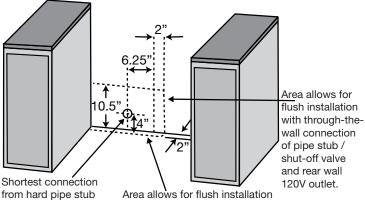
Observe all governing codes and ordinances.

IMPORTANT: This installation must conform with all local codes and ordinances. In the absence of local codes, installation must conform with American National Standard, National Fuel Gas Code ANSI Z223.1 / NFPA 54. - latest edition, or CAN/CGA B149 - latest edition. In Canada, installation must conform to the current natural Gas Installation /code, CAN 1-1.1-M81 and with local codes where applicable. This appliance has been designcertified according to ANSI Z21.1b-201 latest edition. A statement of the maximum gas supply pressure in accordance with the inlet pressure rating of the gas appliance pressure regulator supplied.

IMPORTANT: Leak testing of the appliance must be conducted according to the manufacturer's instructions.

The appliance should be connected to the supply line with 1/2-inch black iron pipe or a certified flexible type stove connector. To prevent gas leaks, put an approved sealing compound which is resistant to liquefied petroleum gases on all threaded connections.

Gas supply should be located near the opening for this appliance (see Figure 2, ranges only):



with through-the-floor connection location to range of pipe stub / shut-off valve.

Figure 2

Types of Gas

NATURAL GAS:

hook-up.

- This appliance is designed for use with Natural gas or, after proper conversion, for use with LP gas.
- This appliance is factory set for use with Natural gas. The • model/serial rating plate has information on the types of gas that can be used. If the types of gas listed do not include the type of gas available, check with the local gas supplier.

LP GAS CONVERSION:

- Conversion must be done by a qualified service technician.
- No attempt shall be made to convert the appliance from the gas specified on the model/serial rating plate for use with a different gas without consulting the serving gas supplier.

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Important Safety Information



GAS CONNECTIONS (All Units)

Important: Do not apply pressure directly to the appliance manifold pipe when tightening supply connections. The manifold pipe should be held securely at the pressure regulator to prevent twisting. Hold the pressure regulator with a wrench during the tightening of the connection, or the manifold pipe may be twisted and split and cause a dangerous leak.

Note: Check all piping connections in the unit for leaks. Never use an open flame to check for gas leaks. Use a soap solution, 75% water, 25% dish washing soap. It is possible for connections made at the factory to leak, due to vibration encountered in transportation. Make certain you have checked them all, and repair any connections that leak.

- The appliance and its individual shut-off valve must be disconnected from the gas supply piping system during any pressure testing of that system at test pressures in excess of 1/2 psig.
- The appliance must be isolated from the gas supply piping system by closing its individual manual shut-off valve during any pressure testing of the gas supply piping system at test pressures equal to or less than 1/2 psig.

ELECTRICAL DANGER

Electrical Shock Hazard.

Do not use an extension cord.

Failure to follow these instructions can result in death, fire, or electrical shock.

- Any additions, changes or conversions required in order for this appliance to satisfactorily meet the application needs must be made by a qualified service technician in accordance with the manufacturer's instructions and all codes and requirements of the authority having jurisdiction. Failure to follow the instructions could result in serious injury or property damage. The qualified agency performing this work assumes responsibility for the conversion.
- DO NOT operate this appliance using a 2-prong adapter or an extension cord. If a 2-prong wall receptacle is the only available outlet, it is the personal responsibility of the consumer to have it replaced with a properly grounded 3-prong wall receptacle installed by a qualified electrician.
- Severe shock, or damage to the range may occur if the appliance is not installed by a qualified installer or electrician.
- This appliance is 120V/60Hz. It is recommended to connect to a 15-Amp or 20-Amp power supply.

GAS LINE SHUT-OFF VALVE

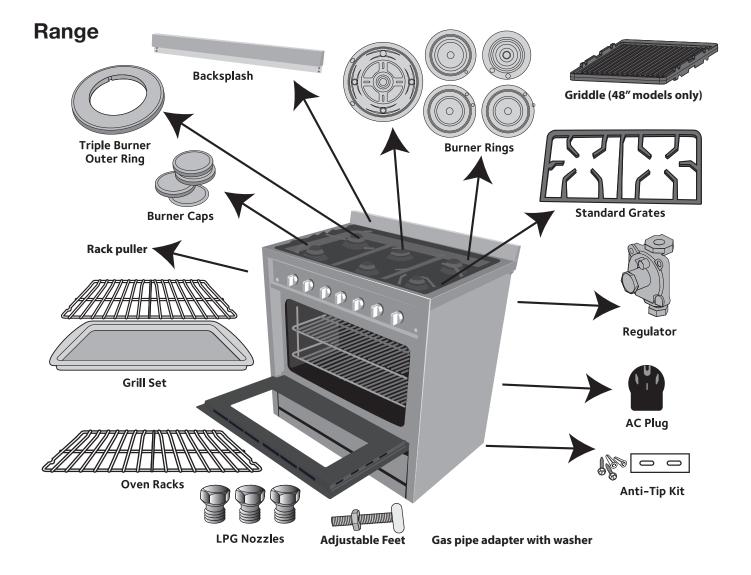
- To reduce the possibility of gas leaks, apply Teflon tape or a thread compound approved for use with LP or Natural gases to all threaded connections.
- Install a manual gas line shut-off valve in the gas line in an easily accessed location outside the range in the gas piping external to the appliance for the purpose of turning on or shutting off gas to the appliance.
- Install male 1/2" (30- or 36-inch range top) or 3/4" (48 inch range top) flare union adapter to 1/2" or 3/4" NPT internal thread elbow at inlet of regulator. Use a wrench on the regulator fitting to avoid damage.
- Install male 1/2" or 3/4" flare union adapter to the NPT internal thread of the manual shut-off valve, taking care to secure the shut-off valve to keep it from turning.

- Total Input Power is 14.1 kW (AN-2160), 20.8 kW (AN-2161), 27.5 kW (AN-2162), 3 A for range tops. Total Input Power is 23.4 kW (AN-2230SS), 30.2 kW (AN-2236SS), 41.1 kW (AN-2248SS), 5 A for ranges. A dedicated circuit, protected by a minimum 15 to 20-amp time delay fuse or circuit breaker is required.
- For personal safety, the appliance must be properly grounded.
- The power supply must be the correct polarity. Reverse polarity will result in continuous sparking of the electrodes, even after flame ignition. If there is any doubt as to whether the power supply has the correct polarity or grounded, have it checked by a qualified electrician.

WARNINGS:

- Electrical Grounding Instructions: this indoor gas cooking appliance is equipped with a three-prong (grounding) plug for your protection against shock hazard and should be plugged directly into a properly grounded three-pronged receptacle.
- Do not cut or remove the grounding prong from the plug.
- Caution: label all wires prior to disconnection when servicing controls. Wiring errors can cause improper and dangerous operation. Verify proper operation after servicing.

