Installation Manual

Installation and Appliance Setup

***CAUTION! Risk of Fire! DO NOT** store instruction manuals inside fireplace cavity. High temperatures could cause a fire.*

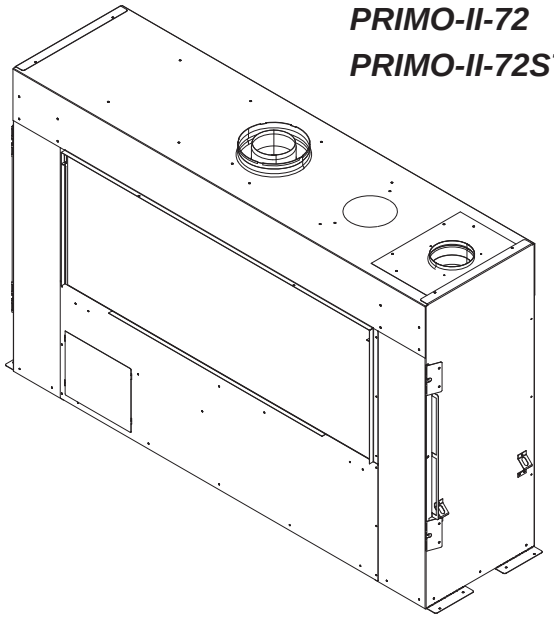
INSTALLER: Leave this manual with the appliance, not inside the appliance.
CONSUMER: Retain this manual for future reference. Do not store inside the appliance.

***NOTICE: DO NOT** discard this manual!*

HEAT&GLO
No one builds a better fire

GAS-FIRED
c UL us
LISTED

Models:
PRIMO-II-48
PRIMO-II-48ST
PRIMO-II-60
PRIMO-II-60ST
PRIMO-II-72
PRIMO-II-72ST



This appliance may be installed as an OEM installation in manufactured home (USA only) or mobile home and must be installed in accordance with the manufacturer's instructions and the *Manufactured Home Construction and Safety Standard, Title 24 CFR, Part 3280* in the United States, or the *Standard for Installation in Mobile Homes, CAN/CSA Z240 MH Series,* in Canada.

This appliance is only for use with the type(s) of gas indicated on the rating plate. This appliance is not convertible for use with other gases, unless a certified kit is used.

⚠ WARNING:
FIRE OR EXPLOSION HAZARD
Failure to follow safety warnings exactly could result in serious injury, death, or property damage.

- **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.
  - Leave the building immediately.
  - 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.

⚠ DANGER



HOT GLASS WILL CAUSE BURNS.

DO NOT TOUCH GLASS UNTIL COOLED.

NEVER ALLOW CHILDREN TO TOUCH GLASS.

A (glass) barrier designed to reduce the risk of burns from the hot viewing glass is provided with this appliance and must be installed for the protection of children and other at-risk individuals.

SafeSurface™ barrier glass must be ordered separately at time of appliance purchase. See Section 12.B.

Pour demander un exemplaire en français de ce Manuel, visitez www.heatnglo.com.

⚠ Safety Alert Key:

- ***DANGER!*** *Indicates a hazardous situation which, if not avoided will result in death or serious injury.*
- ***WARNING!*** *Indicates a hazardous situation which, if not avoided could result in death or serious injury.*
- ***CAUTION!*** *Indicates a hazardous situation which, if not avoided, could result in minor or moderate injury.*
- ***NOTICE:*** *Used to address practices not related to personal injury.*

Note: *The term "recommend" or "recommended" does not indicate a requirement. It is a best practice suggested by Hearth & Home Technologies®.*

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➔ = Contains updated information.

Installation Standard Work Checklist

ATTENTION INSTALLER:

Follow this Standard Work Checklist

This standard work checklist is to be used by the installer in conjunction with, not instead of, the instructions contained in this installation manual.

Customer: _____ **Date Installed:** _____
Lot/Address: _____ **Location of Fireplace:** _____
_____ **Installer:** _____
Model (circle one): PRIMO-II-48, PRIMO-II-60, PRIMO-II-72 **Dealer/Distributor Phone #** _____
PRIMO-II-48ST, PRIMO-II-60ST, PRIMO-II-72ST **Serial #:** _____

WARNING! Risk of Fire or Explosion! *Failure to install appliance according to these instructions could lead to a fire or explosion. Install ONLY components and accessories approved by Hearth & Home Technologies. Unapproved components and accessories could cause fireplace to overheat.*

Appliance Install	YES	IF NO, WHY?
Verified that the chase is insulated and sealed. (Pg. 17)	☐	_____
Verified clearances to combustibles. (Pg. 12-15)	☐	_____
Fireplace is leveled and secured. (Pg. 32)	☐	_____
Venting/Chimney Section 7 (Pg. 33-40)		
Venting configuration complies to vent diagrams. (Section 4)	☐	_____
Required Outside Air Kit Installed	☐	_____
Venting installed, locked and secured in place with proper clearance. (May need to order separately.)	☐	_____
All venting connections are sealed.	☐	_____
Firestops installed.	☐	_____
No insulation or foam materials in contact with venting or between ceiling/wall shield firestops.	☐	_____
Attic insulation shield installed.	☐	_____
Exterior wall/Roof flashing installed and sealed.	☐	_____
Terminations installed and sealed.	☐	_____
HZTERM-ADP installed on Horizontal terminations.	☐	_____
Electrical Section 8 (Pg. 41-45)		
Unswitched power (110-120 VAC) provided to the appliance.	☐	_____
Gas Section 9 (Pg. 46-47)		
Proper appliance for fuel type.	☐	_____
Was a conversion performed?	☐	_____
Leak check performed and inlet pressure verified.	☐	_____
Verified proper air shutter setting for installation type.	☐	_____
Finishing Section 10 (Pg. 48-53)		
Combustible materials not installed in non-combustible areas.	☐	_____
Verified all clearances meet installation manual requirements.	☐	_____
Mantels and wall projections comply with installation manual requirements.	☐	_____
Gas/Electrical Access Plate installed.	☐	_____
Appliance Setup Section 11 (Pg. 54-65)		
All packaging and protective materials removed (inside & outside of appliance).	☐	_____
Refractories, media and optional logs or stones installed correctly.	☐	_____
Firebox glass assemblies installed and secured.	☐	_____
Accessories installed properly.	☐	_____
Safe Surface barrier glass properly installed (must order separately). Required gap maintained ☐ "THIS SIDE OUT" is readable ☐	☐	_____
Manual bag and all of its contents are removed from inside/under the appliance and given to party responsible for use and operation.	☐	_____
Started appliance and verified no gas leaks exist.	☐	_____

Hearth & Home Technologies recommends the following:
- Photographing the installation and copying this checklist for your file.
- That this checklist remain visible at all times on the appliance until the installation is complete.

Comments: Further description of the issues, who is responsible (Installer/ Builder/ Other Trades, etc) and corrective action needed _____

_____

Comments Communicated to party responsible _____ by _____ on _____
(Builder / Gen. Contractor/) (Installer) (Date)

➔ = Contains updated information.

2670-982 Rev. B 1/24

1 Product Specific and Important Safety Information

A. Appliance Certification

MODEL: **PRIMO-II-48, PRIMO-II-48ST,**
PRIMO-II-60, PRIMO-II-60ST,
PRIMO-II-72, PRIMO-II-72ST
LABORATORY: **Underwriters Laboratories, Inc. (UL)**
TYPE: **Vented Decorative Gas Appliances**
STANDARD: **ANSI Z21.50-2019 • CSA 2.22-2019**

This product is listed to ANSI standards for "Vented Decorative Gas Appliances" and "Gas Fired Appliances for Use at High Altitudes". Also Certified for Installation in a Bedroom or a Bedsitting Room.

NOTICE: *This installation must conform with local codes. In the absence of local codes you must comply with the National Fuel Gas Code, ANSI Z223.1-latest edition in the U.S.A. and the CAN/CGA B149 Installation Codes in Canada.*

NOT INTENDED FOR USE AS A HEAT SOURCE.
This appliance is decorative in nature and not intended to be a source of heat.

NOT FOR USE WITH SOLID FUEL.
This appliance is not intended to burn solid fuel.

NOT FOR USE WITH A THERMOSTAT.
This appliance is not to be used with a thermostat. When using the IFT2-RC450 remote control, the Thermostat function is disabled.

B. Glass Specifications

The firebox glass and the SafeSurface barrier glass on this appliance are tempered glass. Hearth & Home Technologies appliances manufactured with tempered glass may be installed in hazardous locations such as bathtub enclosures as defined by the Consumer Product Safety Commission (CPSC). The tempered glass has been tested and certified to the requirements of **ANSI Z97.1** and **CPSC 16 CFR 1202** (Safety Glazing Certification Council **SGCC# 1595** and **1597**. Architectural Testing, Inc. Reports **02-31919.01** and **02-31917.01**).

This statement is in compliance with **CPSC 16 CFR Section 1201.5** "Certification and labeling requirements" which refers to **15** U.S. Code **(USC) 2063** stating "…Such certificate shall accompany the product or shall otherwise be furnished to any distributor or retailer to whom the product is delivered."

Some local building codes require the use of tempered glass with permanent marking in such locations. Glass meeting this requirement is available from the factory. Please contact your dealer or distributor to order.

This appliance requires the installation of SafeSurface™ Glass which keeps the surface temperature of the barrier glass at a safe level and will still be hot to the touch when operated for long periods of time. SafeSurface™ Glass must be ordered with the appliance and installed prior to operation of the appliance. SafeSurface™ Glass complies with the barrier requirements of ANSI Z21.50-2019 CSA 2.22-2019 for vented gas fireplaces. If the barrier glass is removed, the inner glass temperature will be very hot and cause burns.

C. BTU Specifications

Models *(U.S. or Canada)*	**Elevation** *(U.S. or Canada)*	**Maximum Input BTU/h**	**Minimum Input BTU/h**	**Orifice Size (DMS)**
PRIMO-II-48 (NG)	*(0-2000 FT)*	45,000	31,500	#30
PRIMO-II-48 (Propane)	*(0-2000 FT)*	42,000	31,000	#48
PRIMO-II-48ST (NG)	*(0-2000 FT)*	45,000	31,500	#30
PRIMO-II-48ST (Propane)	*(0-2000 FT)*	42,000	31,000	#48
PRIMO-II-60 (NG)	*(0-2000 FT)*	57,000	39,500	#26
PRIMO-II-60 (Propane)	*(0-2000 FT)*	50,000	36,500	#45
PRIMO-II-60ST (NG)	*(0-2000 FT)*	57,000	39,500	#26
PRIMO-II-60ST (Propane)	*(0-2000 FT)*	50,000	36,500	#45
PRIMO-II-72 (NG)	*(0-2000 FT)*	58,500	42,000	#23
PRIMO-II-72 (Propane)	*(0-2000 FT)*	55,000	40,500	#44
PRIMO-II-72ST (NG)	*(0-2000 FT)*	58,500	42,000	#23
PRIMO-II-72ST (Propane)	*(0-2000 FT)*	55,000	40,500	#44

D. High Altitude Installations

NOTICE: *If the heating value of the gas has been reduced, these rules do not apply. Check with your local gas utility or authorities having jurisdiction.*

When installing above 2000 feet elevation:

- In the USA: Reduce input rate 4% for each 1000 feet above 2000 feet.
- In CANADA: Input ratings are certified without a reduction of input rate for elevations up to 4500 feet (1370 m)above sea level. Please consult provincial and/or local authorities having jurisdiction for installations at elevations above 4500 feet (1370 m).

Check with your local gas utility to determine proper orifice size.

E. Non-Combustible Materials Specification

Material which will not ignite and burn. Such materials are those consisting entirely of steel, iron, brick, tile, concrete, slate, glass or plasters, or any combination thereof.

Materials that are reported as passing **ASTM E 136, Standard Test Method for Behavior of Materials in a Vertical Tube Furnace at 750 ºC** shall be considered non-combustible materials.

F. Combustible Materials Specification

Materials made of or surfaced with wood, compressed paper, plant fibers, plastics, or other material that can ignite and burn, whether flame proofed or not, or plastered or unplastered shall be considered combustible materials.

G. Electrical Codes

NOTICE: *This appliance must be electrically wired and grounded in accordance with local codes or, in the absence of local codes, with* **National Electric Code ANSI/NFPA 70-latest edition** *or the* **Canadian Electric Code CSA C22.1.**

- A 110-120 VAC circuit for this product must be protected with ground-fault circuit interrupter protection, in compliance with the applicable electrical codes, when it is installed in locations such as in bathrooms or near sinks.

H. California

WARNING: This product and the fuels used to operate this product (liquid propane or natural gas), and the products of combustion of such fuels, can expose you to chemicals including benzene, which is known to the State of California to cause cancer and reproductive harm. For more information go to: www.P65Warnings.ca.gov.

Note: The following requirements reference various Massachusetts and national codes not contained in this document.

I. Requirements for the Commonwealth of Massachusetts

For all side wall horizontally vented gas fueled equipment installed in every dwelling, building or structure used in whole or in part for residential purposes, including those owned or operated by the Commonwealth and where the side wall exhaust vent termination is less than seven (7) feet above finished grade in the area of the venting, including but not limited to decks and porches, the following requirements shall be satisfied:

Installation of Carbon Monoxide Detectors

At the time of installation of the side wall horizontal vented gas fueled equipment, the installing plumber or gas fitter shall observe that a hard wired carbon monoxide detector with an alarm and battery back-up is installed on the floor level where the gas equipment is to be installed. In addition, the installing plumber or gas fitter shall observe that a battery operated or hard wired carbon monoxide detector with an alarm is installed on each additional level of the dwelling, building or structure served by the side wall horizontal vented gas fueled equipment. It shall be the responsibility of the property owner to secure the services of qualified licensed professionals for the installation of hard wired carbon monoxide detectors.

In the event that the side wall horizontally vented gas fueled equipment is installed in a crawl space or an attic, the hard wired carbon monoxide detector with alarm and battery back-up may be installed on the next adjacent floor level.
In the event that the requirements of this subdivision can not be met at the time of completion of installation, the owner shall have a period of thirty (30) days to comply with the above requirements; provided, however, that during said thirty (30) day period, a battery operated carbon monoxide detector with an alarm shall be installed.

Approved Carbon Monoxide Detectors

Each carbon monoxide detector as required in accordance with the above provisions shall comply with NFPA 720 and be ANSI/UL 2034 listed and IAS certified.

Signage

A metal or plastic identification plate shall be permanently mounted to the exterior of the building at a minimum height of eight (8) feet above grade directly in line with the exhaust vent terminal for the horizontally vented gas fueled heating appliance or equipment. The sign shall read, in print size no less than one-half (1/2) in. in size, **"GAS VENT DIRECTLY BELOW. KEEP CLEAR OF ALL OBSTRUCTIONS".**

Inspection

The state or local gas inspector of the side wall horizontally vented gas fueled equipment shall not approve the installation unless, upon inspection, the inspector observes carbon monoxide detectors and signage installed in accordance with the provisions of 248 CMR 5.08(2)(a)1 through 4.

Exemptions

The following equipment is exempt from 248 CMR 5.08(2)(a)1 through 4:

- The equipment listed in Chapter 10 entitled "Equipment Not Required To Be Vented" in the most current edition of NFPA 54 as adopted by the Board; and
- Product Approved side wall horizontally vented gas fueled equipment installed in a room or structure separate from the dwelling, building or structure used in whole or in part for residential purposes.

MANUFACTURER REQUIREMENTS

Gas Equipment Venting System Provided

When the manufacturer of Product Approved side wall horizontally vented gas equipment provides a venting system design or venting system components with the equipment, the instructions provided by the manufacturer for installation of the equipment and the venting system shall include:

- Detailed instructions for the installation of the venting system design or the venting system components; and
- A complete parts list for the venting system design or venting system.

Gas Equipment Venting System NOT Provided

When the manufacturer of a Product Approved side wall horizontally vented gas fueled equipment does not provide the parts for venting the flue gases, but identifies "special venting systems", the following requirements shall be satisfied by the manufacturer:

- The referenced "special venting system" instructions shall be included with the appliance or equipment installation instructions; and
- The "special venting systems" shall be Product Approved by the Board, and the instructions for that system shall include a parts list and detailed installation instructions.

A copy of all installation instructions for all Product Approved side wall horizontally vented gas fueled equipment, all venting instructions, all parts lists for venting instructions, and/or all venting design instructions shall remain with the appliance or equipment at the completion of the installation.

See Gas Connection section for additional Commonwealth of Massachusetts requirements.

2 Getting Started

A. Design and Installation Considerations

WARNING! Risk of Fire or Explosion! *Read all instructions before starting the installation.*

Direct vent gas appliances are designed to operate with all combustion air siphoned from outside of the building and all exhaust gases expelled to the outside.

The PRIMO-II operates using a combustion fan, which supplies air to the firebox for combustion and a convection fan that circulates air to keep the SafeSurface glass and components of the appliance cool. For more information refer to Section 12.C QR Codes.

Installation MUST comply with local, regional, state and national codes and regulations. Consult insurance carrier, local building inspector, fire officials or authorities having jurisdiction over restrictions, installation inspection and permits.

Before installing, determine the following:

- Where the appliance is to be installed.
- The vent system configuration to be used.
- Gas supply piping requirements.
- Provisions for optional heat management system.
- Electrical wiring requirements.
- Framing and finishing details.
- Whether optional accessories are desired.

Installation and service of this appliance should be performed by qualified personnel. Hearth & Home Technologies recommends HHT Factory Trained or NFI certified professionals.

hearthED FACTORY TRAINING Fuel Your Fire

NFI NATIONAL FIREPLACE INSTITUTE® A CERTIFICATION AGENCY

Improper installation, adjustment, alteration, service or maintenance can cause injury or property damage. For assistance or additional information, consult a qualified service technician, service agency or your dealer.

B. Good Faith Wall Surface/TV Guidelines

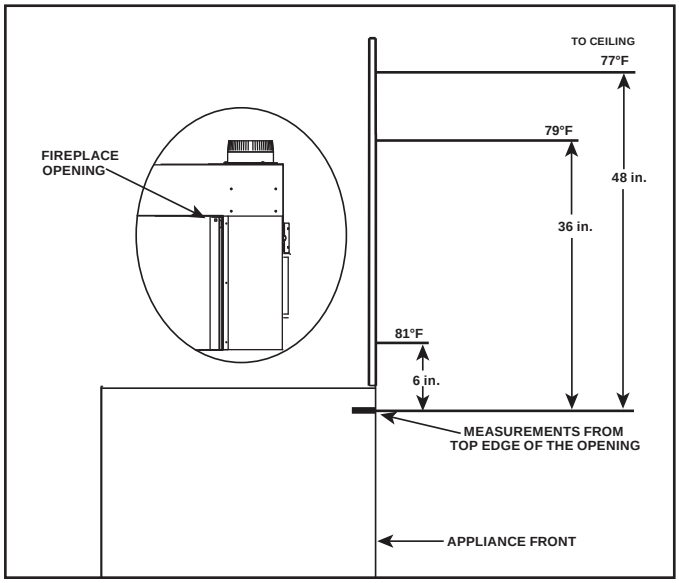
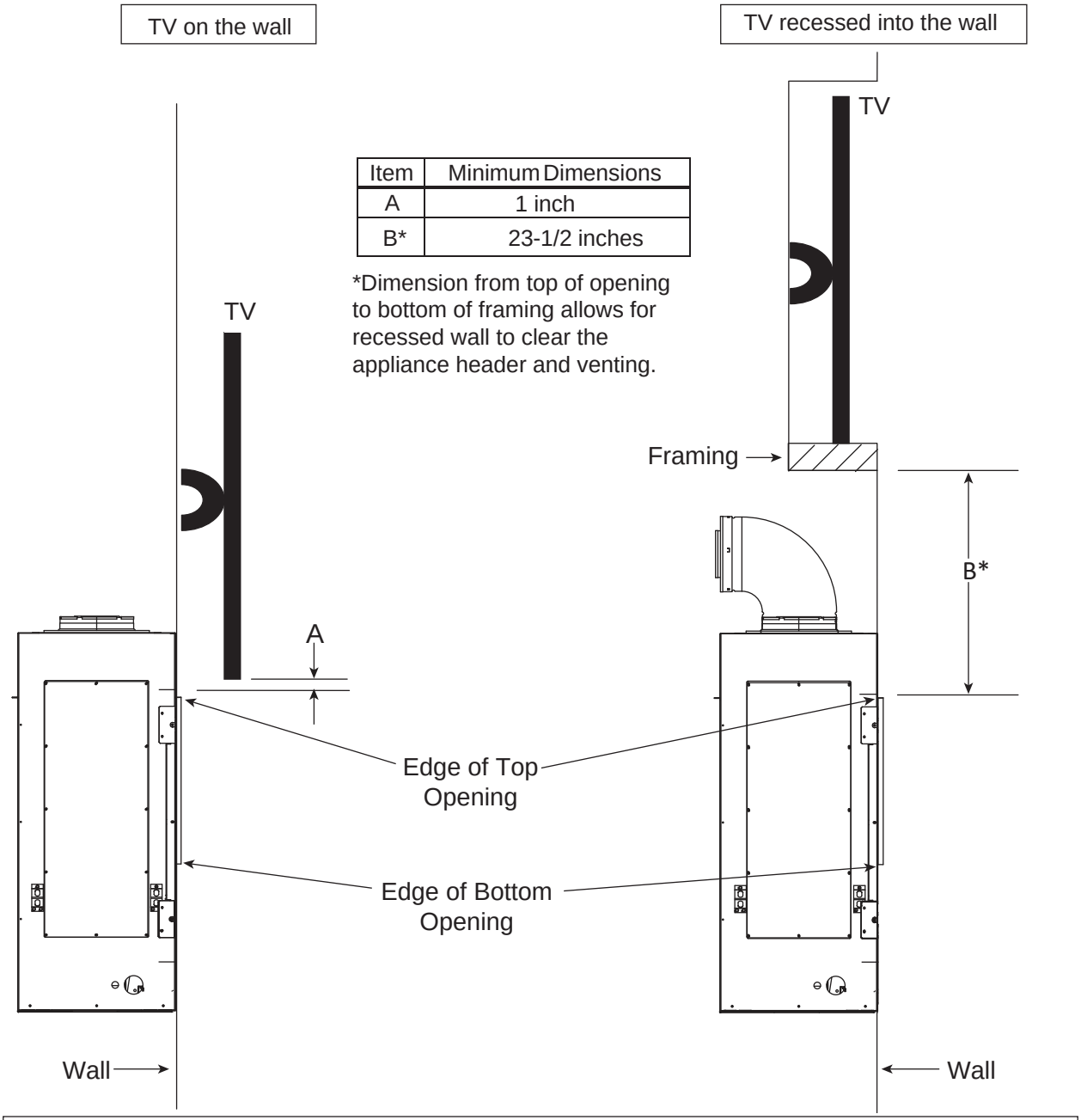


Figure 2.1 Good Faith Wall Surface Temperatures Above Appliance

NOTICE: *Surface temperatures listed above are taken with a temperature measuring probe as prescribed by the test standard used for appliance certification. Temperatures on walls or mantels taken with an infrared thermometer may yield increased temperatures of up to 30 °F (17 °C) or more depending on the thermometer settings and material characteristics being measured. Use appropriate finishing materials that are able to withstand these conditions. For additional finishing guidelines, see Section 10.*

Good Faith Guidelines for TV Installations above Fireplace



Item	Minimum Dimensions
A	1 inch
B*	23-1/2 inches

*Dimension from top of opening to bottom of framing allows for recessed wall to clear the appliance header and venting.

Notes:

1. These are good faith recommended clearances only and not a guarantee of compliance with all TV manufacturers' maximum allowable operating temperatures.
2. Since every home has unique air flow characteristics and maximum allowable operating temperatures can vary from manufacturer to manufacturer and from model to model, actual TV temperatures should be validated at the time of each installation. TVs should not be used in situations where the actual TV temperature exceeds the manufacturers' maximum allowable operating temperatures identified in the TV's technical specifications. Contact the TV's manufacturer directly if you cannot locate this information or have questions regarding the information.
3. Mantel height and depth must conform to mantel requirements specified in the fireplace installation manual.
4. "A" dimension taken from the top of the fireplace opening.
5. Suggestions on how to further reduce TV temperatures: Increase "A" dimension.

Figure 2.2 Good Faith TV Guidelines

C. Tools and Supplies Needed

Before beginning the installation be sure that the following tools and building supplies are available.

Hand Tools	Tape measure
Level	Framing material
Manometer	Framing square
Voltmeter	Electric drill and bits (1/4 in.)
Plumb line	Safety glasses/Gloves
Wrenches	Reciprocating saw

1/4 in. nut driver

Non-corrosive leak check solution

1/2 - 3/4 in. length, #6 or #8 Self-drilling screws

Caulking material (300 ºF minimum continuous exposure rating)

Optional Tool: CARRY-HANDLE

PRIMO-II models are equipped with brackets on the left and right sides for the optional CARRY-HANDLE tool, used to aid in moving the appliance. Install handles on PRIMO-II per the instructions included with the handles. Contact your dealer to order. Quantity of two required.

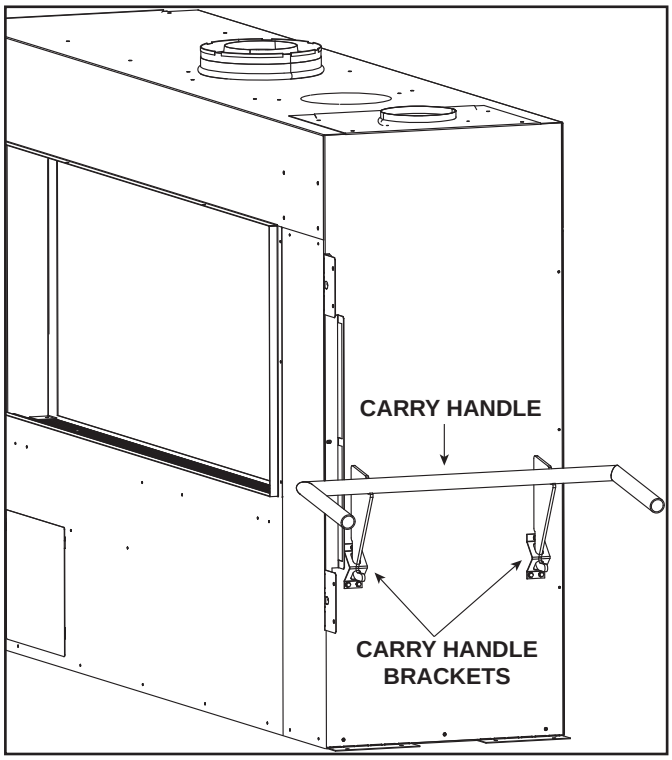


Figure 2.3 Optional CARRY-HANDLE Tool

D. Inspect Appliance and Components

WARNING! Risk of Fire or Explosion! *Damaged parts could impair safe operation.* ***DO NOT i****nstall damaged, incomplete or substitute components. Keep appliance dry.*

WARNING! Risk of Fire, Explosion or Electric Shock! DO NOT *use this appliance if any part has been under water. Call a qualified service technician to inspect the appliance and to replace any part of the control system and/or gas control which has been under water.*

- Carefully remove the appliance and components from the packaging.
- The vent system components and SafeSurface barrier glass will be shipped in separate packages.
- If packaged separately, the log set and appliance grate must be installed.
- Report to your dealer any parts damaged in shipment.
- This product is factory-equipped with an IntelliFire Touch® remote control, which was paired to the appliance at the factory. This specific remote control needs to remain with the contents of the manual bag.

Hearth & Home Technologies disclaims any responsibility for, and the warranty will be voided by, the following actions:

- Installation and use of any damaged appliance or vent system component.
- Modification of the appliance or vent system.
- Installation other than as instructed by Hearth & Home Technologies.
- Improper positioning of the logs/media (as applicable) or the glass assembly.
- Installation and/or use of any component part not approved by Hearth & Home Technologies.

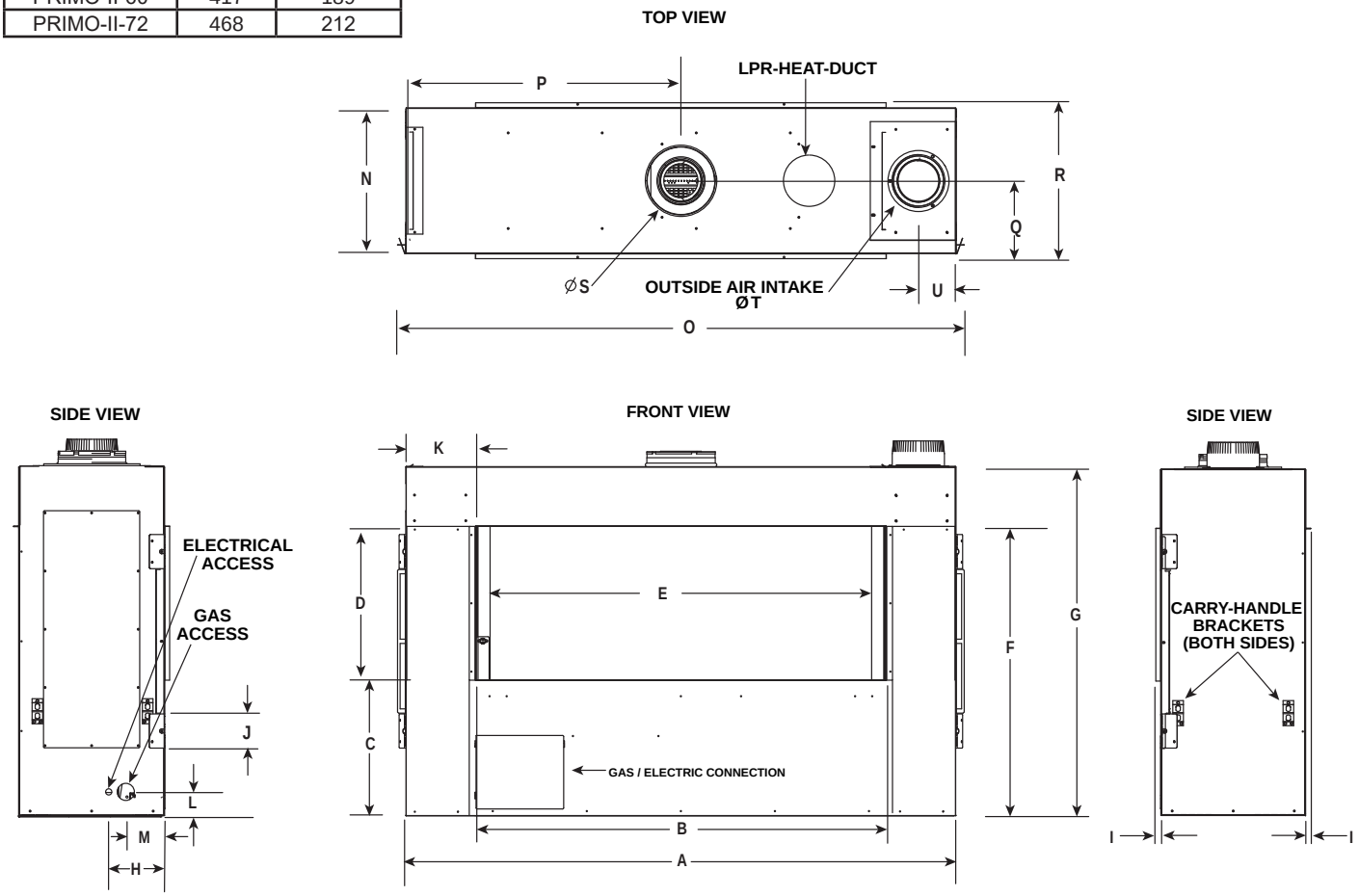
3 Framing and Clearances

A. Appliance Weights and Dimensions

Dimensions are actual appliance dimensions. Use for reference only. For framing dimensions and clearances refer to Section 5.

