

Empire VFSR30NAT

Empire White Mountain Hearth VFSR30NAT 30-Inch Vent-Free Natural Gas Slope Glaze Burner Instruction Manual

Model: VFSR30NAT

1. PRODUCT OVERVIEW

The Empire White Mountain Hearth VFSR30NAT is a 30-inch vent-free slope glaze burner designed for use with natural gas. This burner system incorporates ceramic beads to enhance flame appearance, creating a realistic fire effect. It features a Millivolt Safety Valve with an integrated on/off switch for user control and is remote-ready for convenience. The burner is capable of producing up to 38,000 BTU and requires an Empire "LS" log set of the same size for proper operation.

Key Features:

- **Internal Ceramic Beads:** Designed to tumble gas, creating a dynamic and realistic flame pattern.
- **Millivolt Valve:** Includes an on/off switch for direct control of the burner.
- **Fuel Type:** Operates on Natural Gas.
- **Size:** 30-inch burner, compatible with Empire "LS" log sets of matching size.
- **Heat Output:** Up to 38,000 British Thermal Units (BTU).



Figure 1: The Empire White Mountain Hearth VFSR30NAT 30-inch vent-free natural gas slope glaze burner shown with an Empire "LS" log set and active flames, illustrating its realistic fire appearance.

2. SAFETY INFORMATION

WARNING: Improper installation, adjustment, alteration, service, or maintenance can cause injury or property damage. Read the installation, operating, and maintenance instructions thoroughly before installing or servicing this equipment.

- This appliance is for use with **Natural Gas only**. Do not attempt to use with other fuel types.
- Vent-free gas appliances produce carbon monoxide. Ensure adequate ventilation and never operate in unventilated spaces.
- Always ensure proper clearances to combustible materials as specified in the full installation manual.
- Installation and service must be performed by a qualified installer, service agency, or gas supplier.
- **Proposition 65 Warning:** This product can expose you to chemicals including carbon monoxide, which is known to the State of California to cause birth defects or other reproductive harm. For more information go to www.P65Warnings.ca.gov.
- Do not place clothing or other flammable materials on or near the appliance.
- Keep children and pets away from the appliance when it is in operation.



Figure 2: This icon indicates that the burner is designed for Natural Gas fuel only. Verify your gas supply type before installation.

3. PACKAGE CONTENTS

Upon unpacking, verify that all components are present and undamaged. If any parts are missing or damaged, do not attempt to install or operate the burner. Contact your dealer or the manufacturer immediately.

- VFSR30NAT 30-Inch Vent-Free Slope Glaze Burner Assembly
- Millivolt Safety Valve (pre-installed)
- Instruction Manual
- Mounting hardware (if applicable)

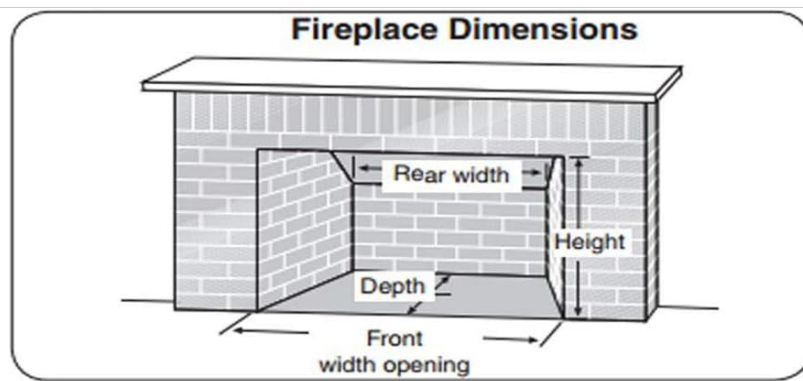
Note: Log sets are sold separately and are required for proper operation and aesthetic completion. Ensure you have an Empire "LS" log set of matching size (30-inch) for this burner.

4. SETUP AND INSTALLATION

Installation of this vent-free gas burner must comply with local codes, or in the absence of local codes, with the National Fuel Gas Code, ANSI Z223.1/NFPA 54. It is strongly recommended that installation be performed by a qualified professional.

