

USER'S INFORMATION MANUAL SERIES 41J GAS FIRED STEAM AND HOT WATER HEATING BOILER

WARNING: If the information in this manual is not followed exactly, a fire or explosion may result causing property damage, personal injury or loss of life.

- Do not store or use gasoline or other flammable vapors and liquids in the vicinity of this or any other appliance.

- WHAT TO DO IF YOU SMELL GAS
 - Do not try to light any appliance.
 - Do not touch any electrical switch; do not use any phone in your 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 and service must be performed by a qualified installer, service agency or the gas supplier.

Do not use this boiler if any part has been under water. Immediately call a qualified service technician to inspect the boiler and to replace any part of the control system and any gas control which has been under water.

Should overheating occur or the gas supply fail to shut off, do not turn off or disconnect the electrical supply to the pump. Instead, shut off the gas supply at a location external to the appliance.

Information and specifications outlined in this manual in effect at the time of printing of this manual. ECR International reserves the right to discontinue, change specifications or system design at any time without notice and without incurring any obligation, whatsoever.



PENNCO BOILERS

2201 Dwyer Avenue, Utica NY 13501
web site: www.ecrinternational.com


**INSTRUCTIONS FOR OPERATION AND MAINTENANCE
OF GAS FIRED HOT WATER HEATING BOILER**

RETAIN FOR FUTURE REFERENCE


SAFETY SYMBOLS & WARNINGS


The following defined symbols are used throughout this manual to notify the reader of potential hazards of varying risk levels.

Utica Boilers recommends all boiler maintenance be performed by a trained heating technician.

	DANGER Indicates a hazardous situation which, if not avoided, WILL result in death or serious injury.
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	NOTICE Indicates information which should be followed to ensure proper installation and operation.
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	WARNING Indicates a hazardous situation which, if not avoided, could result in death or serious injury.
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	CAUTION Indicates a hazardous situation which, if not avoided, may result in minor or moderate injury.
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LIGHTING INSTRUCTIONS

WARNING



Before lighting make certain boiler contains water:

- Steam - water visible in gauge glass
- Water - System pressure minimum 12 psi

LIGHTING PROCEDURE


WARNING



If you do not follow these instructions exactly, a fire or explosion may result causing property damage, personal injury or loss of life.

- This appliance is equipped with an ignition device which automatically lights the pilot. Do not try to light the appliance by hand.
- Before operating, smell all around the appliance area for gas. Be sure to smell next to the floor because some gas is heavier than air and will settle on the floor. Read *"What To Do If You Smell Gas"* on front page of this manual.
- Use only your hand to push in or turn the gas control knob. Never use tools. If the knob will not push in or turn by hand, don't try to repair it, call a qualified service technician. Force or attempted repair may result in a fire or explosion.
- Do not use this appliance if any part has been under water. Immediately call a qualified service technician to inspect the appliance and to replace any part of the control system and any gas control which has been under water.

Operating Instructions For Intermittent Pilot System

- STOP!** Read the safety information above.
- Set the thermostat to lowest setting.
- Turn off all electric power to the appliance.
- This appliance is equipped with an ignition device which automatically lights the pilot. Do not try to light the pilot by hand.
- Turn gas control knob clockwise  to "OFF." See Figure 1 or 2.


- Wait (5) minutes to clear out any gas. If you then smell gas, **STOP!** Follow *"What To Do If You Smell Gas"* on front cover of this manual. If you don't smell gas, go on to the next step.
- Turn gas control knob counterclockwise  to "ON."
- Turn on all electric power to the appliance.
- Set thermostat to desired setting.
- If the appliance will not operate, follow the instructions *"To Turn Off Gas To Appliance"* on page 5 and call a qualified service technician or your gas supplier.