Appliance Weight Table

Model	Pounds	Kilograms
PRIMO-II-48	375	170
PRIMO-II-60	417	189
PRIMO-II-72	468	212



Appliance Dimensions Table

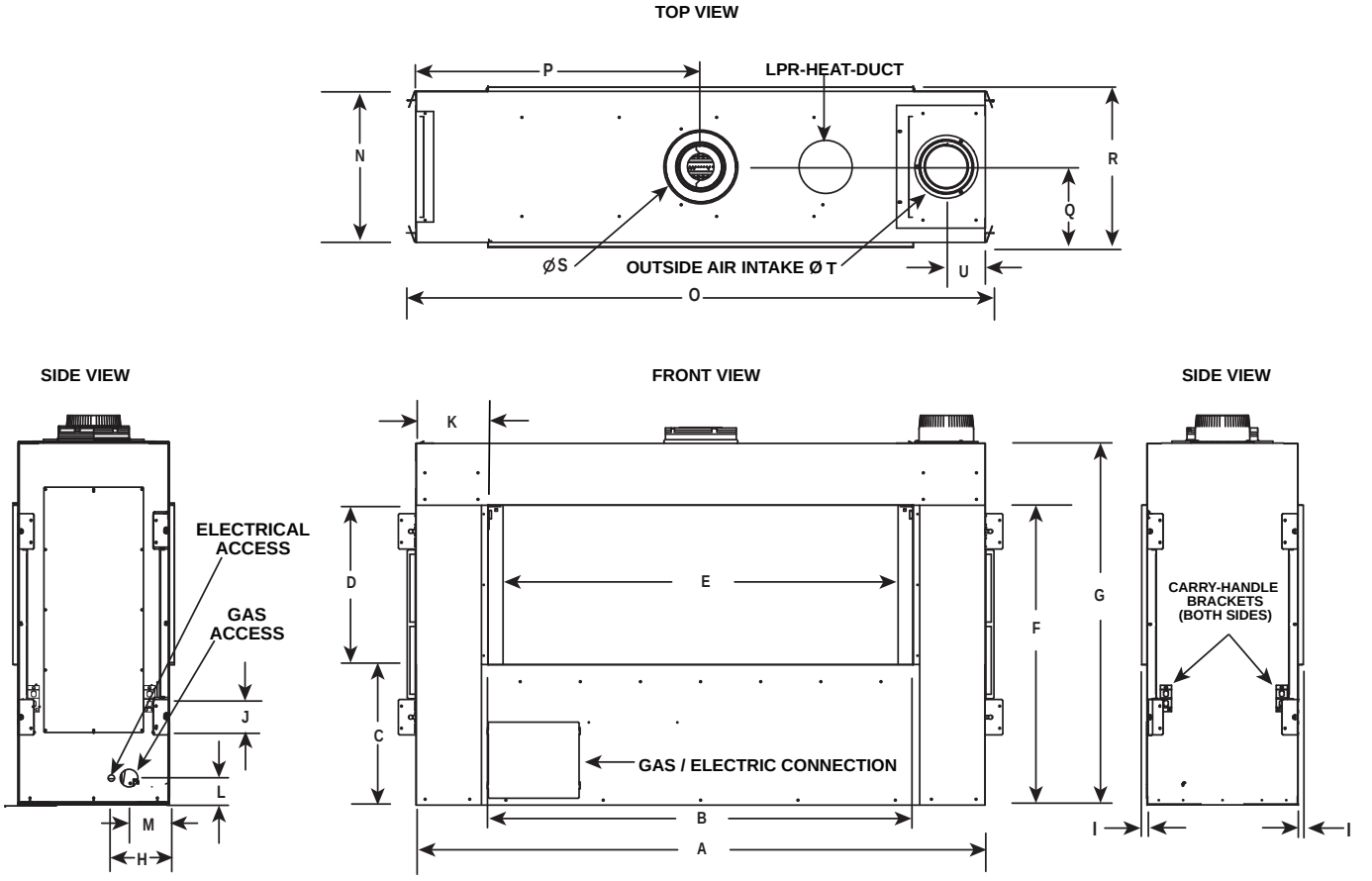
Location	PRIMO-II-48		PRIMO-II-60		PRIMO-II-72	
	in.	mm	in.	mm	in.	mm
A	64-3/8	1635	76-3/8	1940	88-3/8	2245
B	48	1219	60	1524	72	1829
C	15-7/8	403	15-7/8	403	15-7/8	403
D	18	457	18	457	18	457
E	44-5/8	1134	56-5/8	1438	68-5/8	1743
F	33-15/16	862	33-15/16	862	33-15/16	862
G	40-13/16	1037	40-13/16	1037	40-13/16	1037
H	6-1/2	165	6-1/2	165	6-1/2	165
I	5/8	16	5/8	16	5/8	16
J	4	102	4	102	4	102

Location	PRIMO-II-48		PRIMO-II-60		PRIMO-II-72	
	in.	mm	in.	mm	in.	mm
K	9-5/16	237	9-5/16	237	9-5/16	237
L	2-3/4	70	2-3/4	70	2-3/4	70
M	4-1/2	114	4-1/2	114	4-1/2	114
N	17-1/16	433	17-1/16	433	17-1/16	433
O	66-3/8	1686	78-3/8	1991	90-3/8	2296
P	32-3/16	818	38-3/16	970	44-3/16	1122
Q	9-1/8	232	9-1/8	232	9-1/8	232
R	18-1/4	464	18-1/4	464	18-1/4	464
S	8	203	8	203	8	203
T	6	152	6	152	6	152
U	5-3/8	137	5-3/8	137	5-3/8	137

Figure 3.1 Appliance Dimensions (PRIMO-II-48, PRIMO-II-60, PRIMO-II-72)

Appliance Weight Table

Model	Pounds	Kilograms
PRIMO-II-48ST	379	172
PRIMO-II-60ST	423	192
PRIMO-II-72ST	474	215



Appliance Dimensions Table

Location	PRIMO-II-48ST		PRIMO-II-60ST		PRIMO-II-72ST	
	in.	mm	in.	mm	in.	mm
A	64-3/8	1635	76-3/8	1940	88-3/8	2245
B	48	1219	60	1524	72	1829
C	15-7/8	403	15-7/8	403	15-7/8	403
D	18	457	18	457	18	457
E	44-5/8	1134	56-5/8	1438	68-5/8	1743
F	33-15/16	862	33-15/16	862	33-15/16	862
G	40-13/16	1037	40-13/16	1037	40-13/16	1037
H	6-1/2	165	6-1/2	165	6-1/2	165
I	5/8	16	5/8	16	5/8	16
J	4	102	4	102	4	102

Location	PRIMO-II-48ST		PRIMO-II-60ST		PRIMO-II-72ST	
	in.	mm	in.	mm	in.	mm
K	9-5/16	237	9-5/16	237	9-5/16	237
L	2-3/4	70	2-3/4	70	2-3/4	70
M	4-1/2	114	4-1/2	114	4-1/2	114
N	17-1/16	433	17-1/16	433	17-1/16	433
O	66-3/16	1681	78-3/16	1681	90-3/16	1681
P	32-3/16	818	38-3/16	970	44-3/16	1122
Q	9-1/8	232	9-1/8	232	9-1/8	232
R	18-1/4	464	18-1/4	464	18-1/4	464
S	8	203	8	203	8	203
T	6	152	6	152	6	152
U	5-3/8	137	5-3/8	137	5-3/8	137

Figure 3.2 Appliance Dimensions (PRIMO-II-48ST, PRIMO-II-60ST, PRIMO-II-72ST)

B. Appliance Location and Clearances to Combustibles

When selecting a location for the appliance it is important to consider the required clearances to walls and allow sufficient clearance for heat management systems and venting. See Figure 3.3, Figure 3.4 and Figure 3.5.

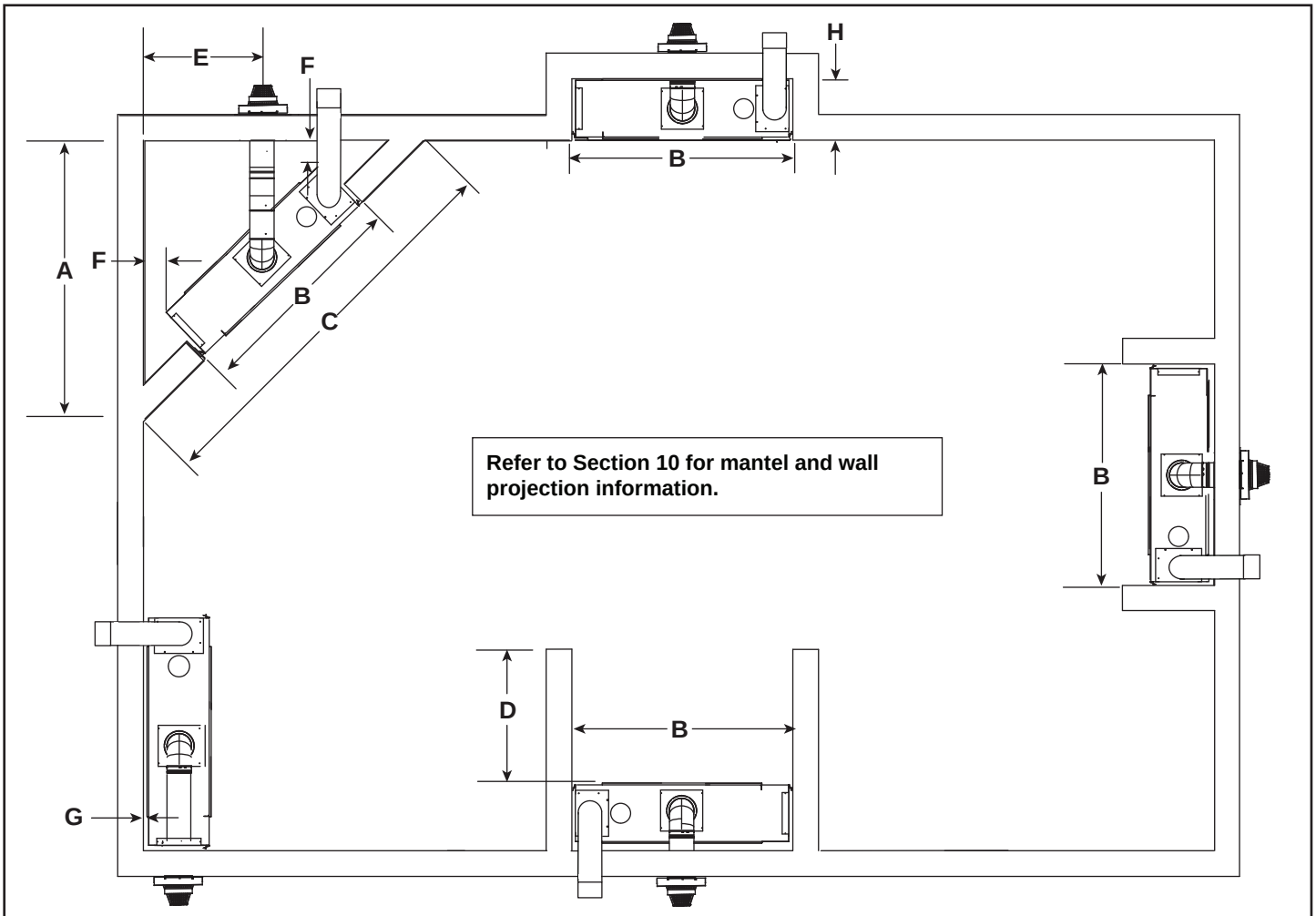
WARNING! Risk of Fire or Burns! *Provide adequate clearance around air openings and for service access. Due to high temperatures, the appliance should be located out of traffic and away from furniture and draperies.*

NOTICE: *Illustrations reflect typical installations and are FOR DESIGN PURPOSES ONLY. Illustrations/diagrams are not drawn to scale. Actual installation could vary due to individual design preference.*

It is important to follow the framing and finishing instructions step by step to ensure proper placement of fireplace in the surrounding framing/finishing materials.

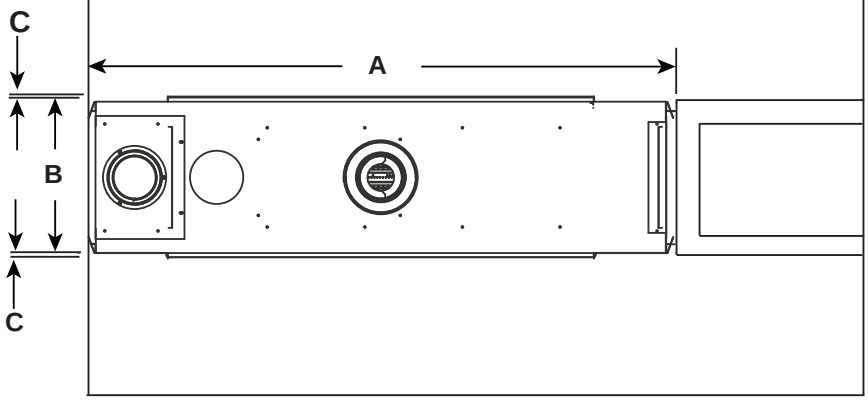
Outside Air Kit (Required)

When selecting the location for the appliance, it is important to consider required clearances between the vent cap and the Outside Air Kit. Refer to Row H in Figure 4.5 for required clearances. Refer to Sections 4.F and 6.A for vent information and appliance preparation for the Outside Air Kit. Installation MUST comply with local, regional, state and national codes and regulations.



Model		A	B	C	D (MAX.)	E	F	G Min.	H
PRIMO-II-48	Inches	74-1/4	66-1/2	105	See Section 10 Mantel Projections	30-7/8	1	1	18
	Millimeters	1886	1689	2667		784	25	25	457
PRIMO-II-60	Inches	82-3/4	78-1/2	117		35-1/8	1	1	18
	Millimeters	2102	1994	2972		892	25	25	457
PRIMO-II-72	Inches	91-1/4	90-1/2	129		39-3/8	1	1	18
	Millimeters	2318	2299	3277		1000	25	25	457

Figure 3.3 Appliance Locations PRIMO-II-48, PRIMO-II-60, PRIMO-II-72



NOTICE: *This See-Through appliance is NOT designed or approved for an indoor/ outdoor application, unless used with the ODK-PR-48/60/72 kits.*

Model		A	B	C
PRIMO-II-48ST	Inches	66-1/2	17	18-1/4
	Millimeters	1689	432	464
PRIMO-II-60ST	Inches	78-1/2	17	18-1/4
	Millimeters	1994	432	464
PRIMO-II-72ST	Inches	90-1/2	17	18-1/4
	Millimeters	2299	432	464

Figure 3.4 Appliance Locations PRIMO-II-48ST, PRIMO-II-60ST, PRIMO-II-72ST

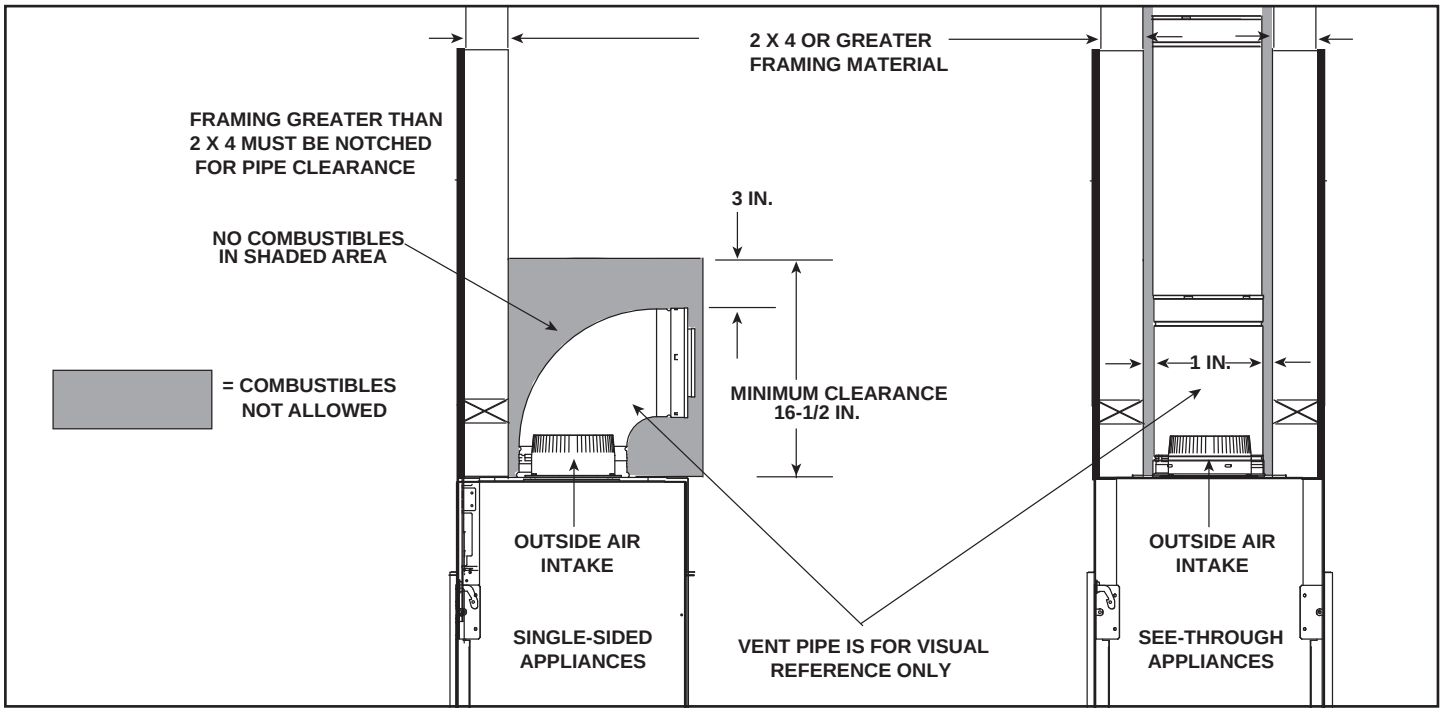
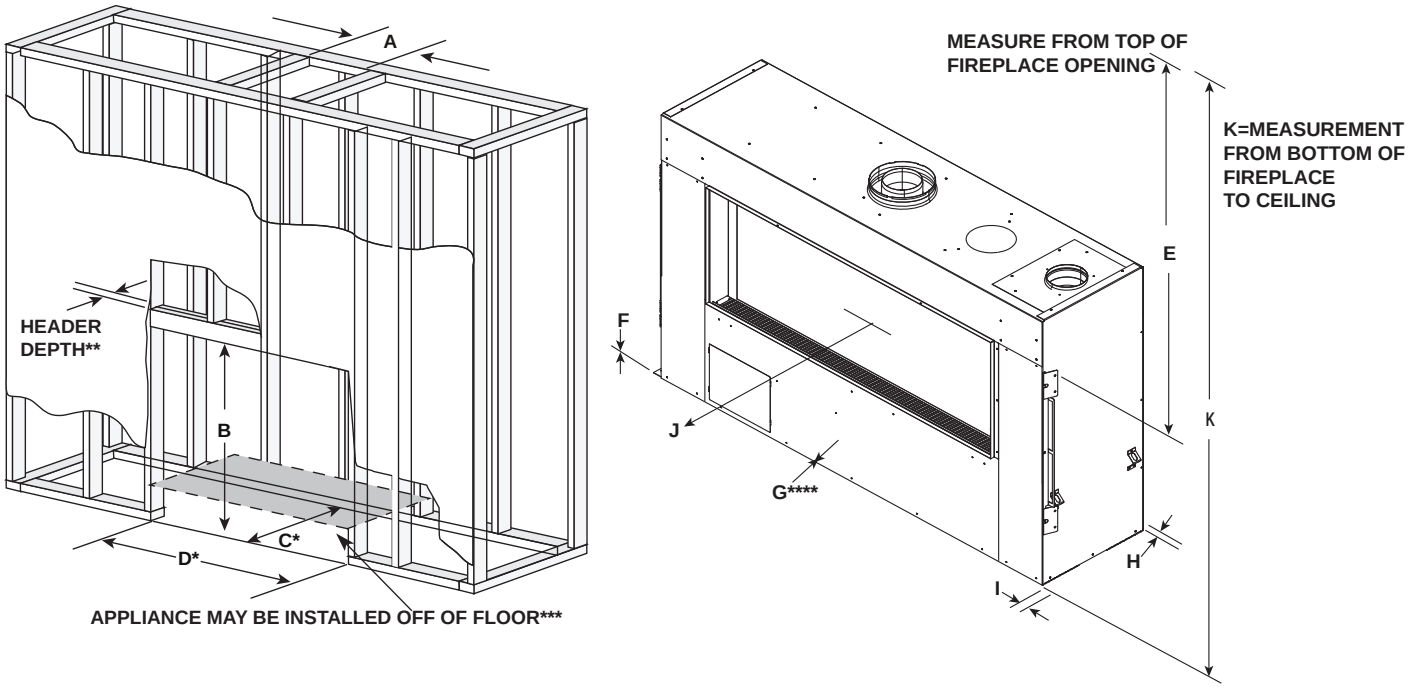


Figure 3.5 Non-Combustible Zone

PRIMO-II-48, PRIMO-II-60, PRIMO-II-72

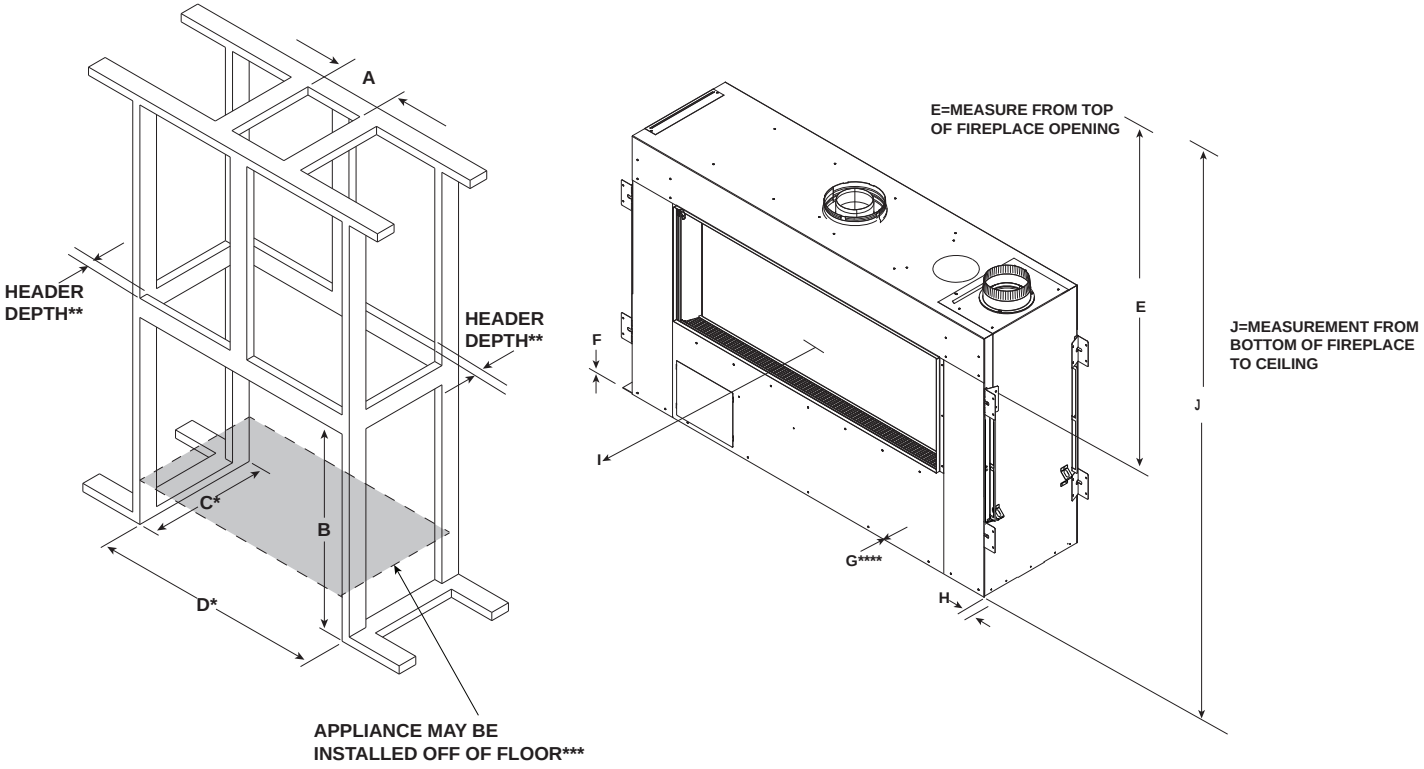


MINIMUM FRAMING DIMENSIONS*												
	A		B	C*	D*	E	F	G****	H	I	J	K
	Rough Opening (DVP Vent Pipe)	Rough Opening (SLP Vent Pipe)	Rough Opening (Height)	Rough Opening (Depth)	Rough Opening (Width)	Clearance to Room Ceiling	Combustible Floor	Minimum Hearth Required	Behind Appliance	Sides of Appliance	Front of Appliance	Clearance to Ceiling
PRIMO-II-48												
in.	10	9	45	18	66-1/2	31	0	0	1	1	36	53-3/4
mm	254	229	1143	457	1689	787	0	0	25	25	914	1365
PRIMO-II-60												
in.	10	9	45	18	78-1/2	31	0	0	1	1	36	53-3/4
mm	254	229	1143	457	1994	787	0	0	25	25	914	1365
PRIMO-II-72												
in.	10	9	45	18	90-1/2	31	0	0	1	1	36	53-3/4
mm	254	229	1143	457	2299	787	0	0	25	25	914	1365

* = Adjust framing dimensions for interior sheathing (such as 1/2 inch drywall).
** = Header depth not to exceed 5-1/2 inches. ** If header depth is greater than 3-1/2 inches, header must be notched in order to maintain clearance to pipe.
*** = If appliance is installed off of floor, maintain required clearances to combustibles. Construct platform in accordance with local building codes.
**** = For installations with vinyl flooring, see Section 3.E.

Figure 3.6 Clearances to Combustibles-PRIMO-II-48, PRIMO-II-60, PRIMO-II-72

PRIMO-II-48ST, PRIMO-II-60ST, PRIMO-II-72ST



Note: C will increase if optional indoor/outdoor kit is installed. For installation instructions and framing dimensions, refer to Section 12.C.

MINIMUM FRAMING DIMENSIONS* (See-Through Models)											
PRIMO-II-48ST											
	A		**B**	**C***	**D***	**E**	**F**	**G****	**H**	**I**	**J**
	Rough Opening (DVP Vent Pipe)	Rough Opening (SLP Vent Pipe)	Rough Opening (Height)	Rough Opening (Depth)	Rough Opening (Width)	Clearance to Room Ceiling	Combustible Floor	Minimum Hearth Required	Sides of Appliance	Front or Rear of Appliance	Clearance to Ceiling
in.	10	9	44-1/2	17	66-1/2	31	0	0	1	36	53-3/4
mm	254	229	1130	432	1689	787	0	0	25	914	1365
PRIMO-II-60ST											
in.	10	9	44-1/2	17	78-1/2	31	0	0	1	36	53-3/4
mm	254	229	1130	432	1994	787	0	0	25	914	1365
PRIMO-II-72ST											
in.	10	9	44-1/2	17	90-1/2	31	0	0	1	36	53-3/4
mm	254	229	1130	432	2299	787	0	0	25	914	1365

* = Adjust framing dimensions for interior sheathing (such as 1/2 inch drywall).

** = Header depth not to exceed 5-1/2 inches. ** If header depth is greater than 3-1/2 inches, header must be notched in order to maintain clearance to pipe.

*** = If appliance is installed off of floor, maintain required clearances to combustibles. Construct platform in accordance with local building codes.

**** = For installations with vinyl flooring, see Section 3.E.

Figure 3.7 Clearances to Combustibles-PRIMO-II-48ST, PRIMO-II-60ST, PRIMO-II-72ST

C. Optional Indoor / Outdoor Kit

An optional Indoor / Outdoor kit is available for use with the PRIMO-II-48ST, PRIMO-II-60ST or PRIMO-II-72ST models. The Indoor / Outdoor kit is a metal trim extension kit for the back side of the see-through models which allows the appliance to be aligned with a window in the home so the fireplace may be enjoyed from outdoors. The Indoor / Outdoor kit is purchased separately from the appliance.

Contact your dealer to order. See Section 12.B.

Follow instructions included with the Indoor / Outdoor Kit. Refer to Section 12.C.

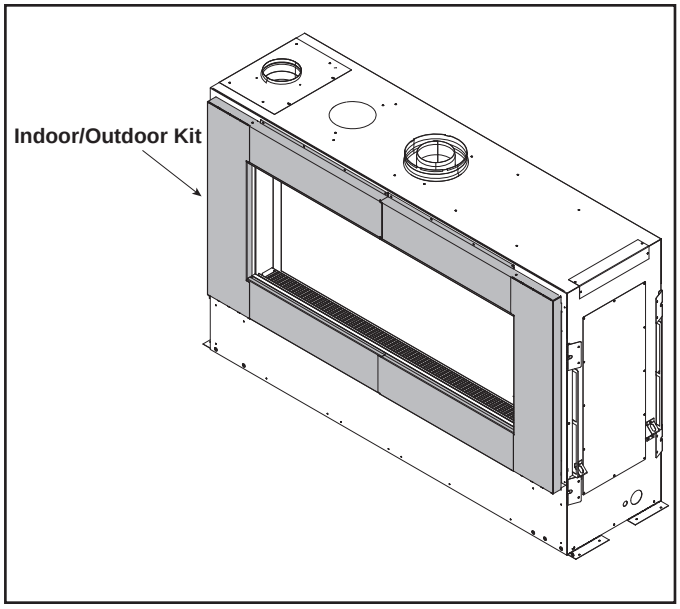


Figure 3.8 Indoor / Outdoor Kit

D. Constructing the Appliance Chase

NOTICE: *Install appliance on hard metal or wood surfaces extending full width and depth.* ***DO NOT*** *install directly on carpeting, vinyl, or any combustible material other than wood.*

WARNING! Risk of Fire! *Maintain specified air space clearances to appliance and vent pipe:*

- *Insulation and other materials must be secured to prevent accidental contact.*
- *The chase must be properly blocked to prevent blown insulation or other combustibles from entering and making contact with fireplace or chimney.*
- *Failure to maintain airspace may cause overheating and a fire.*

A chase is a vertical box-like structure built to enclose the gas appliance and/or its vent system. In cooler climates the vent should be enclosed inside the chase.

NOTICE: *Treatment of ceiling firestops and wall shield firestops and construction of the chase may vary with the type of building. These instructions are not substitutes for the requirements of local building codes. Therefore, you MUST check local building codes to determine the requirements to these steps.*

NOTICE: Where required by code, install only sprinkler heads with a sprinkler activation temperature classified as Extra High.

- *Sprinklers inside of chase: Keep sprinkler head away from vent and chimney.*
- *Sprinklers near Heat Management applications: Reference the heat management instructions for clearances to discharge openings such as PRIMO-HEAT-DUCT registers, etc. Refer to Section 6.B for Heat Management options allowed for this appliance.*

Chases should be constructed and insulated in the same manner as the thermal envelope of the home based on the code requirements for that climate zone to prevent air leakage and draft problems. The chase is an extension of the building thermal envelope.

To further prevent drafts and air leakage, the wall shield and ceiling firestops should be sealed with caulk with a minimum of 300 ºF continuous exposure rating to seal gaps. Gas line holes and other openings should be sealed with caulk with a minimum of 300 ºF continuous exposure rating or stuffed with unfaced insulation. If the appliance is being installed on a cement surface, a layer of plywood may be placed underneath to prevent conducting cold up into the room.

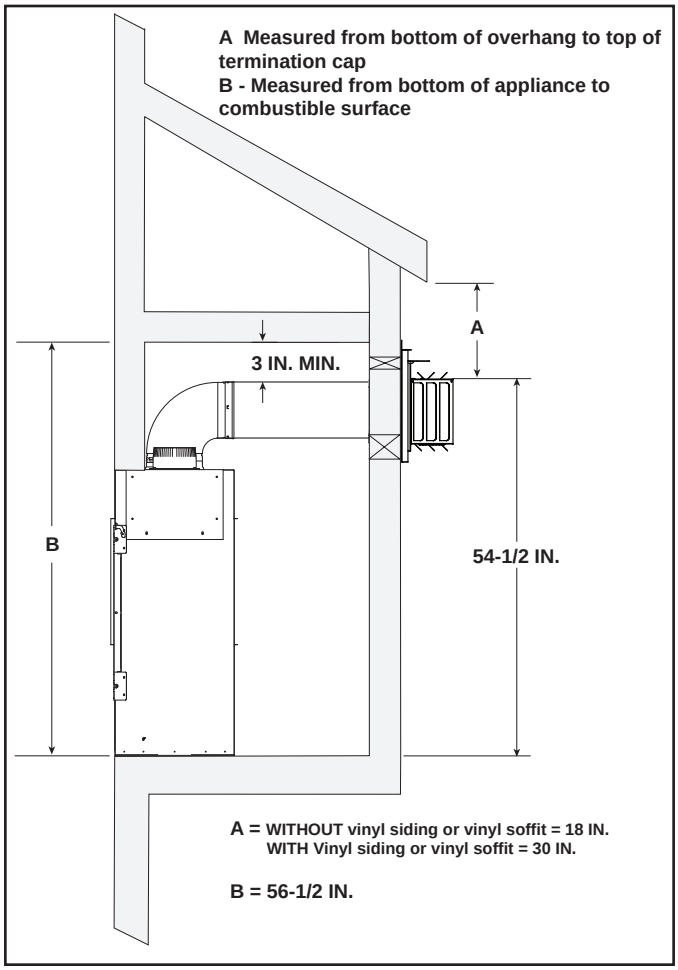


Figure 3.9 Exterior Chase - Minimum Height Requirements

E. Floor Protection

Vinyl Flooring

Vinyl flooring is sensitive to heat. Hearth and Home Technologies does not recommend adhesive based vinyl flooring due to thermal expansion. Floating-style flooring can be used, but will reach temperatures up to 110 °F in a room with ambient temperature of 70 °F. Consult flooring specifications to ensure compatibility.