— 10 —



Installation

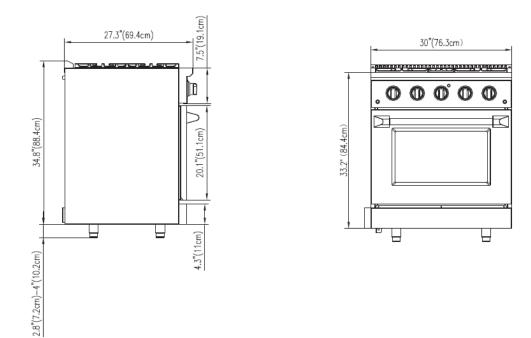
Tools and Additional Parts Needed

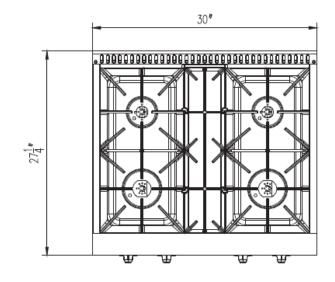


Noncorrosive leak-detection solution

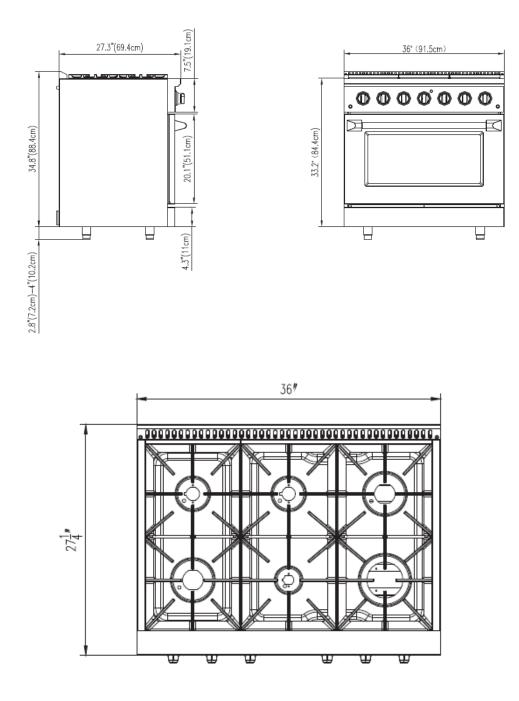
Range Dimensions

EMPV-30GR07





EMPV-36GR08



The use of cabinets for storage above the appliance may result in a potential fire hazard. Combustible items may ignite; metallic items may become hot and cause burns. If a cabinet storage is to be provided, the risk can be reduced by installing a range hood that projects horizontally a minimum of 5" (12.7 cm) beyond the bottom of the cabinets.

GAS RANGE TOP SPECIFICATIONS

Installation

Note: Minimum clearance for back wall is 0" with backsplash (backguard) or high shelf.

- If a range hood is installed above the range top, maintain a 30" (76.2 cm) minimum clearance between the range top and the bottom of the range hood.
- The range top should only be used with ducted range hoods.
- For best smoke elimination, the minimum clearance of the range hood should be installed 30" to 36" above the range top surface. Recommended CFM should be 600 CFM for the 30" range top.
- Do not install with a downdraft ventilation system.

The range top CANNOT be installed directly adjacent to sidewalls, tall cabinets, tall appliances, or other side vertical surfaces above 36" (91.4 cm) high. There must be a minimum of 6" (15.2 cm) side clearance from the range top to such combustible surfaces above the 36" (91.4 cm) counter height.

• Within the 6" (15.2 cm) side clearance to combustible vertical surfaces above 36" (91.4 cm), the maximum wall cabinet depth must be 13" (33.0 cm) and wall cabinets within this 6" (15.2 cm) side clearance must be 18" (45.7 cm) above the 36" (91.4 cm) high countertop.

WARNING: /

- Items of interest to children should not be placed in cabinets above the cooktop.
- Children climbing on the cooktop to reach items could be seriously injured.

Installation in an island

Note: There must be a minimum of 6" (15.2 cm) clearance from rear of range top to a combustible wall. Clearances from non-combustible materials are not part of the ANSI Z21.1 scope and are not certified by CSA. Clearances to non-combustible materials must be approved by the authority having jurisdiction.

• This range top may be installed directly adjacent to existing 36" (91.4 cm) high base cabinets.

GAS RANGE SPECIFICATIONS

- Before installing the range, you must locate and secure the included anti-tip bracket to the wall for your range.
- The range may be installed flush to the rear wall. You may install a non-combustible material on the rear wall above the range and up to the vent hood. It is not necessary to install non-combustible materials behind the range below the countertop height.
- The minimum distance from the side of the range above the countertop to combustible sidewalls must be at least 10 inches.

Installation

STEP 1

Read the Safety Precautions

Please read the safety precautions on pages 4 to 10. Safety instructions pertaining to each step have been outlined in the installation steps; however it is important to read **ALL** the safety instructions.

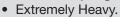
IMPORTANT: It is the installer's responsibility to comply with installation clearances.

STEP 2

Plan Desired Location, Unpack the Appliance and Prepare Tools

Plan a desirable location that fits all requirements in the Safety and Install sections of this manual. Unpack the appliance and parts carefully (all burners, burner caps and cooking grates). Make sure all parts are included as shown on page 11 and set aside. Assemble all tools as shown on page 12. DO NOT remove the protective film covering the appliance.

WARNINGS (ranges only):



• Proper equipment and adequate manpower when move the range to avoid personal injury or damage to the unit or the floor. The unit is heavy and rests on adjustable steel legs.

• Failure to follow this advice may result in damage or personal injury.

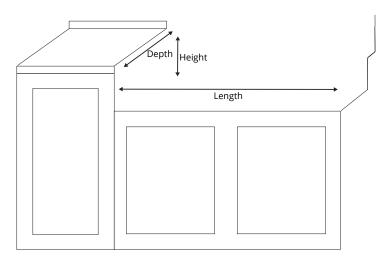
WARNING (ranges only):

STEP 3A (range tops only)

Prepare Cut-Out

Cut the opening in the countertop. To ensure accuracy it is best to make a template (see Figure 5) for the opening. Make sure the sides are parallel also rear and front cuts are exactly perpendicular to the sides. Observe all minimum clearances.