4.1 Fireplace Requirements

This burner is designed for installation in a masonry or listed factory-built fireplace. Ensure your fireplace meets the minimum dimensions required for safe operation. Refer to the table below for non-Empire minimum firebox dimensions.



Note: It is recommended that complete firebox dimensions (front width, back wall, and height) be obtained to ensure proper sizing.

Vent-Free Slope Glaze Burners

Model	Description	Log Length (inches)	Btu Input	Non-Empire Minimum Firebox Dimensions				Ship Wt. (lb)
				Front Width (inches)	Rear Width (inches)	Depth (inches)	Height (inches)	
Manual, Standing Pilot/Piezo								
VFSM-18	Slope Glaze Burner	18	32,000	32	21	14	17	22
VFSM-24	Slope Glaze Burner	24	36,000	34	27	14	18	25
VFSM-30	Slope Glaze Burner	30	38,000	38	30	14	20	32
On/Off Millivolt, Standing Pilot								
VFSR-16	Slope Glaze Burner	16	25,000	24	18	11 1/2	18	18
VFSR-18	Slope Glaze Burner	18	32,000	28	17	14	17	24
VFSR-24	Slope Glaze Burner	24	36,000	30	23	14	18	27
VFSR-30	Slope Glaze Burner	30	38,000	34	26	14	20	30
Variable Flame, Includes Variable Remote, Standing Pilot/Piezo								
VFSV-16	Slope Glaze Burner	16	25,000	24	18	11 1/2	18	18
VFSV-18	Slope Glaze Burner	18	32,000	28	17	14	17	24
VFSV-24	Slope Glaze Burner	24	36,000	30	23	14	18	27
VFSV-30	Slope Glaze Burner	30	38,000	34	26	14	20	30
Intermittent Pilot, Includes Thermostat Variable Remote								
VFSE-18	Slope Glaze Burner	18	32,000	28	17	14	17	25
VFSE-24	Slope Glaze Burner	24	36,000	30	23	14	18	28
VFSE-30	Slope Glaze Burner	30	38,000	34	26	14	20	31

Figure 3: Diagram illustrating key fireplace dimensions (Front width opening, Rear width, Depth, Height) and a table detailing minimum non-Empire firebox dimensions for various Vent-Free Slope Glaze Burner models, including the VFSR-30.

4.2 Gas Connection

Connect the burner to your natural gas supply line. All gas connections must be leak-tested before operating the appliance. Use only approved gas piping and fittings.

4.3 Millivolt Wiring

The Millivolt Safety Valve system requires specific wiring for operation, including connections for the thermopile, thermocouple, and optional remote control or wall switch. Refer to the wiring diagram for correct connections.

