AccuTemp®

EDGE™

TILT SKILLETS & KETTLES

GAS-FIRED
INSULATED SELF-CONTAINED TILTING KETTLE - ALTLGB
INSULATED SELF-CONTAINED STATIONARY KETTLE - ALLGB
OWNERS MANUAL AND INSTALLATION INSTRUCTIONS

MODEL # ALTLGB-20 with optional 3" draw-off

MODEL # ALLGB-60 with optional 3" draw-off

THIS MANUAL MUST BE RETAINED FOR FUTURE REFERENCE. READ, UNDERSTAND AND FOLLOW THE INSTRUCTIONS AND WARNINGS CONTAINED IN THIS MANUAL.

FOR YOUR SAFETY

DO NOT STORE OR USE GASOLINE OR OTHER FLAMMABLE VAPORS OR LIQUIDS IN THE VICINITY OF THIS OR ANY OTHER APPLIANCE.

ESURE DE SÉCURITÉ

NE PAS ENTREPOSER NI UTILISER DE´ESSENCE NI AUTRES VAPEURS OU LIQUIDES INFLAMMABLES À PROXIMTÉ DE CET APPAREIL OU DE TOUT AUTRE APPAREIL.

POST IN A PROMINENT LOCATION

INSTRUCTIONS TO BE FOLLOWED IN THE EVENT THE USER SMELLS GAS. THIS INFORMATION SHALL BE OBTAINED BY CONSULTING YOUR LOCAL GAS SUPPLIER. AS A MINIMUM, TURN OFF THE GAS AND CALL YOUR GAS COMPANY AND YOUR AUTHORIZED SERVICE AGENT. EVACUATE ALL PERSONNEL FROM THE AREA.

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.

AVERTISEMENT: L'INSTALLATION, LE RÉGLAGE, LA MODIFICATION, LA RÉPARATION OU L'ENTRETIEN INCORRECT DE CET APPAREIL PEUT CAUSER DES DOMMAGES MATÉRIELS, DES BLESSURES OU LA MORT. LIRE ATTENTIVEMENT LES INSTRUCTIONS D'INSTALLATION, DE FONCTIONNEMENT ET D'ENTRETIEN AVANT DE PROCÉDER À SON INSTALLATION OU ENTRETIEN.

Made in U.S.A.

Table of Contents

Important!

INSPECTION:

This appliance was carefully inspected before shipment from the factory. The transportation company assumes full responsibility for safe delivery to the customer until customer acceptance of the package. Careful inspection of the packaging and the appliance should be completed before acceptance from the transportation company.

CONTACT INFORMATION:

Toll Free	800 480-0415
Office	260 469-3040
Fax	260 469-3045
Email - Service	service@accutemp.net
Email - Parts	parts@accutemp.net
Web Site	www.accutemp.net

Safety Precautions

☑ Installation of the equipment must be done by a qualified technician, knowledgeable of and experienced in the installation of commercial gas and electrical cooking equipment.

☑ Retain this manual for future reference.

Gas/Combustion Precautions

☑ Your installation must conform to local codes or in the absence of local codes, with the current National Fuel Gas Code ANSI Z223.1/NFPA 54 (latest edition), or the National Gas and Propane Installation Code, CSA B149.1 (latest edition), as applicable.

☑ Appliances equipped with casters the installation must be made with a connector that complies with the Standard for Connectors for Movable Gas Appliances, ANI Z21.69•CSA 6.16 (latest edition), and a quick-disconnect device that complies with the Standard for Quick-Disconnect Devices for Use With Gas Fuel, ANSI Z21.41•CSA 6.9 (latest edition). The appliance must be limited in its movement by a restraining device attached to the frame of the appliance and an adjacent wall. Adequate means must be provided to limit the movement of the appliance without depending on the connector and the quick-disconnect device or its associated piping.

☑ **AVIS**: Les appareils sur roulettes doivent être pourvus des roulettes fournies, d'un tuyau de raccordement conforme à la norme ANSI Z21.69 ou CAN/CGA-6.16 et d'un raccord à débranchement rapide satisfaisant les exigences de la norme ANSI Z21.41 ou CAN1-6.9. Ils doivent aussi être munis d'un dispositif de retenue pour empêcher toute transmission de tension au tuyau de raccordement confromément aux instructions du fabricant.

☑ Appliance **MUST** be connected **ONLY** to the gas type identified on the attached rating plate.

☑ This unit is not suitable for connection to Type B Gas Vent.

☑ Ne convient pas au raccordement à un conduit d'évacuation de type B.

☑ **FOR YOUR SAFETY:** Do not store or use gasoline or other flammable vapors or liquids in the vicinity of this or any other appliance.

☑ **ESURE DE SÉCURITÉ:** Ne pas entreposer ni utiliser de´essence ni autres vapeurs ou liquides inflammables à proximté de cet appareil ou de tout autre appareil.

☑ Always disconnect from the power supply and close the main gas valve before servicing.

☑ The ignition system controls of this equipment have been factory set for either natural (manufactured) or LP gas. Do not attempt to use an ignition system control set for natural (manufactured) gas with LP gas or an ignition system set for LP gas with natural (manufactured) gas. Ignition system controls cannot be field converted from one gas type to the other.

☑ The lighting sequence on this appliance is automatic; do not attempt to manually light the main burner.

☑ It is your responsibility to post, in a prominent location, instructions to be followed in the event the user smells gas. This information must be obtained from your local gas supplier. Until it is obtained, post the label that came with this manual.

IMPORTANT! In the event gas odor is detected, do the following.

☑ Observe the posted instructions.

☑ Shut down the unit at the main shut-off valve.

☑ Contact the local gas company or supplier—from a phone away from the building—for emergency service and follow the supplier's instructions.

☑ If the gas supplier cannot be reached, call the fire department.

☑ Do not use any phone in the building.

☑ Do not light or start any appliance.

☑ Do not touch any electrical switch.

Pressure Testing Precautions on Gas Units

☑ The equipment 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 (3.45 kPA).

☑ The equipment must be isolated from the gas supply piping system by closing its individual manual shut-off valve during any pressure testing of that system at test pressures equal to or less than 1/2 psig (3.45 kPA).

Positioning Precautions

☑ The unit must be placed on a non-combustible floor, under an exhaust hood, with a fire retardant system and all connections and placement must comply with all applicable local and national codes. Your ventilation hood, when installed, must conform to ANSI/UL 705 and ANSI/NFPA 96 (latest edition).

☑ Installer sur un plancher incombustible seulement.

☑ Installer en dessous d'une hotte de ventilation seulement.

☑ Adequate make-up air must be provided for exhaust

systems in the area where the equipment is to be installed.

☑ No frame or restriction shall be constructed around the equipment that will restrict air movement into the equipment's combustion area or prevent proper combustion.

☑ Keep the appliance area free and clear from combustibles. Failure to do so may cause fire or property damage.

☑ Adequate clearance for servicing and proper operation must be maintained.

☑ The appliance must be restrained to prevent tipping when installed in order avoid the splashing of hot liquid. The means of restraint may be the manner of installation or by separate means.

Electrical Precautions

☑ This equipment must be electrically grounded in accordance with local codes or, in the absence of local codes, with the National Electrical Code, ANSI/NFPA No. 70 (latest edition) or the Canadian Electrical Code, CSA C22.1 (latest edition), as applicable.

☑ Never attempt to operate the equipment during a power failure.

☑ This 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-prong receptacle. Do not cut or remove the grounding prong from this plug.

☑ Cet appareil est pourvu d'une fiche à trois broches dont une mise à la terre assurant une protection contre les chocs électriques. La prise dans laquelle elle esst branchée doit être correctement mise à la terre. Ne pas couper ni enlever la broche de mise à la terre de la fiche.

General Use Precautions

☑Always instruct employees on the proper use of this equipment.

☑Never attempt to move this equipment when it is full of hot oil or another hot liquid.

☑Never operate this equipment during a power failure.

☑This equipment is intended for other than household use.

☑ Non destiné à l'usage domestique.

Warning & Operating Plates

☑ All warning and operating plates on the equipment should be in place at all times. If plates are damaged or lost, replace them immediately.

Product Improvements

☑ Be aware that as continuous product improvement occurs, specifications may be changed without notice.

Section I: Installation

IMPORTANT! Installation of the equipment must be done by a qualified technician, knowledgeable of and experienced in the installation of commercial gas and electrical cooking equipment. It is the responsibility of the owner and installer to comply with all applicable local and national codes and regulations when installing the unit.

All internal wiring of the equipment is supplied complete and ready for final connection. A wiring diagram is supplied behind the cover of the unit's control console. OEM's Engineering Department must approve any mechanical or electrical changes.

Positioning the Unit

WARNING:

☑ The unit must be placed on a non-combustible floor, under an exhaust hood, with a fire retardant system and all connections and placement must comply with all applicable local and national codes. Your ventilation hood, when installed, must conform to ANSI/UL 705 and ANSI/NFPA 96 (latest edition).

☑ Installer sur un plancher incombustible seulement.

☑ Installer en dessous d'une hotte de ventilation seulement.

☑ Adequate make-up air must be provided for exhaust systems in the area where the equipment is to be installed.

☑ No frame or restriction shall be constructed around the equipment that will restrict air movement into the equipment's combustion area or prevent proper combustion.

☑ Adequate clearance for servicing and proper operation must be maintained

Position the unit where you intend to use it. A minimum of fifteen (15) inches must be provided for servicing of controls. Remember to also consider the required clearances of any other adjoining pieces of equipment.

Fig. 1.1 Minimum Clearances

Model	Back of Unit	Sides of Unit	Vent
ALLGB(F)	10	6	6
ALTLGB(F)	10	6	6

Draft Hood Installation

Warning: This unit is not suitable for connection to Type B or any other type gas vent. It is required that flue gases be vented to a ventilating hood. This unit must be installed under a ventilation hood.

☑ Ne convient pas au raccordement à un conduit d'évacuation de type B.

☑ Installer en dessous d'une hotte de ventilation seulement.

The flue vent shipped with the kettle is the correct height and shape to give maximum performance. **Do not change the diverter in any way.**

Leveling & Securing the Unit

The feet of the unit may be adjusted so that the kettle is properly leveled.

Appliances must be a room temperature, empty of all liquids, and if fitted with legs, lifted during movement to avoid damage and possible bodily injury.

Warning: Hot liquids can cause severe burns. Avoid contact. Under all circumstances, oil must be removed from the fryer before attempting to move it to avoid spills, and the falls and severe burns that could occur. This fryer may tip and cause personal injury if not secured in a stationary position.

Appliances equipped with casters the installation must be made with a connector that complies with the Standard for Connectors for Movable Gas Appliances, ANI Z21.69•CSA 6.16 (latest edition), and a quick-disconnect device that complies with the Standard for Quick-Disconnect Devices for Use With Gas Fuel, ANSI Z21.41•CSA 6.9 (latest edition). The appliance must be limited in its movement by a restraining device attached to the frame of the appliance and an adjacent wall. Adequate means must be provided to limit the movement of the appliance without depending on the connector and the quick-disconnect device or its associated piping.

AVIS: Les appareils sur roulettes doivent être pourvus des roulettes fournies, d'un tuyau de raccordement conforme à la norme ANSI Z21.69 ou CAN/CGA-6.16 et d'un raccord à débranchement rapide satisfaisant les exigences de la norme ANSI Z21.41 ou CAN1-6.9. Ils doivent aussi être munis d'un dispositif de retenue pour empêcher toute transmission de tension au tuyau de raccordement confromément aux instructions du fabricant.

Section I: Installation

Electrical Connection

WARNING: Electrical Grounding Instructions

☞ This 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-prong receptacle. Do no cut or remove the grounding plug from this plug.