4 Termination Location and Vent Information

A. Approved Pipe

WARNING! Risk of Fire, Delayed Ignition or Asphyxiation. *This appliance requires a separate vent.* ***DO NOT*** *vent to a pipe serving any other appliance.*

This appliance is only approved for use with Hearth & Home Technologies DVP or SLP venting systems. Refer to Section 12.A for vent component information and dimensions. Only use listed decorative termination caps/ shrouds with Hearth & Home Technologies approved venting systems.

DO NOT mix pipe, fittings or joining methods from different manufacturers.

The pipe is tested to be run inside an enclosed wall. There is no requirement for inspection openings at each joint within the wall.

B. Vent Termination Minimum Clearances

⚠ WARNING

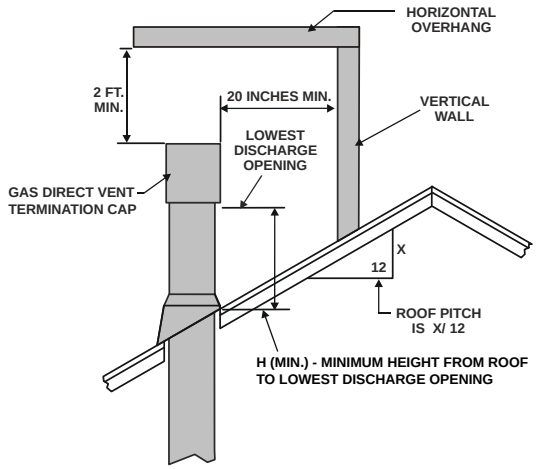


Fire Risk.

Maintain vent clearance to combustibles as specified.

- **DO NOT** pack air space with insulation or other materials.

Failure to keep insulation or other materials away from vent pipe could cause overheating and fire.



Roof Pitch	H (Min.) Ft
Flat to 6/12	1.0*
Over 6/12 to 7/12	1.25*
Over 7/12 to 8/12	1.5*
Over 8/12 to 9/12	2.0*
Over 9/12 to 10/12	2.5*
Over 10/12 to 11/12	3.25
Over 11/12 to 12/12	4.0
Over 12/12 to 14/12	5.0
Over 14/12 to 16/12	6.0
Over 16/12 to 18/12	7.0
Over 18/12 to 20/12	7.5
Over 20/12 to 21/12	8.0

* H minimum may vary depending on regional snowfall. Refer to local codes.

Figure 4.1 Minimum Height From Roof to Lowest Discharge Opening

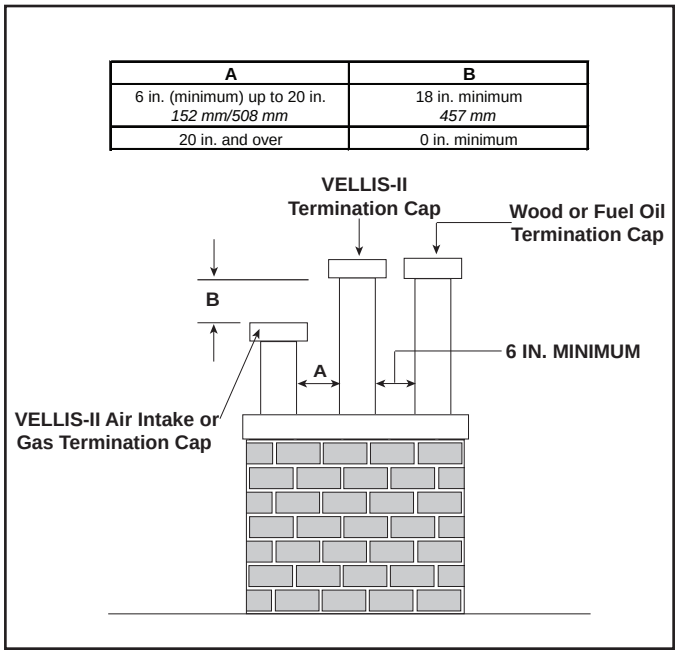


Figure 4.2 Staggered Termination Caps

CAUTION! Risk of Burns! *Termination caps are HOT, consider proximity to doors, traffic areas or where people may pass or gather (sidewalk, deck, patio, etc.). Listed cap shields available. Contact your dealer.*

- Local codes or regulations may require different clearances.
- Hearth & Home Technologies assumes no responsibility for the improper performance of the appliance when the venting system does not meet these requirements.
- Measure horizontal and vertical termination cap clearances as noted in Figure 4.3 and Figure 4.4.

CAUTION! *Risk of Fire! HZTERM-ADP shroud kit required for all horizontal terminations.*

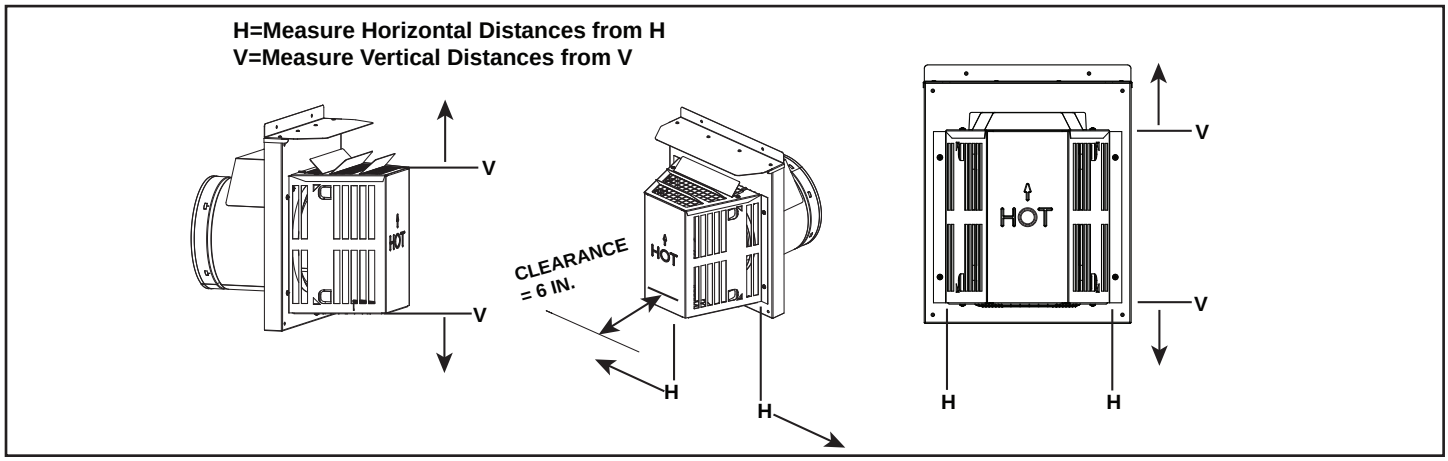


Figure 4.3

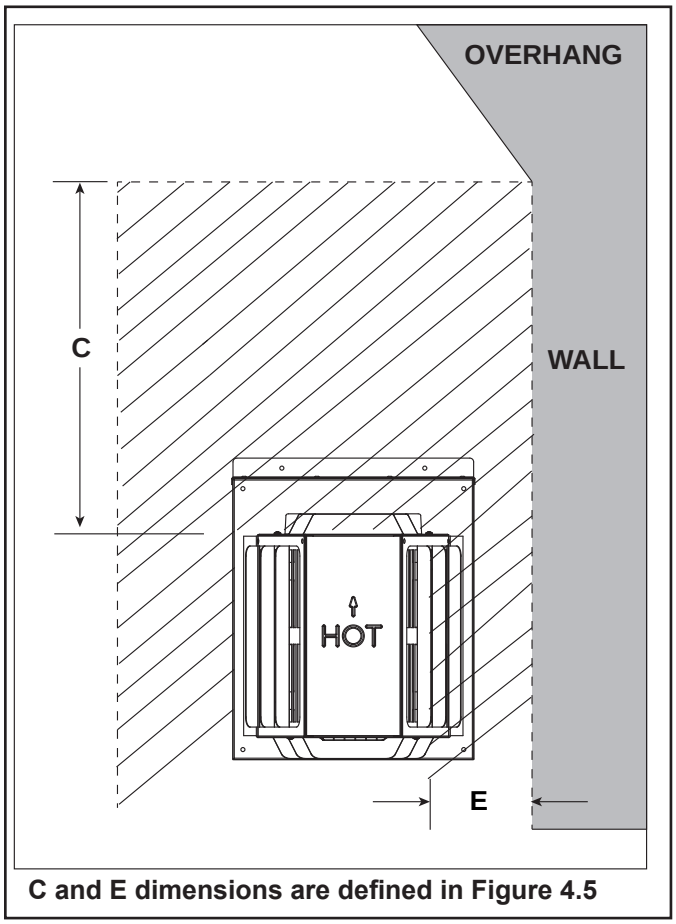


Figure 4.4 Measure Horizontal and Vertical Termination Clearance to Trapezoid Portion of Cap

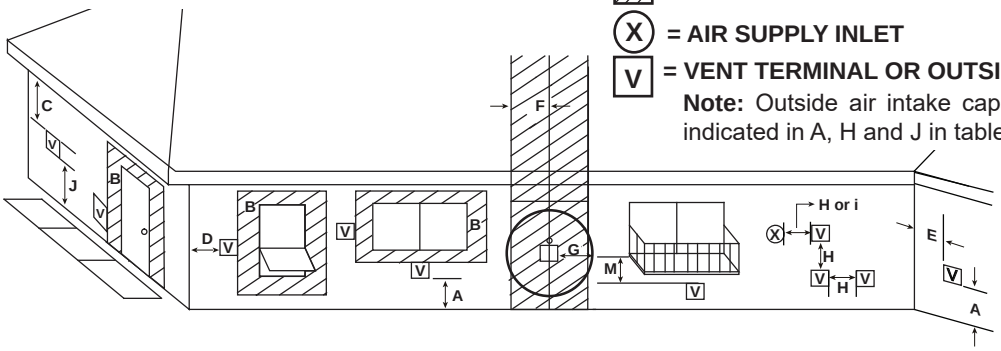
C. Vent Terminal Clearances

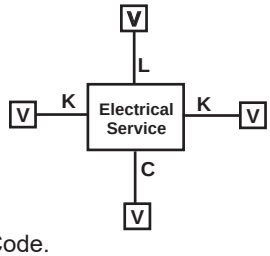
= AREA WHERE TERMINAL IS NOT PERMITTED

(X) = AIR SUPPLY INLET

V = VENT TERMINAL OR OUTSIDE AIR INTAKE

Note: Outside air intake caps are only required to follow clearances indicated in A, H and J in table below.





U.S.A. Installations: In accordance with the current ANSI Z223.1/NFPA 54, National Fuel Gas Code.
Canadian Installations: In accordance with the current CSA B149.1, Natural Gas and Propane Installation Code.

		U.S.A.	CANADA
A	Clearance above grade,veranda, porch, deck, balcony or roof	12 in. (305 mm)	12 in. (305 mm)
B	Clearance to window or door that may be opened, or to permanently closed window	12 in. (305 mm)	12 in. (305 mm)
C	Clearance below ventilated or unventilated soffit (WITHOUT vinyl siding or vinyl soffits)	18 in. (457 mm)	18 in. (457 mm)
	Clearance below ventilated or unventilated soffit (WITH vinyl siding and/or vinyl soffits)	30 in. (762 mm)	30 in. (762 mm)
	Clearance below any electrical service	30 in. (762 mm)	30 in. (762 mm)
D	Clearance to outside corner	6 in. (152 mm)	6 in. (152 mm)
E	Clearance to inside corner (NO vinyl siding or vinyl soffits)	6 in. (152 mm)	6 in. (152 mm)
	Clearance to inside corner (vinyl siding AND/OR vinyl soffits)	12 in. (305 mm)	12 in. (305 mm)
F	Clearance to each side of center line extended above gas meter/regulator assembly	Clearance in accordance with local installation codes and the requirements of the gas supplier	3 ft (914 mm) within a height 15 ft (4.5 m) above the meter/regulator assembly
G	Clearance to gas service regulator vent outlet	3 ft (914 mm)	3 ft (914 mm)
H	Clearance to non-mechanical air supply inlet to building or the combustion air inlet to any other appliance termination (mechanical or non-mechanical)	18 in. (457 mm)	18 in. (457 mm)
I	Clearance to a mechanical (powered) air supply inlet ***(All mechanical air intakes within 10 feet of a horizontal termination cap must be a minimum of 3 feet below termination.)	3 ft (914 mm)***	6 ft (1.8 m)
J	On **public** property: clearance above paved sidewalk or a paved driveway.	7 ft (2.1 m)	7 ft (2.1 m)**
	**(A vent shall not terminate directly above a sidewalk or paved driveway which is located between two single family dwellings and serves both dwellings.)		
K	Clearance from sides of electrical service	12 in. (305 mm)	12 in. (305 mm)
	Location of the vent termination must not interfere with access to the electrical service.		
L	Clearance above electrical service	12 in. (305 mm)	12 in. (305 mm)
	Location of the vent termination must not interfere with access to the electrical service.		
M	Clearance under veranda, porch, deck, balcony or overhang *(Permitted only if veranda, porch, deck, or balcony is fully open on a minimum of two sides beneath the floor.)	18 in. (457 mm)*	18 in. (457 mm)*
	Vinyl or composite overhang	30 in. (762 mm)	30 in. (762 mm)

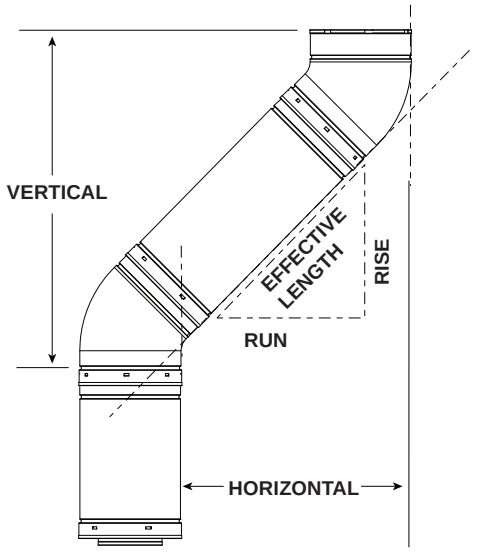
Figure 4.5 Minimum Clearances for Termination

D. Use of Elbows

Diagonal runs have both vertical and horizontal vent aspects when calculating the effects. Use the rise for the vertical aspect and the run for the horizontal aspect. See Figure 4.6.

Two 45º elbows may be used in place of one 90º elbow. On 45º runs, one foot of diagonal is equal to 8-1/2 inch (216 mm) horizontal run and 8-1/2 inch (216 mm) vertical run. A length of straight pipe is allowed between two 45º elbows. See Figure 4.6.

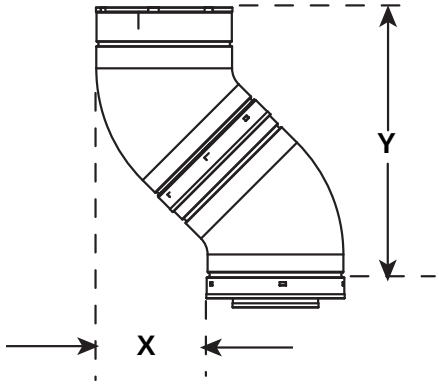
Figure 4.7 shows the vertical and horizontal offsets for DVP or SLP elbows.



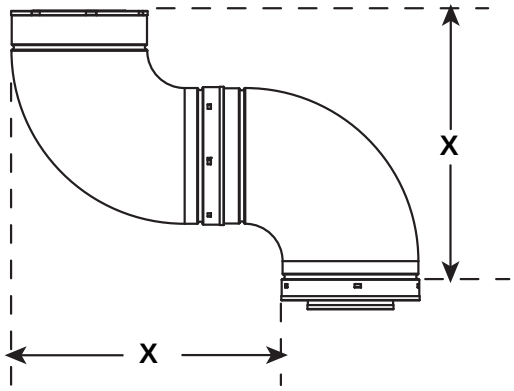
SLP Pipe	Effective Length		Rise/Run	
	Inches	Millimeters	Inches	Millimeters
SLP4	4	102	2-3/4	70
SLP6	6	152	4-1/4	108
SLP12	12	305	8-1/2	216
SLP24	24	610	17	432
SLP36	36	914	25-1/2	648
SLP48	48	1219	34	864
SLP6A	3 to 6	76 to 152	2-1/8-4-1/4	54-108
SLP12A	3 to 12	76 to 305	2-1/8-8-1/2	54-216

DVP Pipe	Effective Length		Rise/Run	
	Inches	Millimeters	Inches	Millimeters
DVP4	4	102	2-3/4	70
DVP6	6	152	4-1/4	108
DVP12	12	305	8-1/2	216
DVP24	24	610	17	432
DVP36	36	914	25-1/2	648
DVP48	48	1219	34	864
DVP6A	3 to 6	76 to 152	2-1/8-4-1/4	54-108
DVP12A	3 to 12	76 to 305	2-1/8-8-1/2	54-216

Figure 4.6



Vent Type	X		Y	
	Inches	Millimeters	Inches	Millimeters
DVP	6-5/8	168	16-1/2	419
SLP	5-1/4	133	11-3/8	289



Vent Type	X	
	Inches	Millimeters
DVP	16-1/4	413
SLP	11-1/4	286

Figure 4.7 Vertical and Horizontal Offset for DVP and SLP Elbows

E. Vent Diagrams

General Rules:

- When penetrating a combustible wall, a wall shield firestop must be installed.
- When penetrating a combustible ceiling, a ceiling firestop must be installed.
- Horizontal runs of vent do not require vertical rise; horizontal runs may be level.
- It is recommended that the horizontal termination cap have a 1/4 inch downward slant to allow any moisture in cap to be released. See Figure 4.8.
- A maximum of ten 90º elbows (or twenty 45º elbows) may be used in any vent configuration. Elbows may be installed horizontally.
- Elbows may be placed directly off of the top of the appliance.
- Elbows may be placed back to back anywhere in the system.
- Any 90º elbow may be replaced with two back to back 45º elbows.
- 2 x 45° elbow jog directly off the top of the fireplace is allowed but has no V or H value, is permitted when reducing to SLP pipe, and DOES NOT count towards total elbow count.

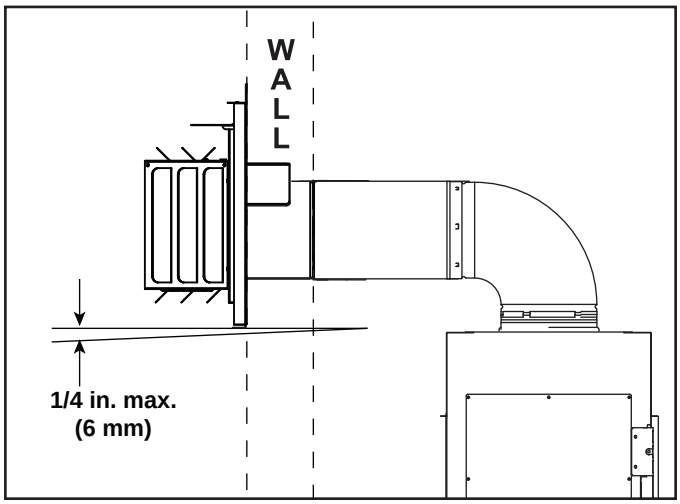


Figure 4.8

Measuring Standards:

Vertical and horizontal measurements listed in the vent diagrams and clearances for termination were made using the following standards:

- Pipe measurements are shown using the effective length of pipe. See Vent Components document, included in manual bag assembly, for information on effective length of pipe components.
- Horizontal terminations are measured to the outside mounting surface (flange of termination cap). See Figure 4.9.
- Vertical terminations are measured to top of last section of pipe. See Figure 4.10.
- Horizontal pipe installed level with no rise.

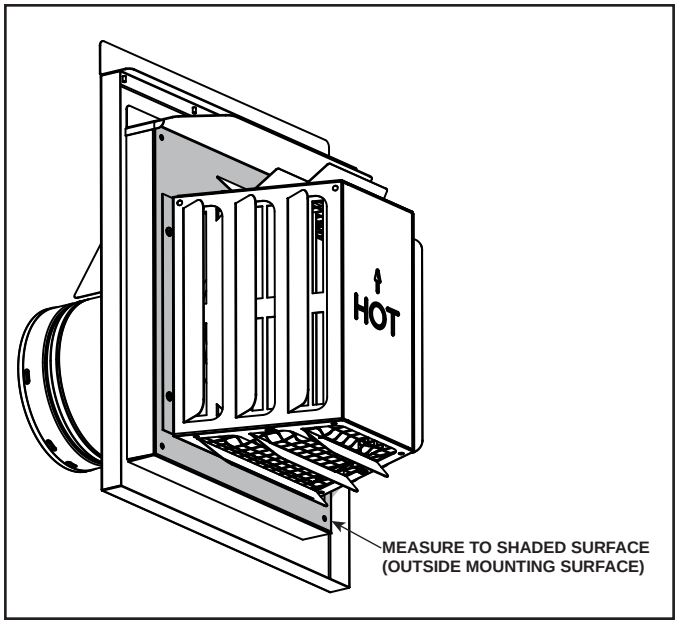


Figure 4.9 Measure to Outside Mounting Surface

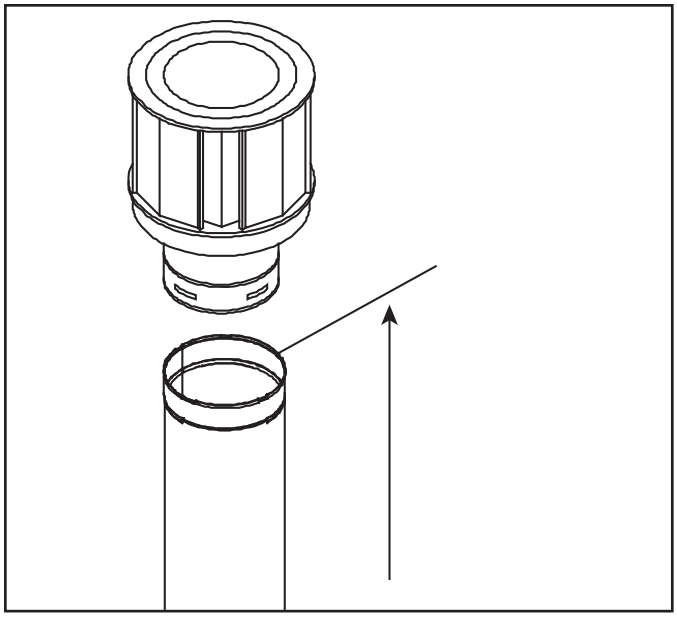


Figure 4.10 Measure to Top of Last Section of Pipe

⚠ WARNING

Fire Risk. Explosion Risk.

Do NOT pack insulation or other combustibles between ceiling firestops.

- ALWAYS maintain specified clearances around venting and firestop systems.
- Install wall shield and ceiling firestops as specified.

Failure to keep insulation or other material away from vent pipe could cause fire.

MODEL	MAX. TOTAL VENT RUN (FT.)*		MAX. 90° ELBOWS
PRIMO-II-48 / ST	DVP	100	10
	SLP	30	3
PRIMO-II-60 / ST	DVP	100	10
	SLP	30	3
PRIMO-II-72 / ST	DVP	100	10
	SLP	30	3

Table 4.1 Vent Runs & Elbow Requirements

ADAPTER KITS	
PART NUMBER	**PART DESCRIPTION**
DVP-SLP24	Adapts from 8 in. DVP-series starting collars to 6-5/8 in. SLP series vent pipe.
No vertical required.	

Venting Rules

CAUTION! Risk of Overheating! *Red Hi-Speed wire on the combustion fan* ***MUST*** *be connected to wire harness when required. Overheating could occur causing appliance to shut down.*

PRIMO-II-48 / PRIMO-II-48ST:

DVP Pipe Requirements:

0-29 ft.: No requirements.

30-49 ft.: Remove flue restrictor.

50-100 ft.: Connect red Hi-Speed wire on Combustion fan and remove flue restrictor.

SLP Pipe Requirements: Red Hi-Speed wire must be connected and flue restrictor must be removed for all SLP vent runs.

PRIMO-II-60 / PRIMO-II-60ST:

DVP Pipe Requirements:

0-19 ft.: No requirements.

20-29 ft.: Remove flue restrictor.

30-100 ft.: Connect red Hi-Speed wire on Combustion fan and remove flue restrictor.

SLP Pipe Requirements: Red Hi-Speed wire must be connected and flue restrictor must be removed for all SLP vent runs.

PRIMO-II-72 / PRIMO-II-72ST:

DVP Pipe Requirements:

0-29 ft.: No requirements.

30-100 ft.: Connect red Hi-Speed wire on Combustion fan and remove flue restrictor.

SLP Pipe Requirements: Red Hi-Speed wire must be connected and flue restrictor must be removed for all SLP vent runs.

See Section 4.G for rheostat removal instructions.

- Approved vent termination cap and HZTERM-ADP cap kits required when terminating horizontally. See approved list. Section 12.A.
- A maximum of 100 feet of DVP vent pipe, whether horizontal or vertical, can be used regardless of vent configuration.
- A maximum of 30 feet of SLP vent pipe, whether horizontal or vertical, can be used regardless of vent configuration.
- Vent runs using any SLP components must follow all venting requirements for SLP.
- Elbows can be positioned in a vertical or horizontal orientation. Elbow dimensions do not need to be factored into total vent run.
- Include DVP to SLP adapter height into total vent run.
- All pipe sections must be connected with screws and sealed .

NOTICE: *A vertical vent drop is not allowed.*

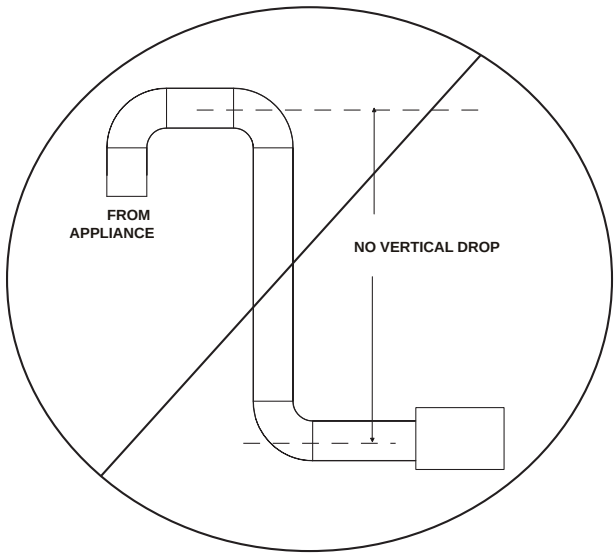


Figure 4.11

F. Outside Air Kit (Required)

The Outside Air Kit is used to provide combustion air from outside of the building to the firebox, and is required on all PRIMO-II installations.

WARNING! Risk of Fire or Overheating! *Outside Air Kit* ***MUST*** *be installed. Failure to install Outside Air Kit will result in overheating of appliance and combustibles.*

A horizontal inlet cap, sized for use with six inch diameter ducting, is provided with the appliance and must be mounted to the exterior of the building.

Note: It is acceptable to use other inlet caps as long as a minimum effective opening of 17-1/2 square inches is maintained. Six inch diameter ducting is required with all caps.

Vertical inlet caps may be used, but are not available from Hearth & Home Technologies. Vertical inlet caps must have a minimum effective opening of 17-1/2 square inches. Refer to Figure 4.2 for required inlet cap clearances.

Insulated Six inch ducting is required to be routed from the collar on the appliance to the inlet cap. Either flexible or rigid insulated ducting is approved for use with the Outside Air Kit. Rigid ducting pipe sections must be connected with screws and sealed.

Ensure there is no excess duct present in the vent run which could inhibit air flow. Verify the duct is properly supported and there are no kinks in the venting. See Venting Rules for more information.

WARNING! Risk of Fire! DO NOT *fold/kink/pinch/obstruct six inch flexible ducts. Appliance could overheat.*

Outside Air Kit Venting Rules

- Horizontal or vertical termination allowed. Components for vertical termination are not available from Hearth & Home Technologies.
- It is acceptable to include downward runs in the venting configuration for the Outside Air Kit. It is **NOT** acceptable to have any upward rise in the venting following a downward run.

NOTICE: *An upward rise following a downward run in the venting will lead to decreased performance of the appliance.*

- Six inch diameter insulated ducting is required. Ducting ordered separately. Flexible venting is available from Heath & Home Technologies. Contact your dealer to order. If using rigid ducting, ensure all connections are taped and venting is properly insulated. B-Vent style ducting is acceptable.
- Maintain clearances to exhaust venting as noted in Figure 4.2 and Figure 4.5.
- For maximum vent run lengths see Table 4.2.

MODEL	MAX. TOTAL VENT RUN (FT.)		MAX. 90° BENDS
PRIMO-II-48 / ST	DVP	100	10
PRIMO-II-60 / ST PRIMO-II-72 / ST	SLP	30	3

Table 4.2 Outside Air Kit Acceptable Venting Lengths

G. Change Fan Speed (Required for Specific Vent Runs)

WARNING! Risk of Overheating! *When connection of the red Hi-Speed wire is required, it* ***MUST*** *be conneted prior to firing the appliance.*

The appliance is shipped from the factory with the blue (Lo-Speed) wire connected. Some specific vent runs require the red Hi-Speed wire to be connected to the wiring harness. See Long Vent Run Requirements in Section 4.E. When required, the red Hi-Speed wire must be connected prior to firing up the appliance.

1. Disconnect electrical power from appliance.
2. Remove the and SafeSurface barrier glass, side transition panels and media. See Section 11.
3. Remove the transition media tray.
4. Remove firebox glass.
5. Remove LED assembly.
6. Disconnect the blue Lo-Speed wire on the combustion fan from the wire harness.
7. Connect the red Hi-Speed wire on the combustion fan to the wire harness. See Figure 4.12.

Note: If removing flue restrictor for DVP long vent run configurations at this time, refer to Section 4.H.

8. Reinstall LED assembly, firebox glass, transition media tray, side transition panels, media, and SafeSurface barrier glass.
9. Reconnect electrical power to appliance.