MILLIVOLT WIRING

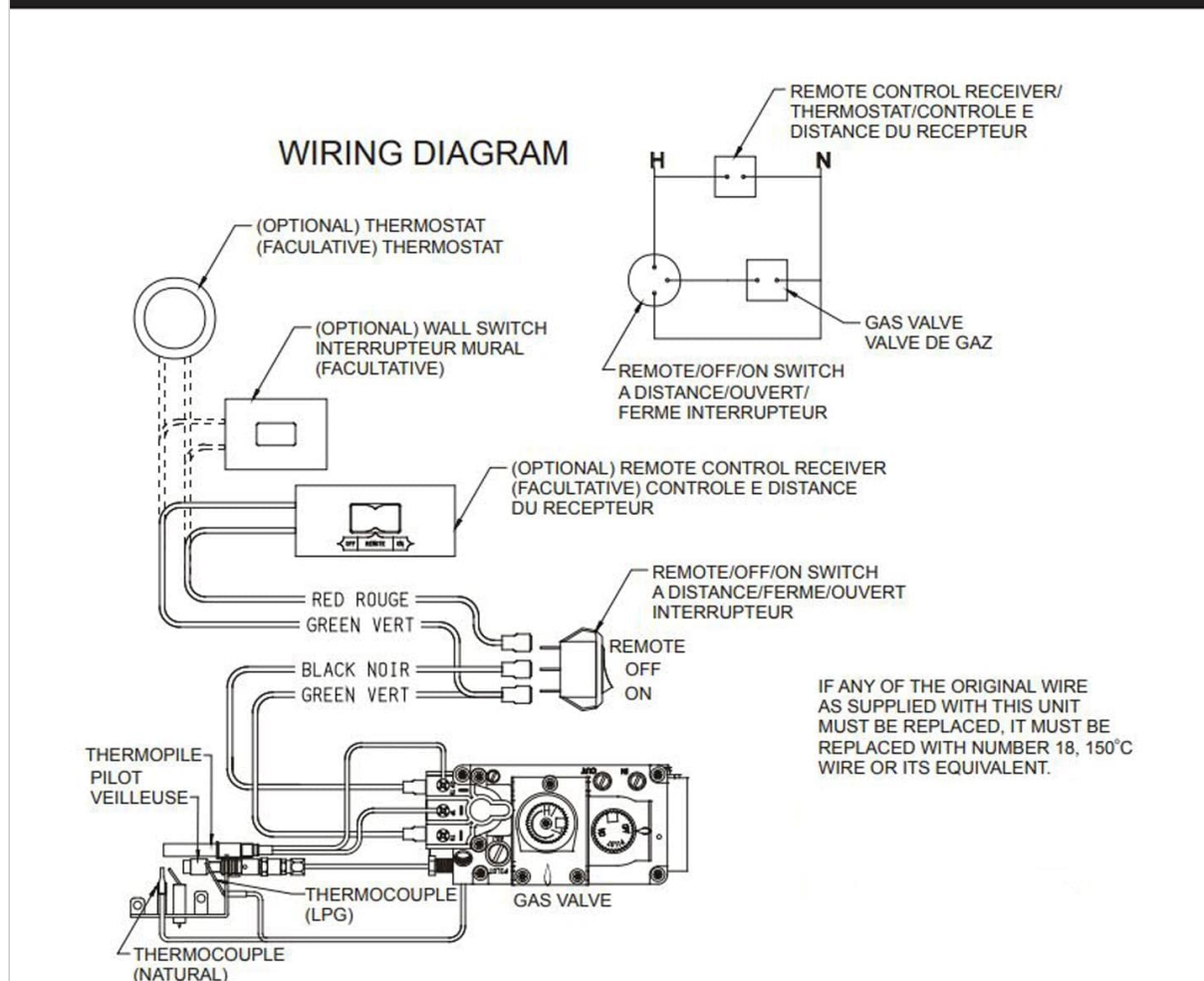


Figure 4: Detailed wiring diagram for the Millivolt system, showing connections for the gas valve, thermopile, thermocouple, and optional remote control receiver or wall switch. Ensure all wiring is performed by a qualified technician.

4.4 Log Set Placement

Carefully place the Empire "LS" log set onto the burner according to the log set's specific instructions. Incorrect log placement can affect flame appearance and burner performance, and may lead to carbon monoxide production.

5. OPERATING INSTRUCTIONS

5.1 Lighting the Pilot

1. Ensure the gas supply to the appliance is turned on.
2. Locate the control knob on the Millivolt Safety Valve.
3. Push the control knob in and turn it to the "PILOT" position.
4. While holding the knob in, press the igniter button repeatedly until the pilot flame lights.
5. Continue to hold the control knob in for approximately 60 seconds after the pilot lights to allow the thermocouple to heat up.
6. Release the control knob. If the pilot extinguishes, repeat the lighting procedure.
7. Once the pilot is lit, turn the control knob to the "ON" position.

5.2 Turning On the Main Burner

After the pilot is lit and the control knob is in the "ON" position:

- **Manual Operation:** Use the on/off switch located on the Millivolt Safety Valve to turn the main burner on or off.
- **Remote Operation (Optional):** If a remote control receiver is installed, use the remote control to activate the main burner. Refer to your remote control's instructions for pairing and operation.