☞AVERTISSEMENT: Mise à la terre

Cet appareil est pourvu d'une fiche à trois broches dont une mise à la terre assurant une protection contre les chocs électriques. La prise dans laquelle elle esst branchée doit être correctement mise à la terre. Ne pas couper ni enlever la broche de mise à la terre de la fiche.

☞ Also, it is required that an electrical cut-off device, such as a fused disconnect switch or equivalent, be installed in the power supply line between the main power supply and the unit.

☞ The pilot flame on this equipment is lit automatically and requires electrical power to operate. The unit will not operate if the power is off.

A power cord is provided on the back of the unit, for connecting to the electric power supply. The installer should verify the electrical requirements of the unit to make sure your power supply line is capable of powering the equipment properly. This information is listed on the unit's nameplate.

Standard 120 Volt Model: Connect a 120-volt, 60 Hz, single (1) phase power cord.

Optional 240 Volt Model: Connect a 240-volt, 60 Hz, single (1) phase power cord.

Gas Connection

WARNING:

☞ Your installation must conform to local codes or in the absence of local codes, with the current National Fuel Gas Code ANSI Z223.1/NFPA 54 (latest edition), or the National Gas and Propane Installation Code, CSA B149.1 (latest edition), as applicable.

☞ Do not store or use gasoline or other liquids with flammable vapors in the vicinity of this equipment.

☞ Always disconnect the fuel source before servicing.

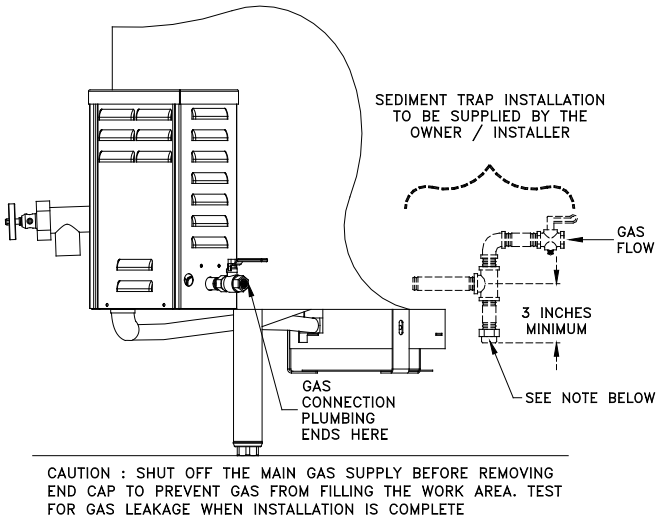
☞ The ignition system controls of this equipment have been factory set for either natural (manufactured) or LP gas. Do not attempt to use an ignition system control set for natural (manufactured) gas with LP gas or an ignition system set for LP gas with natural (manufactured) gas. Ignition system controls cannot be field converted from one gas type to the other.

☞ It is your responsibility to post, in a prominent location, instructions to be followed in the event the user smells gas. This information must be obtained from your local gas supplier.

1. Shut off the main gas supply before beginning the gas connection.

2. Properly configure the gas supply line to be used (see Fig. 1.2). The gas supply line must be a minimum of 3/4" npt pipe. It is your responsibility to ensure that the supply line installed is large enough to achieve the proper pressure and allow the required volume of gas to flow. A sediment trap must be installed to protect against contamination of the ignition system control. Install a manual shut-off valve between the gas supply line and the sediment trap to allow for maintenance of the trap.

Fig. 1.2 Configuration of Gas Connection



3. In making the connections, use a good quality joint compound. If LP gas is supplied, a joint compound resistant to LP gas should be used. Connect the supply line to the ball valve at the rear of the unit. Tighten the connection securely.

Checking For Gas Leaks

WARNING:

Do not permanently supply gas to the unit until the gas lines have been pressure tested. Faulty operation and even equipment damage will result if the gas supply falls below requirements.

The equipment 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 psi (3.5 kPA).

The equipment must be isolated from the gas supply piping system by closing its individual manual shut-off valve during any pressure testing of that system at test pressures equal to or less than 1/2 psi (3.5 kPA).

1. Turn on the main gas supply. With burner off, douse the pipe connections up stream of the ignition system control with a rich soap and water solution. Bubbles indicate a gas leak. If a leak is detected, tighten pipe connections. Replace the part if the leak cannot be stopped.

2. With main burner in operation, douse pipe joints and control inlet and outlet with rich soap and water solution. If another leak is detected, tighten joints and pipe connections. Replace the part if the leak cannot be stopped.

Gas Control - Pressure Verification

Using a pressure gauge or a manometer, the installer must record the gas pressure at both the inlet and outlet of the ignition system control—first with all equipment on the same gas line turned on, then with all equipment turned off. These readings are necessary for your installation and warranty records. Gas pressure input and output ratings for your equipment are listed on the unit's nameplate. Acceptable pressure ranges are provided below. Do not exceed these ratings. NOTE: Since outlet pressure is dependent upon proper inlet pressure, *inlet pressure must be checked first.*

Fig. 1.3 Pressure Regulator Specification Pressures (in Inches Water Column)

Gas Valve Type	Type of Gas	Nominal Inlet Pressure Range	Factory Set Nominal Outlet Pressure	Adjustment Setting Range
Intermittent Pilot	Natural	5.0 - 7.0" w.c.	3.5" w.c.	3 - 5
	LP	12.0 - 14.0" w.c.	9.0" w.c.	8 - 12

To check inlet pressure - with other equipment on the same line turned on and turned off:

Check the inlet pressure with all equipment on the same gas supply line turned on and turned off.

1. Shut off the gas supply and remove the cover panel of the control console. Remove the inlet pressure tap and connect the pressure gauge or manometer (See Fig. 1.4).

2. Turn the gas supply back on. Light the main burner. Turning the primarythermostat dial above room temperature lights the main burner.

3. Record the inlet pressure readings on the Installation Checklist for Warranty Validation. Be sure to take readings with other equipment on the same line turned on and turned off.

4. Reverse the procedure in step 2 to turn off the main burner and shut off the gas supply before disconnecting the manometer or pressure gauge.

5. Replace the inlet pressure tap plug.

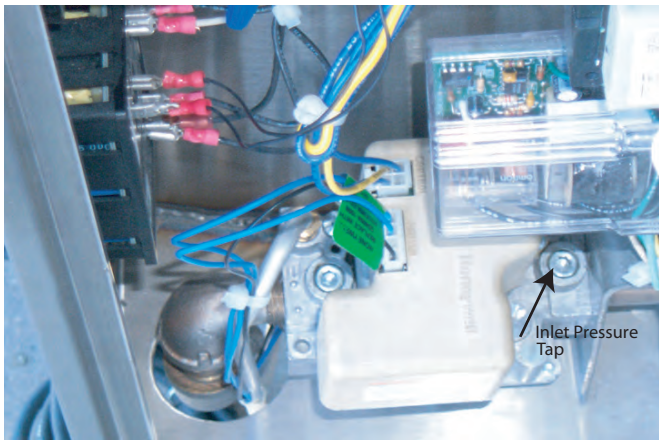
Important! Always shut off the gas supply at the manual valve in the gas supply piping to the unit (or at the tank for LP gas), before removing the inlet pressure tap plug to connect or disconnect a pressure gauge or manometer.

Inlet Pressure Too High? If natural gas pressure exceeds 7" water column or LP gas pressure exceeds 14" water column, then a pressure-regulating valve must be installed in the gas supply line.

I***nlet Pressure Too Low?*** If natural gas pressure is below 5" water column or LP gas pressure is below 12" water column, then the installer must determine the problem. Too much equipment may be on the same line or a larger gas supply line may be required.

Inlet pressure must be correct before checking the outlet pressure.

Fig. 1.4 Inlet Pressure Tap



To check outlet pressure - with other equipment on the same line turned on and turned off:

Check the outlet pressure with all equipment on the same gas supply line turned on.

1. Be sure the ignition system control knob is in the OFF position. Remove the outlet pressure tap plug and connect the pressure gauge or manometer (See Fig. 1.5). Turn the ignition system control knob to the ON position.

2. Turn the gas supply back on and light the main burner by following Step 2 in the previous procedure for checking the inlet pressure.

3. Record the outlet pressure readings by following Step 3 in the Check inlet pressure procedure for checking the inlet pressure.

4. Turn OFF the main burner and shut off the gas supply before disconnecting the manometer or pressure gauge by reversing the procedure in Step 2 in the previous procedure for checking the inlet pressure.

5. Replace the outlet pressure tap plug

6. Replace the cover panel of the control console and turn the gas supply back on.

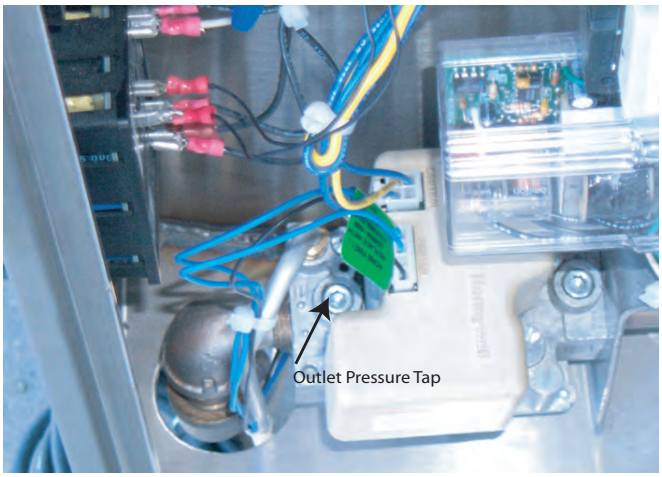
Important! Always shut off the gas supply at the manual valve in the gas supply piping to the unit (or at the tank for LP gas), before removing the outlet pressure tap plug to connect or disconnect a pressure gauge or manometer.

Outlet pressure too high or too low? If the outlet pressure is too high or too low, but the inlet pressure is nominal, the outlet pressure can be adjusted by the installer using the following procedure.

- Remove the pressure regulator adjustment cap screw.
- Using a screwdriver, turn the inner adjustment screw clockwise to increase pressure and counterclockwise to decrease pressure to the infrared burners.
- When proper outlet pressure has been achieved, replace the pressure regulator adjustment cap screw. The unit will not operate properly if the cap screw is not in place.

Proper outlet pressure cannot be achieved? If following the above procedure fails to attain proper outlet pressure, and the inlet pressure is nominal, then the ignition system control needs to be replaced.

Fig. 1.5 Outlet Pressure Tap



Completing the "Installation Checklist"

With all of the preceding installation steps completed, the primary aspects of the installation have been completed. This manual contains an Installation Checklist that must be filled out to show that certain key elements of the installation have been performed properly.

IMPORTANT! The Installation Checklist must be completed for your warranty to be valid. Do not neglect this step.

Warning:

Always disconnect power before cleaning (or servicing) the unit.

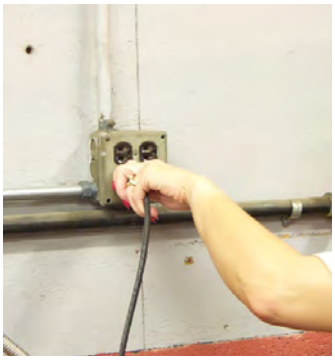
The control console is not waterproof. Never spray the control console, electrical controls, ignition system controls, or connections with water. Clean these areas by wiping them with a clean, damp cloth.

When cooking, never allow water or foodstuff to come in contact with any electrical components.

Initial Cleaning

Before operating your equipment, it must be cleaned thoroughly. Refer to section IV: Caring for Stainless Steel for instructions.

Important! Disconnect all electrical power before cleaning the unit.