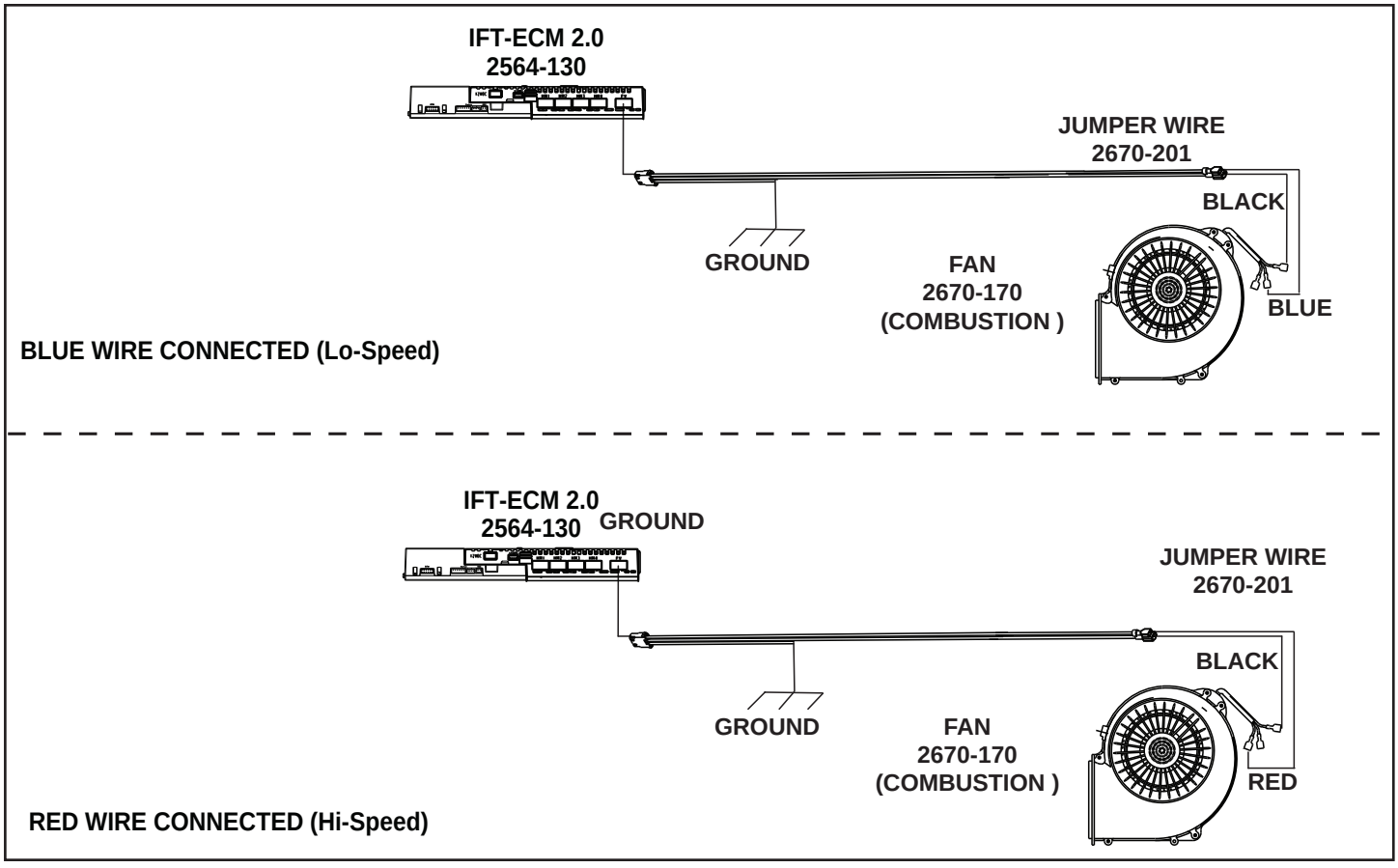


Figure 4.12 Fan Speed Wiring Diagram

H. Flue Restrictor

The flue restrictor is located in the appliance as shown in Figure 4.13. It is factory-installed at the 1-1 setting on PRIMO-II as shown in Figure 4.14. Removal is required for certain vent runs. See Section 4.E, Venting Rules.

Flue Restrictor Removal

1. Remove the two screws.
2. Remove flue restrictor.
3. Replace two screws in the original holes.

Warning! Risk of Asphyxiation or Fumes! *Screws must be placed in original holes. Flue product will escape from firebox.*

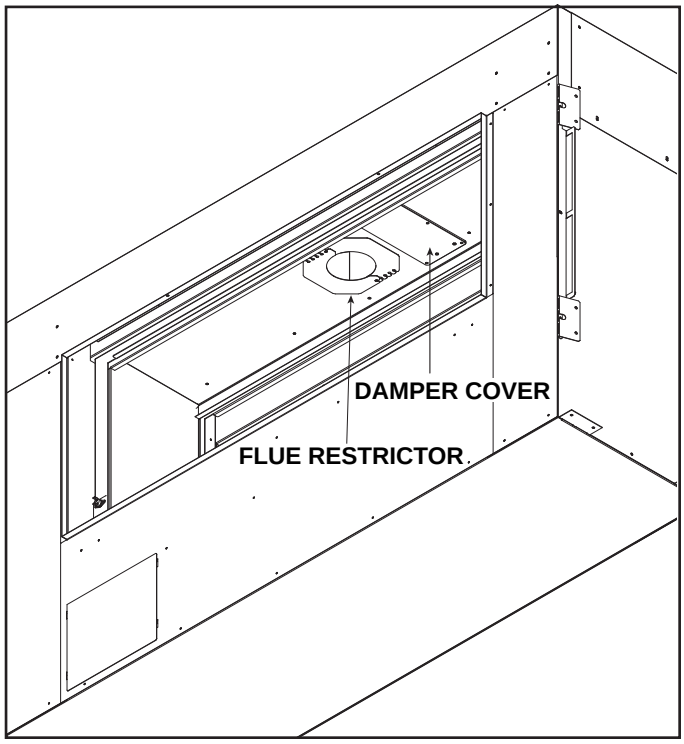


Figure 4.13 Flue Restrictor Location in Appliance

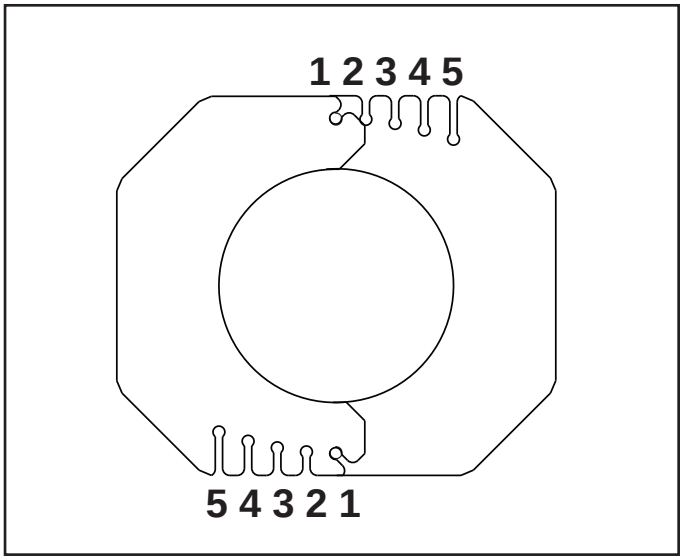


Figure 4.14 Flue Restrictor Setting

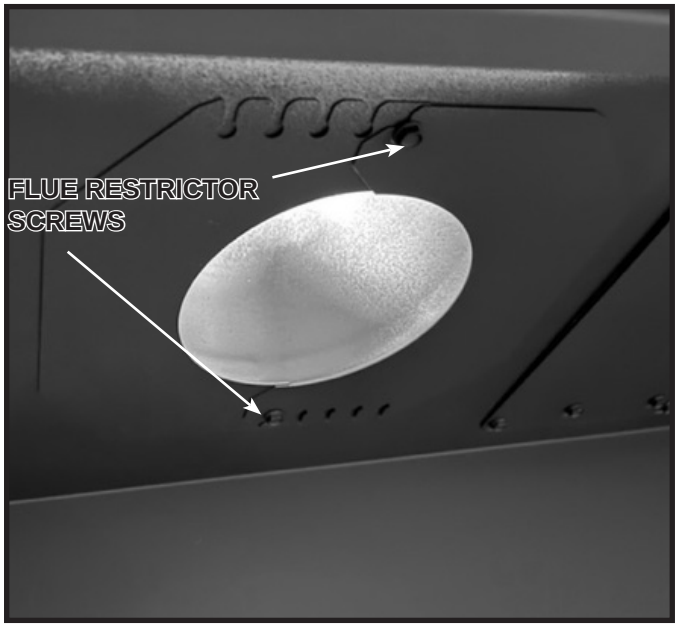


Figure 4.15 Flue Restrictor Installed



Figure 4.16 Reinstall Screws

Note: Inside top of firebox will need to be painted once flue restrictor is removed.

I. Damper

The PRIMO-II is factory-equipped with a damper. No further action is required at time of appliance installation. If necessary, the damper can be accessed by removing the cover, shown in Figure 4.13. Consult appliance Owner's Manual FAQ (Section 5) for more information.

5 Vent Clearances and Vent Framing

A. Vent Clearances to Combustibles

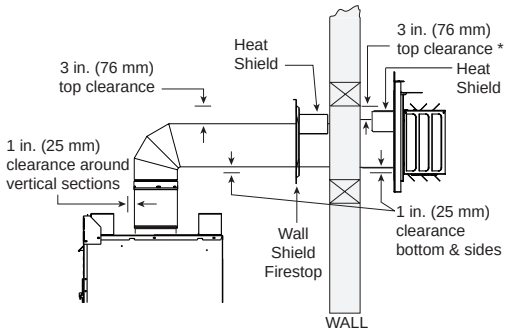
WARNING! Risk of Fire! *Maintain air space clearance to vent.* ***DO NOT*** *pack insulation or other combustibles:*

- *Between ceiling firestops*
- *Between wall shield firestops*
- *Around vent system*

Failure to keep insulation or other material away from vent pipe could cause overheating and fire.

Note: Heat shields MUST overlap by a minimum of 1-1/2 in. (38 mm).
- **DVP heat shield** - designed to be used on a wall 4 in. to 7-1/4 in. (102 mm to 184 mm) thick**.**
- If wall thickness is less than 4 in. the existing heat shields must be field trimmed. If wall thickness is greater than 7-1/4 in. a DVP-HSM-B will be required.
- **SLP heat shield** - designed to be used on a wall 4-3/8 in. to 7-5/8 in. (111 mm to 194 mm thick).
- If wall thickness is less than 4-3/8 the existing heat shields must be field trimmed. If wall thickness is greater than 7-5/8 in. a DVP-HSM-B will be required.

(DVP-SLP Pipe Shown)



* When using SLP pipe, minimum clearances from the vent pipe to combustible materials at inside wall firestops are: Top: 2-1/2 in. (64 mm); Bottom: 1/2 in. (13 mm); Sides: 1 in. (25 mm)

Figure 5.1 Horizontal Venting Clearances To Combustible Materials

Elbow and Offset Clearances to Combustibles

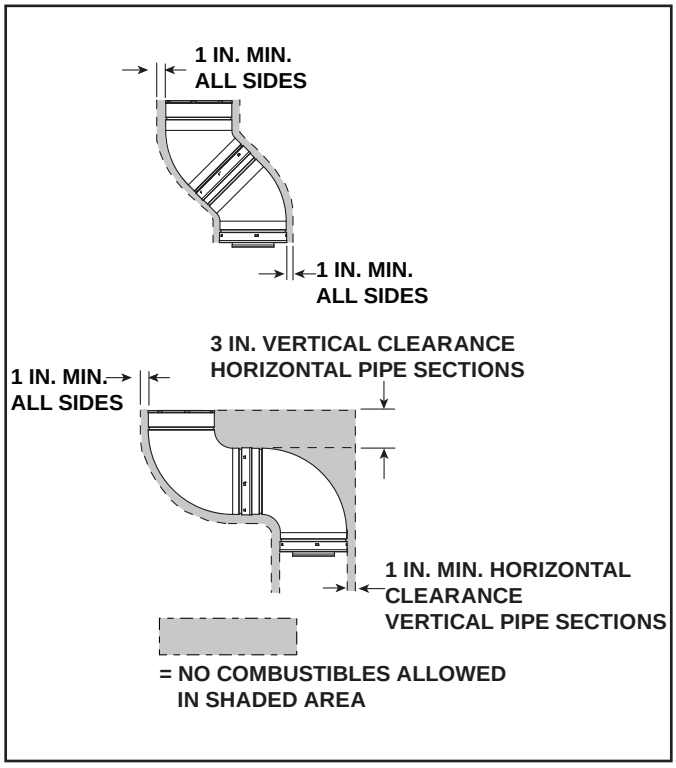


Figure 5.2 Clearances from Vent to Combustible Framing Materials

B. Wall Penetration Framing/Firestops

Combustible Wall Penetration

Whenever a combustible wall is penetrated, you must frame a hole for the wall shield firestop(s). The wall shield firestop maintains minimum clearances and prevents cold air infiltration.

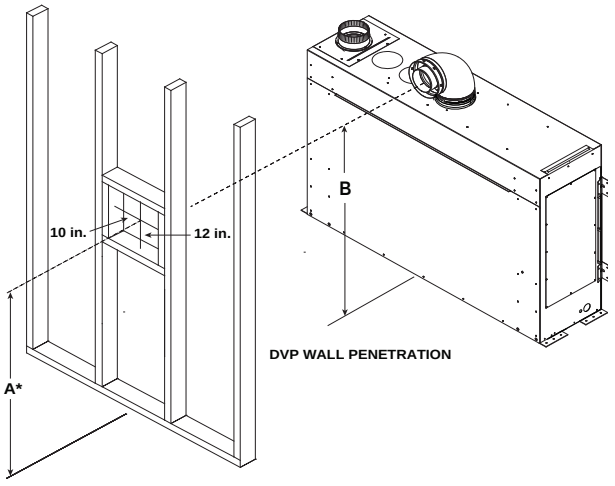
- The opening must be framed on all four sides using the same size framing materials as those used in the wall construction.
- SLP pipe - A wall shield firestop must be placed on each side of an interior wall. A minimum 1-1/2 in. (38 mm) overlap of attached heat shields must be maintained.
- DVP pipe - A wall shield firestop is required on one side only on interior walls. If your local inspector requires a wall shield firestop on both sides, then both wall shield firestops must have a heat shield (refer to Section 12.A.) attached to them.
- See Section 7.G. for information for regarding the installation of a horizontal termination cap.

Non-Combustible Wall Penetration

If the hole being penetrated is surrounded by non-combustible materials such as concrete, a hole with diameter one inch greater than the pipe is acceptable.

Whenever a non-combustible wall is penetrated, the wall shield firestop is only required on one side and no heat shield is necessary.

DO NOT PACK VENT FRAMING HOLE WITH INSULATION OR OTHER MATERIAL.



	A*	B*
Inches	50-1/2	49-1/2
Millimeters	1283	1257

* Shows center of vent framing hole for top venting. The center of the hole is one (1) in. (25 mm) above the center of the horizontal vent pipe.

Note: Center of the horizontal vent pipe to the vertical measuring surface of a trap cap is 5 inches (127 mm).

Figure 5.3 DVP Wall Penetration

C. Ceiling Firestop/Floor Penetration Framing

WARNING! Risk of Fire! DO NOT pack insulation around the vent. Maintain clearances to vent to prevent overheating.

A ceiling firestop **MUST** be used between floors and attics.

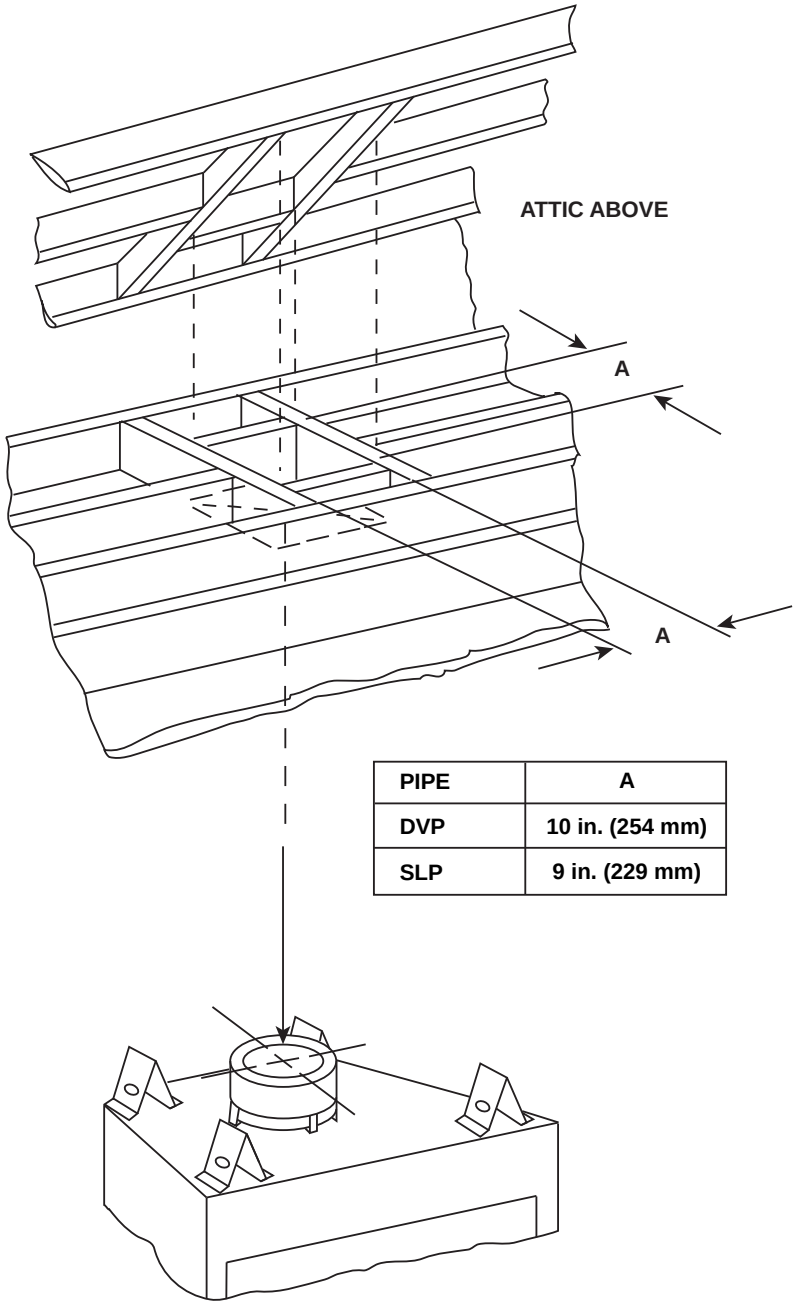
- **DVP pipe only** - Frame an opening 10 in. by 10 in. (254 mm by 254 mm) whenever the vent penetrates a ceiling/floor (see Figure 5.4).
- **SLP pipe only** - Frame opening 9 in. x 9 in. (229 mm x 229 mm) whenever the vent penetrates a ceiling/floor (see Figure 5.4).
- Frame the area with the same sized lumber as used in ceiling/floor joist.
- The ceiling firestop may be installed above or below the ceiling joists when installed with an attic insulation shield. It must be under joists between floors that are not insulated. Refer to Figure 5.5.
- Secure in place with nails or screws.

D. Install Attic Insulation Shield

WARNING! Fire Risk. *The use of an attic shield is required to prevent loose materials or insulation from contacting the vent causing overheating and a fire.*

The International Fuel Gas Code requires an attic shield constructed of 26 gauge minimum steel that extends at least 2 in. (51 mm) above insulation.

- Attic insulation shields must meet specified clearances to combustible materials and be secured in place.
- An attic insulation shield kit is available from Hearth & Home Technologies. Contact your dealer to order. Install attic insulation shield according to instructions included with kit.



PIPE	A
DVP	10 in. (254 mm)
SLP	9 in. (229 mm)

Figure 5.4 Installing Ceiling Firestop - Generic Fireplace Shown

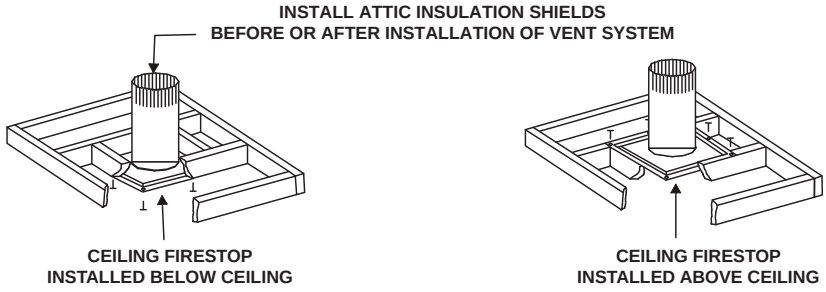


Figure 5.5 Installing the Attic Shield

6 Appliance Preparation

A. Prepare to Install Outside Air Kit (Required)

CAUTION! Risk of Cuts, Abrasions or Flying Debris. *Wear protective gloves and safety glasses during installation. Sheet metal edges are sharp.*

The Outside Air Kit must be installed prior to operation of this appliance. The kit is supplied with the appliance and ships in a box inside of the appliance firebox.

Kit contents include:

- Collar
- Collar Gasket
- Horizontal Inlet Cap

Components required to complete installation:

- Six inch ducting
- Vertical Inlet Cap (for vertical inlet only)

For required inlet cap clearances, refer to Figure 4.2 and Figure 4.5.

For venting and inlet cap requirements, refer to Section 4.F.

Note: Installation of the collar assembly must be completed prior to final positioning of the appliance.

Installation of Collar Assembly

1. Remove cover plate over Outside Air Kit opening on the appliance. See Figure 6.2 for opening location.
2. Center collar gasket on top of opening. Place collar on top of the gasket and align screw holes with the appliance.
3. Attach collar assembly to the appliance using the screws removed in Step 1.

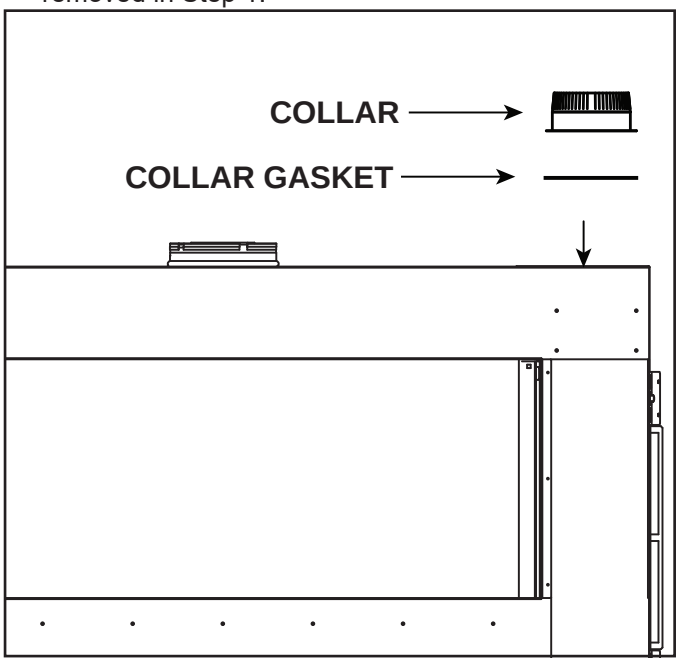


Figure 6.1 Attach Outside Air Kit Collar

B. Prepare to Install LPR-HEAT-DUCT Kit (Optional)

NOTICE: *Additional clearances are required for heat management systems installations. Provisions must be made in advance to ensure fit within the framing.*

- The LPR-HEAT-DUCT heat management kit is available for the PRIMO-II series.
- Locate the knockout on the top right side of the appliance. See Figure 6.2. Remove the knockout from the appliance with a tin snips.
- Center the collar and collar gasket around the exposed hole and attach it to the appliance with 3 screws.

  Note: Do this BEFORE final positioning of the appliance.
- Determine the location for the air register that will accommodate 25 feet of ducting.

Reference the appropriate instructions included with the kit for the remaining installation steps.

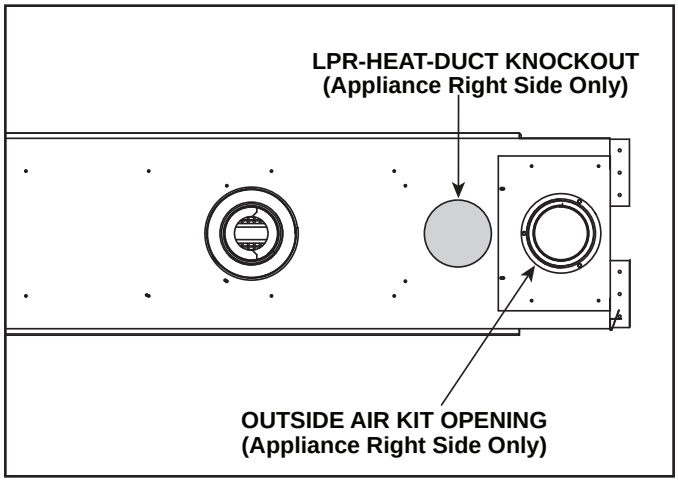


Figure 6.2 Heat Management Knockout Locations

C. Securing and Leveling the Appliance

⚠ WARNING

Risk of Fire!

Prevent contact with:

- *Sagging or loose insulation*
- *Insulation backing or plastic*
- *Framing and other combustible materials*

Failure to maintain air space clearance could cause overheating and fire.

Block openings into the chase to prevent entry of blown-in insulation. Make sure insulation and other materials are secured.

Figure 6.3 shows how to properly position and secure the appliance. Nailing tabs are provided to secure the appliance to the framing members.

- Bend out two nailing tabs on each side.
- Place the appliance into position.
- Keep nailing tabs flush with the framing.
- Level the appliance from side to side and front to back.
- "Square" the appliance as shown in Figure 6.3.
- Shim the appliance as necessary. It is acceptable to use wood shims underneath the appliance.
- Secure the appliance to the framing by using nails or screws through the nailing tabs. Use a minimum of one fastener per nailing tab.
- Optional: Secure the appliance to the floor by inserting two screws through the pilot holes at the bottom of the appliance.

Some figures in manual show the fireplace installed on the floor. However, this fireplace can be elevated off the floor provided that the fireplace is properly supported by framing materials and the ceiling clearances are maintained.

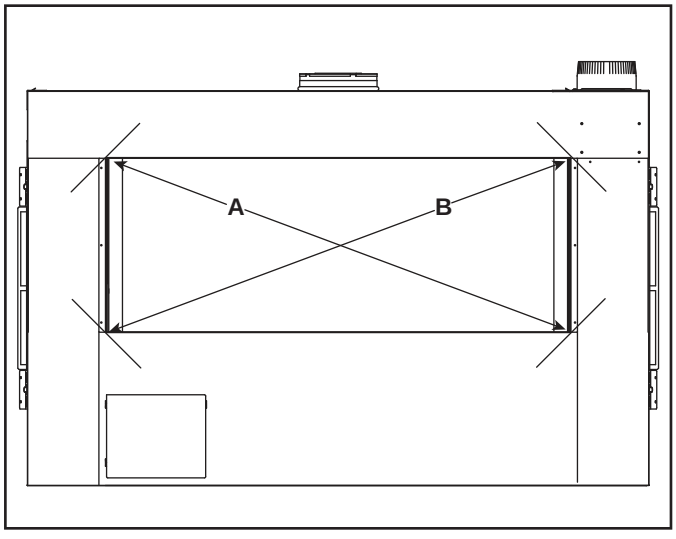


Figure 6.3 Positioning the Appliance Squarely

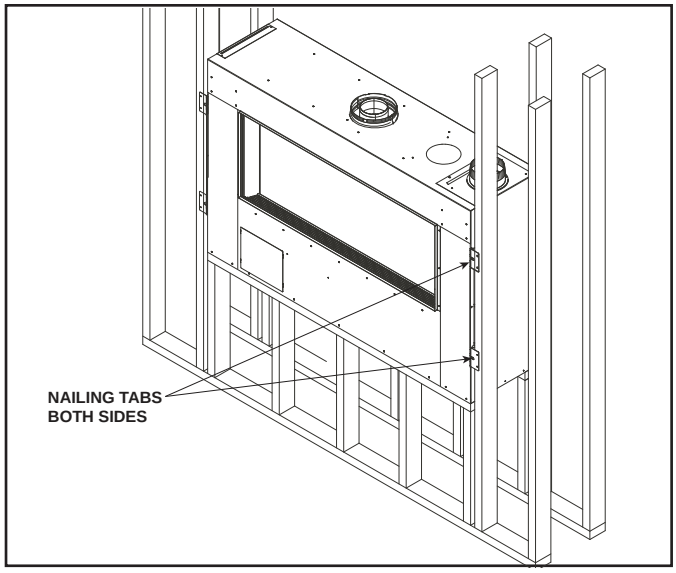


Figure 6.4 Nailing Tab Locations

Setting the Fireplace into the Framing

The left and right nailing tabs were designed as a means to ensure the fireplace is mounted flush with the framing materials. See Figures 6.4-6.6.

1. The shipping flanges protrude further out from the appliance than the side standoffs. The shipping flange may be bent upward or broken off in order to place the appliance into position in the framing.
2. Bend out all nailing tabs. The see-through model will have eight nailing tabs. The single-sided model will have four nailing tabs.
3. Screw each nailing tab to the adjoining framing material. Ensure that the one inch air space clearance is maintained on the sides and back of the fireplace. See Figures 3.6-3.7 for framing and clearance details.

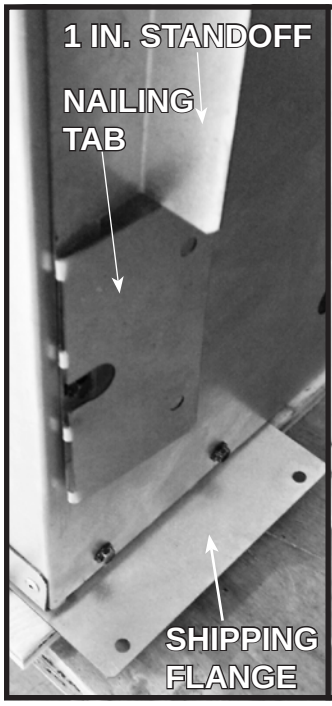


Figure 6.5 Nailing Tabs Shipping Position

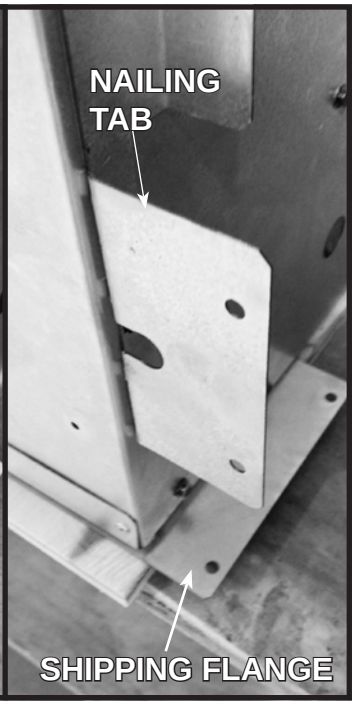


Figure 6.6 Nailing Tabs Installation Position

7 Venting

A. Assemble Vent Sections (DVP Pipe Only)

WARNING! Risk of Fire or Explosion! *Vent sections MUST be installed correctly. Improperly installed vent sections could leak or cause appliance to overheat.*

Attach Vent to the Firebox Assembly

Note: The end of the pipe sections with the lanced tabs will face toward the appliance.

Attach the first pipe section to the starting collar:

- Lanced pipe end of the starting collar.
- Inner pipe over inner collar.
- Push the pipe section until all lanced tabs snap in place.
- Lightly tug on pipe to confirm it has locked.

REQUIREMENT FOR ALL PRIMO-II INSTALLATIONS:

All pipe sections must be connected with screws and sealed .

WARNING! Risk of Fire or Explosion! DO NOT *break silicone seals on slip sections. Use care when removing termination cap from slip pipe. If slip section seals are broken during removal of the termination cap, vent could leak.*

All outer pipe joints must be sealed using one of the methods below, including the slip section that connects directly to the horizontal termination cap.

- Apply a bead of silicone sealant (300 ºF minimum continuous exposure rating) inside the female outer pipe joint prior to joining sections. See Figure 7.1 **OR**
- Apply a bead of silicone sealant (300 ºF minimum continuous exposure rating) to the outside of connecting joint after joining sections **OR**

  Apply aluminum foil tape (300 ºF minimum continuous exposure rating) to the outside of connecting joint after joining sections. On horizontal pipe runs, it is recommended that the tape seam is positioned on the bottom side of the vent pipe.
- Only outer pipes need to be sealed. All unit collar, pipe, slip section, elbow and cap outer flues shall be sealed in this manner, unless otherwise stated.

Assemble Pipe Sections

Per Figure 7.2:

- Start the inner pipe on the lanced end of section A into the flared end of section B.
- Start the outer pipe of section A over the outer pipe of section B.
- Once both vents sections are started, push firmly until all lanced tabs lock into place.
- Lightly tug on the pipe to confirm the tabs have locked.

It is required that screws used to hold outer pipe sections together are no longer than 1/2 in. (13 mm) . If predrilling holes, **DO NOT** penetrate inner pipe.

For 90º and 45º elbows that are changing the vent direction from horizontal to vertical, one screw minimum should be put in the outer flue at the horizontal elbow joint to prevent the elbow from rotating. Use screws no longer than 1/2 in. (13 mm). If predrilling screw holes, **DO NOT** penetrate inner pipe.