Figure 1 - Honeywell VR8300 Series Gas Valve (300/400 Bases)

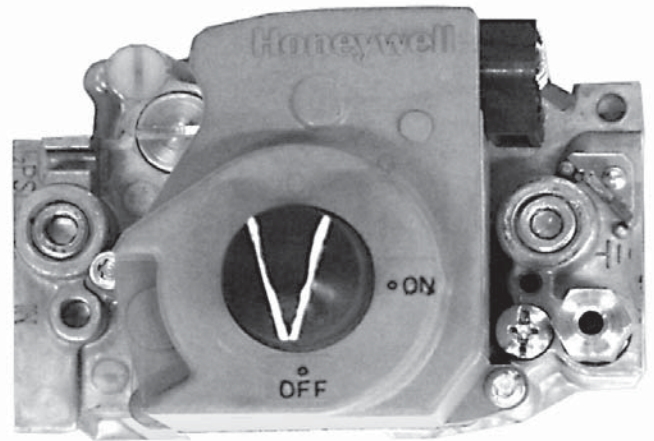
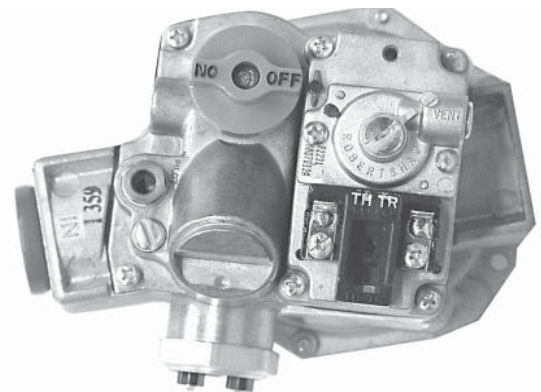



Figure 2 - Robertshaw 7000 DERHC Series Gas Valve (500 Base)



LIGHTING INSTRUCTIONS

To Turn Off Gas To Appliance

1. Set the thermostat to lowest setting.
2. Turn off all electric power to the appliance if service is to be performed.
3. Push in gas control knob slightly and turn clockwise  to "OFF." DO NOT FORCE.

Note Some gas control knobs cannot be turned from "PILOT" to "OFF" unless knob is pushed in slightly. **DO NOT FORCE.**

4. Replace access panel.

GENERAL INSTRUCTIONS

WARNING



Burn and scald hazard. Discharge of water, vapor and steam may scald. Follow these instructions to avoid possible hazard.

Before the beginning of each heating season have a professional service agency check and clean the boiler if necessary. Check for the following:

1. Flue ways for dirt and scale.
2. Venting flue connectors for plugging, sagging, rust through and solid joints.
3. Burners and pilot for proper flame and operation.
4. Gas piping for leaks.
5. Operation of electronics and wiring condition.
6. Functionality of low water cutoff (*steam*).
7. Functionality of Pressure Control.
8. Water pump oiling (*See manufacturer's manual*).
9. Safety relief valve or safety valve.
10. Blow down.
11. Air vents on steam heaters.
12. Operation of other custom system components.
13. Purge air from water systems.
14. Clean and Flush steam systems, if required, and fill to proper level. (See **Figure #3 next page**)

GENERAL INSTRUCTIONS



WARNING

Water and steam are under pressure, open all valves slowly.

Owner should be aware of weekly and monthly maintenance. Since some equipment is non-factory installed, please refer to manufactures literature.

Weekly, do the following. All boilers are equipped with safety valve (steam) or safety relief valve (water). The lever of the safety relief valve should be operated periodically to ensure proper operation. If valve leaks steam when boiler is operating at normal pressure it must be replaced. On steam boilers with manual low water cut-off valves, open purge valve until water flows clear. (*Figure# 3*)