Clean the unit thoroughly with a mild detergent solution. Always "wipe" around the control console (never spray). Never rinse control consoles with a spray hose or let water come in contact with any electrical and control components.

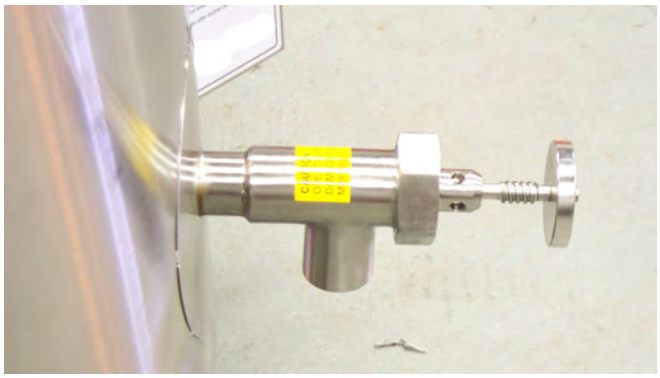
For routine cleaning, Accutemp's optional "Care Kit" accessories help you thoroughly clean all surfaces, including the inside of the lid and the inside of the draw-off valve. During washing, excess water in the kettle may be drained away through the draw-off using the optional drain hose attachment.

Use the "Care Kit" to clean hard to reach places like inside the lid and inside the draw-off valve. Rinse and drain away wastewater easily through the optional drain hose.

Take care when removing the draw-off valve for cleaning. The draw-off hex bonnet nut and valve stem are surprisingly heavy. Do not drop them, since this can cause damage to the stem creating leaks. Also be sure to remove all water from the kettle before removing the draw-off valve.

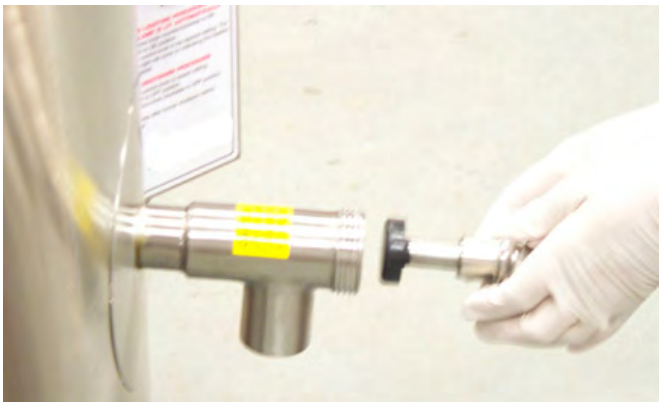
Removing & Cleaning the Draw-Off Valve:

1. Make sure the stem is in the open position.



2. Unscrew the hex bonnet nut.

3. Carefully remove the nut and stem assembly



4. Thoroughly clean the body and tube using the draw-off cleaner brush provided with the Legion Care Kit.

5. When through, rinse with clean water and re-assemble, taking care not to over-tighten the draw-off. It is designed to be hand-tightened only.

Control Functions

We've already started the unit up during installation. Now we'll examine all control functions, step by step, for a full understanding.

IMPORTANT: After installation or service and prior to operating the unit, make sure the following are done, otherwise the unit will not operate.

☑ Make sure the ignition system control knob is in the **ON** position.

☑ Make sure the main electrical power and the gas supply to the unit have both been turned on.

Fig. 2.1 Control Panel Features

Summary of Control Functions:

Rocker Switch (On - Off). Energizes the unit for operation.

Primary Thermostat Dial (Temperature). Allows the user to set the cooking temperature of the unit.

Unit Power On Indicator Light (Green). Illuminates upon depressing the rocker switch to the ON position. This indicates the unit has been energized.

Heater Power On Indicator Light (Red). Illuminates upon turning the thermostat dial to show that the infrared burners are operating. Note: If the temperature of the unit is already above the set temperature, the red heater power on light will not come on.

Low Water Indicator Light (Amber). It alerts the user that the water level in the steam jacket has fallen below the recommended operating level and that the low water relay has been activated, turning off the burner as a safety precaution until the low water condition has been remedied (Refer to Section III, Service & Maintenance, Item 4, Filling Steam Jacket). Once the water level has been increased to normal working levels the low water relay will reset and permit normal operation.

Tilt Switch (ALTLGB & ALTLGB-F only). Automatically shuts off the kettle when tilted. Care should be taken when tilting unit filled with hot product.

Shutting Down the Unit:

Normal (Routine) Shutdown. Turn the primary thermostat dial to the lowest temperature setting and press the rocker switch to OFF.

Complete System Shutdown. Perform normal shut down as described above. Then, turn the ignition system control knob (located inside the control console, clockwise to OFF. Do not force the knob. The appliance will completely shut off. To resume normal operation, turn the ignition system control knob to the ON position and set the primary thermostat dial to the desired temperature setting.

How to Start Cooking:

1. Press the rocker switch to ON position, turn the primary thermostat clockwise to the desired temperature. This will cause the red indicator light to come on, showing that the burner is operating.

2. Close the lid to speed up the heating process.

3. Once the unit has cycled (the red indicator light goes out), you can start cooking immediately. However, to guarantee the most even, stable heat you may want to let it cycle several times.

4. If a new temperature is desired during a cooking operation, simply turn the thermostat to the new setting. Again, allow several cycles to ensure proper heat stabilization.

5. To shut down the unit, turn the thermostat dial to OFF and press the rocker switch to OFF.

Section III: Service and Maintenance

This section covers the basics of servicing and maintaining your equipment. A "Maintenance and Service Log" is included in this manual for your use in recording all maintenance and service performed.

IMPORTANT: Service must be done by a qualified technician experienced with commercial gas and electric cooking equipment. Use only OEM supplied parts. Unauthorized or generic parts can cause bodily injury and equipment damage. If the unit ever needs repair during the warranty period, prior authorization is required. Also refer to the sections of this manual entitled Service Calls and also Important Warranty Information.

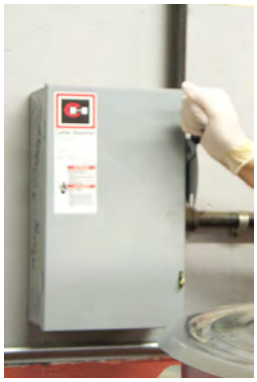
Servicing

Warning: Always disconnect the power supply and shut off manual gas valve before cleaning or servicing.

Replacing Primary Thermostat

Re-Calibrating Thermostats (Do Not Attempt)

IMPORTANT! If thermostat is defective or not working properly, it must be replaced (without breaking the seal) and returned to Accutemp. The warranty is voided if the seal is broken or any attempt is made to recalibrate a thermostat. See below for replacement instructions.



1. Disconnect the unit from its power supply.

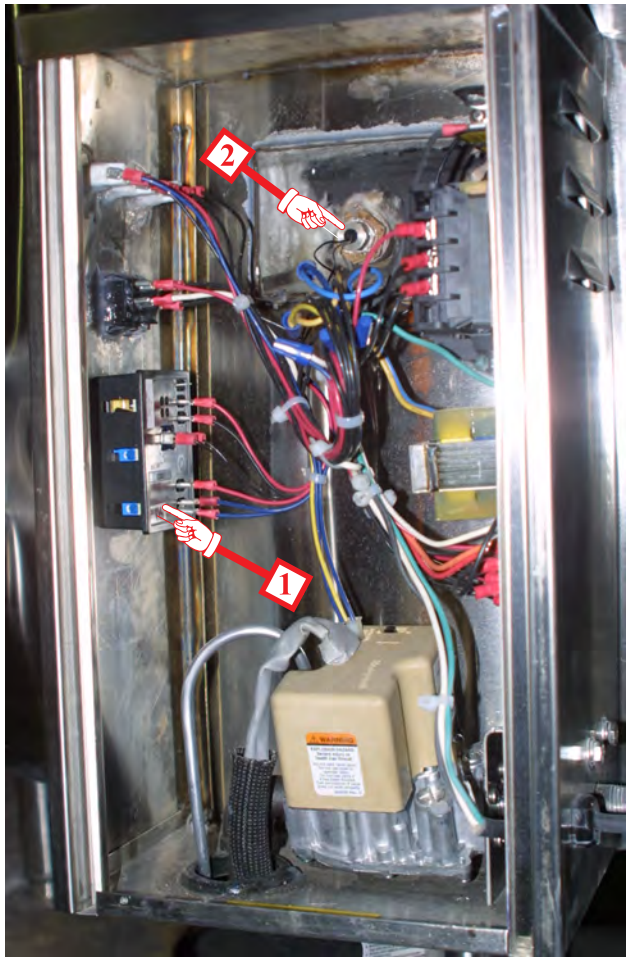
2. Turn off the manual gas valve at the rear of the unit.

3. Remove the control console panel.

4. On the existing primary control thermostat controller (Item 1), mark and disconnect the sensor (probe) leads (Item 2) from terminal 1 and 2. For 120 VAC operation, mark and disconnect the black wire(s) from terminals 4 and 7 and white wire from terminal 5. For 208 to 240 VAC operation, mark and disconnect the black wire(s) from terminals 3 and 7 and white wire from terminal 5. Mark and disconnect the red wire from terminal 6. Mark and disconnect the black wire from terminal 6.

5. If replacing the primary control thermostat controller (Item 1), remove the knob on the front panel by loosening the setscrew and loosen the rubber-coated nut to release the controller from the front panel.

6. Reconnect the wires from the sensor (probe) leads to the



new controller and secure to front panel with mounting nut and replace knob securing with setscrew.

7.Replace control console panel and secure in place.

8. If replacing the sensor (probe) (Item 2),drain water in jacket below the sensor location.

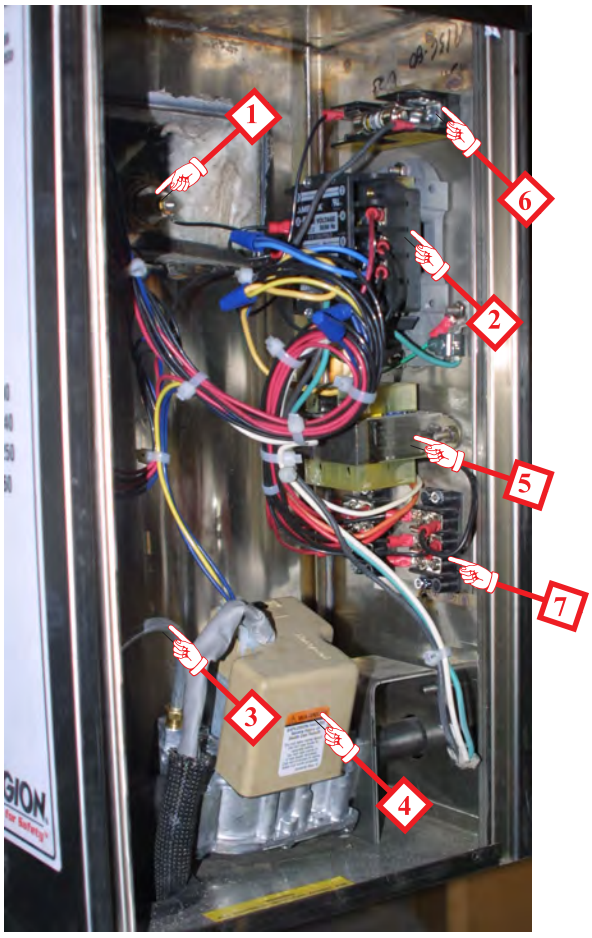
9. Refer to step 4 to disconnect leads from primary control thermostat controller.