Figure 7.1 High Temperature Silicone Sealant

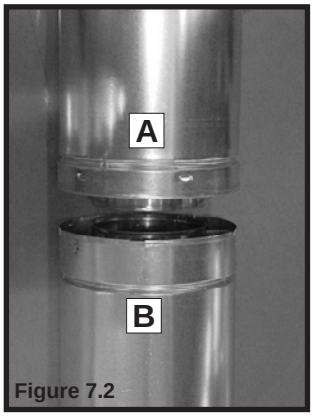


Figure 7.2

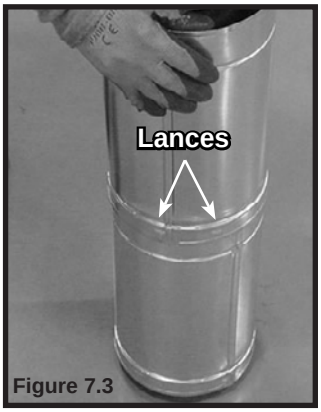
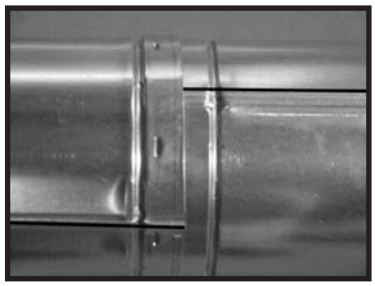
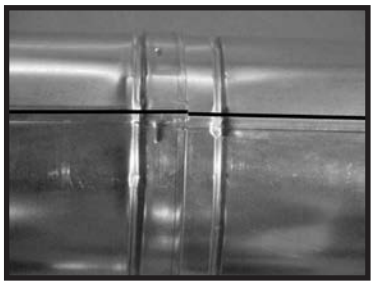


Figure 7.3

Note: Make sure that the seams are not aligned to prevent unintentional disconnection.



CORRECT



INCORRECT

Figure 7.4 Seams

B. Assemble Vent Sections (SLP Only)

WARNING! Risk of Fire or Explosion! *Vent sections MUST be installed correctly. Improperly installed vent sections could leak or cause appliance to overheat.*

To attach the first vent component to the starting collars of the appliance:

- Attach the selected adapter to the starting collar of the appliance.
- Lock the vent components into place by sliding the pipe section onto the collar.
- Align the seam of the pipe and seam of collar to allow engagement. Rotate the vent component to lock into place. Use this procedure for all vent components. See Figure 7.5.
- Continue adding vent components, locking each succeeding component into place.
- Ensure that each succeeding vent component is securely fitted and locked into the preceding component.

It is required that screws used to hold outer pipe sections together are no longer than 1/2 in. (13 mm). If predrilling holes, **DO NOT** penetrate inner pipe.

REQUIREMENT FOR ALL PRIMO-II INSTALLATIONS:

All pipe sections must be connected with screws and sealed .

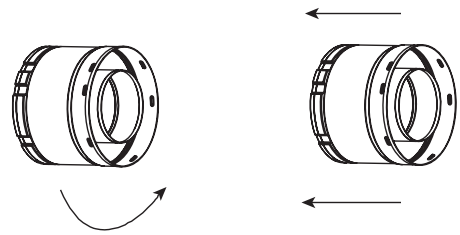
WARNING! Risk of Fire or Explosion! DO NOT *break silicone seals on slip sections. Use care when removing termination cap from slip pipe. If slip section seals are broken during removal of the termination cap, vent could leak.*

All outer pipe joints must be sealed using one of the methods below, including the slip section that connects directly to the horizontal termination cap.

- Apply a bead of silicone sealant (300 ºF minimum continuous exposure rating) inside the female outer pipe joint prior to joining sections. See Figure 7.1 **OR**
- Apply a bead of silicone sealant (300 ºF minimum continuous exposure rating) to the outside of connecting joint after joining sections **OR**

  Apply aluminum foil tape (300 ºF minimum continuous exposure rating) to the outside of connecting joint after joining sections. On horizontal pipe runs, it is recommended that the tape seam is positioned on the bottom side of the vent pipe.
- Only outer pipes need to be sealed. All unit collar, pipe, slip section, elbow and cap outer flues shall be sealed in this manner, unless otherwise stated.

WARNING! Risk of Fire or Explosion! DO NOT *break silicone seals on slip sections. Use care when removing termination cap from slip pipe. If slip section seals are broken during removal of the termination cap, vent could leak.*



Note: Align seams to engage pipe, then rotate counterclockwise to lock

Figure 7.5 Adding Venting Components

C. Assemble Slip Sections

- Slide the inner flue of the slip section into the inner flue of the pipe section and the outer flue of the slip section over the outer flue of the pipe section. See Figure 7.6.
- Slide together to the desired length.

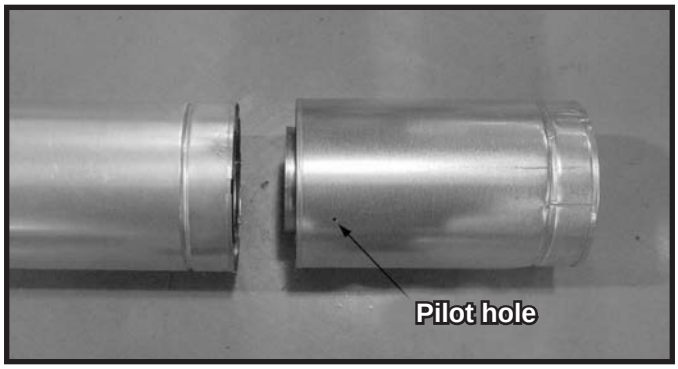


Figure 7.6 Slip Section Pilot Holes

- Maintain a 1-1/2 in. (38 mm) overlap between the slip section and the pipe section.
- Secure the pipe and slip section with two screws no longer than 1/2 in. (13 mm), using the pilot holes in the slip section. See Figure 7.7.

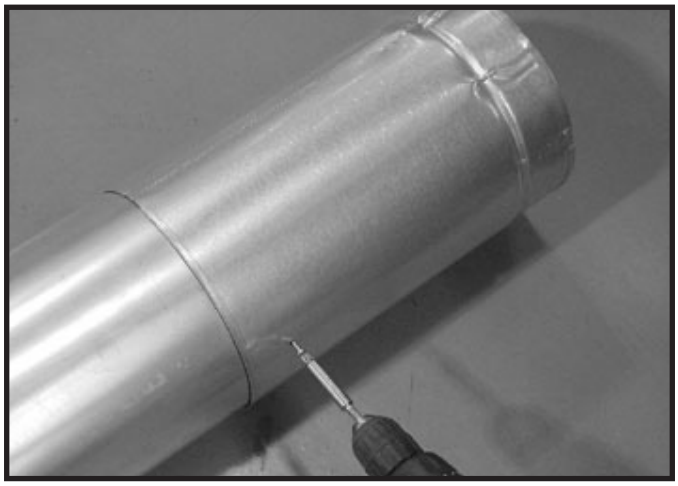


Figure 7.7 Screws into Slip Section

- Continue adding pipe as necessary following instructions in “Assembling Pipe Sections.”

NOTICE: *If slip section is too long, the inner and outer flues of the slip section can be cut to the desired length.*

D. Secure the Vent Sections

WARNING! Risk of Fire, Explosion or Asphyxiation! *Improper support could allow vent to sag and separate. Use vent run supports and connect vent sections per installation instructions.* ***DO NOT*** *allow vent to sag below connection point to appliance.*

- Vertical runs originating off the top of the appliance, with no offsets, must be supported every 8 feet (2.44 m) after the maximum allowed 25 feet (7.62 m) of unsupported rise.
- Horizontal runs must be supported every 5 feet (1.52 m).
- Vent supports or plumbers strap (spaced 120º apart) may be used to support vent sections. See Figures 7.8 and 7.9.

  Note: Figures 7.8 and 7.9 are to be used for reference only. Method of strap installation could vary by configuration of vent system.
- Wall shield firestops may be used to provide horizontal support to vent sections.
- SLP ceiling firestops have tabs that may be used to provide vertical support.

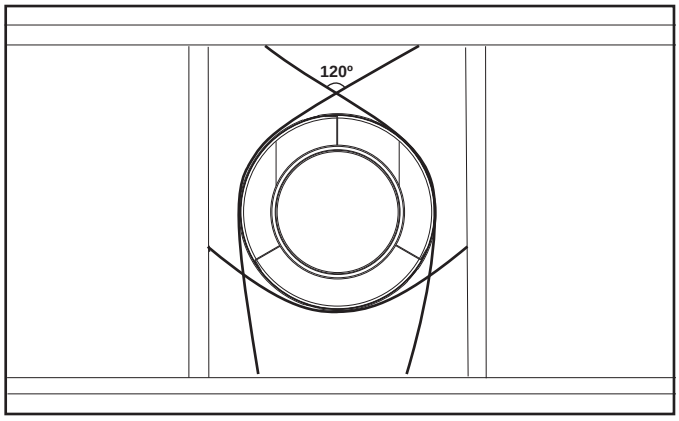


Figure 7.8 Securing Vertical Pipe Sections

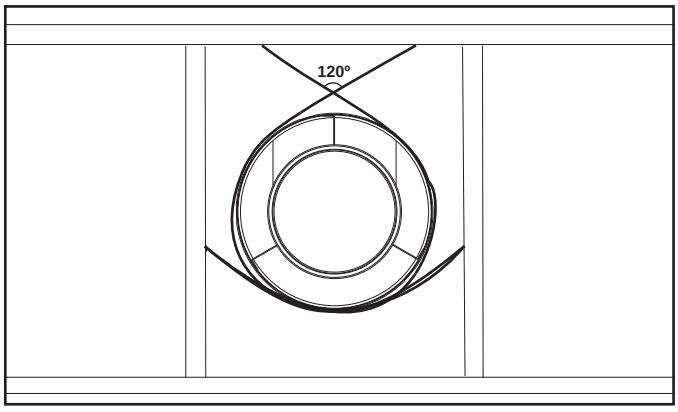


Figure 7.9 Securing Horizontal Pipe Sections

E. Disassemble Vent Sections

- Rotate either section (see Figure 7.10) so the seams on both pipe sections are aligned as shown in Figure 7.11.
- Pull carefully to separate the pieces of pipe.

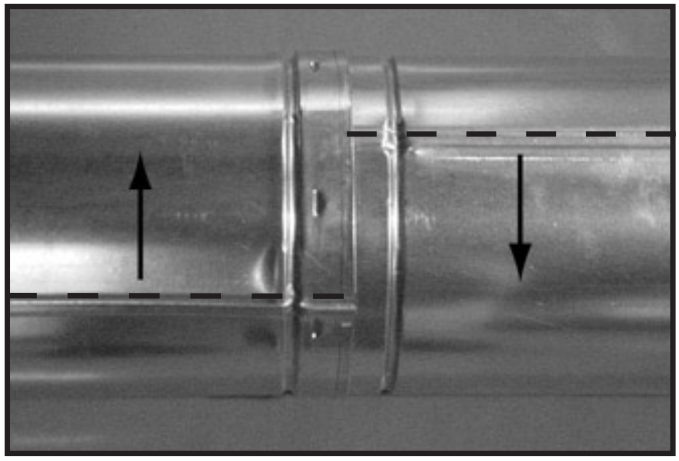


Figure 7.10 Rotate Seams for Disassembly

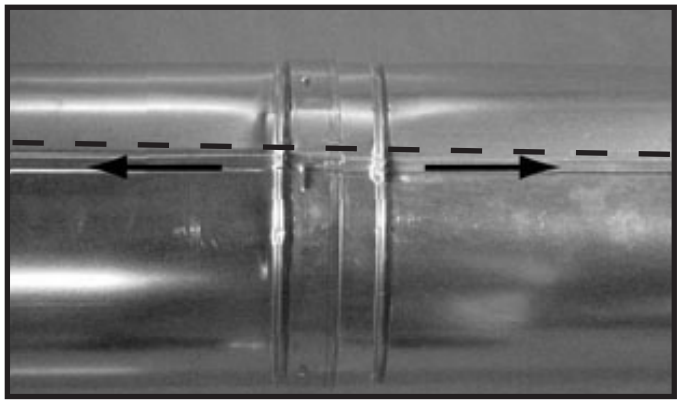


Figure 7.11 Align and Disassemble Vent Sections

F. Vertical Termination Requirements

Install and Seal Metal Roof Flashing

- See minimum vent heights for various pitched roofs (Section 4, Figure 4.1) to determine the length of pipe to extend through the roof.
- Slide the roof flashing over the pipe sections extending through the roof as shown in Figure 7.12.
- Use an elastomeric or silicone sealant with a minimum of 150 ºF temperature rating to seal the metal roof flashing.

Note: When installing a silicone or EPDM pipe flashing boot on a metal roof, it is recommended to put a bead of 100% silicone sealant where the boot contacts the vent pipe to prevent the entry of water. Follow the manufacturer's recommendations when installing the boot.

NOTICE: *Failure to properly seal the roof flashing and pipe seams could permit entry of water.*

- Seal the gap between the roof flashing and the outside diameter of the pipe.
- Seal the perimeter of the flashing where it contacts the roof surface. See Figure 7.12.
- Seal the exposed pipe section seams that are located above the roof.

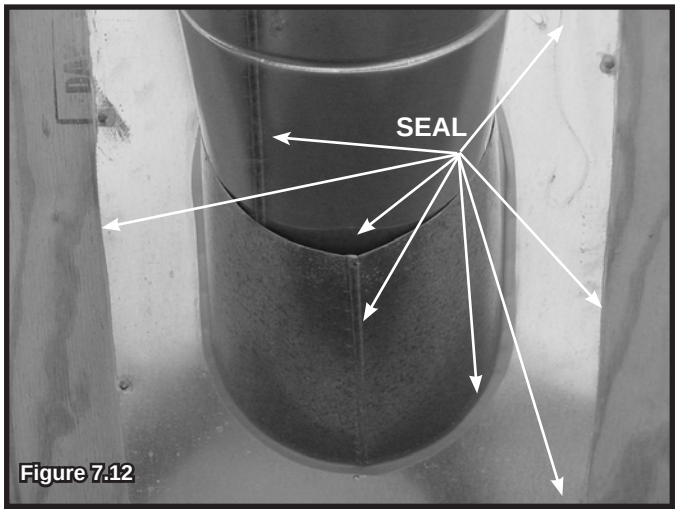


Figure 7.12

Assemble and Install Storm Collar

CAUTION! Risk of Cuts, Abrasions or Flying Debris. *Wear protective gloves and safety glasses during installation. Sheet metal edges are sharp.*

- Slide the storm collar onto the exposed pipe section and align brackets.
- Insert a bolt (provided) through the brackets and install nut. Do not completely tighten. See Figure 7.13.


Figure 7.13 Insert Bolt into Brackets

- Slide the assembled storm collar down the pipe section until it rests on the roof flashing. See Figure 7.14.
- Tighten nut and make sure the collar is tight against the pipe section.
- Seal around the top of the storm collar. See Figure 7.14.

Install Vertical Termination Cap

- Attach the vertical termination cap by sliding the inner collar of the cap into the inner flue of the pipe section while placing the outer collar of the cap over the outer flue of the pipe section.
- Secure the cap by driving three self-tapping screws (supplied) through the pilot holes in the outer collar of the cap into the outer flue of the pipe. See Figure 7.14.

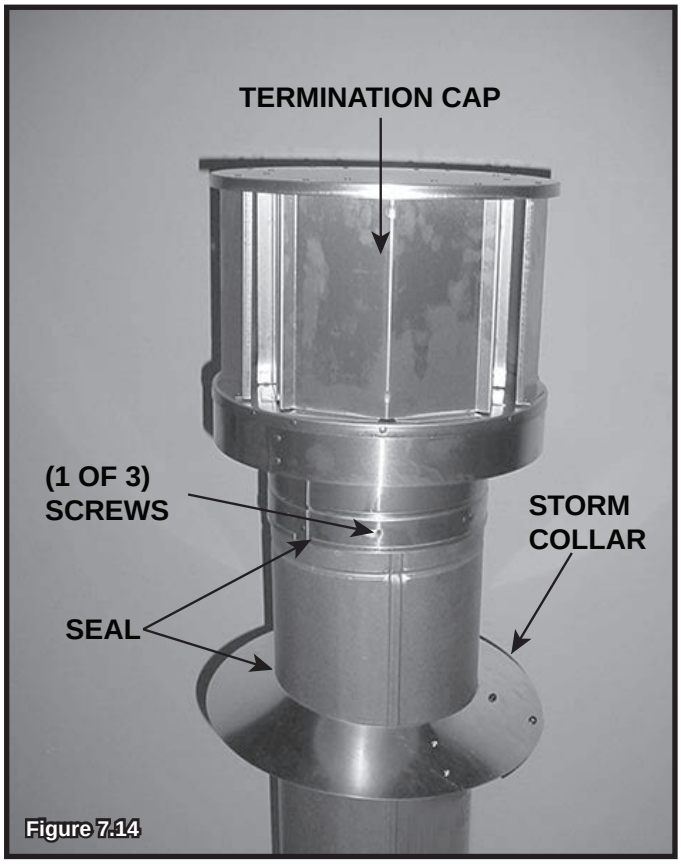


Figure 7.14

G. Horizontal Termination Requirements

Heat Shield Requirements for Horizontal Termination

WARNING! Risk of Fire! *To prevent overheating and fire, heat shields must extend through the entire wall thickness.*

- ***DO NOT*** *remove the heat shields attached to the wall shield firestop and the horizontal termination cap (shown in Figure 7.15).*
- *Heat shields must overlap 1-1/2 in. (38 mm) minimum.*

There are two sections of the heat shield. One section is factory-attached to the wall shield firestop. The other section is factory-attached to the cap. See Figure 7.15.

If the wall thickness does not allow the required 1-1/2 in. (38 mm) heat shield overlap when installed, an extended heat shield must be used.

- If the wall thickness is less than 4 in./102 mm (DVP) or 4-3/8 in./ 111 mm (SLP), the heat shields on the cap and wall shield firestop must be trimmed. A minimum 1-1/2 in. (38 mm) overlap MUST be maintained.
- Use an extended heat shield if the finished wall thickness is greater than 7-1/4 in. (184 mm).
- The extended heat shield may need to be cut to length maintaining sufficient length for a 1-1/2 in. (38 mm) overlap between heat shields.
- Attach the extended heat shield to either of the existing heat shields using the screws supplied with the extended heat shield. Refer to vent components diagrams in the back of this manual.
- Rest the small leg on the extended heat shield on top of the pipe section to properly space it from the pipe section.

Important Notice: Heat shields may <u>not</u> be field constructed.

Install Horizontal Termination Cap (DVP and SLP Pipe)

WARNING! Risk of Fire! *The telescoping flue section of the termination cap MUST be used when connecting vent.*

- *1-1/2 (38 mm) minimum overlap of flue telescoping section is required.*

Failure to maintain overlap could cause overheating and fire.

- Vent termination must not be recessed in the wall. Siding may be brought to the edge of the cap base.
- Flash and seal as appropriate for siding material at outside edges of cap.
- When installing a horizontal termination cap, follow the cap location guidelines as prescribed by current **ANSI Z223.1** and **CAN/CGA-B149** installation codes and refer to Section 4 of this manual.

CAUTION! Risk of Burns! *Local codes may require installation of a cap shield to prevent anything or anyone from touching the hot cap.*

NOTICE: *For certain exposures which require superior resistance to wind-driven rain penetration, a flashing kit is available. When penetrating a brick wall, a brick extension kit is available for framing the brick.*

Note: When using termination caps with factory-supplied heat shield attached, no additional wall shield firestop is required on the exterior side of a combustible wall.

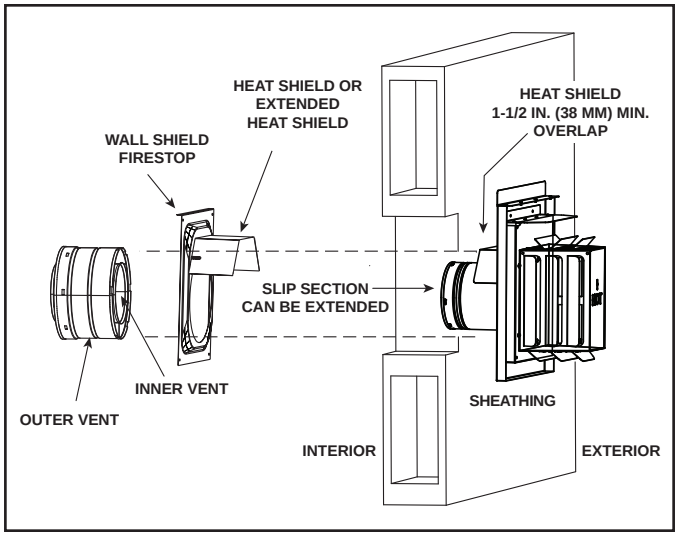


Figure 7.15 Venting Through the Wall

8 Electrical Information

A. General Information

WARNING! Risk of Shock! DO NOT *wire 110-120 VAC to the IntelliFire Touch 2.0 Electronic Control Module (IFT-ECM 2.0) or to the appliance wall switch. Incorrect wiring will damage the IFT2-ECM.*

These gas appliance models are built with the following electronic control module which is in compliance with Federal Communications Commission (FCC) and Industry Standard of Canada (IC).

Model Name: IntelliFire Touch® Technology 2.0 - Electronic Control Module (IFT2-ECM)

Model No: 2564-130

NOTICE: *This appliance must be electrically wired and grounded in accordance with local codes or, in the absence of local codes, with* **National Electric Code ANSI/NFPA 70-latest edition** *or the* **Canadian Electric Code CSA C22.1.**

- Wire the appliance circuit using a minimum 14-2 AWG with ground to unswitched 110-120 VAC. This is required for proper operation of the appliance.
- The PRIMO-II appliances will have a typical maximum 5 amp draw.
- A 110-120 VAC circuit for this product must be protected with ground-fault circuit interrupter protection, in compliance with the applicable electrical codes, when it is installed in locations such as in bathrooms or near sinks.
- Low voltage (24VAC or less) and high voltage (110-120VAC) voltage cannot be shared within the same wall box.

Note: It is recommended that the appliance is on a dedicated circuit.

NOTICE: *The following items, when installed on the same circuit, may cause non-damaging interference and interrupt normal operation of the fireplace:*

- *Smart Home Automation devices*
- *Residential & Commercial Servers*
- *Audio Visual Systems*

Junction Box Wiring

The junction box is factory-installed in the control cavity of the appliance. It is accessed through the panel on the front of the appliance.

- Open the access panel by lifting and pulling out.
- Remove the screw attaching the junction box to the junction box plate. Rotate the junction box up and off of the plate. See Figure 8.1.
- Pull the electrical wires from outside the appliance through the electrical wire opening, as shown in Figure 8.2, into the control cavity and secure wires with a Romex connector.

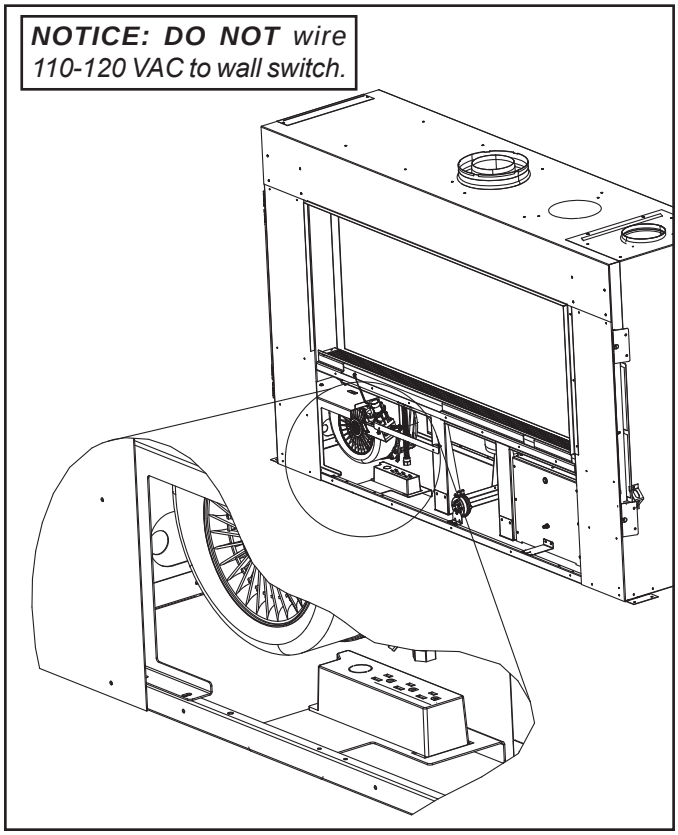


Figure 8.1 Junction Box Detail

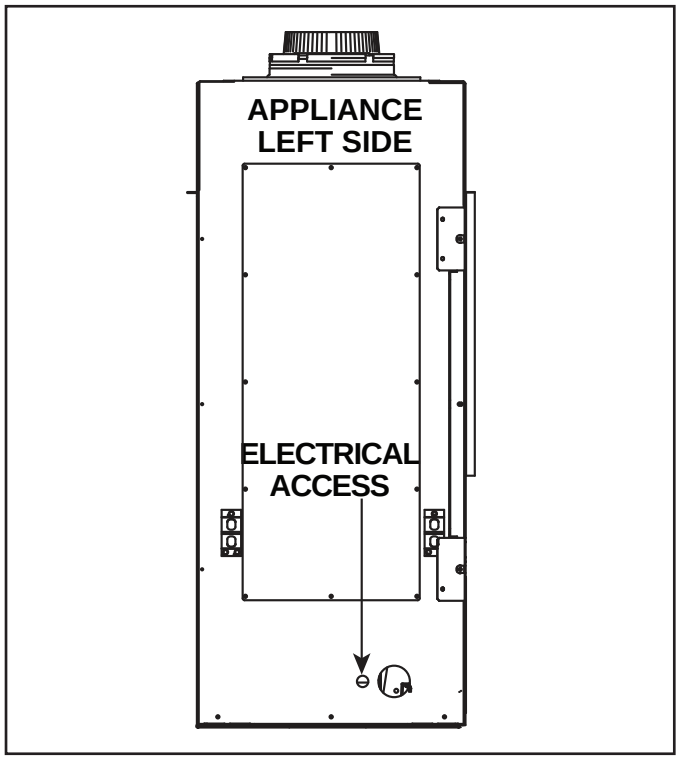


Figure 8.2 Electrical Access

- Make all necessary wire connections to the junction box/receptacle and reattach the junction box/receptacle to the outer shell.
- The gap between the electrical wires and the electrical access hole MUST be sealed with caulk or aluminum foil tape with a minimum of 300 ºF continuous exposure rating or stuffed with non-combustible, unfaced insulation to prevent the convection fan from drawing air through the gap and preventing cold air infiltration.

NOTICE: *If gap is not sealed properly, appliance could cycle.*

Accessories Requirements

- This appliance is operated using a remote control. The IFT2-RC450 remote ships factory-installed. The IFT-RC150U wireless wall switch is an option for this appliance.

Wiring for optional Hearth & Home Technologies approved accessories should be done now to avoid reconstruction. Follow instructions that come with those accessories.

Electrical Service and Repair

WARNING! Risk of Shock! *Label all wires prior to disconnection when servicing controls. Wiring errors could cause improper and dangerous operation. Verify proper operation after servicing.*

WARNING! Risk of Shock! *The damaged wire must be replaced with the wire that meets the following requirements:*

- *A minimum of 105°C temperature rated*
- *Proper AWG current rated*
- *UL 758 Appliance Wiring Material certified*

B. Wiring Requirements
IntelliFire Touch® Ignition System Wiring

- Wire the appliance junction box to 110-120 VAC for proper operation of the appliance.

WARNING! Risk of Shock or Explosion! *DO NOT wire the appliance junction box to a wall electrical switch. The appliance junction box will be wired to a Romex cable that is connected to the utility power (110-120 VAC). DO NOT miswire the appliance junction box Line (Black), Neutral (White) and Ground (Green) connections to the Romex cable. Otherwise, there is a danger of electrical shock and the controls malfunctioning.*

- Refer to Figure 8.7 IntelliFire Touch (IFT 2.0) Wiring Diagram.
- This appliance is equipped with an IFT control system which operates on 6 VDC through the included adapter.
- Connect the 6 VDC power adapter AC input power plug into the appliance junction box to supply power to the appliance.

Access and Removal of Component Tray

If access to the electrical component tray is needed for service:

1. Remove SafeSurface barrier glass following the instructions in Section 11.
2. Remove media from the transition media tray
3. Remove the side transition panels by removing top and bottom screws in each panel.
4. Disconnect the two high temperature limit switch wires from the high temperature limit switch assembly.
5. Remove transition media tray.
6. Remove LED tray assembly.
7. Locate component tray and remove component tray screw. See Figure 8.3.
8. Lift upward on component tray to remove it from the control cavity of the appliance. Rotate it down to a horizontal position as shown in Figure 8.5. Figure 8.6 shows the layout of the components on the component tray assembly.

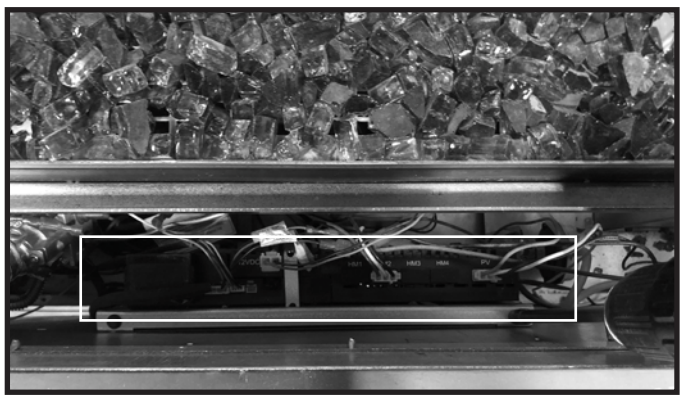


Figure 8.3 Location of Component Tray - Top View

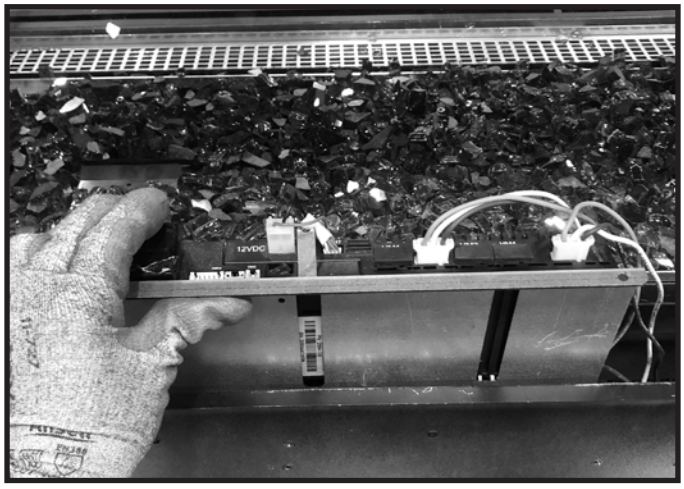


Figure 8.4 Lift Component Tray Up and Out of Firebox

Removal of Fans for Service

If the convection and combustion fans need to be serviced or replaced, a replacement kit is available. Follow instructions for fan removal included in the kit. Contact your dealer to order.