5.3 Turning Off the Burner

- To turn off the main burner, use the on/off switch or remote control.
- To turn off the pilot, turn the control knob on the Millivolt Safety Valve to the "OFF" position.
- For extended periods of non-use, it is recommended to turn off the gas supply to the appliance.

6. MAINTENANCE

Regular maintenance ensures safe and efficient operation of your burner. All maintenance should be performed by a qualified service technician.

- **Annual Inspection:** Have the burner and gas connections inspected annually by a qualified service technician. This includes checking for gas leaks, proper pilot and main burner operation, and condition of the ceramic beads and log set.
- **Cleaning:** Keep the burner area free from dust, lint, and debris. Use a soft brush or vacuum cleaner to gently clean the burner ports and pilot assembly. Do not use abrasive cleaners.
- **Log Set:** Inspect the log set periodically for cracks or deterioration. Replace any damaged logs to maintain proper flame pattern and safety.
- **Ceramic Beads:** Ensure the ceramic beads are properly positioned over the burner. If they become dislodged, carefully reposition them according to the original setup.

7. TROUBLESHOOTING

If you experience issues with your burner, consult the following common troubleshooting steps. For problems not listed or if issues persist, contact a qualified service technician.

Problem	Possible Cause	Solution
Pilot will not light.	No gas supply; air in gas line; faulty igniter; pilot orifice clogged; thermocouple/thermopile issue.	Ensure gas supply is on. Bleed air from line. Check igniter spark. Clean pilot orifice. Inspect thermocouple/thermopile connections.
Pilot lights but will not stay lit.	Thermocouple not heating sufficiently; faulty thermocouple/thermopile; control knob not held long enough.	Hold control knob in for 60 seconds. Ensure pilot flame engulfs thermocouple. Replace faulty thermocouple/thermopile.
Main burner will not light.	Pilot not lit; control knob not in "ON" position; main burner orifice clogged; faulty Millivolt valve; remote control issue.	Light pilot. Turn control knob to "ON". Clean burner orifice. Check Millivolt valve. Check remote battery/pairing.
Poor flame appearance.	Incorrect log placement; burner ports clogged; low gas pressure.	Adjust log placement per log set instructions. Clean burner ports. Verify gas pressure with a qualified technician.

8. SPECIFICATIONS

Attribute	Detail
Model Name	White Mountain Hearth
Model Number	VFSR30NAT
Brand	Empire
Burner Size	30-Inch
Fuel Type	Natural Gas
Ventilation Type	Vent-Free
Heat Output	38,000 British Thermal Units (BTU)
Power Source	Gas Powered
Burner Type	Ceramic
Material	Ceramic
Product Dimensions (Approx.)	17.5"D x 33"W x 9.25"H
Item Weight	30 Pounds
Installation Type	Freestanding (within a fireplace)
Special Feature	Cordless (Millivolt system)
UPC	720968265630

9. WARRANTY AND SUPPORT













9.1 Warranty Information

This Empire White Mountain Hearth burner comes with a **Limited Warranty**. Specific terms and conditions of the warranty, including coverage duration and what is covered, are typically provided with the product packaging or can be obtained from the manufacturer. Please retain your proof of purchase for warranty claims.

9.2 Customer Support

For technical assistance, parts, or warranty inquiries, please contact Empire customer support. Refer to the contact information provided in your product packaging or visit the official Empire website for the most current support details.

When contacting support, please have your model number (VFSR30NAT) and proof of purchase readily available.