9. Remove sensor (Item 2) from kettle jacket using a 18mm deep well socket.

10. After installing new sensor, reconnect the wires from the new sensor (probe) to the controller.

11. Replace control console panel and secure in place.

12. Refill kettle with pure distilled water. Refer to Filling Steam Jacket of this section for instructions.



B) Replacing the Ignition System Control

Disconnect power and turn off main gas supply before starting.

To replace the gas control valve (Item 4);

1.Disconnect the controls connector and the igniter connector from the gas control valve (Item 4).

2. Disconnect the pilot tube (Item 3) from the gas control valve (Item 4).

3. Loosen flexible gas hose nut (Item 7), using a crescent wrench or 1 1/8 open end wrench, located under the control console.

4. Remove the manual gas valve, reducing bushing and nipple from gas control valve

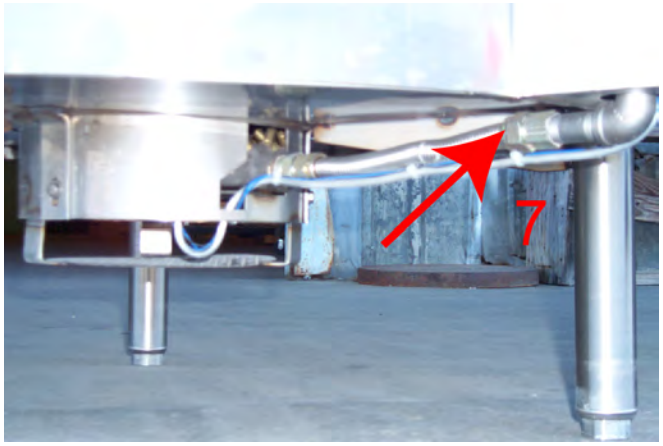
5.Remove 1/4-20 bolts (Item 6) from rear of control console to loosen bracket holding gas valve.

6.Remove gas control valve from control console.

Note: You may need to rotate valve slightly to allow clearance for elbows and bracket attached to valve.

Make note of positioning of valve in control console when removing to insure correct placement of new valve.

7.Reverse steps to secure new gas control valve in place.



(C) Replacing the Gas Burner or Burner Orifices

Refer to steps 1 through 3 of Replacing the Ignition System Control then,

Remove 3 1/4-20 bolts from burner shroud (Item 8). Let the shroud/gas burner assembly drop down, then pull out from underneath the kettle.

Remove 3/8 nut and flat washer located in center of burner assembly (Item 9).

Lift burner out of shroud.

Reverse steps to replace new burner.

D) Replacing the Pilot/Igniter Assembly

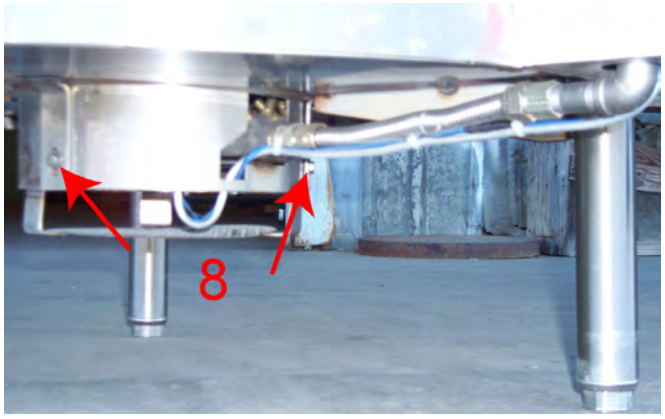
Refer to steps in C) Replacing the Gas Burner or Burner Orifices then,

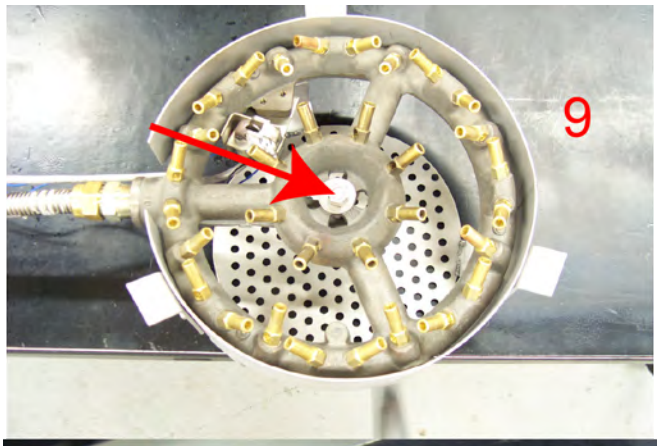
Turn gas burner over and loosen 2 1/4-20 bolts to remove bracket from burner (Item 10).

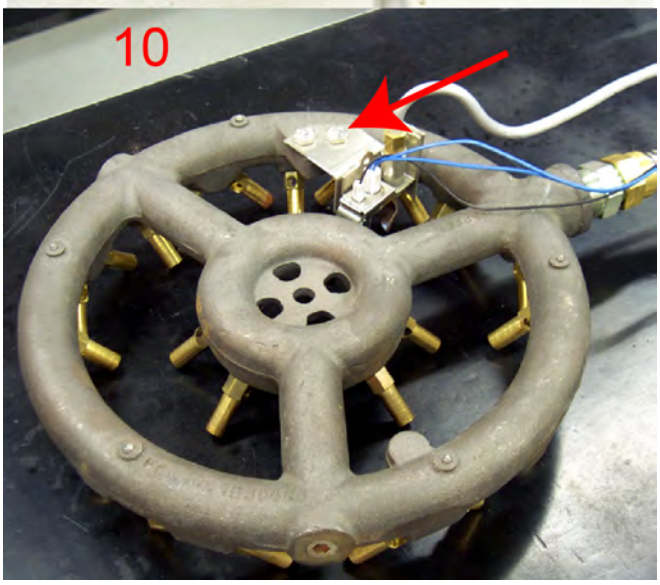
Lift bracket away from burner and remove 1 slotted screw from bracket which holds the igniter to the bracket.

Remove pilot tube using a 7/16 open end wrench (make sure not to lose the orifice inside the igniter).

Reverse steps to replace the new igniter.







Actuator Maintenance and Adjustment

A) Actuator Tension Adjustment

The lid on the ALLGB and ALLGB-F(standard on 60 gallon and up) can operate with spring-loaded actuators. If the lid can be raised to any position, and it remains in that position, the actuators are adjusted properly. Should the tension need adjustment after shipping, or at any time in the future, the following procedure can be performed.

Raise the unit's lid completely. Removal of the stop nut may be needed to raise the lid completely.

Remove the tube closure cap on the actuator. With a 3/4" deep hex socket, turn the adjusting nut (located inside

the actuator sleeve) clockwise to increase the tension or counterclockwise to decrease tension. Rotate the nut one turn at a time and test the lid's operation. When the adjustment is complete, replace the tube closure cap on the actuator sleeve.

B) Actuator: Re-Packing With Grease

The lid actuator(s) of your unit must be re-packed with grease every six months to ensure proper operation. Perform the following steps. Refer to Figure 3.1 and to Figure 3.2.

1. Raise the lid of the unit fully.

2. Remove the tube closure cap.

3. Remove the self-locking 1/2-13 hex nut on the actuator rod.

4. If the components inside the actuator sleeve do not slide out easily, remove the bolt, which secures the actuator sleeve to the frame lug. Put aside the bolt, nut, and lock washer for re-assembly later.

5. Grasp the actuator sleeve and pull down away from the actuator rod. The components inside the actuator sleeve will slide out.

6. Pack the spring (or springs) with Bel-Ray No-Tox Clear Grease #2. The grease must be liberally applied between each coil.

7. After re-packing with grease, reassemble the components back inside the actuator sleeve and slide the sleeve back over the actuator rod.

8. Reconnect the actuator assembly to the frame lug using the bolt, nut, and lock washer previously set aside.

9. Adjust the tension of the actuators using the procedure described earlier in this section.

C) Actuator Replacement

Should the actuators on your unit ever require replacement, use the following procedure. Refer to Figure 3.1 and to Figure 3.2.

1. Raise the lid of the unit fully.

2. Remove the tube closure cap.

3. Using a deep socket tool, loosen the self-locking hex nut on the actuator rod (by turning it counterclockwise) to eliminate pressure on the springs.

4. From the pivot arm of the actuator, remove the acorn nut, bolt, lock washer, and spacer and retain them for mounting the new actuator(s).

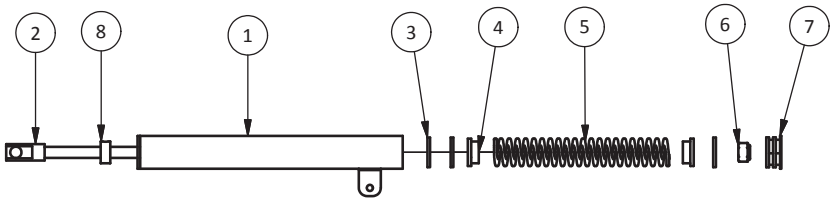
5. From the frame lug (at the other end of the actuator) remove the acorn nut, bolt, and lock washer and retain them for mounting the new actuator(s).

6. Mount the new actuators using the bolts, nuts, lock washers, and spacers set-aside in the above steps.

Note: The actuator rod must be free to pivot during use. Therefore, when tightening the hex bolt into the acorn nut, tighten it completely, and then back off a half turn.

7. After the new actuator(s) are installed, adjust the tension using the procedure described earlier in this section.

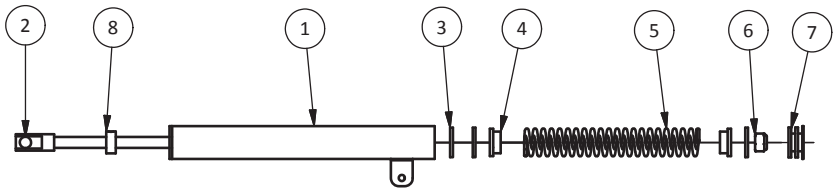
Figure 3.1: Actuator Components & Assembly



404486-001

404486-001 [20G - 40G INSULATED, & 20G -60G UN-INSULATED]

Parts List			
ITEM	QTY	PART NUMBER	TITLE
1	1	404483-001	SLEEVE WELDMENT
2	1	455880	ACTUATOR ROD & LUG
3	3	408505	WASHER NYLON 1.355 X .52
4	2	408506	NYLON SHOULDER WASHER
5	1	408531	SPRING 8" X 1 1/4" X 5/8"
6	1	405591	NUT SS LOCK 1/2-13
7	1	404485	ACTUATOR END-CAP PLUG
8	1	456695	ACTUATOR COVER STOP



404486-002

404486-002 [60G - 150G INSULATED, & 80G -150G UN-INSULATED]

Parts List			
ITEM	QTY	PART NUMBER	TITLE
1	1	404483-001	SLEEVE WELDMENT
2	1	455879	ROD ACTUATOR LUG
3	3	408505	WASHER NYLON 1.355 X .52
4	2	408506	NYLON SHOULDER WASHER
6	1	405591	NUT SS LOCK 1/2-13
5	1	408531	SPRING 8" X 1 1/4" X 5/8"
7	1	404485	ACTUATOR END-CAP PLUG
8	1	456695	ACTUATOR COVER STOP

Fig. 3.2: Removing/Installing Actuators

Gas Control System

A). Maintenance of the Gas Control System

Your equipment came with an intermittent pilot gas control system. The systems is as follows:

The SV9501/9502 SmartValve™ System Control combines gas flow control and electronic intermittent pilot sequencing functions into a single unit. The Q3450 SmartValve™ System pilot burner provides pilot flame ignition and sensing for the SV9501/9502 Systems. It consists of a replaceable igniter-flame rod assembly, bracket assembly, pilot target, ground electrode, orifice assembly, compression fitting and spring clip. The igniter lights the pilot burner. The flame rod proves the pilot flame and the pilot flame lights the main burner.