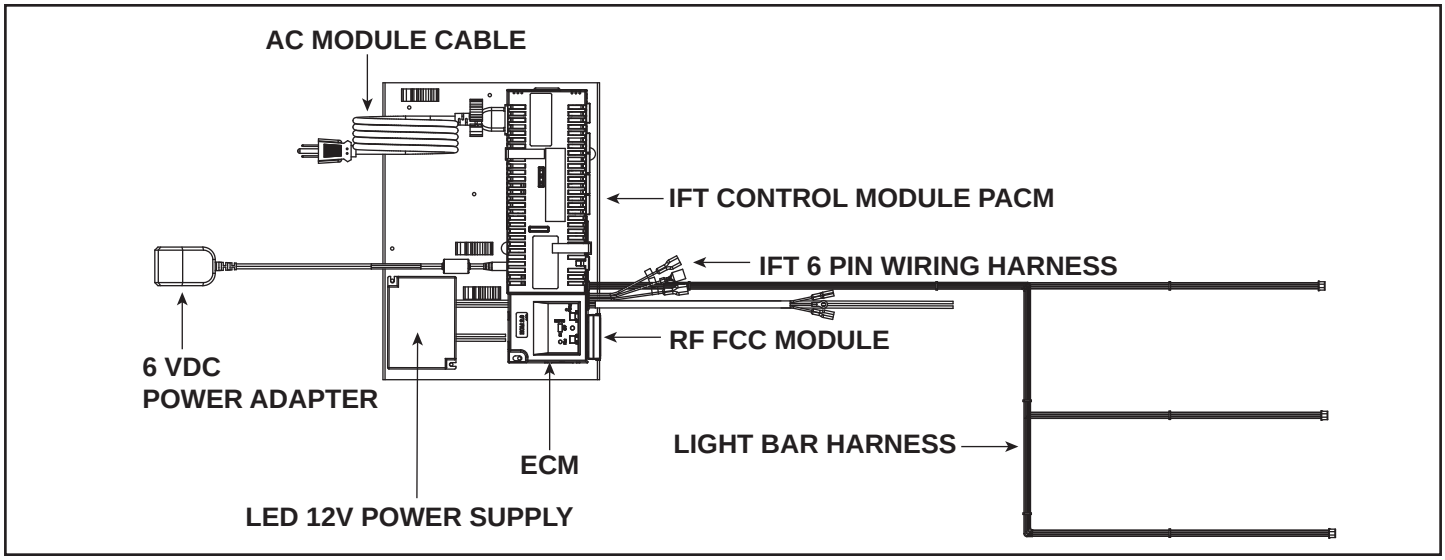


Figure 8.5 Component Tray Removed

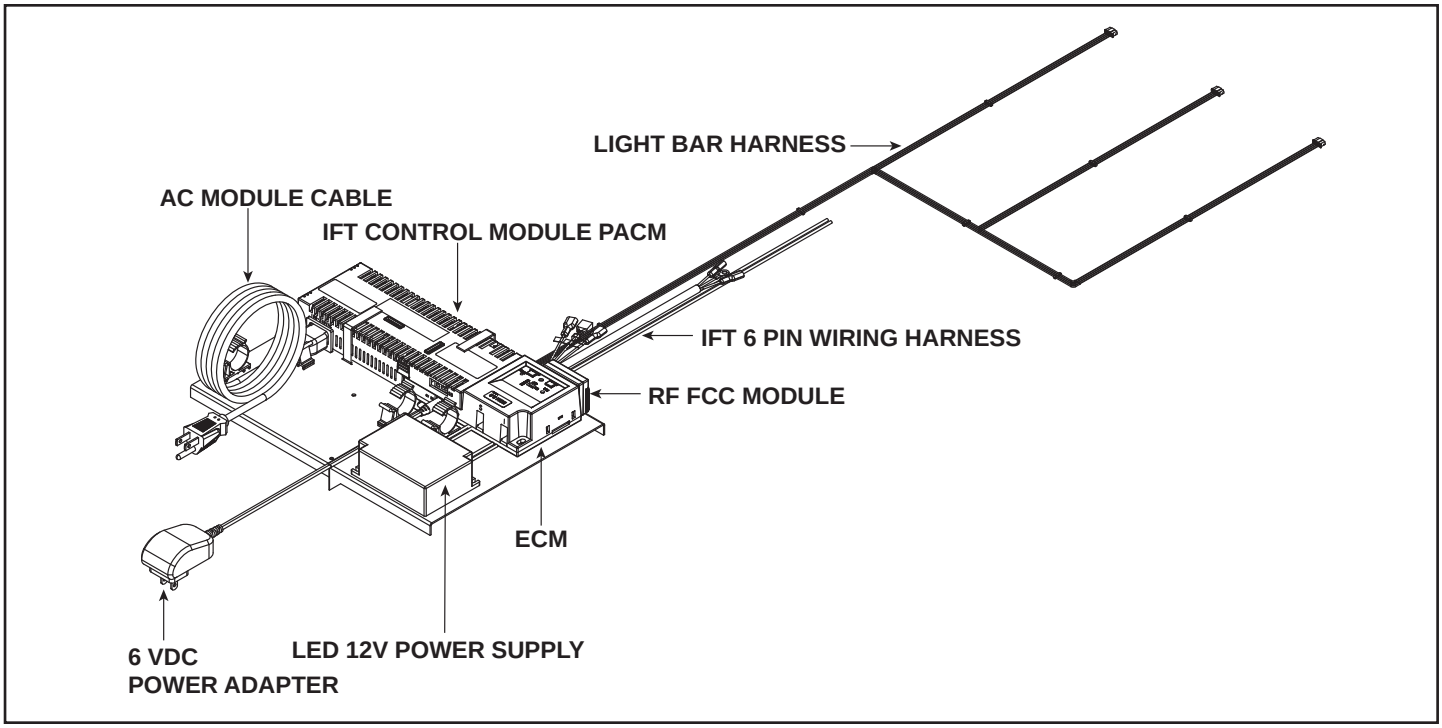


Figure 8.6 Component Tray Assembled

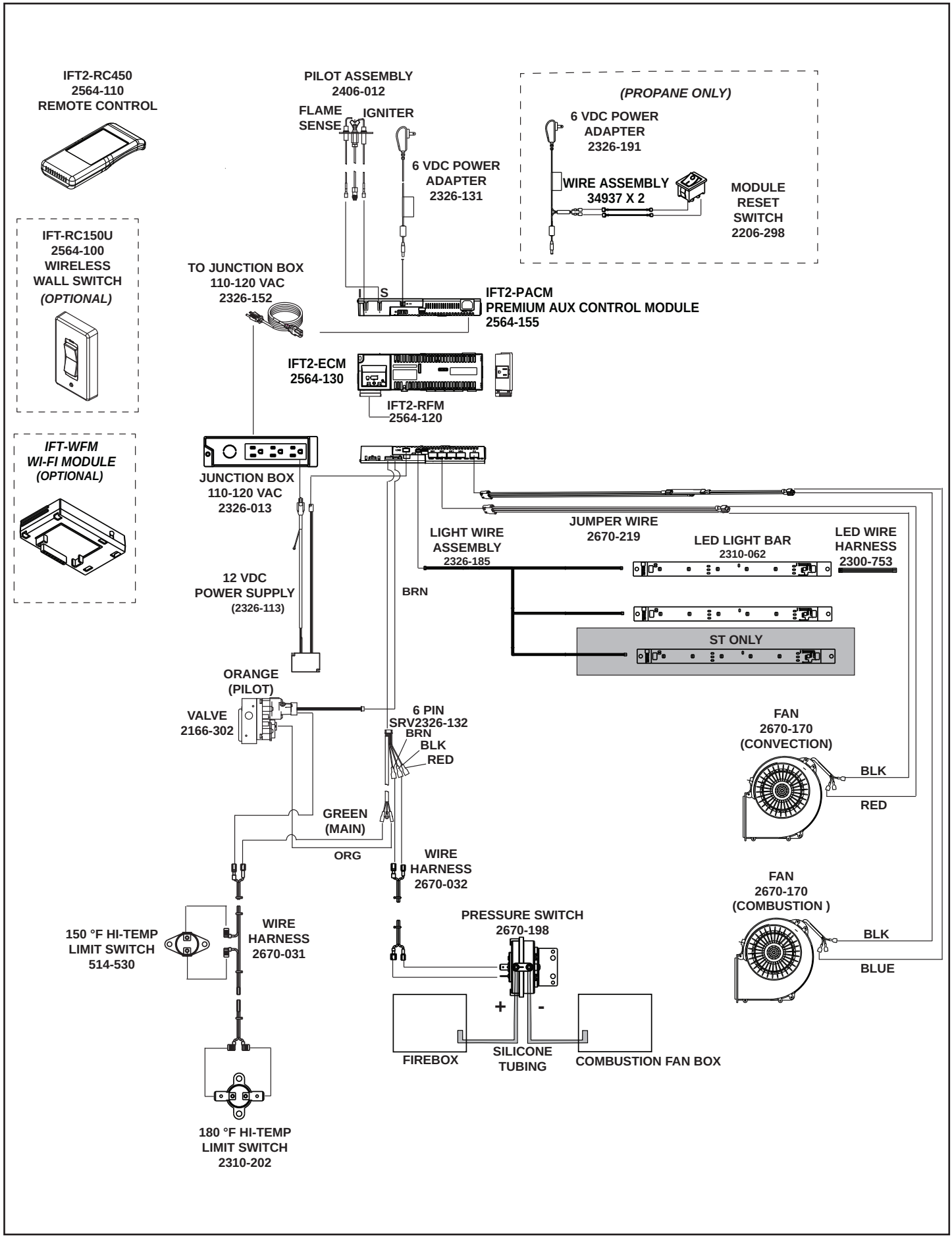


Figure 8.7 IntelliFire Touch Wiring Diagram

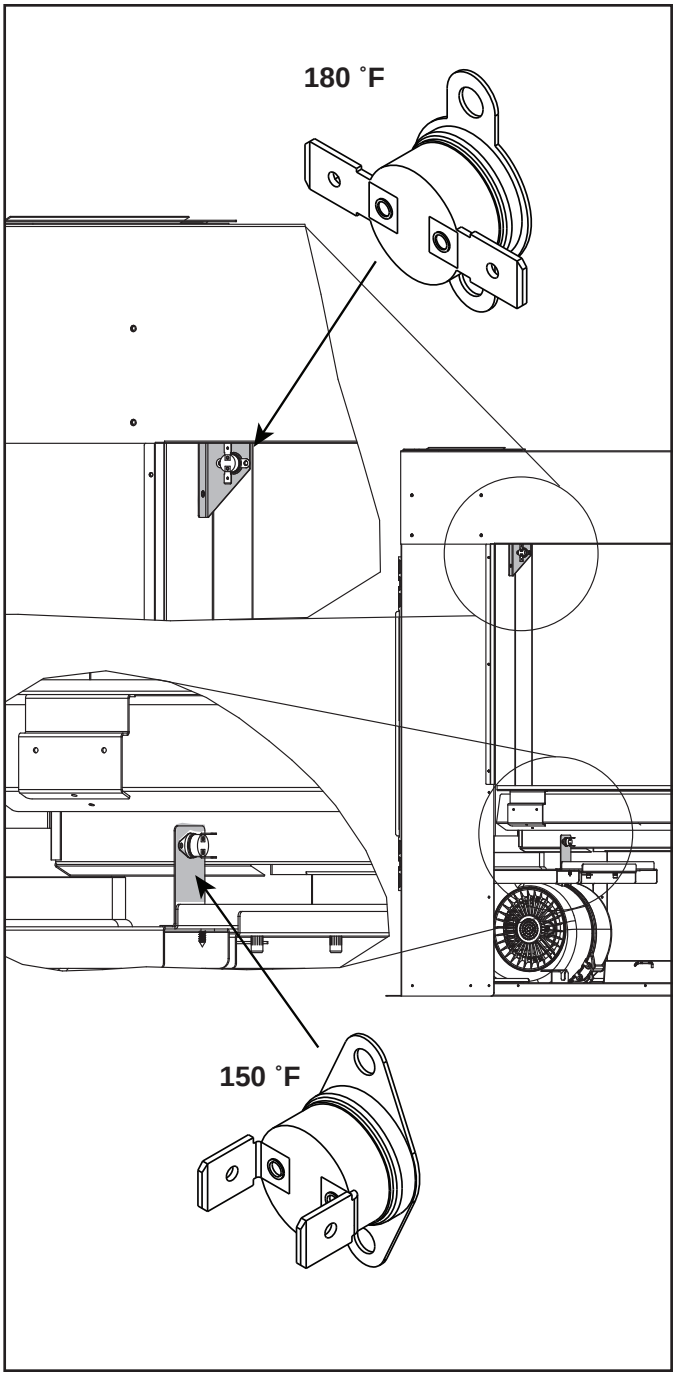


Figure 8.8 High Temperature Limit Switch Locations

9 Gas Information

⚠ WARNING



Risk of Fire! Risk of Explosion! Risk of Asphyxiation!

Follow all instructions and warnings for installing and servicing gas line.



- Gas line installation and service must be performed by a qualified installer or licensed plumber in accordance with all applicable codes for the installation location (NFPA 54 / ANSI Z223.1, the current International Fuel Gas Code, or CAN/CSA B149 in Canada) (In the Commonwealth of Massachusetts installation must be performed by a licensed plumber or gas fitter).
- Check all fittings and connections by means of a listed combustible gas detector, a noncorrosive leak detection fluid, or other approved leak detection method. ***DO NOT*** use open flame.

⚠ WARNING



Risk of Fire! Risk of Explosion!

Pressure exceeding 1/2 PSIG (14 in. w.c. / 3.5 kPa) will damage gas valve control.



- Disconnect appliance and its manual shutoff valve BEFORE line pressure testing.
- Cap outlet on piping system at appliance connection BEFORE line pressure testing.
- Connect appliance AFTER confirming piping system pressure is equal or less than 1/2 PSIG (14 in. w.c./ 3.5 kPa).

A. Fuel Conversion

- Make sure the appliance is compatible with available gas types.
- Conversions must be made by a qualified service technician using Hearth & Home Technologies specified and approved parts.

B. Gas Pressure

- Install pressure regulator upstream of gas valve if line inlet pressure exceeds 1/2 PSIG.
- Recommended inlet pressure for optimal appliance performance: 7.0 in. w.c. (NG) 12.0 in. w.c. (Propane)
- Pressure requirements when in operation are:

Gas Pressure	Natural Gas	Propane
Minimum inlet pressure	5.0 in. w.c.	11.0 in. w.c.
Maximum inlet pressure	10.0 in. w.c.	13.0 in. w.c.
Manifold pressure	3.5 in. w.c.	10.0 in. w.c.

- Verify inlet pressure is within specified range, including when other household gas appliances are operating.

Note: A listed (and Commonwealth of Massachusetts approved) 1/2 in. (13 mm) T-handle manual shut-off valve and flexible gas connector are connected to the 1/2 in. (13 mm) control valve inlet.

- **If substituting for these components, please consult local codes for compliance.**

C. Gas Connection and Gas Line Purging

⚠ WARNING



Risk of Fire! Risk of Explosion!

Gas buildup during line connection and purging could ignite.



- Support gas control when attaching pipe to prevent bending gas line.
- Gas line installation and purging of the gas fuel line MUST be performed by a qualified service technician or a licensed plumber in accordance with the applicable gas code for the installation location (NFPA 54 / ANSI Z223.1, the current International Fuel Gas Code, or CAN/CSA B149 in Canada).
- Use a listed combustible gas detector, a noncorrosive leak detection fluid, or other approved leak detection method to check all fittings and connections for gas leaks before lighting the appliance.
- Ensure ventilation.
- Eliminate ignition sources, such as sparks or open flames.

- Refer to Section 3 for location of gas line access in appliance.
- Pipe incoming gas line into valve compartment.
- The gap between supply piping and gas access hole MUST be sealed with caulk or aluminum foil tape with a minimum of 300 ºF continuous exposure rating or stuffed with non-combustible, unfaced insulation to prevent cold air infiltration.

NOTICE: *If gap is not sealed properly, appliance could cycle.*

- Ensure that gas line does not come in contact with outer wrap of the appliance. Follow local codes.
- Connect incoming gas line to the 1/2 in. (13 mm) NPT connection on manual shutoff valve.
- A small amount of air will be in the gas supply line and must be purged. Light the appliance to allow air to purge through the pilot assembly.

D. High Altitude Installations

NOTICE: *If the heating value of the gas has been reduced, these rules do not apply. Check with your local gas utility or authorities having jurisdiction.*

When installing above 2000 feet elevation:

- In the USA: Reduce input rate 4% for each 1000 feet above 2000 feet.
- In CANADA: Input ratings are certified without a reduction of input rate for elevations up to 4500 feet (1370 m)above sea level. Please consult provincial and/or local authorities having jurisdiction for installations at elevations above 4500 feet (1370 m).

Check with your local gas utility to determine proper orifice size.

E. Air Shutter Setting

WARNING! *Risk of Explosion or Delayed Ignition! Improperly adjusted air shutter could cause soot buildup.*

NOTICE: *If sooting occurs, provide more air by opening the air shutter.*

The air shutter is set at the factory to accommodate all vent runs for natural gas installations. Propane installations will require adjustment of the air shutter.

Air shutter settings should be adjusted by a qualified service technician at the time of installation.

To adjust the air shutter:

- Loosen the shutter screw.
- Rotate the shutter to desired setting.
- Tighten the shutter screw.

See Figure 9.1.

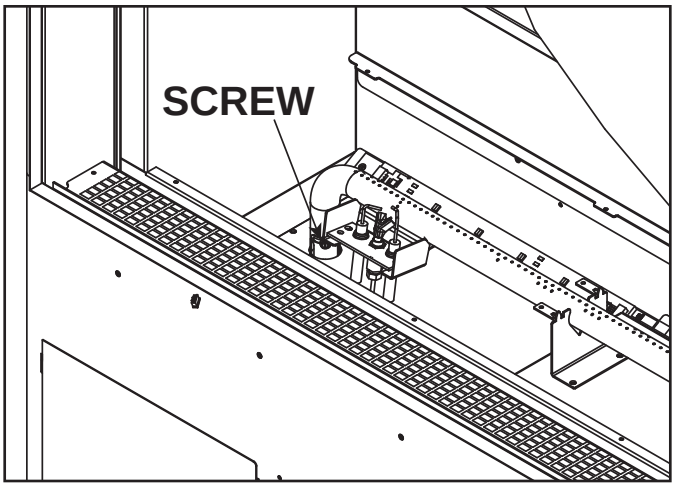


Figure 9.1 Air Shutter

Air Shutter Settings

MODEL	NG	
	No Logs	With Optional Log Set
PRIMO-II-48 PRIMO-II-48ST	1/8 in.	1/8 in.
PRIMO-II-60 PRIMO-II-60ST	1/16 in.	3/16 in.
PRIMO-II-72 PRIMO-II-72ST	1/8 in.	1/8 in.

MODEL	PROPANE	
	No Logs	With Optional Log Set
PRIMO-II-48 PRIMO-II-48ST	3/8 in.	7/16 in.
PRIMO-II-60 PRIMO-II-60ST	3/8 in.	3/8 in.
PRIMO-II-72 PRIMO-II-72ST	7/16 in.	1/2 in.

Shutter Setting Verification / Flame Appearance

- After 15 minutes, the flames will be a yellow/blue mix. The front flames may be blue at this time.
- After 30 minutes, the flames should be yellow with some blue flames near the burner ports.
- After 1 hour, the flame will be at its maximum maturity.

NOTICE: *Flames should not appear orange or stretch to the top of firebox. If flames are dark orange with dark, smoky tips, provide more primary air to the burner by opening the air shutter accordingly.*

10 Finishing

A. Facing and Finishing

⚠ WARNING

Risk of Fire!

DO NOT *apply combustible materials beyond the minimum clearances. Comply with all minimum clearances to combustibles as specified in this manual. Materials overlapping into non-combustible zones could ignite and will interfere with air flow or proper operation.*

- Facing and/or finishing materials must not interfere with air flow or access for service.
- Facing and/or finishing materials must never overhang into the glass opening. See Figure 10.6.
- Observe all clearances when applying combustible materials.
- Seal gaps between the finished wall and appliance top and sides using a 300 ºF minimum sealant. Refer to Figure 10.1 and Figure 10.2.
- Finishing materials must be installed with no gaps in order to prevent the escape of heat between the finishing materials and the wall. See Figure 10.2.

WARNING! Risk of Fire! DO NOT *apply combustible materials beyond the minimum clearances. Comply with all minimum clearances to combustibles as specified in this manual. Overlapping materials could ignite and will interfere with proper operation.*

- Facing materials may be combustible or non-combustible.
- Facing material thickness of 1/2 inch is referenced throughout this manual, but either 1/2 inch or 5/8 inch material is acceptable.
- Additional non-combustible finishing materials such as granite, stone or tile may be installed. See Figure 10.1.

NOTICE: *Surface temperatures around the appliance will become warm while the appliance is in operation. Ensure finishing materials used for all surfaces (floor, walls, mantels, etc.) will withstand temperatures up to 190°F.*

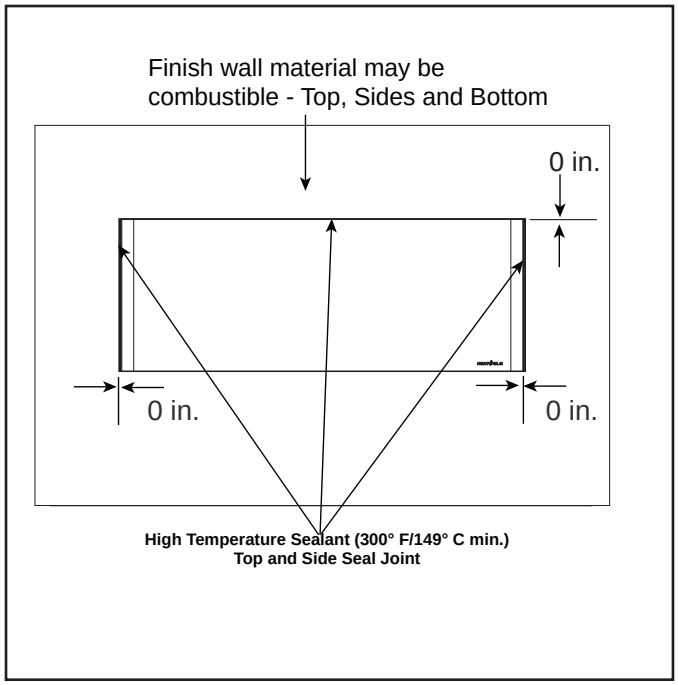


Figure 10.1 Non-Combustible Facing Diagram

WARNING! *Risk of Overheating!* ***DO NOT*** *allow gap between finishing materials and front of appliance or between front of appliance and wall sheathing material.*

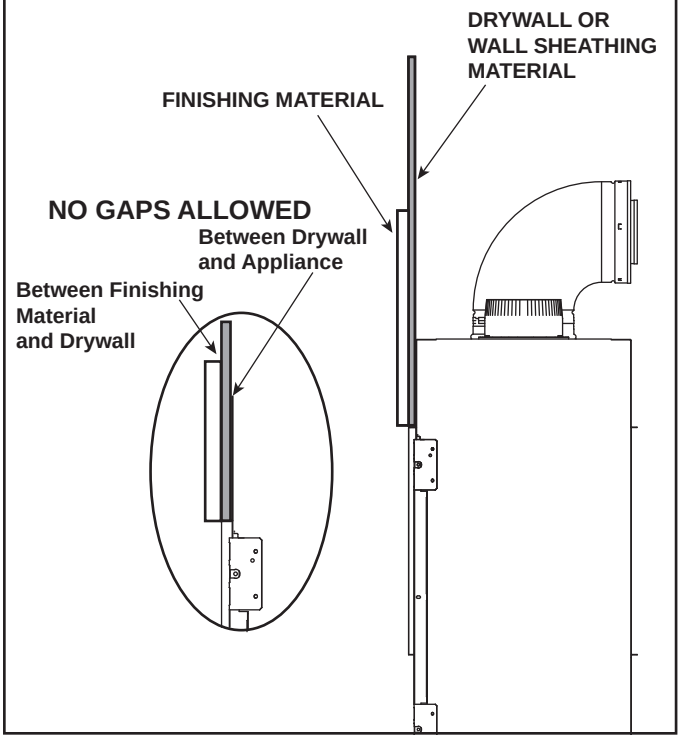


Figure 10.2 Finishing Material Installed

Finishing Instructions

It is important to follow the framing and finishing instructions to ensure proper placement of fireplace into the surrounding framing/finishing materials.

Wall sheathing materials 1/2 in. thick are specified in this installation manual to properly align with the finishing methods that may be used. The PRIMO-II may be finished to the appliance opening with 1/2 inch thick drywall.

- Ensure that the one inch back clearance and one inch side clearances are maintained.

WARNING! Risk of Fire! *Maintain specified air space clearances to combustibles. Inadequate air space could cause overheating and fire.*

The appliance is designed to be used with 1/2 in. wall sheathing materials such as drywall, plywood, wood composites, or non-combustible materials. Non-combustible finishing is not required.

Note: It is acceptable to use a high temperature silicone sealant to adhere drywall to lower access cover panel.

Drywall Installation and Finishing

Introduction

If the desired finished fireplace installation does not utilize non-combustible finishing materials (such as tile, marble, stone, etc.), special attention must be paid to the installation of drywall/gypsum wallboard to minimize potential development of cracking and paint discoloration. Hearth and Home Technologies has tested the following methods and materials and therefore recommends the following steps for the best drywall performance.

NOTICE: *Hearth & Home Technologies recommends using multiple pieces of decorative finish material around the opening of the appliance to reduce the chances of the material cracking. A single piece of decorative finish material (such as marble or granite) is more susceptible to cracking due to uneven heating and cooling which causes temperature differentials within the material itself. The use of multiple pieces will reduce the temperature differentials in each piece and reduce the likelihood of cracks.*

Preparation

1. Install 1/2 inch drywall on wall. Figure 10.4 shows the PRIMO installed. Drywall (1/2 inch) has been installed up to the top, bottom and sides of appliance opening as shown in Figure 10.3 and 10.4. See Section 10.A for more details regarding facing material.
2. Apply the drywall joint compound. When applying the joint compound, feather it evenly around the opening throughout the zone shown in Figure 10.4. A smooth, even surface, covering a wide area of the wall is desired for best results. For best results, follow the tips below.

Filling and Finishing Seams

1. **Step 1:** Fill all gaps and joints between the drywall pieces with a general purpose chemically setting joint compound such as Durabond® 45 Joint Compound manufactured by USG (Sheetrock® brand), recommended by Hearth & Home Technologies. Use a drywall knife to firmly press the joint compound into all gaps. See Figure 10.1. Allow these joints to dry.
2. **Step 2:** All joints are to be taped with fiberglass mesh tape 1 7/8" minimum width, and embedded with Setting-Type joint compound, such as with Durabond® Joint Compound manufactured by USG (Sheetrock® brand), or equivalent. Allow these joints to dry.
3. **Step 3:** Depending on the technique used in steps 1 and 2, two to three finishing coats are required to provide a smooth and durable finish. Hearth and Home Technologies recommends a lightweight or all-purpose compound. Allow each coat to properly cure. Allow the finishing coat(s) to cure for 24 hours before operating appliance.

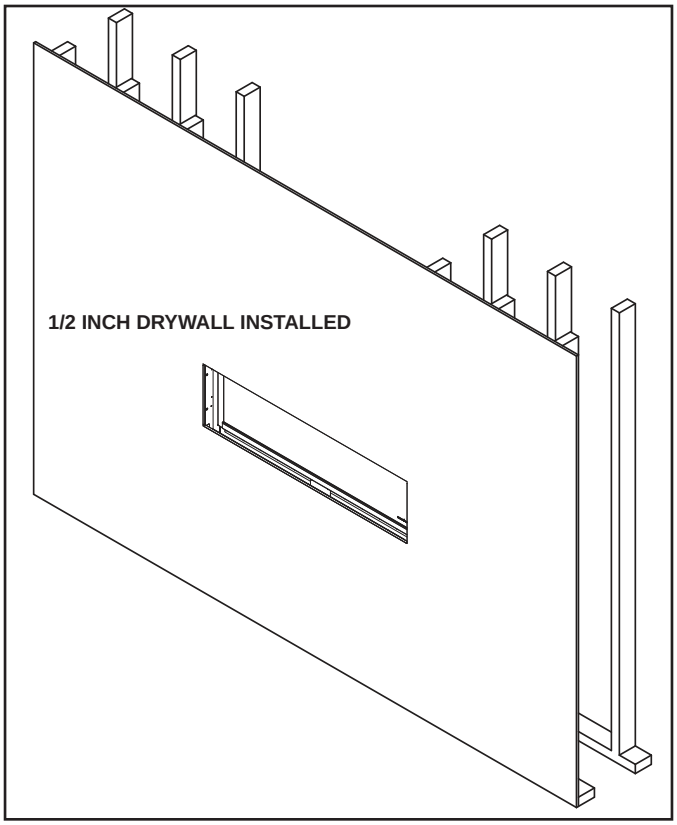


Figure 10.3

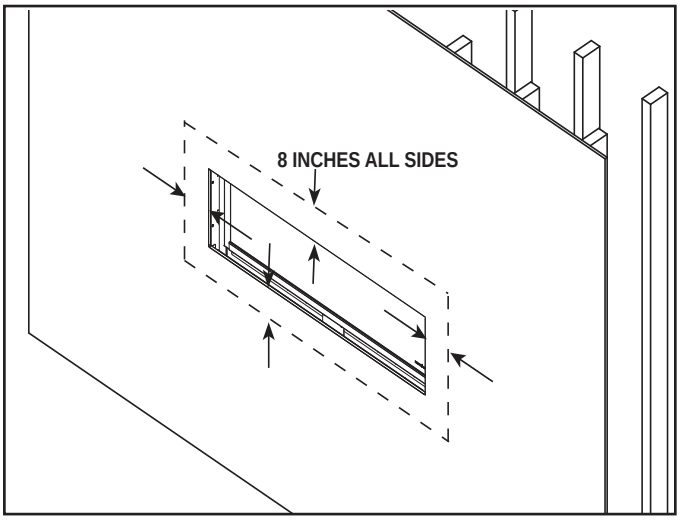


Figure 10.4 Feather Joint Compound Evenly

Painting

If desired finishing includes a painted wall, a high-quality 100% acrylic latex paint with a high-quality latex primer base coat are recommended around the appliance to limit discoloration. Oil-based or standard acrylic paints may be more prone to discoloration due to heat exposure.

Drywall Joint-Crack Prevention and Repair

Drywall joints around the fireplace will be affected by exposure to elevated temperatures, along with other environmental, structural factors due to new construction, and methods used to install and finish the drywall. If a crack does emerge adjacent to the fireplace, it can be permanently repaired by filling it with a paintable latex caulk, followed by repainting.

Some movement of the screws used to secure the noncombustible board to the appliance/surround framing is expected. If a blemish begins to show over a screw head, sand the surface to remove the blemish and repaint.

***WARNING! Risk of Fire, Explosion or Asphyxiation! DO NOT** use screws more than 3/4 inch long on lower access cover panel. Longer screws may penetrate gas line or damage valve or electrical components.*

WARNING! Risk of Injury! Risk of Explosion! Install fasteners as instructed.

- ***Gas train could be damaged causing a gas leak.***
- ***Electrical components could be damaged causing electrical shock.***
- ***LED'S could be damaged.***
- ***Glass installation could be obstructed.***

Note: It is acceptable to use a high temperature silicone sealant to adhere drywall to lower access cover panel.