 <p>EMPIRE VFD42FB2ML-6 Owner's Manual</p> <p>Shop genuine replacement parts for EMPIRE VFD42FB2ML-6</p>  <p>Find Your EMPIRE Fireplace Parts... Select From Our Models</p> <p>Manual contents follow</p>	<p>Empire VFD42FB2ML-6 Vent-Free Firebox: Installation and Owner's Manual</p> <p>This manual provides detailed installation instructions, safety guidelines, clearances, maintenance procedures, parts lists, and warranty information for the Empire VFD42FB2ML-6 vent-free firebox and compatible gas log sets. It covers essential information for installers and owners.</p>
  <p>Find Your EMPIRE Fireplace Parts... Select From Our Models</p> <p>Manual contents follow</p>	<p>Empire VFD36FB2AL-4 Deluxe Vent-Free Universal Firebox Installation and Owner's Manual</p> <p>This comprehensive manual provides detailed installation instructions, safety guidelines, clearance requirements, maintenance procedures, parts lists, and warranty information for the Empire VFD36FB2AL-4 Deluxe Vent-Free Universal Firebox. It covers all aspects from initial setup to ongoing care, ensuring safe and efficient operation.</p>
 <p>INSTALLATION INSTRUCTIONS AND OWNER'S MANUAL</p> <p>INSTALLER: Look for the label on the fireplace. Read and follow the instructions carefully.</p> <p>OWNER: Read the instructions carefully before installing the fireplace. Follow the instructions carefully to ensure safe and proper installation.</p> <p>WARNING: Do not use the fireplace for cooking or heating food. Do not use the fireplace for drying clothes or other items. Do not use the fireplace for any other purpose not intended by the manufacturer.</p> <p>CAUTION: Do not touch the fireplace when it is hot. Do not touch the fireplace when it is on. Do not touch the fireplace when it is off.</p> <p>EMPIRE DVCP34BN91(N,P)-1 Direct-Vent Gas Fireplace Insert</p> 	<p>Empire DVCP34BN91(N,P)-1 Direct-Vent Gas Fireplace Installation Instructions and Owner's Manual</p> <p>Comprehensive installation instructions and owner's manual for the Empire DVCP34BN91(N,P)-1 Direct-Vent Gas Fireplace Insert. Covers safety, preparation, installation steps, operation, maintenance, and troubleshooting.</p>
 <p>EMPIRE VFS36FB2DF-4 Owner's Manual</p> <p>Shop genuine replacement parts for EMPIRE VFS36FB2DF-4</p>  <p>Find Your EMPIRE Fireplace Parts... Select From Our Models</p> <p>Manual contents follow</p>	<p>EMPIRE VFS36FB2DF-4 Vent-Free Firebox Owner's Manual and Installation Guide</p> <p>This document provides comprehensive installation instructions and owner's information for the EMPIRE VFS36FB2DF-4 Vent-Free Firebox. It includes critical safety warnings, detailed installation procedures, clearance requirements, maintenance guidelines, parts lists, and accessory information from Empire Comfort Systems.</p>
  <p>Find Your EMPIRE Fireplace Parts... Select From Our Models</p> <p>Manual contents follow</p>	<p>EMPIRE DV-35-4SG Direct Vent Wall Furnace Owner's Manual & Installation Guide</p> <p>Official owner's manual and installation guide for the EMPIRE DV-35-4SG and DV-25-5SG Direct Vent Wall Furnace by Empire Comfort Systems Inc. Covers safety, installation, operation, maintenance, and troubleshooting.</p>
 <p>INSTALLATION INSTRUCTIONS AND OWNER'S MANUAL</p> <p>INSTALLER: Look for the label on the furnace. Read and follow the instructions carefully.</p> <p>OWNER: Read the instructions carefully before installing the furnace. Follow the instructions carefully to ensure safe and proper installation.</p> <p>WARNING: Do not use the furnace for cooking or heating food. Do not use the furnace for drying clothes or other items. Do not use the furnace for any other purpose not intended by the manufacturer.</p> <p>CAUTION: Do not touch the furnace when it is hot. Do not touch the furnace when it is on. Do not touch the furnace when it is off.</p> <p>EMPIRE DV20E-6 DV40E-6 Fan Type Direct-Vent Wall Furnace</p> 	<p>Empire DV20E-6 DV40E-6 Fan Type Direct-Vent Wall Furnace Installation and Owner's Manual</p> <p>Installation and owner's manual for the Empire DV20E-6 and DV40E-6 fan type direct-vent wall furnace. Includes safety information, installation instructions, specifications, gas supply details, and conversion procedures.</p>