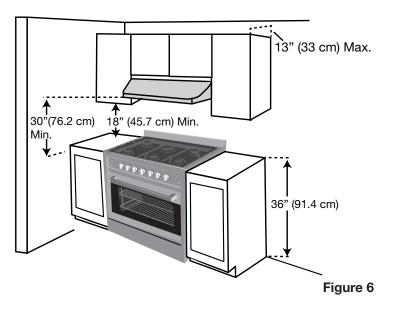
- AN-2160 / 30-inch models (Length × Depth × Height): 30.5" × 26" × 7.5" (77.5 cm × 66 cm × 19.1 cm)
- AN-2161 / 36-inch models (Length × Depth × Height): 36.5" × 26" × 7.5" (92.7 cm × 66 cm × 19.1 cm)
- AN-2162 / 48-inch models (Length × Depth × Height): 48.5" × 26" × 7.5" (123.2 cm × 66 cm × 19.1 cm)



STEP 3B (ranges only)

Dimensions and Clearances

- Before installing the range, you must locate and secure the included anti-tip bracket to the wall for your range.
- The range may be installed flush to the rear wall. You may install a non-combustible material on the rear wall above the range and up to the vent hood. It is not necessary to install non-combustible materials behind the range below the countertop height.
- The minimum distance from the side of the range above the countertop to combustible sidewalls must be at least 10 inches.



STEP 4

Gas Connection

Range Tops:

This range top is designed to operate at a pressure of 4" of water column on natural gas or 10" of water column on propane gas (LPG).

This range top can be converted for use on Liquid propane gas (LPG). When using this range top on LPG gas, conversion must be made by a qualified installer before attempting to operate the range top on that gas.

For correct operation, the pressure of natural gas supplied to the regulator should be between 4" and 5" of water column. For LP gas, the pressure supplied must be between 10" and 12" of water column.

When checking for correct operation of the regulator, the inlet pressure must be at least 1" more than the operating manifold pressure as given above.

Ranges:

For NG, input pressure is 7" W.C. and output pressure 5" W.C.

For LP, input pressure is 11" W.C. and output pressure: 10" W.C.

Appliance regulator is set at 5.0" W.C. outlet pressure.

The gas supply pressure for checking the regulator setting is 5" (Natural Gas) and 10" (LP gas). Connect flexible gas line connector to the regulator on the range. Position range to permit connection at the shut off valve.

DANGER:

The gas supply line must be equipped with an approved manual shut-off valve. The shut-off valve must be in an easily accessible location in the same room as the appliance. Do not block access to the shut-off valve. Be sure you know how and where to shut off the gas supply to the range.

Installation

STEP 4 (Continued)

Gas Connection

The pressure regulator located at the inlet of the appliance manifold must remain in the supply line regardless of Natural (NG) or Liquid Propane (LP) gas is being used.

A flexible metal appliance connector used to connect the appliance to the gas supply should be 3 feet/91.4 cm max. in length for easy installation. In Canada, flexible connectors should be single wall metal connectors less than 6 feet/182.9 cm in length.

WARNINGS:

- Please make sure to read ALL safety precautions on pages 4 to 10.
- Explosion Hazard.
- Use a new CSA International approved gas supply line.
- Install a shut-off valve.
- Securely tighten all gas connections.
- If connected to LP, have a qualified person make sure gas pressure does not exceed 12" (30 cm) water column. Examples of a qualified person include: licensed heating personnel, authorized gas company personnel, and authorized service personnel.
- Failure to do so can result in death, explosion, or fire.

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Shut off the main gas supply valve before removing the old cooking appliance (if applicable) and leave it off until the new hook-up has been completed. Don't forget to relight the pilots on other gas appliances when you turn the gas back on.



Because hard piping restricts movement of the appliance, the use of a CSA certified flexible metal appliance connector is recommended unless local codes require a hard-piped connection. Never reuse an old connector when installing a new appliance. If the hard piping method is used, you must carefully align the pipe.

To prevent gas leaks, use pipe joint compound resistant to NG gases on all male external pipe threads.



Use a flexible gas line to connect to the 1/2" fitting, located on the bottom right hand corner underneath the appliance.



When all connections have been made, be sure all appliance controls are in the off position and turn on the main gas supply valve. Check for gas leaks by using a 75% water,

by using a 75% water, 25% dish washing soap solution. If a gas leak occurs, shut off gas immediately, tighten all connections, and retest for leaks.

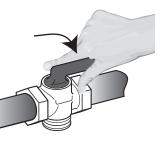


Figure 7

DANGER:

- Please make sure to read ALL safety precautions on pages 4 to 10.
- Do not use a flame to check for leaks from gas connections. Checking for leaks with a flame may result in a fire or explosion.
- Tighten all connections if necessary to prevent gas leakage in the appliance or supply line.
- Check alignment of control knob valves after connecting the appliance to the gas supply to be sure the appliance manifold pipe has not moved. A misalignment could cause the valve stems to rub on the control panel, resulting in a gas leak at the valve.
- Disconnect this appliance and its individual manual shut-off valve from the gas supply piping system during any
 pressure testing of that system at test pressures in excess of 1/2 psi (3.5 kPa or 12" water column).
- Isolate the appliance from the gas supply piping system by closing its individual manual shut-off valve during any pressure testing of the gas supply piping system at test pressures equal to or less than 1/2 psi (3.5 kPa or 12" water column).

STEP 5 (Optional)

(Must be done before Step 6 if converting to Propane)

Liquefied Petroleum (Propane) Gas Conversion

This appliance can be used with Natural Gas or LP/Propane Gas. It is shipped from the factory for use with Natural Gas. A kit for converting to LP gas is supplied with your appliance. The kit is marked "FOR LP/PROPANE GAS CONVERSION".

- Please make sure to read ALL safety precautions on pages 4 to 10.
- Failure to make the appropriate conversion after Step 4 can result in serious personal injury and property damage.
- The conversion must be performed by a qualified service technician in accordance with the kit instructions and all local codes and requirements. Failure to follow instructions could result in serious injury or property damage. The qualified agency performing this work assumes responsibility for the conversion.

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When the appliance is converted for Liquid Petroleum (LP) Gas, the LP gas supply is required to provide a minimum of 10" to a maximum of 12" water column to

the appliance regulator. Following LP Gas Conversion, complete steps: "Adjusting the Regulator Pressure"; "Changing Burner Nozzles"; "Adjusting Burner Flames"; and "Testing Flame Stability".

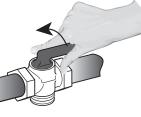


Figure 8

Adjusting the Regulator Pressure



Shut off the gas supply to the appliance by closing the manual shut-off valve (see Figure 8). Disconnect electrical power to the appliance before servicing. Do not remove regulator or allow it to turn during servicing.





Unscrew the regulator cap with a wrench (see Figure 9).



Remove retainer pin by pulling it out (see Figure 10).



Figure 10



Reverse the retainer pin and snap it back into the regulator cap (see Figure 11)



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Figure 11
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Screw the regulator cap back into the regulator and re-attach it to the nipple and flare union as shown. DO NOT over-tighten (see Figures 12 and 13).