Control Knob Settings:

OFF. Prevents pilot and main gas flow through the ignition system control.

ON. Permits gas flow into the control body and, under control of the thermostat, to the pilot and main burners.

Frequency of Maintenance Required:

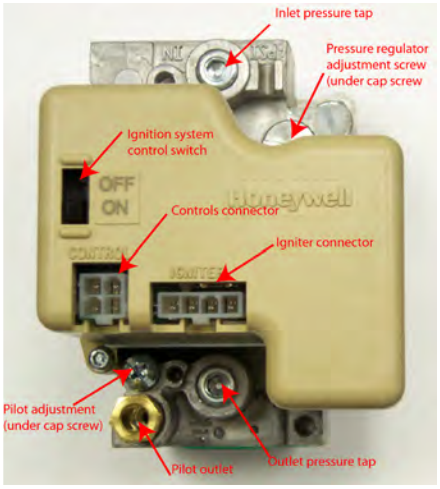
Cycling Frequency. Appliances that may cycle 20,000 times annually should be checked monthly.

Intermittent Use. Appliances that are used seasonally should be checked before shutdown and again before the next use.

Consequence of Unexpected Shutdown. Where the cost of an unexpected shutdown would be high, the system should be checked more often.

Dusty, Wet, or Corrosive Environment. Since these types of environments can cause the gas control to deteriorate more rapidly, the system should be checked more often.

Fig. 3.3: SV9501 / 9502 Gas Control



When to Replace the Gas Control:

√ The gas control does not perform properly on checkout or troubleshooting.

√ The gas control knob is hard to turn.

√ The gas control is likely to have operated more than 200,000 cycles.

√ The control is wet or looks as if it has been wet.

B) Adjusting the Pilot Flame

The pilot flame was adjusted at the factory. Should it ever need adjusting, follow the instructions below.

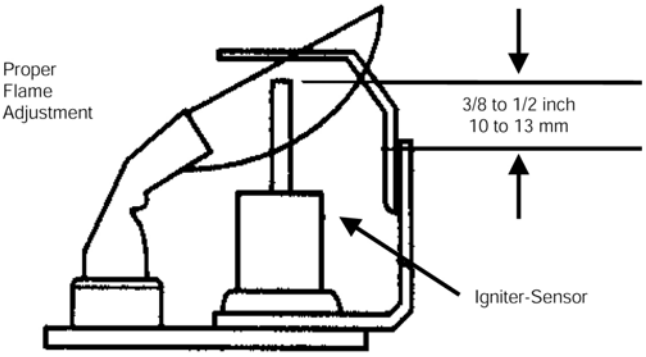


Fig. 3.4: Pilot System for the SV9501/9502 SmartValve™ Gas Control

Proper Setting: The flame should envelope 3/8" to 1/2" (10 mm to 13 mm) of the igniter sensor tip.

1. Turn off the thermostat dial.

2. Disconnect the lead to the MV terminal on the gas control.

3. Re-light the pilot by turning up the thermostat to call for heat.

4. Remove the pilot adjustment cover screw from the gas control (see Fig. 3.3).

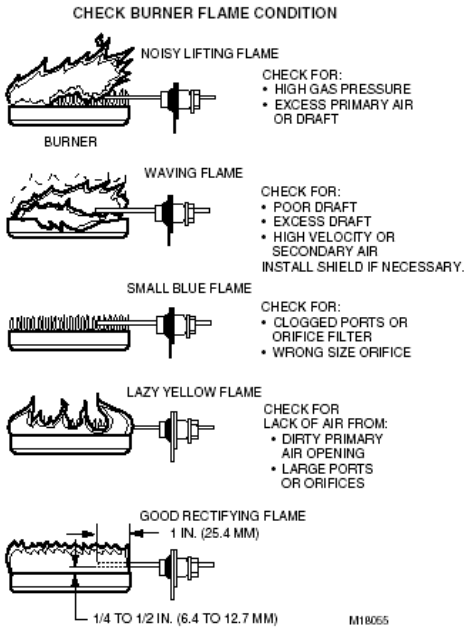
5. Turn the inner pilot adjustment screw clockwise to decrease or counterclockwise to increase the pilot flame.

When done, replace the cover screw and tighten it firmly.

C) Identifying Unsatisfactory Pilot Flames

Much can be determined by the appearance of the pilot. The size, color, shape, sound, and movement of the flame are all indicators. Refer to the chart below to identify and correct possible problems.

Fig. 3.5: Examples of Problem Pilot Flames



Filling Steam Jacket

Warning!

After start-up use pure, chloride free, distilled water only (referred to as "water" in the following text). Do not use tap water to refill to correct water level.

Appliance failure caused by incorrect water quality is not covered under warranty.

Allow kettle to cool. Never attempt to add water to a hot kettle.

Place the thermostat in the off position. Press the rocker switch to the OFF position. Disconnect power at the customer supplied electrical cut-off device.

Open the air vent by turning selector screw counter-clockwise (See Fig. 3.6) until air blows through valve to release any residual steam contained in the steam jacket OR open the petcock by turning the lever to vertical (See Fig. 3.7) to release any residual steam contained in the steam jacket.

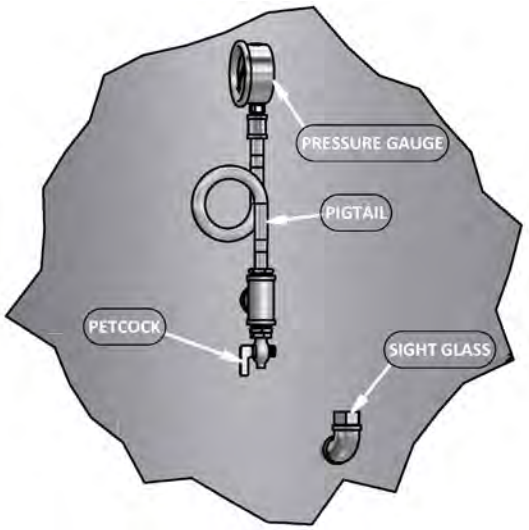
Remove sight glass and place a funnel in the inlet elbow.

Pour water into funnel. Continue adding water until the water in the jacket is visible in the sight glass. **DO NOT FILL BEYOND THE TOP OF THE SIGHT GLASS LEVEL.**

Remove funnel, replace sight glass in inlet elbow, securely turn selector screw on Dole Air Valve clockwise as far as it will go to return to automatic venting and restore power to the kettle.

CAUTION: Drain the steam jacket if the kettle is to be stored in an unheated area. Water freezing in the steam jacket may cause damage to the unit. Drain is located behind the control-housing panel.

Fig. 3.7: Filling Steam Jacket - Commercial Units



Safety Relief Valve

Installation Instructions

This valve must be mounted in a vertical, upright position directly to a clean, tapped opening located at the top of the equipment. Under no circumstances should there be a flow restriction or valve of any type between the safety relief valve and the pressure vessel.

Be certain that all connections - including the valve inlet - are clean and free from any foreign material.

Use pipe compound sparingly, or tape, on external threads only.

The Btu/hr or lb/hr rating of the safety valve must equal that of the equipment to which it is installed.

Warning! The safety relief valve may discharge large amounts of steam and/or hot water during operation. Therefore, a discharge line must be installed to reduce the potential for bodily injury and property damage that:

√ is connected from the valve outlet with no obstructions and directed downward to a safe point of discharge.

√ allows complete drainage of both the valve and the discharge line.

√ is independently supported or securely anchored so as to avoid applied stress on the valve.

√ is as short and straight as possible.

√ terminates freely to atmosphere when any discharge will be clearly visible and is at no risk of freezing.

√ terminates with a plain end that is not threaded.

√ is constructed of a material suitable for exposure to temperatures of 375° F or greater.

√ is of a pipe size equal to or greater than that of the valve outlet over its entire length.

Do not cap, plug, or otherwise obstruct discharge pipe outlet!

Operating Instructions

DO NOT ALLOW water to flow through a safety relief valve as sediment or debris may be deposited on seating surface if adding water to a kettle. Excessive deposits may prevent the valve from operating properly and a dangerous pressure buildup and equipment rupture may result.

Maintenance and Testing

CAUTION! Make certain discharge pipe is properly connected to valve outlet and arranged to contain and safely dispose of boiler discharge before testing (see "Installation Instructions").

Under normal operating conditions a "try lever test" must be performed every two months. Under severe service conditions, or if corrosion and/or deposits are noticed within the valve body, testing must be performed more often. A "try lever test" must also be performed at the end of any non-service period.

Test at or near maximum operating pressure by holding the test lever fully open for at least 5 seconds to flush the valve seat free of sediment and debris - then release lever and permit the valve to snap shut.

If lift lever does not activate, or there is no evidence of discharge, discontinue use of equipment immediately and contact a licensed contractor or qualified service personnel.

Section IV: Caring For Stainless Steel

This section provides specific guidelines for cleaning and protecting the stainless steel surface of your equipment.

Important!

Always disconnect power before cleaning (or servicing) the unit. Never spray the control console, electrical controls, gas controls, or connections with water. Clean these areas by wiping them with a clean, damp cloth.

The stainless steel can be cared for using any good commercial stainless steel cleaner or polish. Contrary to popular belief, stainless steel remains resistant to corrosion only as long as its passive surface remains intact. There are some basic rules to prevent the breakdown of this surface.

Only plastic scouring pads and soft cloths should be used, since they will not damage the stainless steel surface. Never use anything that will scratch the surface such as steel pads, wire brushes, or scrapers. In the kettle liner, scratches make cleaning more difficult and provide places for bacteria to collect and grow. Never use steel wool since it can leave particles embedded in the kettle liner and can also lead to eventual corrosion and pitting. Never let deposits from water, particularly hard water, or deposits from food sit on the surface for extended periods. Wipe up

deposits and spills promptly. After cleaning, rinse off the cleaning agents thoroughly with water, wipe dry, and then allow the surface to air dry. Oxygen actually helps maintain stainless steel's protective surface.

Never use cleaners containing chlorides (or quaternary salts, since they can also contribute to pitting and rusting). Use only alkaline, alkaline-chlorinated, or non-chloride cleaners.

Tip: If you've been doing a lot of continued boiling or steaming, you may notice a build-up of lime or scale in the kettle liner. This cleans up easily using vinegar, a vinegar/water mixture, or any commercial de-liming / de-scaling solution.

Sanitizing

Suggested Tools:

a. Cleaner, such as Klenzade HC-10 or HC-32 from ECOLAB, Inc.

b. Kettle brushes in good condition

c. Sanitizer such as Klenzade XY-12.

d. Film remover such as Klenzade LC-30.

Procedure:

1. Clean food contact surfaces as soon as possible after use. If the unit is in continuous use, thoroughly clean and sanitize the interior and exterior at least once every 12 hours.

2. Scrape and flush out food residues. Be careful not to scratch the kettle with metal implements.

3. Prepare a hot solution of the detergent/cleaning compound as instructed by the supplier. Clean the unit thoroughly. A cloth moistened with cleaning solution can be used to clean controls, housings, and electrical conduits.

4. Rinse the kettle thoroughly with hot water, and then drain completely.

5. As part of the daily cleaning program, clean soiled external and internal surfaces. Remember to check the sides of the unit and control housing.

6. To remove stuck materials, use a brush, sponge, cloth, plastic or rubber scraper, or plastic wool with the cleaning solution. To reduce effort required in washing, let the detergent solution sit in the kettle and soak into the residue. Do NOT use abrasive materials or metal tools that might scratch the surface. Scratches make the surface harder to clean and provide places for bacteria to grow.

7. The outside of the unit may be polished with a stainless steel cleaner such as "Zep Stainless Steel Polish" from Zep Manufacturing Co used in accordance with the manufacturer's directions.