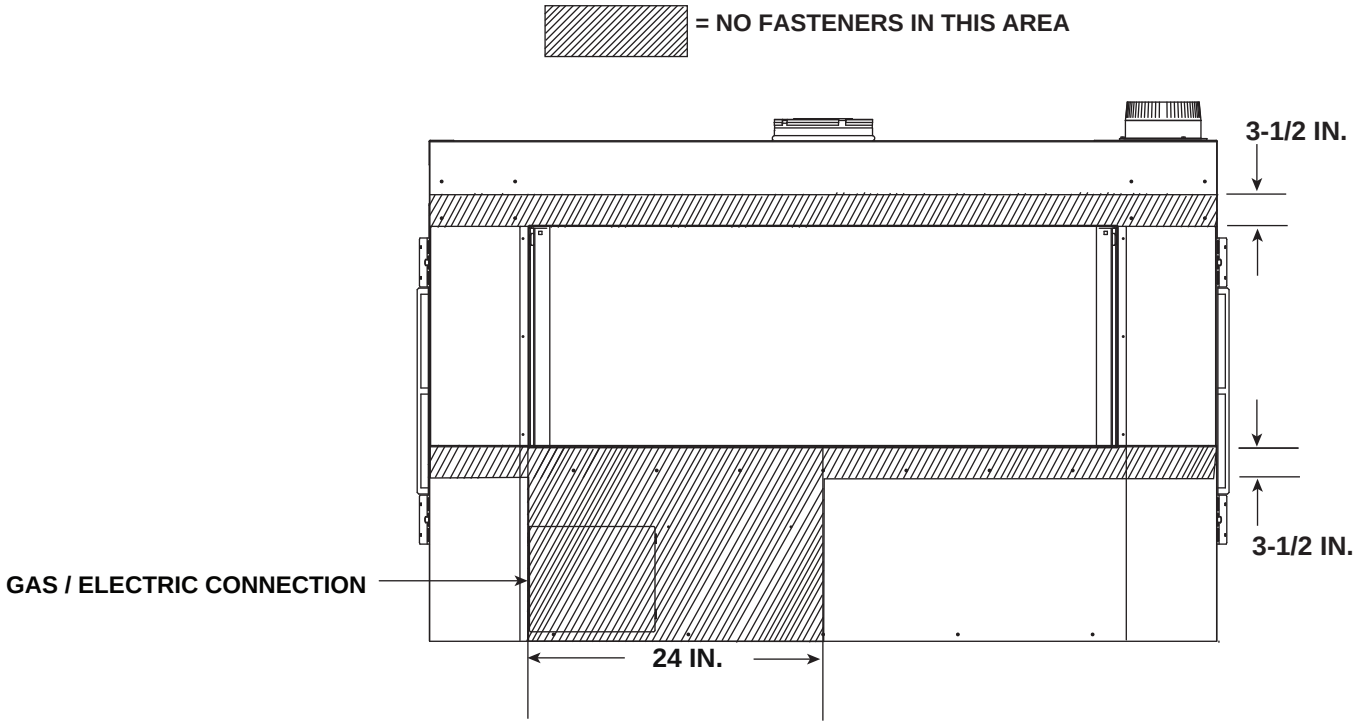


Figure 10.5 Screw Length Requirements

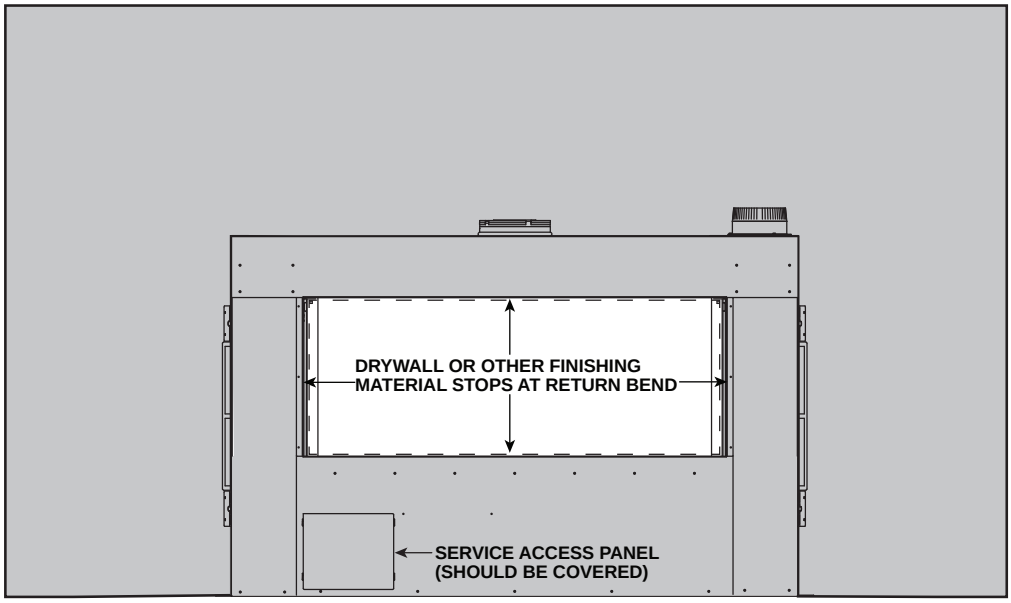
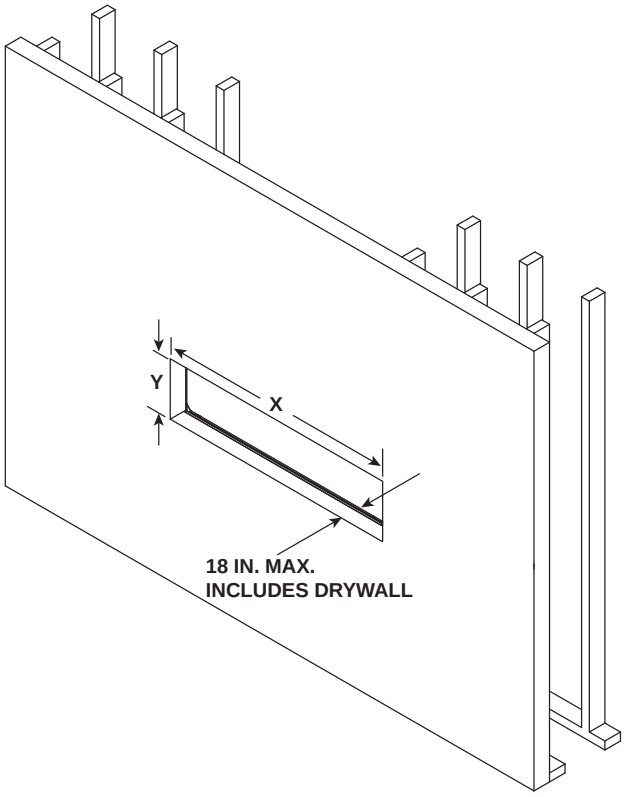


Figure 10.6 Drywall Detail

Finishing

Combustible or Non-Combustible

NOTICE: *If minimum dimensions are not met, barrier glass cannot be removed.*



MODEL	X Min.	Y Min.
PRIMO-II-48 / PRIMO-II-48ST	48-1/8	18-1/8
PRIMO-II-60 / PRIMO-II-60ST	60-1/8	18-1/8
PRIMO-II-72 / PRIMO-II-72ST	72-1/8	18-1/8

Figure 10.7 Finishing- Combustible or Non-Combustible (Recessed Wall)

B. Installing a Television

If installing a television (TV) above the appliance, see Section 2.B.

C. Mantel and Wall Projections

WARNING! Risk of Fire! *Comply with all minimum clearances as specified. Mantel MUST be fastened to wall with no gaps.*

- *No gaps allowed between the wall and the bottom of the mantel.*
- Follow guidelines as shown in the figures below for mantels, mantel legs and wall projections.

> **Note:** Measurement is taken from top/side of the opening, NOT the top/side of the fireplace.

Combustible or Non-Combustible Mantels

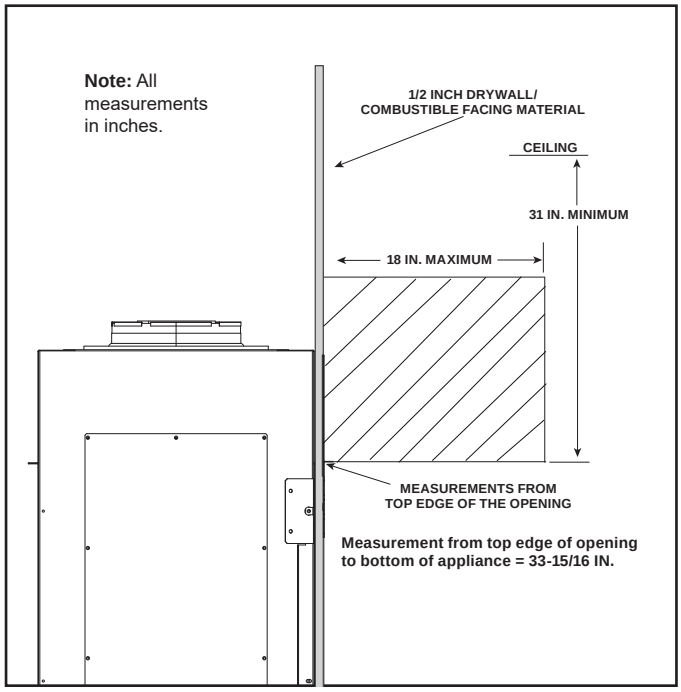


Figure 10.8 Minimum Vertical and Maximum Horizontal Dimensions of Combustibles or Non-Combustibles.

Mantel Legs Or Wall Projections Extending Past The Face Of The Fireplace (Combustible or Non-Combustible)

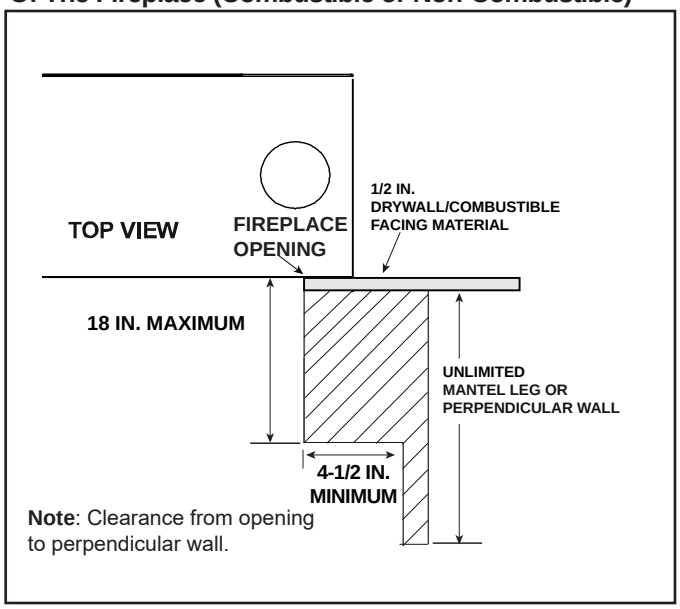


Figure 10.9 Mantel Leg or Wall Projections (Acceptable on both sides of opening)

D. Hearth Extension and Hearth Requirements

A hearth extension is not required for the PRIMO-II models.

If a hearth is installed, it can be combustible or non-combustible and come up to, but not extend past, the bottom edge of the appliance opening. Any hearth length is acceptable.

CAUTION! *Risk of overheating. DO NOT allow hearth to extend beyond appliance opening. Overheating will occur.*

11 Appliance Setup

A. Remove the Shipping Materials

WARNING! Risk of Fire! *Close the ball valve before installing the splatter guard to prevent accidental lighting. Remove the splatter guard before lighting the appliance.*

Remove shipping materials from inside or underneath the firebox.

- The splatter guard is a piece of corrugated material used to protect the appliance during the installation process before finishing work on the whole hearth is complete. The splatter guard is factory installed on the PRIMO-II. Splatter guards must be removed before appliance is fired.

B. Clean the Appliance

Clean/vacuum any sawdust that may have accumulated inside the firebox or underneath in the control cavity.

C. Firebox Media Tray

Remove Firebox Media Tray

1. Remove the screws on the front and back sides of the media tray, pilot shield, and the screws attaching the media tray to the burner legs. Remove media tray from the appliance. See Figure 11.1.

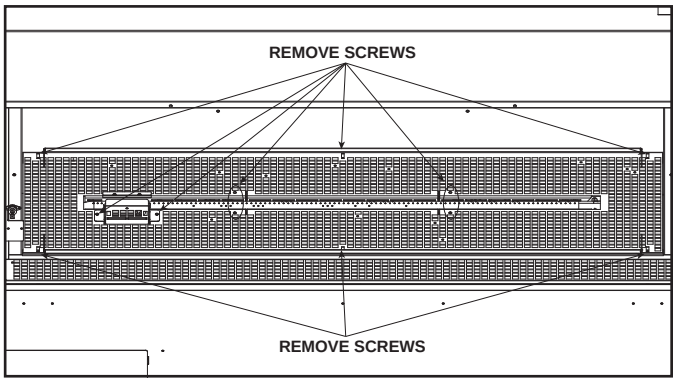


Figure 11.1 Remove Media Tray Screws

Install Firebox Media Tray

1. Place firebox media tray into appliance. Ensure it is properly positioned over the burner. Install the screws attaching the media tray to the burner legs. Install the screws, removed with the media tray, into the front and back sides of the media tray and attach pilot shield to secure in place. See Figure 11.1.

D. Install the Refractory

This appliance requires refractory to be purchased at the time of the appliance purchase and installed prior to appliance operation. Install the required refractory as directed in the instructions included with the refractory kit.

E. Install Log Set (Optional)

An optional log set is available for this appliance. Contact your dealer to order. Install the logs according to the instructions included with the log set.

Note: Adjust burner air shutter according to the air shutter settings in Section 9.E of this manual.

F. Install Firebox Media

This appliance requires firebox media to be purchased at the time of the appliance purchase and installed prior to appliance operation. Refer to Table 11.1 for purchase quantity and Tables 11.2 and 11.3 for quantities used.

WARNING! Choking Hazard! *Keep media out of reach of children.*

NOTICE: *DO NOT place media pieces 3/4 inch or larger on burner. Burner ports could be blocked causing incomplete lighting.*

MEDIA-CP, MEDIA-CY, MEDIA-GT, MEDIA-SM (HNG only)		
MODEL	**QUANTITY (1 bag = 5 lbs.)**	
	No Logs	**With Logs**
PRIMO-II-48	20 lbs. (4 bags)	15 lbs. (3 bags)
PRIMO-II-48ST	20 lbs. (4 bags)	15 lbs. (3 bags)
PRIMO-II-60	20 lbs. (4 bags)	15 lbs. (3 bags)
PRIMO-II-60ST	25 lbs. (5 bags)	20 lbs. (4 bags)
PRIMO-II-72	25 lbs. (5 bags)	20 lbs. (4 bags)
PRIMO-II-72ST	30 lbs. (6 bags)	25 lbs. (5 bags)

Table 11.1 Total Media Purchase Requirements

FIREBOX MEDIA REQUIREMENTS				
MODEL	**QUANTITY (1 Bag = 5 lbs.)**			
	No Logs		**With Logs**	
	NG	Propane	NG	Propane
PRIMO-II-48 PRIMO-II-48ST	12.5 lbs. (2.5 bags)		7.5 lbs. (1.5 bags)	
PRIMO-II-60 PRIMO-II-60ST	15 lbs. (3 bags)		10 lbs. (2 bags)	
PRIMO-II-72 PRIMO-II-72ST	20 lbs. (4 bags)		15 lbs. (3 bags)	12.5 lbs. (2.5 bags)

Table 11.2 Firebox Media Requirements

TRANSITION TRAY MEDIA REQUIREMENTS	
MODEL	**QUANTITY (1 Bag = 5 lbs.)**
PRIMO-II-48	3 lbs. (0.6 bags)
PRIMO-II-48ST	6 lbs. (1.2 bags)
PRIMO-II-60	4 lbs. (0.8 bags)
PRIMO-II-60ST	8 lbs. (1.6 bags)
PRIMO-II-72	5 lbs. (1 bag)
PRIMO-II-72ST	10 lbs (2 bags)

Table 11.3 Transition Tray Media Requirements

INSTALLATION

Note: If both the media and logs will be installed, the logs must be installed first. Read and follow the instructions included with the kit to install logs.

1. The included media placement jig, shown in Figure 11.2, MUST be used any time media are placed on the burner to ensure that none end up in the burner lighting area. Verify that the media placement jig is correctly installed in place in the appliance. See Figure 11.2.

⚠ WARNING

Delayed Ignition Risk

- Place media according to instructions.
- Do NOT place media in area in front of pilot
- Do NOT place media in a position that they may fall into area in front of pilot.
- Do NOT use any media other than the media approved for use with this fireplace.
- Do NOT exceed one layer of media on base pan.

Fireplace will not function properly.
Delayed ignition may occur.

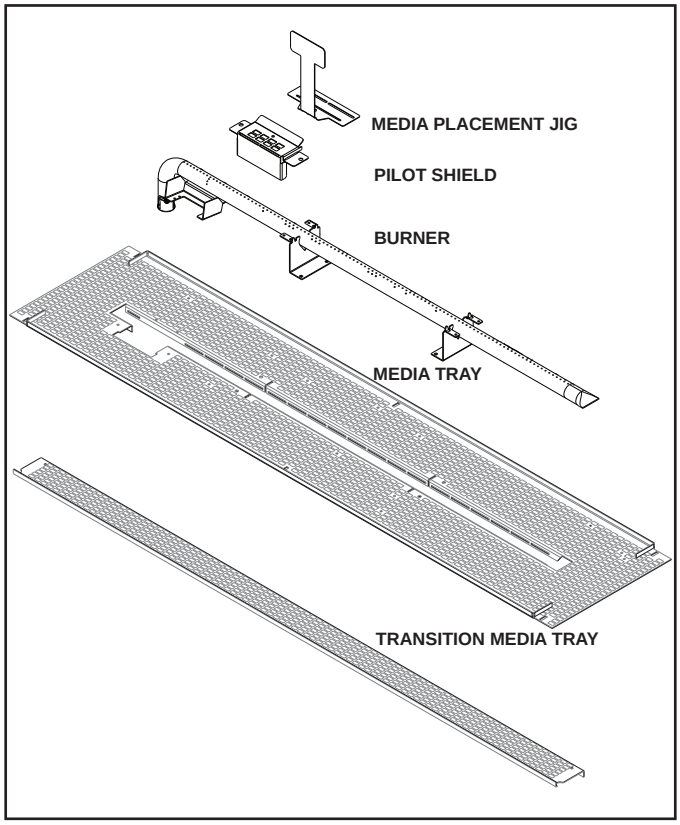


Figure 11.2 Media Tray Components

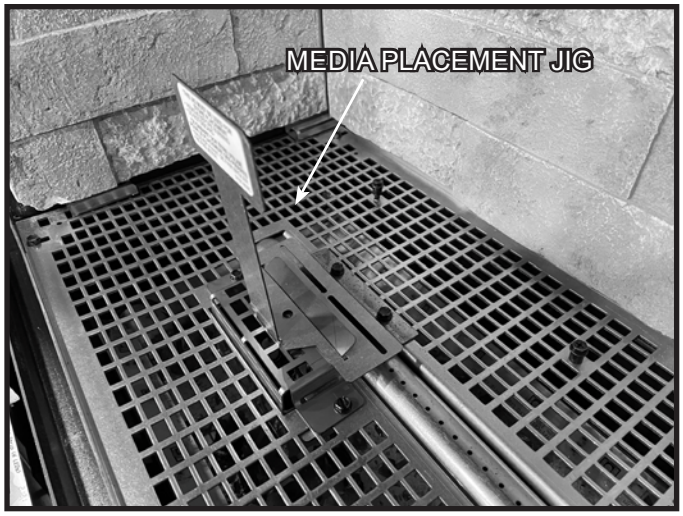


Figure 11.3 Media Placement Jig Location

2. The media placement jig must remain in place while media is placed on the media tray and around the pilot bracket.

3. Place an even layer of media around the media tray as shown in Figure 11.4. **DO NOT place media on media placement jig.**

NOTICE: *Place the appropriate amount of media in firebox media tray assembly as directed in Table 11.2. An excessive amount of media could cause sooting to occur.*

Note: It will be helpful to use a small cup to pour the precise amount of media onto the tray. This process will be especially helpful if logs are installed.

4. Remove the screw, noted in Figure 11.4, from the media placement jig and carefully lift the jig out of the appliance. **DO NOT allow any pieces of media to fall into the area in front of the pilot.**



Figure 11.4 Place Media, Remove Media Placement Jig Screw

⚠ WARNING

Risk of Asphyxiation or Fumes.

- Place media according to instructions.
- Do NOT allow media to fall into the glass frame rail.
- Do NOT place media in a position that they may fall into area between glass and firebox.
- Do NOT use any media other than the media approved for use with this fireplace.

Fireplace will not function properly.
Gas leak may occur.



Figure 11.5 Media Placement Jig Removed

WARNING! Risk of Explosion. DO NOT *place media directly in front of the pilot assembly. Delayed ignition could occur.*

5. Place a few small pieces of media over the pilot shield as shown in Figure 11.6. **DO NOT** allow any media in the area between pilot shield and the rear media stop.

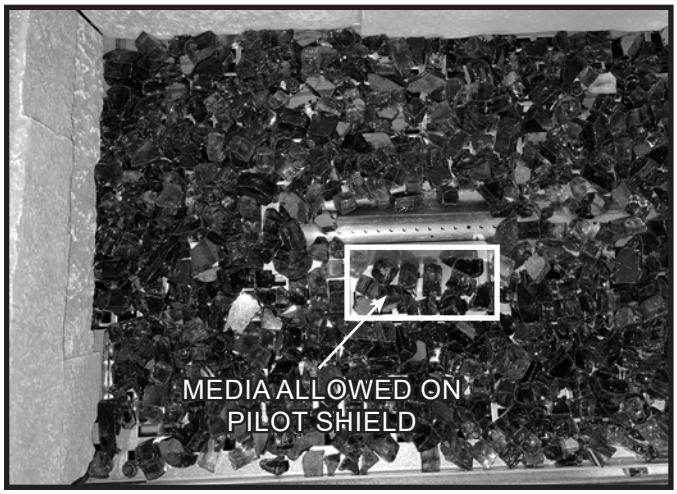


Figure 11.6 Media Placement Jig Removed

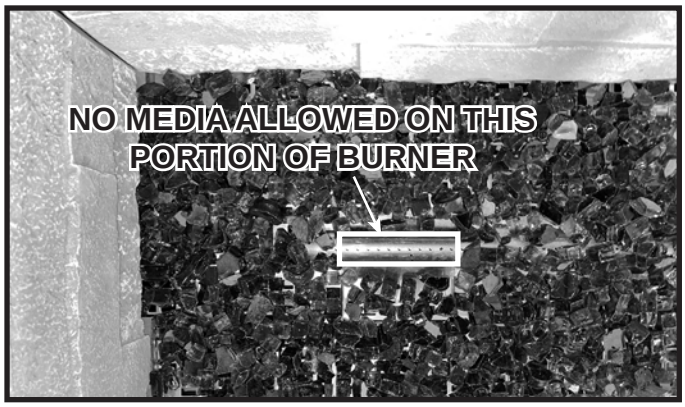


Figure 11.7 Pilot Shield Media Installation

NOTICE: *DO NOT place media pieces 3/4 inch or larger on the burner. Burner ports could be blocked causing incomplete lighting.*

6. After the media is installed and the media placement jig is removed, replace the firebox glass on the appliance. Assure that there is no media between the glass and the firebox. Media in this area will prevent the glass gasket from sealing.

Note: If optional Stones kit will be installed, install them at this time. Follow instructions included with the kit and continue with Step 8.

WARNING! Risk of Asphyxiation! *Install glass assembly with care. Gasket MUST be sealed. Remove all media between glass and firebox.*

7. Turn the appliance on. Wait for the 2 minute pre-purge and ensure that the entire burner lights. If the burner does not light smoothly or completely, note the location that the flame stops or pauses. Figure 11.8 shows an example of incomplete lighting.

   The burner may not light completely if two or more consecutive ports are blocked by media. Figure 11.9 shows an example of 3/4 inch or larger media blocking burner ports.

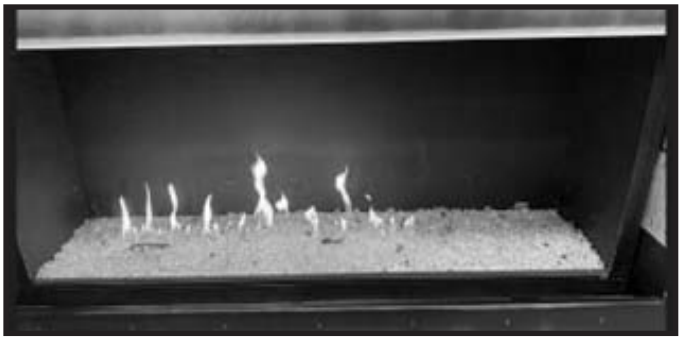


Figure 11.8 Incomplete Burner Lighting

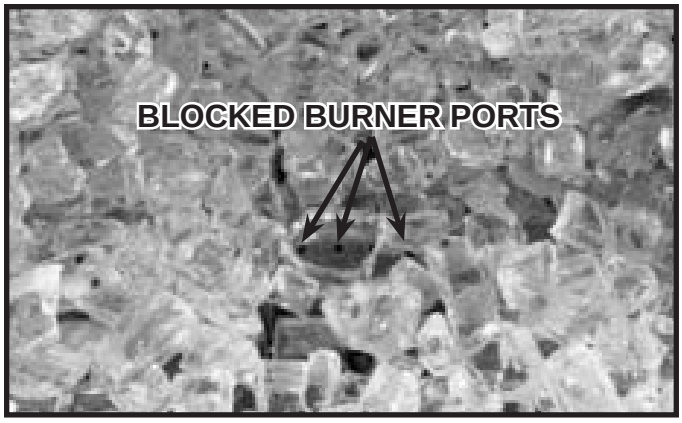


Figure 11.9 Blocked Burner Ports

8. Remove the firebox glass as instructed in Section 11.I and adjust the media in the location that the flame stopped to ensure that there are not consecutive ports being blocked by media.
9. Reinstall the firebox glass and verify the entire burner lights completely. Repeat this process as necessary until complete lighting is achieved as shown in Figure 11.10.



Figure 11.10 Lighting Complete

TROUBLESHOOTING

After the initial start up burn, it may be necessary to adjust the media placement to achieve the best flame appearance. While flame height variation is normal, there may appear to be higher peaks in some areas and low flame peaks in other areas.

If the flame height appears to be excessively high in some spots, applying more media to these areas on top of the burner will help even out the flames. Spreading the media as evenly as possible is the most effective way to achieve optimal flame appearance and the most even flame heights. One or more test burns may be required to watch the flames mature and see how even they look before making adjustments.

Avoid using media pieces larger than 1-1/2 inches square, these can be disruptive to the flame patterns. If you find extra large media pieces, discard.

G. Install the Stones Kit (Optional)

An optional stones kit is available for use with these models. Install the stones as directed in the instructions included with the kit.

H. IFT2-ECM Setup

- Detailed instructions for electrical wiring and connections are provided in Section 8.

This appliance is factory-equipped with an IntelliFire Touch remote control. The remote was paired to the appliance and tested at the factory. Follow the steps below and refer to Figure 11.11 for setup.

1. Verify that the new appliance has power and secure electrical connections.
2. Verify that the gas type selector switch is set to the appropriate fuel type.
3. Adjust the 3-Position ECM selector switch to 'REMOTE' mode. Detailed Operating Instructions for the IFT2-ECM are provided in Section 3.I of the Owner's Manual.
4. Wait to verify LED indicator on the ECM stops flashing.
5. Install batteries in the IFT2-RC450 remote. The IFT2-RC450 remote will be paired to the appliance as preset at the factory.

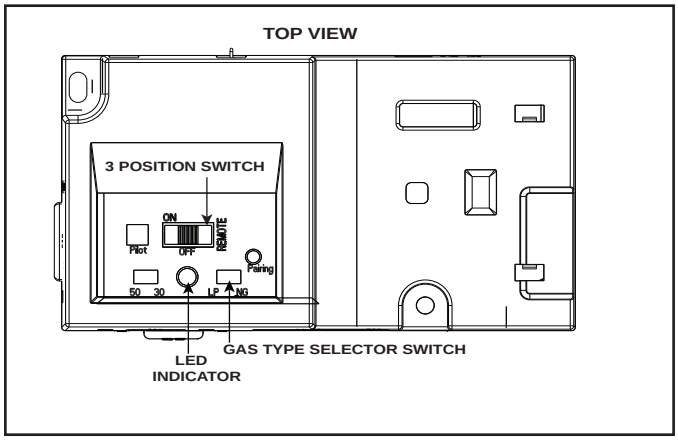


Figure 11.11 IFT2-ECM

I. Firebox Glass

WARNING! Risk of Asphyxiation! *Handle firebox glass assembly with care. Inspect the gasket to ensure it is undamaged and inspect the glass for cracks, chips or scratches.*

- ***DO NOT*** *strike, slam or scratch glass.*
- ***DO NOT*** *operate fireplace with glass removed, cracked, broken or scratched.*
- *Replace as a complete assembly.*

WARNING! Risk of Injury! *Glass is heavy. Use suction cups to handle glass.*

CAUTION! Risk of Injury! *Glass removal and installation must be performed by a qualified service technician. See chart below for firebox glass weights.*

- ***PRIMO-II-60 AND PRIMO-II-72 MODELS: It is recommended that glass installation and removal be performed by two qualified service technicians.***

Firebox Glass Weights		
PRIMO-II-48	**PRIMO-II-60**	**PRIMO-II-72**
25 lbs	**30 lbs**	**36 lbs**

CAUTION! Risk of Cuts! *Wear protective gloves and safety glasses during installation. Use suction cups to handle firebox glass.*

Remove Firebox Glass Assembly Using Suction Cups

1. Remove the firebox glass high temperature limit switch assembly by removing the machine screw holding the bracket in place and set the assembly aside. See Figure 11.12.

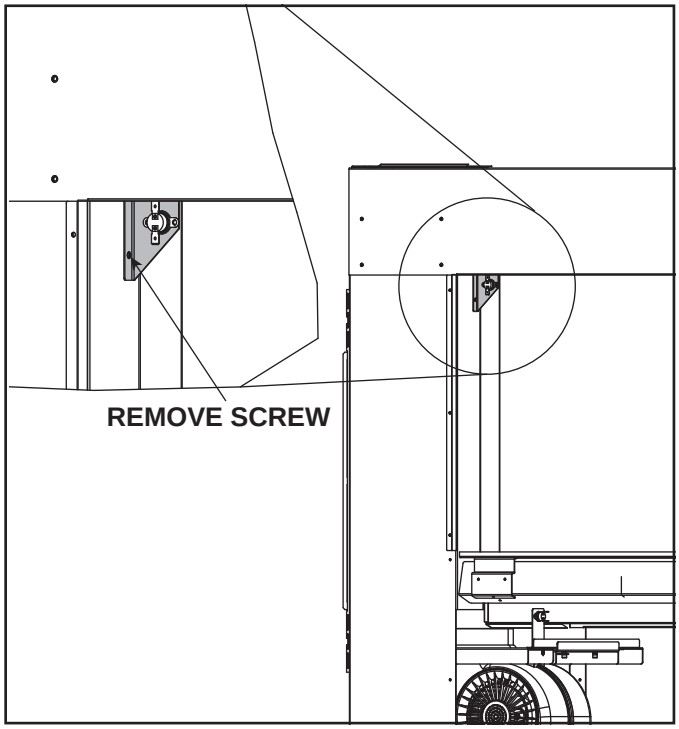


Figure 11.12 High Temperature Limit Switch Installed Correctly

2. Locate the brackets, on the left and right sides of the glass retainer bar assembly, that hold the glass in position. See Figure 11.13 (A). Remove the screw from the hole in the center of the bracket. See Figure 11.13 (B).
3. Using a hand tool only, start the threads of the screw into the rivnut in the bracket shown in Figures 11.13 (C) and 11.14. This will hold the screw until it is needed for reassembly.
4. Pull downward on the glass retainer bar assembly to disengage it from the retaining channel of the appliance. If the retainer bar is difficult to remove, use a hand tool to continue threading the bolt into the rivnut (started in Step 3) to assist in disengaging the retainer bar assembly. Do not bottom out the screw in the rivnut as this may cause the rivnut to deform and spin. Repeat steps 2 through 4 on opposite side.

Note: DO NOT use a power tool for this step.