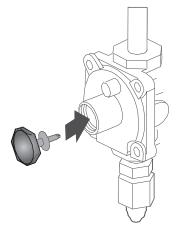
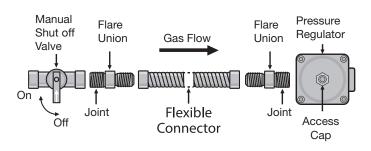


Figure 12



STEP 5 (Continued)

Liquefied Petroleum (Propane) **Gas Conversion**

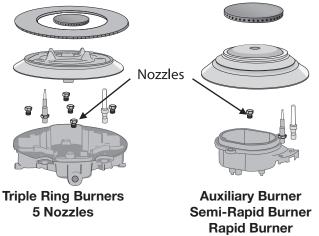
Changing Burner Nozzles

INSTALLATION TIP: To prevent any omissions, remove ALL existing Natural Gas nozzles before replacing them with the LP nozzles.

Remove the burner grates, burner caps and burner rings. Using the a 7mm nut driver, remove ALL the existing Natural Gas burner nozzles. Carefully read and observe each nozzle label for correct location (DO NOT force or over-tighten nozzles as doing so will damage the burner base and affect the flame).



Install the proper nozzles in the exact locations as noted in the illustrations below (see Figures 14).



1 Nozzle Each

Figure 14

WARNING:

Save the natural gas orifices removed from the appliance for possible future conversions to natural gas. You should use the following process to convert to Natural gas. Take extra care when handling steel parts.

WARNING:

Care should be taken when removing and replacing gas components. Use proper support to prevent damage to components.

Adjusting the Burner Flames

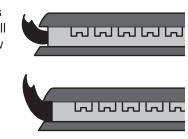
Ensure electricity and gas are switched on. Turn all 11 burners to their highest settings. Flames should be blue in color (LP gas flames may have yellow tips). Foreign particles in the gas line may cause an orange flame at first, but this will soon disappear.



Check each cooktop burner for proper low flame: Push and turn burner knob to Low; the flame size should be 1/4" to 3/8" (0.64 cm to 0.95 cm) high. (See Figure 14)



Set two other burners to "Medium". This will prevent the upper row of flames from being set too low resulting in the flame being extinguished when the other burners are turned on.



A. Low flame B. High flame

Figure 15 To adjust the flame, remove the knobs; insert a 3/32 screwdriver through the access hole to engage the brass slotted screw as shown (See Figure 15). Slowly turn the screw counter-clockwise to lower the flame and clockwise to increase the flame.

Note: If burner does not stay ignited at low setting, return burner knob to "OFF" position then push and turn burner knob to Medium setting and adjust the flame slightly higher. Return burner knob to "OFF" position then re-check flame height at Low setting.

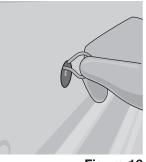


Figure 16

STEP 5 (Continued)

Liquefied Petroleum (Propane) Gas Conversion

Testing Flame Stability



Test 1: Turn a burner knob from High to Low quickly. If the upper row of flames goes out at this setting, increase the flame size and test again. Repeat for all burners.

Test 2: With a burner knob set to Low, open and close the cabinet door under the appliance. If the flame is extinguished by the air currents created by the door movement, increase the flame height and test again. Repeat for all burners.



After the adjustment is made, turn all burners off. Ignite each burner individually. Observe the flame with each burner knob in the High position. Rotate the knob to the lowest setting and make sure that the flame size decreases as the knob is rotated counter-clockwise.

Adjust the height of top burner flames. When a burner knob is set to Low, the burner flame should be a steady blue flame approximately 1/4" (0.64 cm) over burner cap.

Once the conversion has been completed and has passed testing, fill out the conversion sticker and include your name, organization and the date conversion is made. Apply the sticker near the appliance gas inlet opening to alert others in the future that this appliance has been converted. If converting back to Natural Gas, please remove the sticker so others know that the appliance is set to use its original gas.

Installation

STEP 6 (ranges only)

Install Anti-Tip Bracket

To reduce the risk of tipping of the range, the range must be secured to the floor with a properly installed Anti-Tip Bracket (included).

All ranges can tip and cause injuries. Install anti-tip device packaged with range, follow all Installation Instructions.

Failure to install the Anti-Tip Bracket will allow the range to tip over if excessive weight is placed on an open door or if a child climbs upon it. Serious injury might result from spilled hot liquids or from the range itself. If range is ever moved to a different location, the Anti-Tip Bracket must be re-installed. Make sure the anti-tip bracket is installed:



Slide range forward.



Make sure the anti-tip bracket is securely attached to the wall behind the range.



Safely tilt the front of the range upward slightly and move back against wall, Making sure the pin slides under bracket.

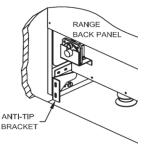


Figure 17

STEP 7

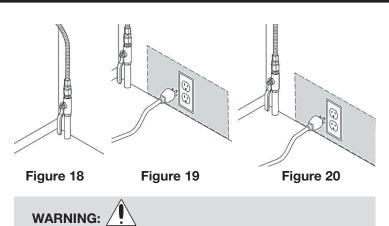
Connect to AC

DANGER:

- Please make sure to read ALL safety precautions on pages 4 to 10.
- Electrical Shock Hazard.
- Do not use an adapter.
- Do not use an extension cord.
- Failure to follow these instructions can result in death, fire, or electrical shock.
- Electrical connection must be performed by a qualified service technician in accordance with the kit instructions and all local codes and requirements.
- The safety circuit-breaker and the electrical system must be able to withstand the load of the appliance. See rating label on back of appliance.
- Rating plate is located on back of appliance should you need to verify any of the electrical requirements.
- The power supply system should have a ground connection in good working order in accordance with the regulations in force.
- The electrical socket must be easily accessible with the appliance installed. In all cases, the power supply lead must be positioned so that it does not reach a temperature of 50°C (122°F) above the room temperature at any point.
- The manufacturer is not liable for any direct or indirect damage caused by faulty installation or connection. It is therefore necessary that all installation and connection operations are carried out by qualified personnel, complying with the local and general regulations in force.

Installation

- The power cord is equipped with a three-prong (grounding) plug which mates with a standard threeprong grounding wall receptacle to minimize the possibility of electrical shock hazard from the appliance.
- All cord connected appliance shall include instructions relative to location of the wall receptacle and a warning to the user to disconnect the electrical supply before serving the appliance.
- Where a standard two-prong wall receptacle is encountered, it is the responsibility and obligation of the customer to have it replaced with a properly grounded threeprong wall receptacle. Do not cut or remove the grounding prong from the power cord.