Section IV: Caring For Stainless Steel

8. When equipment needs to be sanitized, use a solution equivalent to one that supplies 200 parts per million available chlorine. Obtain advise on sanitizing agents from your supplier of sanitizing products. Following the supplier's instructions, apply the agent after the unit has been cleaned and drained. Rinse off the sanitizer thoroughly.

9. It is recommended that each piece of equipment be sanitized just before use.

10. If there is difficulty removing mineral deposits or a film left behind by hard water or food residues, clean the kettle thoroughly and use a deliming agent, like Lime-A-Way® from Ecolab, in accordance with the manufacturer's directions. Rinse and drain the unit before further use.

NOTICE: NEVER LEAVE A CHLORINE SANITIZER IN CONTACT WITH STAINLESS STEEL SURFACES LONGER THAN 30 MINUTES. LONGER CONTACT CAN CAUSE STAINING AND CORROSION.

Section V: Troubleshooting

Troubleshooting-General Problems

The Gas Self-Contained Steam Jacketed Kettle is designed to operate smoothly and efficiently if properly maintained. However, in the event of a problem, following is a list of checks to be made by qualified personnel. The wiring diagram for the unit is located behind the removable panel of the control console.

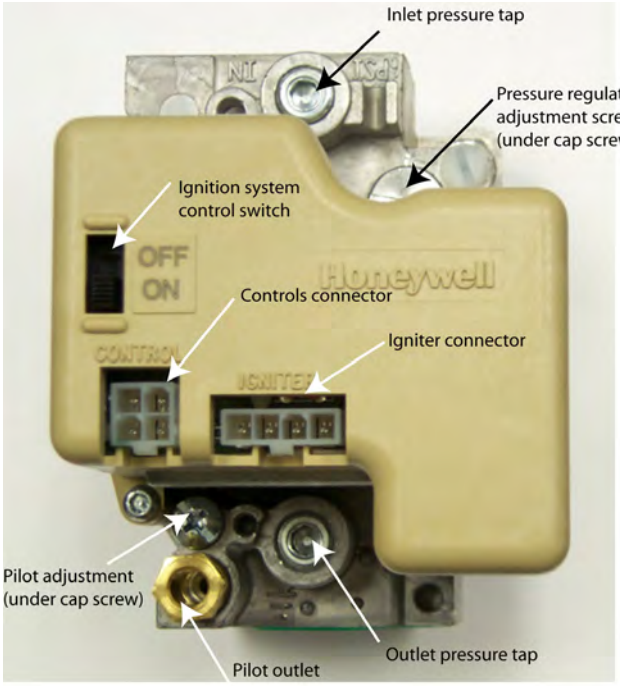
IMPORTANT: Service must be done by a qualified technician experienced with commercial gas and electrical cooking equipment. Use only OEM supplied parts. Unauthorized or generic parts can cause bodily injury and equipment damage. If the unit ever needs repair during the warranty period, prior authorization is required. Also refer to the sections of this manual entitled Service Calls and also Important Warranty Information.

Symptom	Possible Causes
Kettle will not heat, pilot light will not come on	Gas and/or power supply not turned on
	Loose or broken wires
	Low voltage tranformer failure
	Thermostat malfunctioning
	Automatic low water relay engaged, amber light should be on if this has happened
Kettle continues to heat after it reaches desired temperature	Thermostat setting - too high
	Primary thermostat malfunctioning
Kettle does not reach desired temperature	Thermostat setting - too low
	Primary thermostat malfunctioning
	Air in kettle jacket
Uneven cooking due to "cold spots"	Low gas pressure
	Plugged orifice(s) in burner
	Plugged burner supply tube
Pilot Outages	Low gas pressure or supply
	Plugged pilot supply tube
	Drafts on the pilot flame
	Splashed or sprayed water
	Improper adjustment of pilot
	Mis-aligned pilot sensor

Troubleshooting—SV9501/9502 Gas Control System

Your unit came with the SV9501/9502 SmartValve™ Gas Control System, use this section to troubleshoot problems.

Fig. 5.1: The SV9501/9502 SmartValve



Troubleshooting Chart

Symptom	Try This
Main burner will not come on with the call for heat	1. Make sure the ignition system control knob is in the ON position
	2. Adjust the thermostat to call for heat
	3. Using the AC voltmeter, check for 24V at the ignition system control (see Fig. 5.2)
Pilot Outage	1. If the pilot flame goes out during ignition, but is properly adjusted, re-check the mounting and location. The pilot burner must be rigidly positioned relative to the pilot carryover burner.
	2. If the mounting and location of the pilot burner are okay, but pilot continues to go out, make sure that the flame is not exposed to drafts that push or pull the pilot flame away from the igniter-flame rod or cause the pilot flame to extinguish.
	3.Check the pilot and main burner light off. Set the thermostat to call for heat and watch the pilot burner during the ignition sequence to determine if:

	•the igniter continues to glow red after the pilot is lit, or
	•the pilot lights and the igniter stops glowing red, but the main burner does not light.
	If so, assure adequate flame current as follows:
	•turn off the appliance at the circuit breaker or fuse box
	•clean the flame rod with an emery cloth
	•make sure electrical connections are clean and tight.
	•check for a cracked ceramic insulator, which can cause short to ground, and relace the igniter-flame rod assembly if necessary (see instructions later in this section).
	Turn on the power and set the thermostat to call for heat. The pilot should light and then the main burner should light.

Checking the Grounding

1. If the ground is poor or erratic, safety shutdown will occur. Therefore, if nuisance shutdowns are reported, check that the ground is made through the pilot tubing.

2. Excessive temperature at the ceramic flame rod insulator will permit electrical leakage to ground.

- If the bracket is bent, bend it back to the correct position.
- If the insulator is cracked, replace the igniter-flame rod assembly (Q3400A).

Checking the Ignition Cable

1. Make sure that the ignition cable is not in contact with metal surfaces.

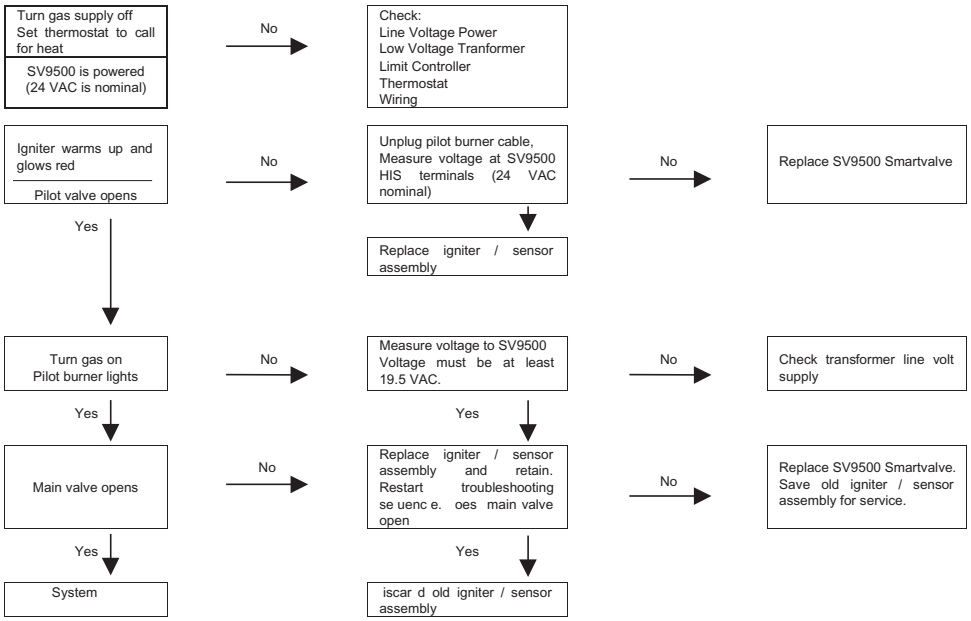
2. Make sure the ignition cable is not more than 3 ft. (or 1 m.) long.

3. Check the electrical continuity of the ignition cable.

Checking and Adjusting Gas Input and Burner Ignition

Proper gas pressure is necessary for proper operation of the equipment. Check the inlet and outlet pressure of the gas control valve using the procedure described in item 6 of Section I: Installation, entitled Pressure Testing Gas Lines.

Fig. 5.2: The SV9501/9502 SmartValve™ Troubleshooting Sequence



Section VI: Parts List

General Parts List

PART NO.	ITEM DESCRIPTION
409257-260	Thermostat, primary 150-260°F
408496	Knob, primary thermostat
409258	Thermostat probe RTD
407793	Grommet thermostat shaft
408495	Nut rubber coated
Z-20-NJ	Burner, Z-10 (No jets)
X-20-NJ	Burner, X-10 (No Jets)
X-44-NJ	Burner, X-44 (No jets)
400414	Burner orifice #73 LP
404379	Burner orifice #74 LP
404630	Burner orifice #75 LP
409280-62	Burner orifice #62, Natural gas
406870	Burner orifice #63, Natural gas
406869	Burner orifice #64, Natural gas
409280-65	Burner orifice #65, Natural gas
409280-67	Burner orifice #67, Natural gas
408087	Gas control valve SV9501/9502
431136	Transformer 24V
455946	Pilot burner SmartValve™ System (Natural gas)
455947	Pilot burner SmartValve™ System (LP gas)
430247	Manual gas shutoff ½"
408198	Manual gas shutoff ¾"
409166-12	Gas connector hose, 1/2" i.d. x 12" long, 1/2" MIP x 1/2" FIP adapters
409166-12-01	Gas connector hose, 1/2" i.d. x 12" long, 3/4" MIP x 1/2" FIP adapters
455802	Air Vent 20JR
440148	Petcock BCP 1/8" npt
440280	Pigtail (anti-siphon) SS 1/4" npt
456724	Safety relief valve 30 psi/425 lbs/hr, 3/4 npt (Replaces part #440168)
456727	Pressure gauge 30Hg-0-60 (Replaces part #406732)
406578	Terminal Block (Jumped)
454012	Sight glass 1/2"
430083	Pressure limit control (Optional)
455426	Low water relay 1500A 120V (Replaces part #430029)
420064	Low water probe 3/8"
430085	Tilt switch 20 amp 120 vac (TLGB[F]) only
400749-1	Ground Lug 14-6 wire range
400780	Fuse block 1 pole
400781	Fuse 1 amp 600 VAC
407810	Indicator light red 120V
407714	Indicator light amber 120V
408579	Indicator light green 120V
407615	Rocker switch
400270	Strainer disk 9" with 1/4" holes, 1.5& 2" Draw-off
404939-001	Strainer disk 9" with 1/4" holes, 3" Draw-off
409255-4	Flue vent elbow 4"
409255-5	Flue vent elbow 5"
400269	Strainer disk 9" with 1/8" holes (Optional)
400271	Strainer disk 9" with solid (Optional)
800237	Adjustable foot insert (no flange) 2"
400275	Adjustable foot insert w/flange 2"
408693-001	Actuator assembly and hardware 20 - 40 gallon
408693-006	Actuator assembly and hardware 40F – 80 gallon
408693-002	Actuator assembly and hardware 80F – 150 gallon
407977	Kettle care kit 5 – 25 gallon
407978	Kettle care kit 30 – 100 gallon

Section VI: Parts List

Actuator Parts List & Assembly

Fig. 6.1: Actuator Assembly Diagram

404486-001 [20G - 40G INSULATED, & 20G -60G UN-INSULATED]

Parts List

ITEM	QTY	PART NUMBER	TITLE
1	1	404483-001	SLEEVE WELDMENT
2	1	455880	ACTUATOR ROD & LUG
3	3	408505	WASHER NYLON 1.355 X .52
4	2	408506	NYLON SHOULDER WASHER
5	1	408531	SPRING 8" X 1 1/4" X 5/8"
6	1	405591	NUT SS LOCK 1/2-13
7	1	404485	ACTUATOR END-CAP PLUG
8	1	456695	ACTUATOR COVER STOP