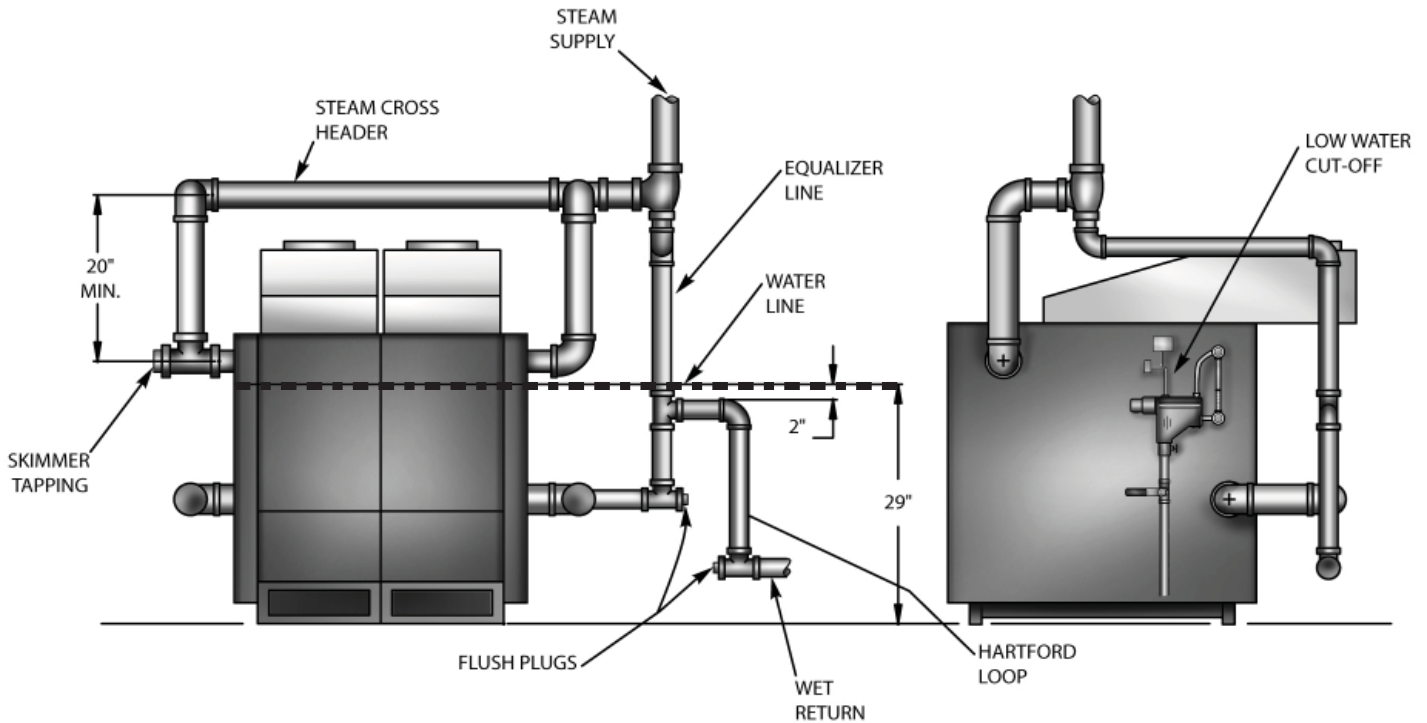


WARNING

Burn and scald hazard. Discharge of water, vapor and steam may scald. Follow these instructions to avoid possible hazard.

STEAM BOILERS: During the heating season the owner should blow down the boiler at least once each month. Before blowing down the boiler, fill it to the water line. Light the burners and allow steam pressure to build up. Run a temporary connection from one of the drain valves. If possible, connect a hose to the drain valve on the opposite side of the boiler from the make up water. Shut off the gas burners, open the drain valve and blow down the entire contents of the boiler. Allow the boiler to thoroughly cool and slowly refill to the water line. Repeat the process as many times as required until the blow-off water is clear.

Figure 3 - Steam Boiler – Optimum Water Level



Maintain proper water level – Flush manual Low Water Cutoff once a week.

Date	Service Performed	Company Name & Tech Initials	Company Address & Phone #



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Date of Installation: _____

Boiler Model #: _____

Installed By: _____



An ISO 9001-2008 Certified Company

ECR International, Inc.

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