- Never use reductions, shunts, or adapters which can cause overheating or burning.
- Make sure the AC Supply cable does not come in contact with any parts or components that get hot.

STEP 8A (range tops only)

Finish Installation



Gently slide in the range top half into the cut-out, make sure your gas connection and electrical power plug are properly installed.



Once this is done you're now ready to slide the range top all the way back to the wall.

Install all burners and burner caps.



Install all grates.

STEP 8B (ranges only)

Finish Installation



When all connections have been made, check that all range controls are in the "off" position and turn on the main gas supply valve.



Safety Precautions

Before operating this appliance it is VERY important that you read the safety precautions on pages 4 to 10 as well as all safety precautions listed on this and the following pages with the header, **"Safety Before Operating"**.

- Make sure your appliance is properly adjusted by a qualified service technician or installer for the type of gas (natural or LP) that is to be used. Your appliance can be converted for use with either type of gas. See the installation instructions section in this manual. These adjustments must be done by a qualified service technician according to the manufacturer's instructions and all codes and requirements of the authority having jurisdiction. Failure to follow these instructions could result in serious injury or property damage. The qualified agency performing this work assumes responsibility for the conversion.
- Items of interest to children should not be placed in cabinets above a appliance or on the backsplash of appliance—children climbing on the appliance to reach items could be seriously injured.
- **DO NOT** leave children alone or unattended where appliance is hot or in operation. They could be seriously burned.
- **DO NOT** let anyone climb, stand or hang on the cooktop. They could damage the range or cause it to tip over which could result in severe personal injury.
- NEVER use your appliance as a space heater to heat or warm the room. Doing so may result in carbon monoxide poisoning and overheating of the oven.
- NEVER wear loose fitting or hanging garments while using the appliance. Be careful when reaching for items placed in cabinets over the appliance. Flammable material could be ignited if brought in contact with flame or hot oven surfaces and may cause severe burns.
- **DO NOT** place flammable materials in an oven, a warming drawer or near a cooktop.
- **DO NOT** place or use combustible materials such as gasoline or other flammable vapors and liquids in the vicinity of this or any other appliance.
- **DO NOT** allow cooking grease or other flammable materials in or near the appliance.
- **DO NOT** use water on grease fires. Never touch a flaming pan. Turn the controls off. Smother a flaming pan on a surface burner by covering the pan completely with a well-fitting lid, cookie sheet or flat tray. A grease fire can be put out by covering it with baking soda or, if available, by using a multi-purpose dry chemical or foam-type fire extinguisher. Flame in the upper oven or lower oven drawer can be smothered completely by closing the oven door or drawer and turning the control to off, or by using a

multi-purpose dry chemical or foam-type fire extinguisher.

- Allow the burner grates and other surfaces to cool before touching them.
- NEVER block the vents (air holes) of the appliance. They provide the air inlet and outlet that are necessary for the appliance to operate properly with correct combustion.
- Stepping, leaning or sitting on this appliance can result in serious injuries and also cause damage to the appliance.
 DO NOT allow children to climb or play around the appliance. The weight of a child may cause the appliance to tip, resulting in serious burns or other injury.
- Leak testing of the appliance shall be conducted according to the manufacturer's instructions.
- Make sure your appliance is properly installed and grounded by a qualified installer, according to the installation instructions. Any adjustment and service should be performed only by qualified gas range installers or service technicians.
- To prevent poor air circulation, place the appliance out of kitchen traffic path and out of drafty locations.
- **DO NOT** attempt to repair or replace any part of your appliance unless it is specifically mentioned in this manual.

All other service should be referred to a qualified technician.

- Make sure all packaging materials are removed from the appliance before operating it to prevent fire or smoke damage should the packaging material ignite.
- When cooking, set the burner controls so that the flame heats only the bottom of the utensil and does not overlap at the sides of the utensil.
- Utensils (pots and pans) that conduct heat slowly, i.e. glass pots, should be used in conjunction with burner flames at a low or medium setting.
- Turn off all controls and wait for appliance parts to cool down before touching them. Do not touch the burner grates or surrounding areas until cool.
- Use the appliance only for cooking tasks as outlined in this manual. When using the appliance, do not touch the grates, burner caps, burner bases, or any other parts in proximity to the flame. These components may be hot enough to cause burns.
- During and after use, do not touch interior surfaces of the oven until cool.

Surface Burner Safety

WARNINGS:

- If the top burner flame goes out, gas will continue to flow to the burner until the knob is turned to the OFF position.
- Do not leave the burners ON unattended.
- Use proper pot/pan size—DO NOT use pans that are unstable or easily tipped. Select cookware having flat bottoms and large enough to cover burner grates. To avoid spillovers, make sure cookware is large enough to contain the food properly. This will save both cleaning time and prevent hazardous accumulations of food which could ignite if left on the appliance. Use pans with handles that can be easily grasped and remain cool.
- NEVER leave the surface burners unattended at high flame settings. Boilovers cause smoking and greasy spillovers that may catch on fire.
- Always turn the burner knob to the Ignite position when igniting the top burners and make sure the burners have ignited.
- Control the top burner flame size so it does not extend beyond the edge of the cookware. Excessive flame is hazardous.
- Use only dry pot holders moist or damp pot holders on hot surfaces may result in burns from steam. DO NOT let pot holders come near open flames when lifting cookware. DO NOT use a towel or other bulky cloth instead of a pot holder.
- When using glass cookware—make sure it is designed for top-of-range cooking.
- To prevent burns, ignition of flammable materials and spillage, cookware handles should be turned toward the side or back of the appliance and should not extend over adjacent burners.
- NEVER place any items on the cooktop. The hot air from the vent may ignite flammable items and will increase pressure in closed containers, which may cause them to burst.
- Carefully watch foods being fried at a high flame setting.
- Always heat fat slowly, and watch as it heats.
- If frying combinations of oils and fats, stir together before heating.
- Use a deep fat thermometer if possible to prevent overheating fat beyond the smoking point.