404486-002 [60G - 150G INSULATED, & 80G -150G UN-INSULATED]

Parts List

ITEM	QTY	PART NUMBER	TITLE
1	1	404483-001	SLEEVE WELDMENT
2	1	455879	ROD ACTUATOR LUG
3	3	408505	WASHER NYLON 1.355 X .52
4	2	408506	NYLON SHOULDER WASHER
6	1	405591	NUT SS LOCK 1/2-13
5	1	408531	SPRING 8" X 1 1/4" X 5/8"
7	1	404485	ACTUATOR END-CAP PLUG
8	1	456695	ACTUATOR COVER STOP

MOUNTING HARDWARE FOR ACTUATORS

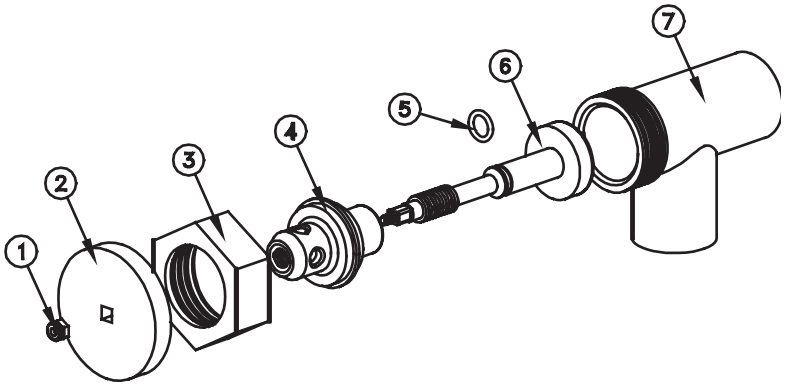
Parts List

ITEM	QTY	PART NUMBER	TITLE
1	1	450425	BOLT HHCS SS 3/8-16 x 1-1/4
2	1	450669	CAP NUT S/S 3/8-16
2*	1	400069	3/8-16 BREAK-AWAY NUT (*PRISON PACKAGE OPTION)
3	1	450675	CAP NUT BCP 1/4-20
3*	1	400048	1/4-20 BREAK-AWAY NUT (*PRISON PACKAGE OPTION)
4	1	450418	BOLT SS HEX 1/4-20 X 7/8
5	2	450403	WASHER SS 1/4" ID
6	1	456644	SLEEVE ACTUATOR LUG

Section VI: Parts List

Compression Draw-Off Parts List & Assembly

Fig. 6.2: Compression Draw-Off Assembly Diagram



Item No.	Description	Part Number		
		1 ½"	2"	3"
1	Nut, handle	408392	408392	408207
2	Handle, round stainless steel	408359	408359-2	408360
3	Hex bonnet nut	450033-01	450032-01	440234-01
4	Faucet gland	460097-01	410228-01	440233-01
5	"O" ring	400382	400382-2	400382-3
6	Stem with viton coating	440131-01RV	440058-01RV	400346-01RV
Compression draw-off valve (complete)		405932	405932-2	405995

Installation Checklist

Proper operation of your Gas Self-Contained Steam Jacketed Kettle is dependent upon proper installation. Performing the following checks at the time of installation could avoid unnecessary service calls.

IMPORTANT: Recording the following information is necessary for your warranty to be valid.

	Item	Reference Section	Verify Completion
1.	Verify that specified clearances are met.	Installation 1. Positioning the Unit	
2.	Verify that ventilation hood requirements comply with all code requirements. It is the responsibility of the owner and/or installer to learn and comply with these codes.	Installation 1. Positioning the Unit	
3.	Verify the voltage requirements and electrical connections were checked.	Installation 3. Electrical Connection	
4.	Verify that a sediment trap and manual shut-off valve is installed in the gas supply line.	Installation 4. Gas Connection	
5.	Verify that the gas valve inlet and outlet readings were checked. Record the information on the following lines. The readings must be within the ranges specified in Fig. 1.3.	Installation 4. Gas Connection	
6.	Verify that actuators are adjusted to hold cover in proper position	Service & Maintenance 2. Actuator Maintenance and Adjustment	

Record Gas Supply Pressure Readings			
All other equipment on the same gas supply line turned ON		All other equipment on the same gas supply line turned OFF	
Inlet		Inlet	
Outlet		Outlet	

Maintenance & Service Log

For Service: Call Toll-Free (800) 480-0415, within the Continental United States and Hawaii. They are available 7 days a week from (7:00 a.m. through 7:00 p.m., Eastern Standard Time).