- Use the least possible amount of fat for effective shallow or deep-fat frying. Filling the pan too full of fat can cause spillovers when food is added.
- **DO NOT** cook foods directly on the flame (without a pot or pan), use proper cookware.
- **DO NOT** use a wok on the surface burners if the wok has a round metal ring that is placed over the burner grate to support the wok. This ring acts as a heat trap, which may damage the burner grate and burner ring. Also, it may cause the burner to work improperly and may cause a carbon monoxide level above that allowed by current standards, resulting in a health hazard.
- Foods for frying should be as dry as possible. Frost or moisture on foods can cause hot fat to bubble up and spill over the sides of the pan.
- NEVER try to move a pan of hot fat, especially a deep fat fryer. Wait until the fat is cool.
- **DO NOT** place plastic items on the cooktop—they may melt if left too close to the vent.
- Keep all plastics away from the surface burners.
- To prevent burns, always be sure that the Burner knobs are in the OFF position and all grates are cool before attempting to remove them.
- If you smell gas, turn off the gas to the appliance and call a qualified service technician. Never use an open flame to locate a leak.
- Always turn Burner knob to the OFF position before removing cookware.
- **DO NOT** lift the cooktop. Lifting the cooktop can cause damage and improper operation of the appliance.
- If appliance is located near a window, **DO NOT** hang long curtains that could blow over the surface burners and catch on fire.
- **DO NOT** operate the burner for an extended period of time without cookware on the grate. The finish on the grate may chip without cookware to absorb the heat.
- Always use utensils/cookware for their intended purpose. Follow manufacturer's instructions. Some utensils/ cookware were not made to be used in the oven or on the cooking surface.

READ AND FOLLOW THIS SAFETY INFORMATION CAREFULLY.

SAVE THESE INSTRUCTIONS!

Operation

instructions.

Guidelines for Using Cooktop Burners

- There are dual burners that have the same low turn-down setting (SIM) for gentle simmering (620 BTU/hr). Use the SIM setting for melting chocolate and butter, cooking rice and delicate sauces, simmering soups and stews, and keeping cooked food hot.
- Never leave the appliance unattended when in use. Boil over causes smoking and greasy spills that may ignite.
- Never allow flames to extend beyond cookware or curl up its sides. This could discolor and damage the utensil and you may get burned touching a hot handle.
- Keep handles out of the way. Turn handles so that they don't extend over the edge of the appliance or another burner that is on.
- Take care when deep-frying. Oil or fat can overheat very quickly, particularly on a high setting.

Surface Burner Ignition



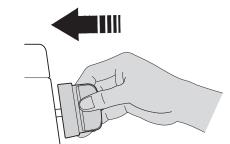
To light the top burners, push the appropriate control knob to release gas.



Turn the control knob counter-clockwise to the "HI" position. You will hear a clicking noise, the sound of the electric spark igniting the burner.



Once burner ignition has been achieved, then turn the burner control knob to adjust the desired heat setting.



NOTE: When one burner is turned to the "Hi" position, all the burners will spark. Do not attempt to disassemble or clean around any burner while another burner is on. Do not touch any burner cap, burner base, or igniter while the igniters are sparking.

Heat Settings

н	Ignites the burners.	
Simmer	Melting small quantities, steaming rice, warming food, melting chocolate or butter.	
Low	Melting large quantities.	
Low – Medium	um Low-temperature frying, simmering large quantities, heating milk, cream sauces, gravies.	
Medium	Sautéing and browning, braising, pan-frying, maintaining slow boil on large quantities.	
Medium – Hi high-temperature frying, pan boiling, maintaining slow boil on large quantities.		
Hi	Boiling liquid quickly, deep frying.	

produce dangerous flames. See 'Replacing the burner parts' in 'Care and cleaning'.
Keep the burners clean. Especially after a spill or boil over, make sure you clean the affected burners before using them again. Food residue may clog the igniter and the notches of the flame spreader, stopping the burner from functioning correctly. See 'Care and cleaning' for

Make sure that all burner parts are properly in place.

Incorrectly or incompletely assembled burners may

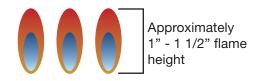
• Check that the burner flames are regular. They should be blue with no yellow tipping, and burn without fluttering all around the burner cap. If not, see 'Troubleshooting' for advice.

Simmer and Boil

- A smaller flame will give the best simmer results. Small flames offer precise cooking performance for delicate foods, keeping food warm, melting chocolate or butter, and for slow-cooking over low heat.
- The highest (larger) flame settings provide the maximum possible heat. This setting should be used for heavy cooking loads such as water boiling and pasta cooking.

Flame Size

- When adjusting the burner knob, watch the flame size.
- Any flame larger than the bottom of the cookware is wasted.
- The flame should be steady and blue in color. Foreign material in the gas line may cause an orange flame during initial operation.



Gas appliances can cause minor exposure to four of these substances, namely benzene, carbon monoxide, formaldehyde and soot, caused primarily by the incomplete combustion of natural gas fuel. When operating your appliance on natural gas, the flames from the burners should be blue in color. In addition, the flames should be stable, free of yellow tipping, excessive noise and lifting. However, this yellow tipping should be restricted to the primary flame kernels only. Properly adjusted burners, indicated by a bluish rather than a yellow flame, will minimize incomplete combustion. Exposure to those substances can be minimized by venting with an open window or use of a ventilation fan or hood.

Power Failure

- If the gas does not ignite within four seconds, turn off the valve and allow at least five minutes for any gas to dissipate. Repeat the lighting procedure.
- If the power fails, the surface burners can be lighted manually. Hold a lighted match near a burner and turn knob counterclockwise to "HI". After burner lights, turn knob to setting.

Cooktop

- To prevent the appliance from discoloring or staining, clean cooktop after each use, and wipe up acidic or sugary spills as soon as the appliance has cooled.
- The sealed burners of your appliance are not secured to the cooktop and are designed to be removed. Boil overs or spills will not seep underneath the cooktop. The burners should be cleaned after each use.



FOOD SAFETY

According to the United States Department of Agriculture: DO NOT hold foods at temperatures between 40°F to 140°F more than 2 hours. Cooking raw foods below 275°F is not recommended.

Burner Grates

- The grates must be properly positioned before cooking. Improper installation of the grates may result in scratching of the cooktop and / or poor combustion.
- Do not operate the burners without a pan or utensil on the grates.



Operation

Oven Vent (ranges only)

• Do not block the ducts at the rear of the range when cooking in the oven. It is important that the flow of hot air from the oven and fresh air into the oven burner never be interrupted. Avoid touching the vent opening or nearby surfaces during oven or broiler operation – they may become hot.

Oven Operation (ranges only)

Never cover any slots, holes or passages in the oven bottom or cover an entire rack with materials such as aluminum foil. Doing so blocks air flow through the oven and may cause carbon monoxide poisoning. Aluminum foil lining may also trap heat, causing a fire hazard. Do not use Aluminum Foil on any porcelain surface. Doing so will cause damage to the porcelain, affecting the life of the porcelain.

Oven Function

Natural Airflow Bake occurs when heat is transferred into the oven from the bake burners in the bottom of the oven cavity. Heat is then circulated by natural airflow. This is a traditional bake setting.

Infrared Broil

The broil burner is located at the top of the oven. This burner heats the metal screen until it glows. The glowing screen produces the infrared heat, searing the outside of broiled foods and sealing in juices.

Convection Bake

Heat is transferred from the bake burners in the bottom of the oven cavity to the oven cavity itself. The convection fan in the rear of the oven then circulates it. This convection process provides more even heat distribution throughout the oven cavity.