Model No.: _____ Purchased From: _____

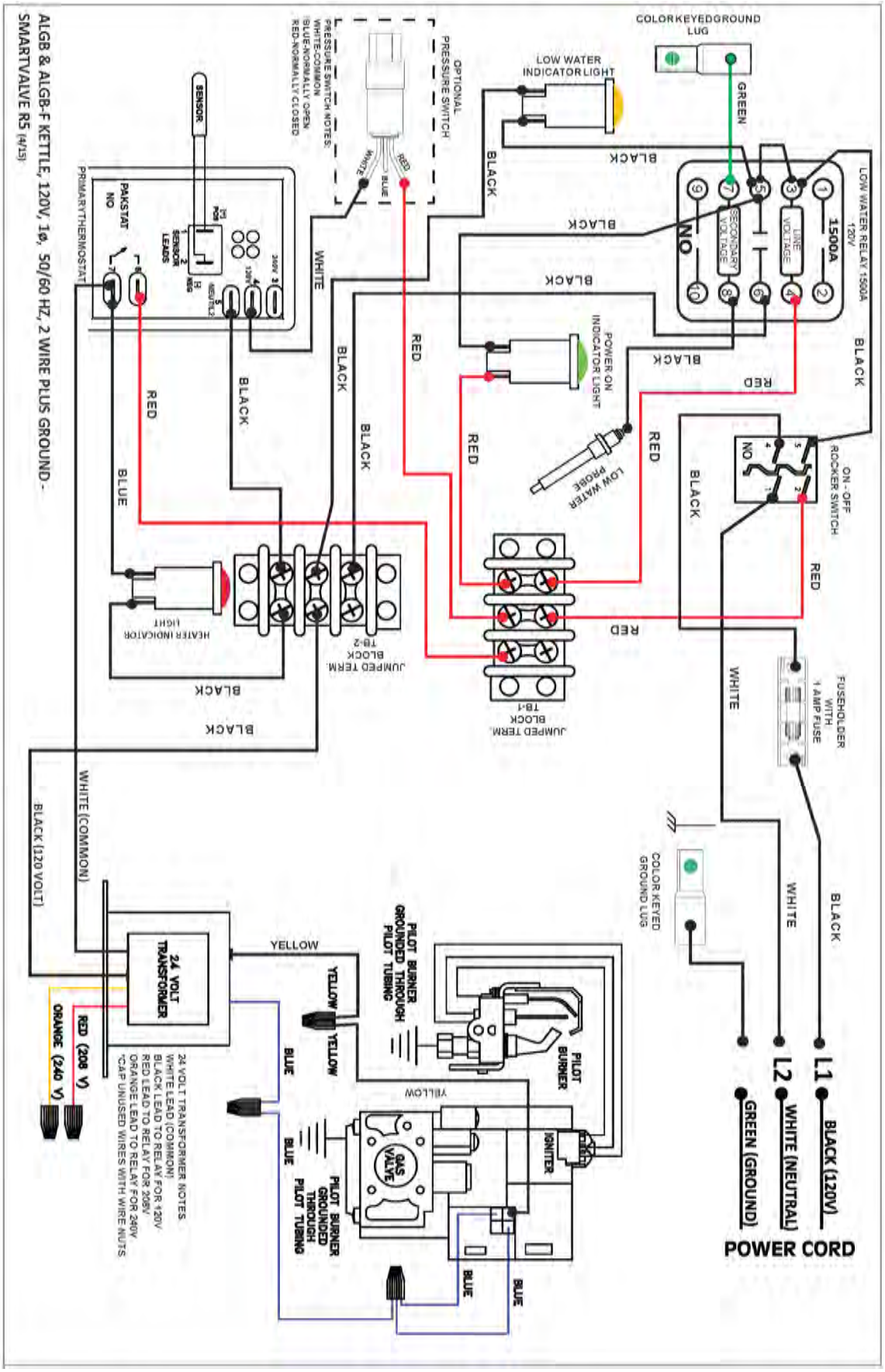
Serial No.: _____ Date Purchased: _____

Purchase Order No.: _____ Location Installed: _____

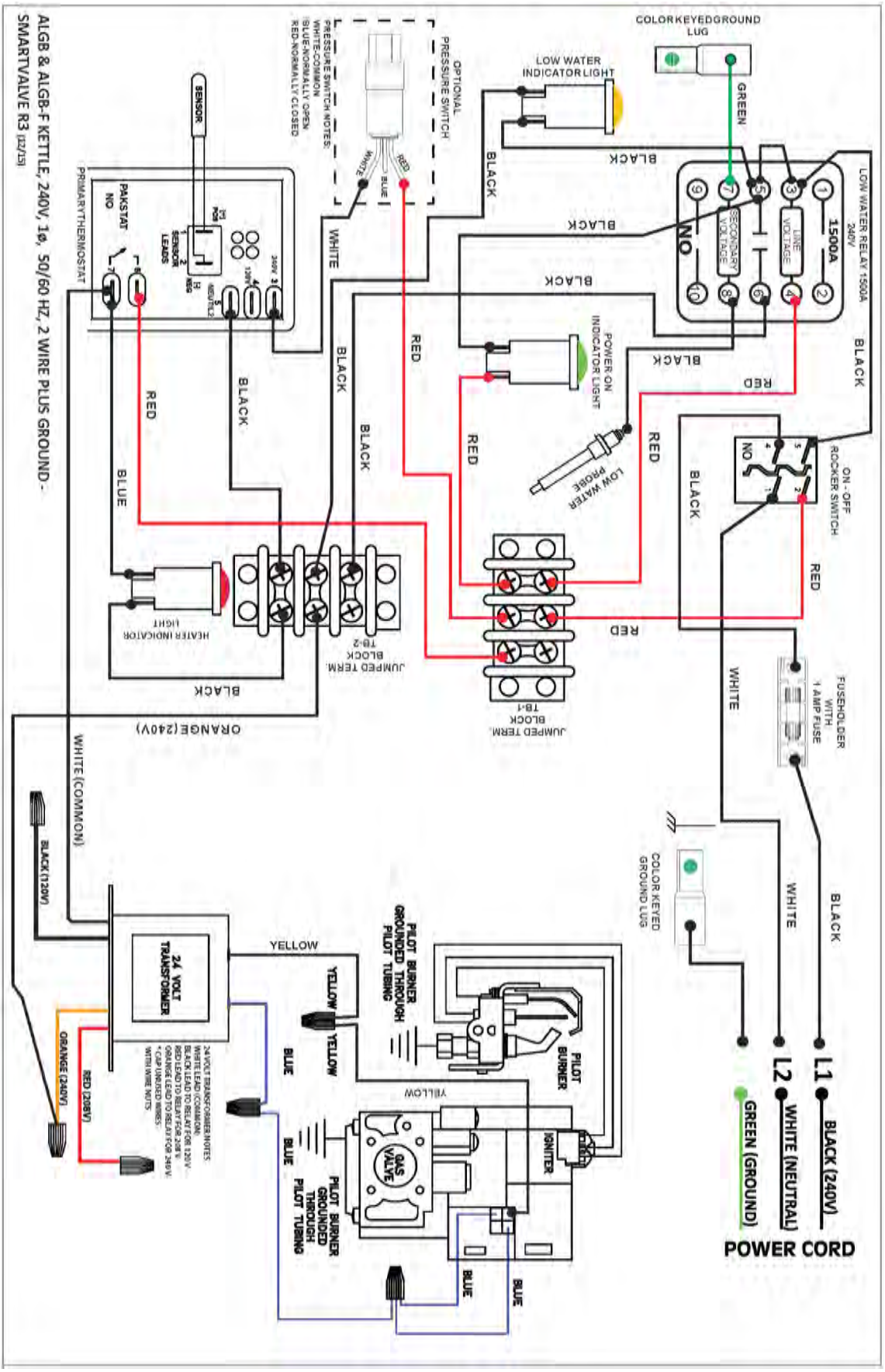
Date Installed: _____

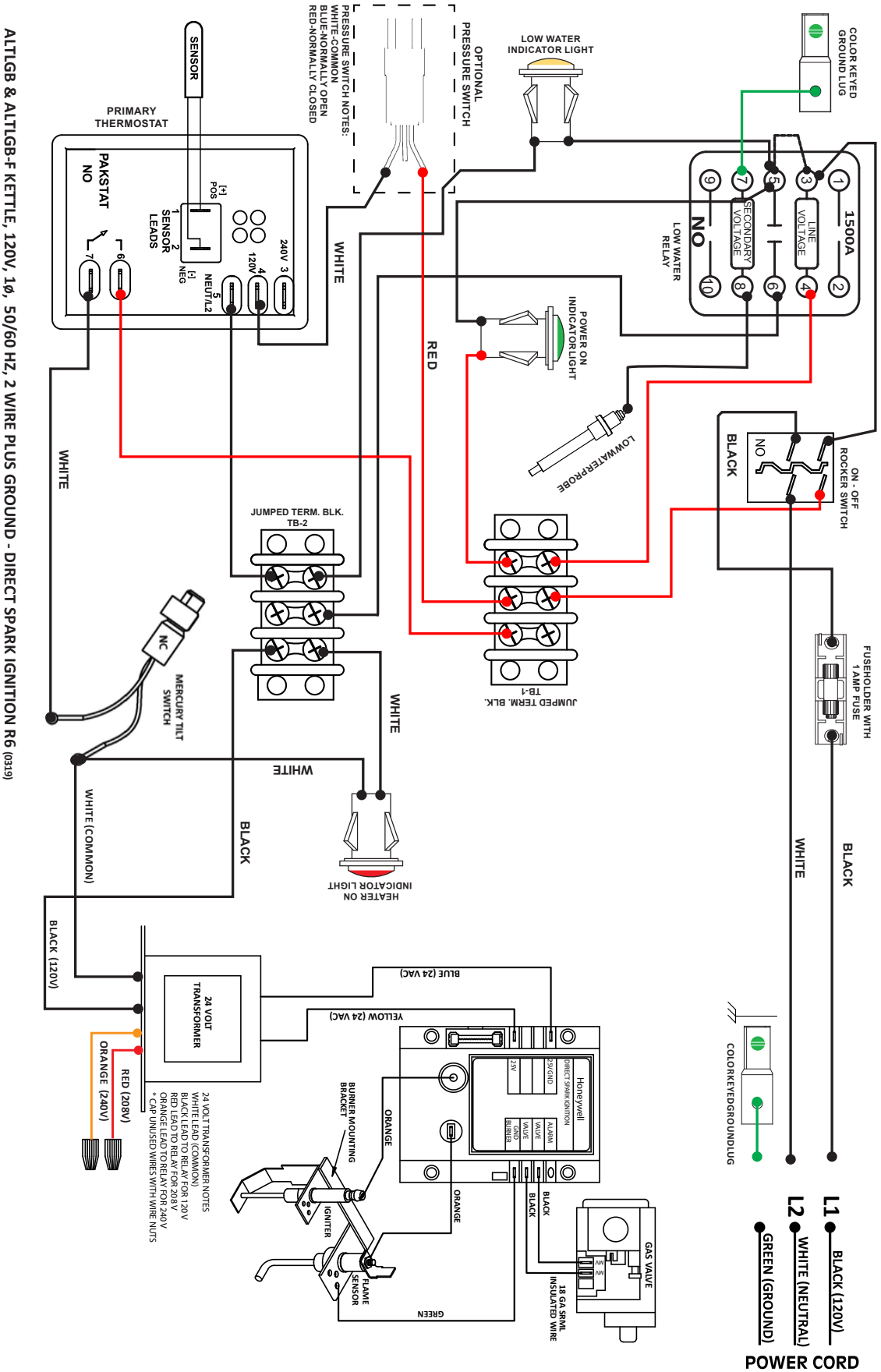
Date	Maintenance Performed:	Performed By:

120V/1PH


ALGB & ALGB-F KETTLE, 120V, 1ø, 50/60 HZ, 2 WIRE PLUS GROUND - SMARTVALVE R5 (4/15)
COLOR KEYED GROUND LUG
LOW WATER INDICATOR LIGHT
GREEN
LOW WATER RELAY 150A 120V
1500A
LINE VOLTAGE
SECONDARY VOLTAGE
NO
BLACK
OPTIONAL PRESSURE SWITCH
PRESSURE SWITCH NOTES:
WHITE-COMMON
BLUE-NORMALLY OPEN
RED-NORMALLY CLOSED
SENSOR
PRIMARY THERMOSTAT
PAKSTAT NO
SENSOR LEADS
WHITE
RED
BLUE
POWER ON INDICATOR LIGHT
LOW WATER PROBE
ON - OFF ROCKER SWITCH
FUSEHOLDER WITH 1 AMP FUSE
HEATER INDICATOR LIGHT
JUMPED TERM. BLOCK TB-2
JUMPED TERM. BLOCK TB-1
COLOR KEYED GROUND LUG
L1
BLACK (120V)
L2
WHITE (NEUTRAL)
GREEN (GROUND)
POWER CORD
WHITE (COMMON)
BLACK (120 VOLT)
24 VOLT TRANSFORMER
YELLOW
ORANGE (240 V)
RED (208 V)
24 VOLT TRANSFORMER NOTES
WHITE LEAD (COMMON)
BLACK LEAD TO RELAY FOR 120V
RED LEAD TO RELAY FOR 208V
ORANGE LEAD TO RELAY FOR 240V
*CAP UNUSED WIRES WITH WIRE NUTS
PILOT BURNER GROUNDED THROUGH PILOT TUBING
PILOT BURNER
IGNITER
GAS VALVE
BLUE

240V/1PH


ALGB & ALGB-F KETTLE, 240V, 1ø, 50/60 HZ, 2 WIRE PLUS GROUND - SMARTVALVE R3 (12/15)
COLOR KEYED GROUND LUG
GREEN
LOW WATER INDICATOR LIGHT
LOW WATER RELAY 1500A 240V
1500A
LINE VOLTAGE
SECONDARY VOLTAGE
NO
BLACK
OPTIONAL PRESSURE SWITCH
PRESSURE SWITCH NOTES:
WHITE-COMMON
BLUE-NORMALLY OPEN
RED-NORMALLY CLOSED
WHITE
RED
BLUE
SENSOR
PRIMARY THERMOSTAT
PAKSTAT NO
SENSOR LEADS
POWER ON INDICATOR LIGHT
LOW WATER PROBE
ON - OFF ROCKER SWITCH
FUSEHOLDER WITH 1 AMP FUSE
HEATER INDICATOR LIGHT
JUMPED TERM. BLOCK TB-2
JUMPED TERM. BLOCK TB-1
ORANGE (240V)
WHITE (COMMON)
BLACK (120V)
24 VOLT TRANSFORMER
YELLOW
PILOT BURNER GROUNDED THROUGH PILOT TUBING
PILOT BURNER
IGNITER
GAS VALVE
COLOR KEYED GROUND LUG
L1
L2
BLACK (240V)
WHITE (NEUTRAL)
GREEN (GROUND)
POWER CORD
24 VOLT TRANSFORMER NOTES
WHITE LEAD TO COMMON
BLACK LEAD TO RELAY FOR 120V
BLUE LEAD TO RELAY FOR 208V
ORANGE LEAD TO RELAY FOR 240V
* CAP UNUSED WIRES WITH WIRE NUTS
ORANGE (240V)
RED (208V)



ALTLGB & ALTLGB-F KETTLE, 120V, 1ø, 50/60 HZ, 2 WIRE PLUS GROUND - DIRECT SPARK IGNITION R6 (0319)

U.S. & Canada Sales Only

LIMITED WARRANTY

One Year Parts and LaborOne Year Parts and Labor

AccuTemp Products, Inc. (AccuTemp) warrants that your AccuTemp equipment will be free of defects in material and workmanship under normal use for a period of twelve (12) months from installation or fifteen (15) months from date of shipment from AccuTemp, whichever date first occurs (the Warranty Period). Registration of AccuTemp equipment is required at time of installation.

Damage to AccuTemp equipment that occurs during shipment must be reported to the carrier, and is not covered under this warranty. The reporting of any damage during shipment is the sole responsibility of the commercial purchaser/user of such AccuTemp equipment.

AccuTemp provides an active service department, which should be contacted and advised of service issues regardless of warranty period.

During the warranty period, AccuTemp agrees to repair or replace, at its option, F.O.B. factory, any part which proves to be defective due to defects in material or workmanship, provided the equipment has not been altered in any way and has been properly installed, maintained, and operated in accordance with the instructions in the AccuTemp Owners Manual.

During the warranty period, AccuTemp also agrees to pay for any factory authorized equipment service agency (within the continental United States and Canada) for reasonable labor required to repair or replace, at our option, F.O.B. factory, any part which proves to be defective due to defects in materials or workmanship, provided the service agency has received advance approval from AccuTemp factory service to perform the repair or replacement. This warranty includes travel time not to exceed two hours and mileage not to exceed 50 miles (100 miles round trip), but does not include post start-up assistance or training, tightening of loose fittings or external electrical connections, minor adjustments, gaskets, maintenance, or cleaning. AccuTemp will not reimburse the expense of labor required to replace parts after the expiration of the warranty period.

Proper installation is the responsibility of the dealer, owner-user, or installing contractor and is not covered by this warranty. While AccuTemp products are built to comply with applicable standards for manufacturers, including Underwriters Laboratories (UL) and National Sanitation Foundation (NSF), it is the responsibility of the owner and the installer to comply with any applicable local codes that may exist.

AccuTemp makes no other warranties or guarantees, whether expressed or implied, including any warranties of performance, merchantability, or fitness for any particular purpose. AccuTemp s liability on any claim of any kind, including negligence, with respect to the goods and services covered hereunder, shall in no case exceed the price of the goods and services, or parts thereof, which gives rise to the claim. In no event shall AccuTemp be liable for special, incidental, or consequential damages, or damages in the nature of penalties.

This constitutes the entire warranty, which supersedes and excludes all other warranties, whether written, oral, or implied.

IMPORTANT

Improper installation can affect your warranty. Installation is the responsibility of the Dealer, Owner/User or the Installation Contractor. See: Section One, Installation of the Owner s Manual.

For Service Call 800-480-0415 or email: service@accutemp.net

AccuTemp
INNOVATIVE COOKING EQUIPMENT SOLUTIONS

AccuTemp
INNOVATIVE COOKING EQUIPMENT SOLUTIONS

LIFETIME™
SERVICE & SUPPORT

1-800-480-0415 | service@accutemp.net

IMPORTANT SERVICE INFORMATION

AccuTemp Product, Inc. Technical & Customer Support Technician is available Monday thru Sunday, 7:00am to 7:00pm EST.