Multiple rack use is possible for the large baking jobs. Convection cooking is faster, can be accomplished at lower temperatures and provides more even temperatures than regular cooking.

Convection Roast

The convection fan circulates the heated air evenly over and around the food. Using the cover and broiler pan provided, heated air will be circulated over the around the food being roasted. The heated air seals in juices quickly for a moist and tender product, while at the same time creating a rich golden brown exterior. When convection roasting, it is important that you use the broiler pan for best convection roasting results. The pan is used to catch grease spills and has a cover to prevent grease splatters.

Convection Defrost

With temperature control off, the motorized fan in the rear of the oven circulates air. The fan accelerates natural defrosting of the food without heat. To avoid illness and food waste, do not allow defrost food to remain in the oven for more than two hours without being cooked.

Convection Dehydrate

With the temperature control on 175°F, warm air is radiated from the bake burners in the bottom of the oven cavity and is circulated by a motorized fan in the rear of the oven. Over a period of time, the water is removed from the food by evaporation. Removal of water inhibits growth of microorganisms and retards the activity of enzymes.

BEFORE BAKING OR BROILING

The oven and broiler should be turned on to burn off the manufacturing oils. Turn on the oven to 450°F (230°C) for 20 to 30 minutes; then turn the oven knob to "Broil" for the same length of time. It is recommended to turn on the ventilator above your range at this time.

Broiler Operation (ranges only)

Note: Door must be closed during broiling operation.

Broiling is a method of cooking tender cuts of meat directly under the infrared broiler in the oven. Broiling in the oven is accomplished with the oven door closed. It is normal and necessary for some smoke to be present to give the food a broiled flavor.

Preheating

Preheating is suggested when searing rare steaks (remove the broiler pan before preheating with the infrared broiler, foods will stick on hot metal). To preheat, turn the "Oven" selector knob to the "Broil" position. Wait for the burner to become hot, approximately 2 minutes.

Preheating is not necessary when broiling meat well-done.

Top Broil

Broil one side until the food is browned; turn and cook on the second side. Season and serve. Always pull the rack out to the "stop" position before turning or removing food.

Setting Broil

The "Oven" selector knob controls the Broil feature. When broiling, heat radiates downward from the oven broiler for even coverage. The Broil feature temperature is 500°F (260°C).

The broil pan and insert used together allow dripping grease to drain and be kept away from the high heat of the oven broiler. DO NOT use the broil pan without the insert. DO NOT cover the broil pan insert with foil. The exposed grease could catch fire.

To set the oven to Broil:



Place the broiler pan insert on the broiler pan. Then place the food on the broiler pan insert.



Arrange the interior oven rack and place the broiler pan on rack. Be sure to center the broiler pan and position directly under the broil burner. If preheating the broil burner first, position the broiler pan after the broil burner is preheated.



Turn selector knob to Broil.

The oven indicator light will remain on until the selector knob is turned to the off position or the temperature control cycles off.

Operation

Griddle Operation (applicable models only)

Before Using the Griddle



Clean the griddle thoroughly with warm, soapy water to remove dust or any protective coating.



Rinse with clean water and wipe off to dry with soft, clean, lint-free cloth.



A stainless steel cover that is sized to fit on top of the surface when the griddle is not being used is provided. Please note that the cover must be removed before turning the griddle on.



Make sure the grease tray is under the front edge of the griddle. Position the tray under the griddle overhang to catch grease or food residue.

WARNING:

The surface of the griddle is hot after use. Please allow sufficient time for the griddle to cool prior to cleaning.

Maintenance

Replacing the Oven Light (ranges only)



To prevent electrical shock or personal injury, make sure the oven and light bulb are cool and power to the oven has been turned off before replacing the light bulb.



Turn off the power at the main power supply.



Remove the lens cover from the housing by pulling straight out.



Replace light and make sure the lens cover is in place when using the oven.

Use of the Griddle



Push and turn the control knob counter-clockwise to the preferred cooking temperature.



Preheat the griddle for 10-12 minutes.



When the griddle is preheated to the desired temperature, the indicator light will turn on.



Butter or cooking oil can be added for more flavor, before placing the food to cook.

Removing the Oven Door and Kick Plate (ranges only)



- The removable oven door is heavy. You may need help removing and replacing it.
- Be careful when removing and lifting up the door.
- DO NOT lift the door by the handle, but by holding the door on each side.

You can change the color and look of your range by changing the oven door. For normal range use, it is not recommended to remove the oven door. Make sure the oven is turned off and cool when replacing the door. The oven door is heavy, be careful when lifting it.

Follow these instructions to replace the door:

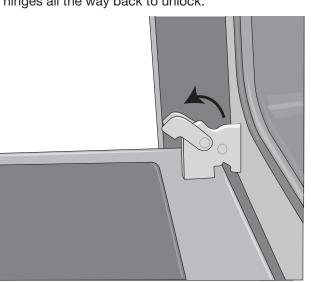


Open the door completely.





Lift up and pull the small levers located on the two hinges all the way back to unlock.

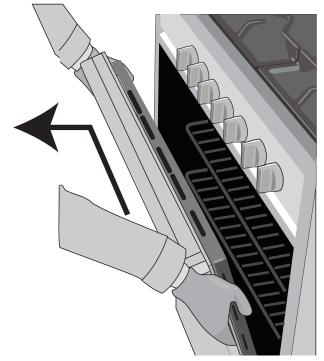




While holding the door on each side, close the door until it touches the levers. Continue closing the door until it is about 4" (10 cm) from being completely closed.

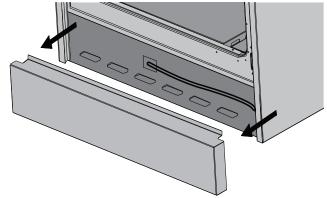


Lift up the door and pull it towards you, pulling it out of the hinges. The door will gently detach from the oven. If the door does not easily detach from the oven, do not apply force and make sure the levers are unlocked.





Remove the kick plate.





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To replace the door, perform the previous steps in reverse order.

Care and Cleaning



- Please make sure to read ALL safety precautions on pages 4 to 10 and 24 to 25.
- Electric Shock Hazard.
- To avoid possible burns use care when cleaning the appliance.

 DO NOT attempt to clean the appliance whenever the oven or burner rings are still hot.
 DO NOT attempt any of the following cleaning instructions before turning all burners and the oven off, and allow them to completely cool.
 IMPORTANT: Always follow label instructions on cleaning products.

Range Top / Cooktop

- To avoid electrical shock or burns, turn off all controls and ensure the cooktop is cool before cleaning.
- Before cleaning the cooktop, ensure that all burners are turned off and that all components are cool enough to safely touch.
- Do not use harsh or abrasive cleaning agents, waxes, polishes, or commercial cooktop cleaners to clean the cooktop. They may cause permanent damage to the surface.
- Use only a sponge, soft cloth, fibrous or plastic brush, and nylon pad for cleaning.
- Always dry components completely before using the cooktop.

Control Knobs

To clean, use a damp soapy cloth for everyday cleaning of the knobs. For heavier cleaning for grease, etc., apply a nonabrasive liquid detergent to a damp cloth. Clean and then dry completely.

Make sure not to rotate the knobs when cleaning.

Burner Grates

These three grates should only be used in their proper positions. DO NOT operate a burner for an extended period of time without cookware on the grate. To clean, AFTER COOLING, use hot water or white vinegar, and DO NOT place in a dishwasher. When replacing the grates, be sure they are positioned securely over the burners.

Please note that the grates have rubber pads on the feet that come into contact with the appliance to avoid scratches. After cleaning it is important to verify that these rubber pads are still there. Should they come off, they can be reapplied using a heat-resistant adhesive.

Burner Rings

Lift off when cool. Wash burner rings in hot, soapy water and rinse with clean water. To remove burned-on food particles, you may scour with a **plastic** scouring pad. Thoroughly dry before returning the rings to the appliance.

The rings are NOT dishwasher safe.

Do not use cleaners for stainless steel surfaces as these rings are not stainless steel.

Burner Caps

Lift off when cool. Wash Burner Caps in hot, soapy water and rinse with clean water. Remove any food from between the burner slots using a small non-abrasive brush like a toothbrush, and afterwards wipe using a damp cloth.

To remove deposits from the burner cavities, remove the cap and separate the two parts. Clean the burner holes routinely with a small gauge wire or needle and especially after bad spillovers which could clog these holes.

Thoroughly dry before returning the heads to the appliance.

The heads are NOT dishwasher safe.

Stainless Steel

To clean the stainless steel surface, use warm sudsy water or a stainless steel cleaner or polish. Always wipe the surface in the direction of the grain. Follow the cleaner instructions for cleaning the stainless steel surface.

DO NOT use a steel wool pad as it will scratch the surface. Do not use cleaners with chlorides or chlorines. Do not use harsh scrubbing cleaners.

Use a hot, damp cloth with a mild detergent. Use a clean, hot, damp cloth to remove soap. Dry with a dry, clean cloth.

Metal Finishes

Wash with soap and water, glass cleaner, or mild liquid sprays.

Plastic Finishes

When control panel trim and end caps are cool, clean with soap and water, rinse and dry.

Use a glass cleaner and soft cloth.

Ranges:

Control Panel, Door Handle, Control Housing

- Clean the control panel, door handle and control housing with a solution of mild detergent and warm water.
- Do not use abrasive cleaners or scrubbers; they will permanently damage the finish.
- Dry the components with a soft, lint-free cloth.

Oven Window

- Clean all glass surfaces with a solution of mild detergent and hot water. Use a mild glass cleaner to remove fingerprint or smears.
- Dry completely with a soft, lint-free cloth.

Porcelain Surfaces

- Clean oven interior and inner door liners with a solution of mild detergent and hot water.
- Rinse and dry with a soft cloth. Do not use abrasives or commercial oven cleaners.

Oven Racks

• Clean oven racks with solution of detergent and hot water. To clean heavy soil, use a scouring pad such as steel wool with plenty of water.

Oven Frame

• Clean with hot water, soap-filled steel-wool pads or cleaners. Rinse well with clean water and dry.

Oven Gasket

- Do not clean the gasket. The fiberglass material of the oven door gasket cannot withstand abrasion.
- It is necessary for the gasket to remain intact.

Outer Oven Door

- Use soap and water to thoroughly clean the top, sides and front of the oven door. Rinse well. You may also use a glass cleaner to clean the glass on the outside of the door.
- Do not use oven cleaners, cleansing powders of harsh abrasives on the outside of the door.

Inner Oven Door

- Do not allow excess water to run into any holes or slots in the door. Any soap left on the liner causes additional stains when the oven is heated.
- Before you call for service, please review the potential problem / possible causes and remedies shown in the table below.

Troubleshooting Tips

Symptom	Possible Cause	Solution
No ignition spark.	Dead batteries or ignition module failed.	 Replace batteries and attempt ignition. If there is still no spark ignition, the appliance burners can still be used. To light them: Holding a lit match to the flame spreader, push in on the control knob and turn counterclockwise to LIGHT. When the flame is burning all the way round the burner, you may adjust the heat.
Igniters spark continuously after flame ignition.	Power supply polarity is reversed. Igniters are wet or dirty.	Have polarity corrected. Dry or clean igniters.
Burners will not light.	Burner parts or igniters may be wet, dirty or misaligned.	Check that the burner parts are clean, dry and correctly assembled. Check that the igniters are clean and dry.
Igniters are sparking but burners are not igniting.	Gas shut-off valve is in the "OFF" position.	Turn shut-off valve to the "ON" position.
Top burner will not stay lit.	Failed thermocouple.	Replace thermocouple.
The flames have suddenly gone out.	A draft or spill has extinguished the flame.	Turn the burners off, cleaning the burners and sump area. Once clean, reignite top burners.
Burner flame goes out at low setting.	Low gas pressure.	Contact gas company.
	Air intake holes around burners are obstructed.	Remove obstruction from air intake holes.
Flames do not burn all around the burner cap.	Burner parts may be dirty or misaligned.	See "Care and Cleaning" instructions.
Top burners do not light or do not burn evenly.	Plug on appliance is not completely inserted in the electrical outlet.	Make sure the unit is properly connected to the power supply.
	Burner holes on the side of the burner may be clogged.	Remove the burner heads and clean them. Check the electrode area for burned-on food or grease.
Burner flames are very large and yellow.	Burner bezel ports are clogged.	Clean burner bezel ring ports with straightened paperclip, needle, or wire.
	Burner ports or burner caps are not positioned properly.	Remove and carefully re-install burner bezel and caps.
	Appliance is being operated with the wrong type of gas.	Ensure that the type of appliance matches the gas supply.
	Regulator is not installed, is faulty, or is set for the wrong type of gas.	Check installation, replace regulator, or set regulator for proper gas.
"Cracking" or "popping" sound is heard coming from appliance.	This is the sound of metal heating and cooling.	This is normal.
Nothing works.	Power supply is not energized.	Have an electrician check the power supply, including the house circuit breaker, wiring and fuses.

Ranges:

Symptom	Possible Cause	Solution
Oven will not heat.	Oven settings are not corrected.	Adjust time, temperature, or rack position.
Foods over-cooked or under-cooked.	Incorrect cooking time or temperature.	Have polarity corrected.
		Dry or clean igniters.

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