5. Remove the glass retainer bar assembly. See Figure 11.13 (D).

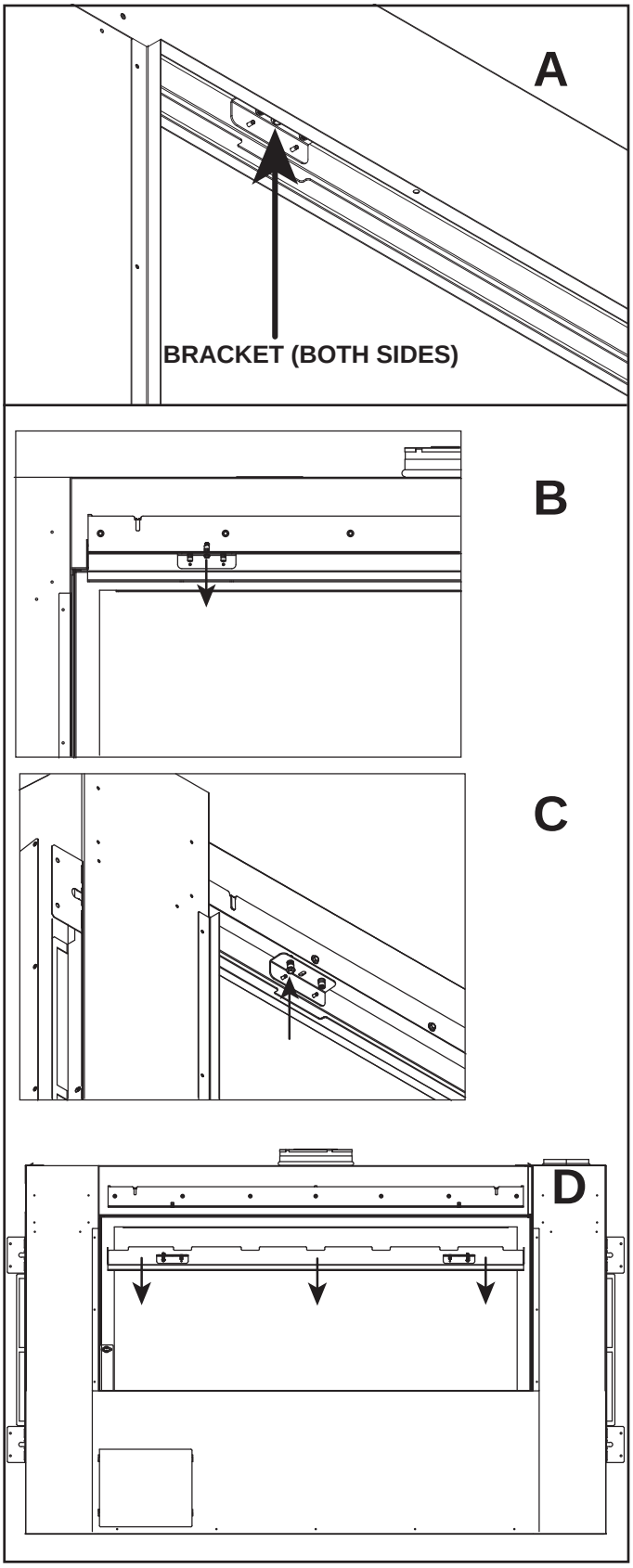


Figure 11.13 Removing Glass Retainer Bar Assembly

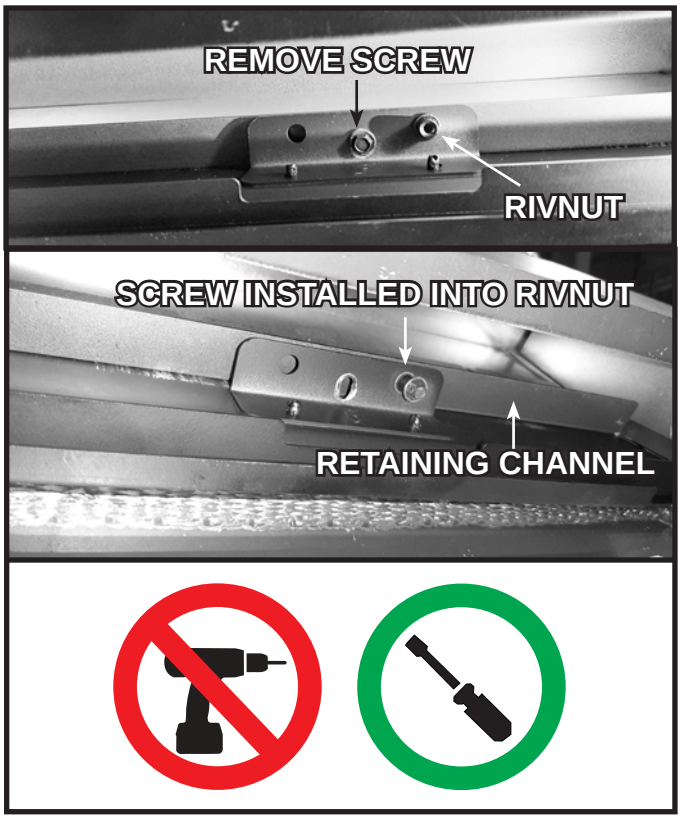


Figure 11.14 Remove Screw and Install into Rivnut

6. Press glass suction cups firmly against glass and ensure that an adequate hold has been created. Lift up, then lower the glass assembly downward toward the firebox control cavity. Tip it outward slightly and lift out of appliance. See Figure 11.15.

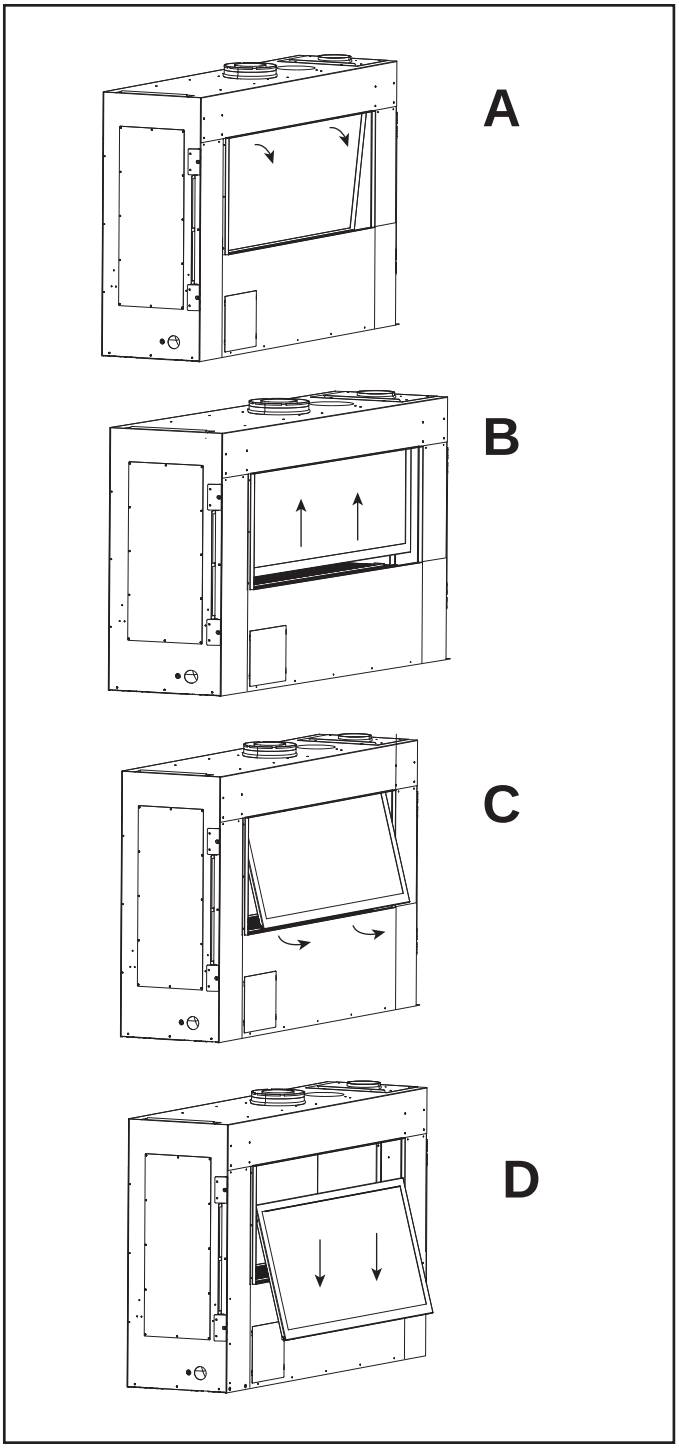


Figure 11.15 Removing Firebox Glass

Replace Firebox Glass Assembly Using Suction Cups

1. Place the top of the firebox glass assembly into appliance first. Tilt the bottom in toward the firebox and set glass assembly into the glass frame rail ensuring that the assembly is centered left to right. See Figure 11.16.

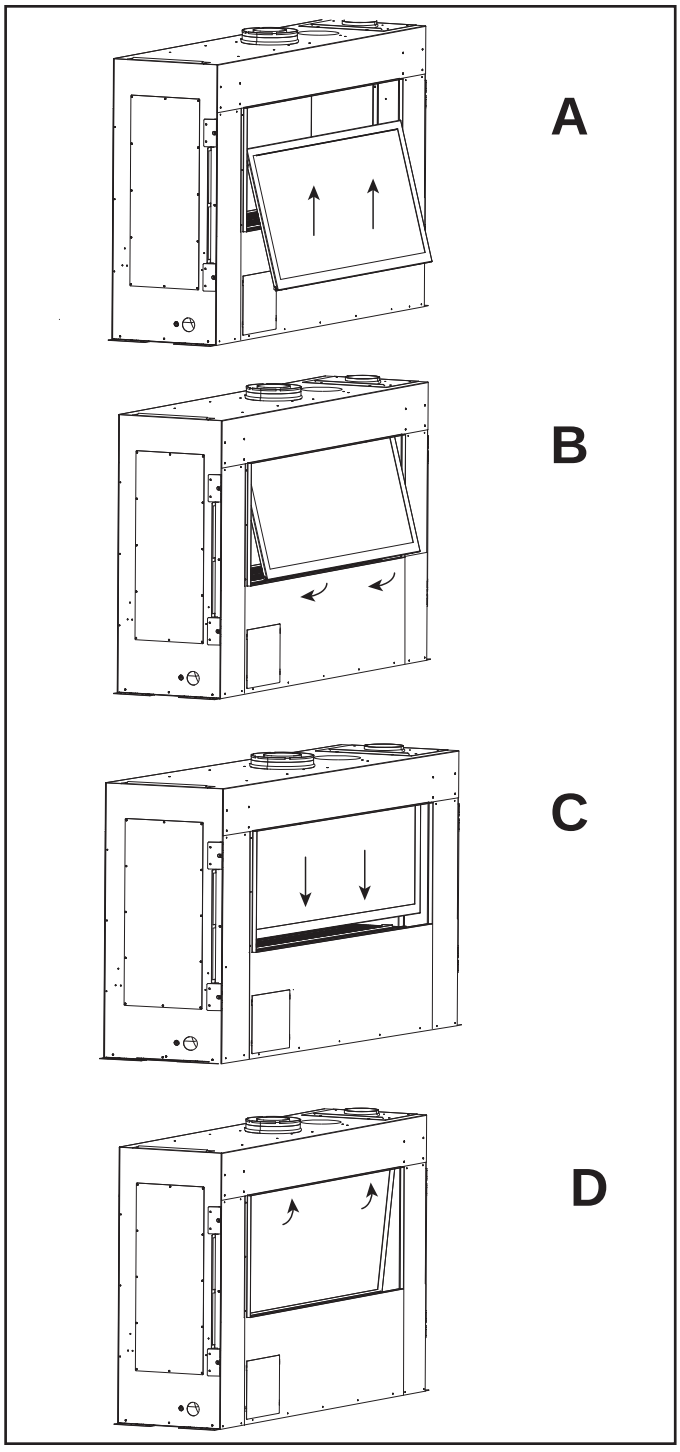


Figure 11.16 Replacing Firebox Glass

2. Remove the screws from the glass retainer bar assembly's bracket rivnuts, if they were left in from glass removal process, and set aside.
3. Align the glass retainer bar assembly with the appliance retaining channel. Use the locating tabs on the sides of the glass retainer bar assembly to help center left and right. See Figure 11.17.
4. Seat the glass retainer bar assembly in the appliance retaining channel by firmly pushing upward.
5. To fully seat the glass retainer bar assembly, carefully thread the screws, which were removed from the rivnuts in Step 2, into the center hole of the bracket assembly on each side. See Figure 11.18. Use caution to not cross thread the screw. Once both screws are properly aligned and partially installed, the screws may be installed completely.
6. Reinstall high temperature limit switch assembly and attach wire connections. See Figure 11.12.

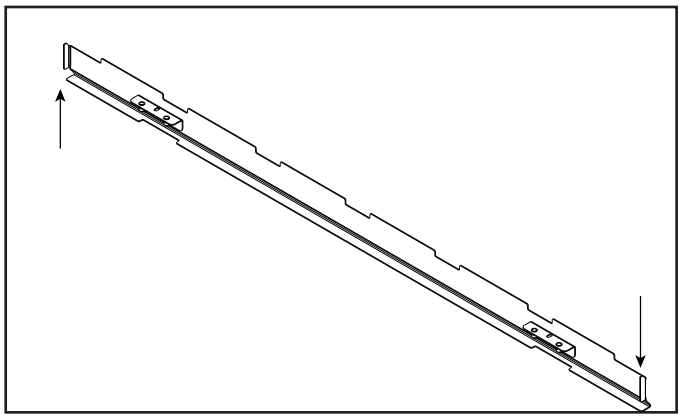


Figure 11.17 Glass Retainer Bar Assembly Locating Tabs

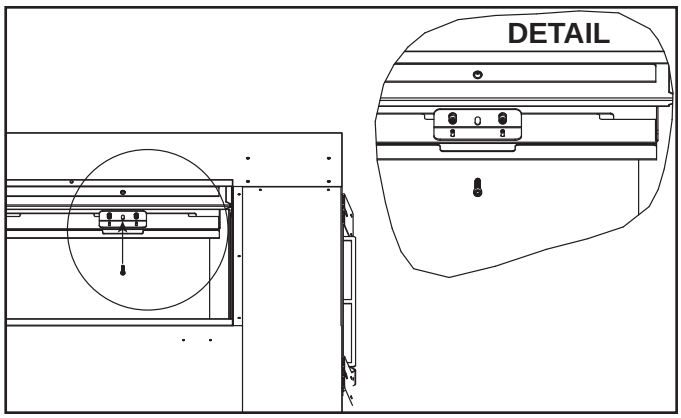


Figure 11.18 Glass Retainer Bar Assembly Installation

J. Transition Media Tray and Transition Panels

Note: If appliance has been converted to Propane, ensure the reset switch has been installed. Refer to the instructions included with the conversion kit.

Install Transition Media Tray and Transition Panels

1. Set and press the transition media tray into position as shown in Figure 11.19. The rear return bend should be positioned in between the glass frame and the glass rail so the semi-circle notches will face the glass. The front of the media tray is seated on the SafeSurface barrier glass retainer bracket.

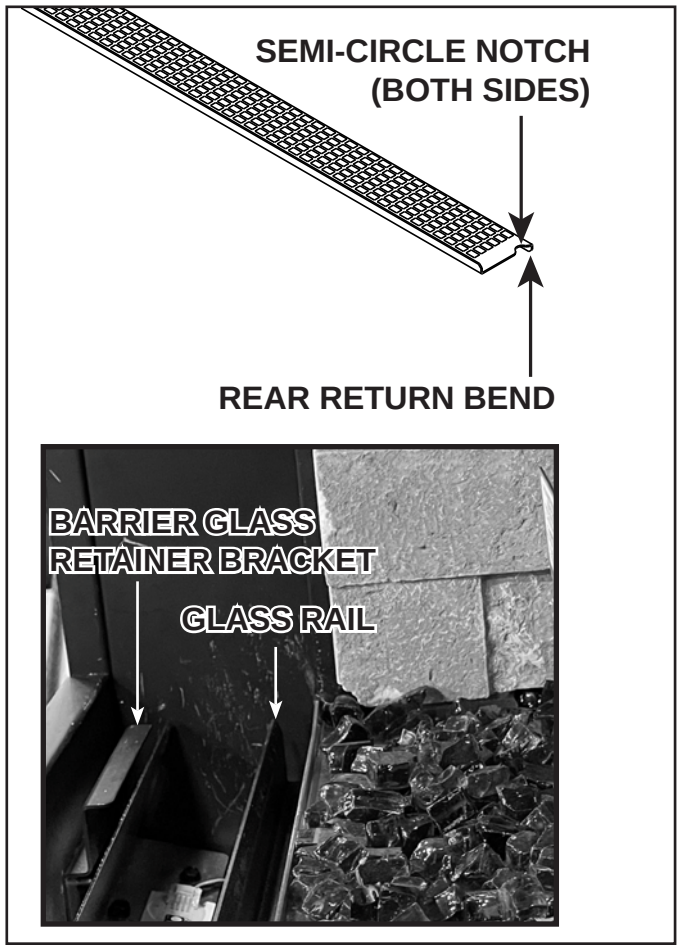


Figure 11.19 Install Transition Media Tray

2. Ensure that high temperature limit switch is installed correctly with wires connected. See Section 11.I for installation instructions. See Figure 11.12. Verify that wires are not pinched by the transition media tray.
3. Install transition panels on left and right sides of appliance opening. Align the bottom of the panel with the pilot hole on the appliance and ensure the tab is on the outside of the media tray ledge as shown in Figure 11.20. Install bottom screw. Tilt the top into position and install the top screw. See Figure 11.21.

Note: The tool used for operating the gas shutoff valve can be stored vertically behind the right transition panel as shown in Figure 11.22.

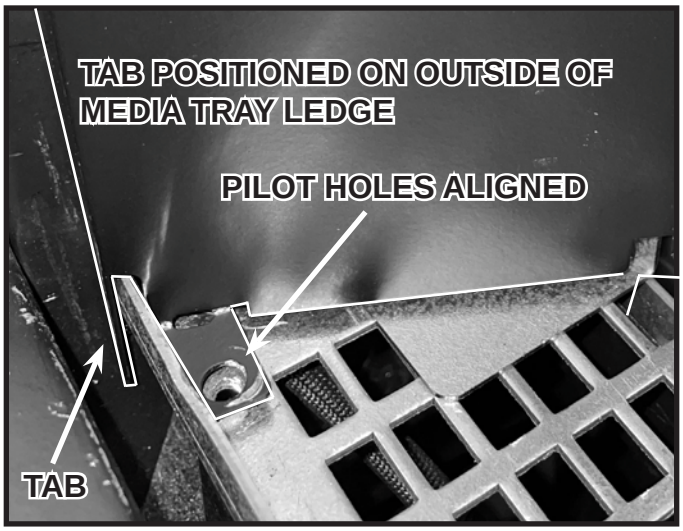


Figure 11.20 Transition Panel Tab Position



Figure 11.21 Transition Panel installed

Remove Transition Media Tray and Transition Panels

1. Remove side transition panels located on the left and right sides of the appliance opening by removing the top and bottom screw and tilting the top of the transition panel toward the center of the appliance.
2. Remove the transition media tray from the appliance by lifting upward to disengage the press fit between the glass frame and the glass rail. The transition media tray fits tightly between the glass rail and glass frame, lift carefully.



Figure 11.22 Storage Location for Gas Valve Shutoff Tool

K. Install Transition Media

***WARNING! Risk of Overheating! DO NOT** allow transition media to fall into SafeSurface barrier glass slot. Remove all media that falls into this area. Convection air flow will be impaired. Component damage will occur.*

1. Place the appropriate amount of media in the transition media tray as directed in Table 11.3 in Section 11.F. It may be helpful to use a small cup to more precisely pour an even layer of media onto the tray. See Figure 11.23.
2. Install the SafeSurface barrier glass in place according to the instructions provided in Section 11.L.

Note: Steps 1 and 2 will be repeated one time if the appliance is a See-through model.



Figure 11.23 Place Media in Transition Media Tray

L. SafeSurface Barrier Glass

WARNING! Risk of Injury! *Handle barrier glass with care. Inspect the glass for cracks, chips or scratches.*

- ***DO NOT*** *strike, slam or scratch glass.*
- ***DO NOT*** *operate fireplace with glass removed, cracked, broken or scratched.*
- *Replace as a complete assembly.*

WARNING! Risk of Injury! *Glass is heavy. Use suction cups to handle barrier glass.*

CAUTION! Risk of Injury! *Glass installation and removal must be performed by a qualified service technician. See chart below for barrier glass weights.*

- ***PRIMO-II-60 AND PRIMO-II-72 MODELS: It is recommended that glass installation and removal be performed by two qualified service technicians.***

SafeSurface Barrier Glass Weights		
PRIMO-II-48	**PRIMO-II-60**	**PRIMO-II-72**
15 lbs	**18 lbs**	**22 lbs**

CAUTION! Risk of Cuts! *Wear protective gloves and safety glasses during installation. Use suction cups to handle firebox glass.*

WARNING! Risk of Fire! *Install barrier glass as instructed. Overheating will occur.*

1. Locate the glass retaining clips and stage for install.

Note: The glass retaining clips ship from the factory as a pair. If using glass retaining clips for the first time, they will need to be broken apart. See Figure 11.24.

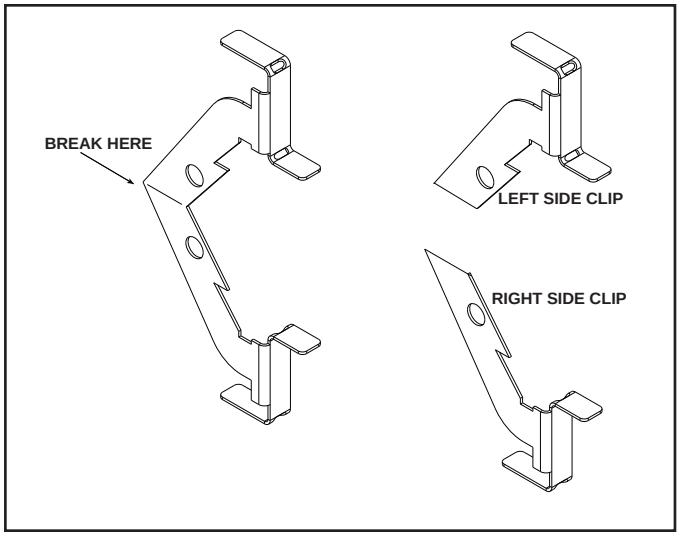


Figure 11.24 Glass Retaining Clip Separation

2. Press glass suction cups firmly against the glass surface on which the printed text “THIS SIDE OUT” is legible. Ensure that an adequate hold has been created.
3. Ensure no glass media is in the SafeSurface barrier glass retainer bracket. Set the glass into the barrier glass retainer bracket, located behind the sheet rock ledge and the front side of the transition media tray. Center the glass left to right. See Figure 11.19.

WARNING! Risk of Overheating! *SafeSurface glass slot MUST be free of media and obstructions.*

4. Install the SafeSurface glass retaining clips by placing the bottom of the clip into the slot shown in Figure 11.25. Rotate the top of the clip up into position as shown in Figure 11.26. Repeat on both sides of the appliance.

Note: When barrier glass is properly placed, a 5/16 inch gap is maintained between the top of the barrier glass and the top of the appliance opening. See Figure 11.27.

WARNING! Risk of Fire! *A 5/16 vertical gap is required for proper airflow.*

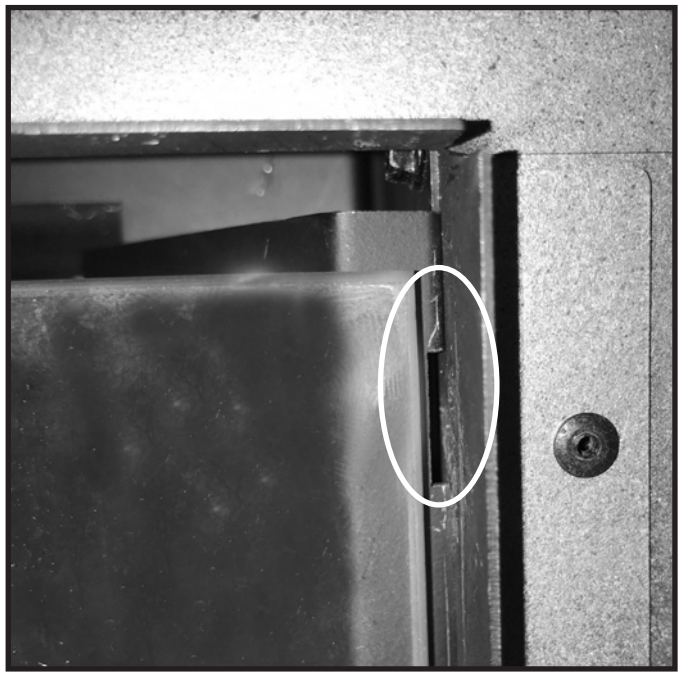


Figure 11.25 Slot for Barrier Glass Retaining Clip (Right Side Shown)

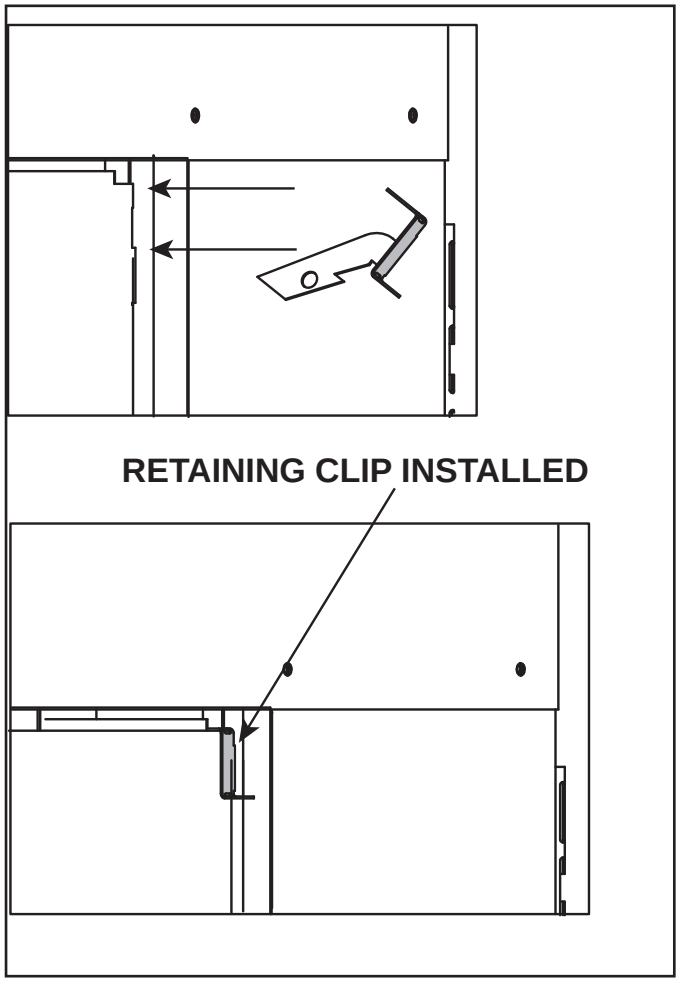


Figure 11.26 Barrier Glass Retaining Clip Installation (Right Side Shown)

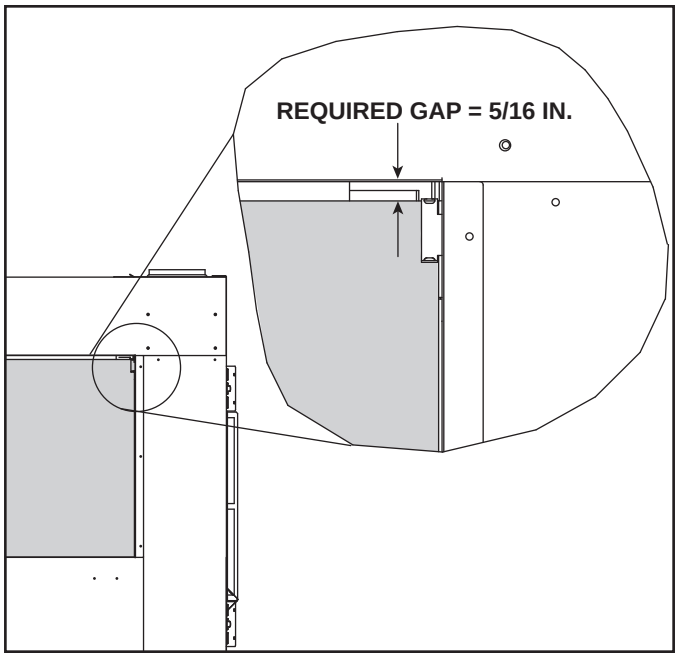


Figure 11.27 Barrier Glass Retaining Clip Installed

Remove SafeSurface Barrier Glass

1. Press glass suction cups firmly against glass. Ensure an adequate hold has been created.
2. Remove barrier glass retaining clips on left and right sides by gently pulling up and rotating outward. See Figure 11.26.
3. Lift glass straight up into the top cavity, tilt the bottom out and remove glass from the appliance. See Figure 11.28.

NOTE: When drywall is the only material used in finishing, the top of the barrier glass may also be tilted outward for removal.

4. Set glass on prepared work surface.

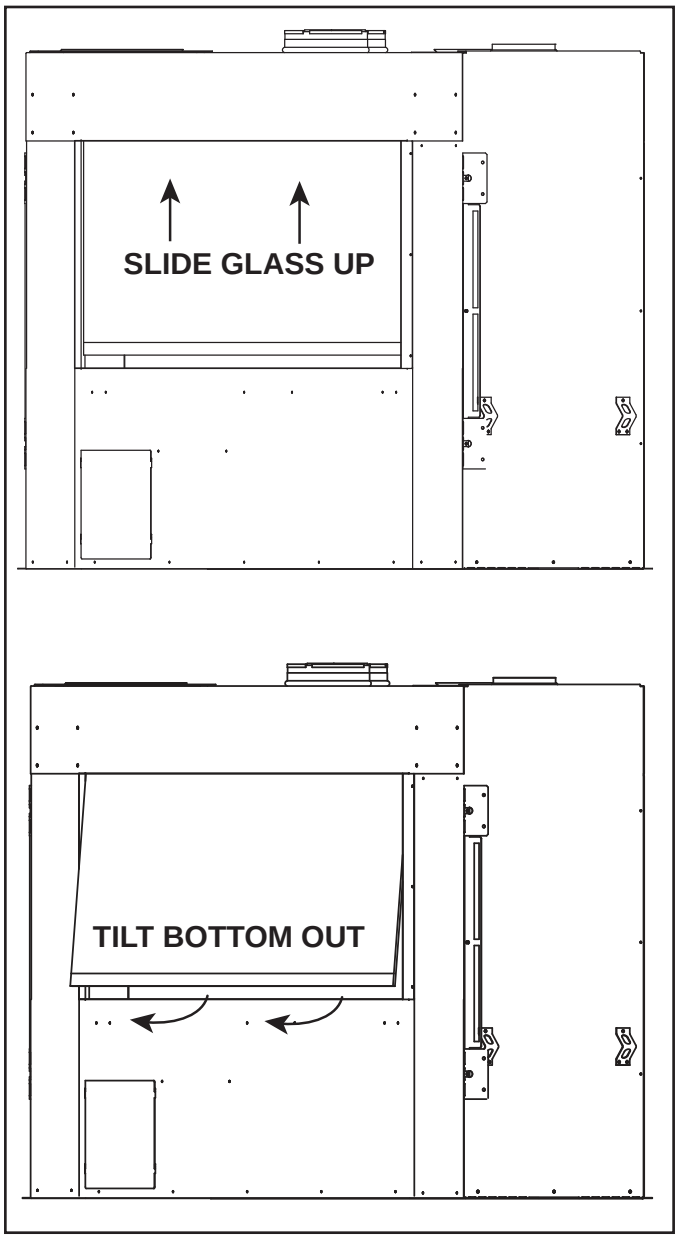


Figure 11.28 Barrier Glass Removal

12 Reference Materials

A. Approved Vent Components List

Vent components on this list are approved for use with these models.

Scan QR code or click on the link to access document including dimensions and effective lengths of vent components.

Vent Components

PRIMO-II Vent Component			
HZTERM-ADP	Required for all PRIMO-II installations with horizontal termination. *Information not included in Vent Components document. Refer to HZTERM-ADP instructions.		
DVP Vent Components			
DVPXX	DVP Vent Pipe (4/6/8/12/24/36/48 Inch)	DVP6A/DVP12A	6 Inch/12 Inch DVP Slip Section
DVP45	45 Degree Elbow	DVP-TVHW	Vertical Termination Cap (High Wind)
DVP90ST	90 Degree Elbow	DVP-TRAPFL	Flashing
DVP-HVS	Vent Support	DVP-BEK2	DVP-HPC Cap Brick Extension
DVP-RDS	Roof Deck Insulation Shield	DVP-HSM-B	Extended Heat Shield
DVP-WS	Wall Shield Firestop	RF6 / RF12	Roof Flashings
DVP-FS	Ceiling Firestop	TRAP-VSS	Vinyl Siding Shield
DVP-TRAP	Horizontal Termination Cap (DVP-TRAP1/2/K1/K2)	UNIV-AS2	Universal Attic Shield
SLP Vent Components			
SLPXX	SLP Vent Pipe (4/6/12/24/36/48 Inch)	SLP6A/SLP12A	SLP Adjustable Pipe Sections
SLP45	45 Degree Elbow	SLP-CCS-BK	Cathedral Ceiling Support Box-Black
SLP90	90 Degree Elbow	SLP-DCF-BK	Ceiling Firestop Black
DVP-SLP24	Adapter	SLP-WT-BK	Wall Thimble Black
SLP-HVS	Horizontal Pipe Support	SLP-RDS	Roof Deck Insulation Shield
SLP-TVHW	Vertical Termination Cap	SLP-FS	Ceiling Firestop
SLP-TRAP	Horizontal Termination Cap (TRAP1/2)	SLP-WS	Wall Shield Firestop
		DVP-HSM-B	Extended Heat Shield
Power Vent Components			
PRIMO-II models are not approved for power venting.			
Coaxial / Colinear Components			
PRIMO-II models are not approved for coaxial / colinear venting.			
Decorative Terminations / Shrouds			
Only use listed decorative termination caps/shrouds with Hearth & Home Technologies approved venting systems. This applies to both DVP and SLP venting systems.			
DTO134	Octagon Decor Cap	LDS33	Decor Shroud 36 x 36
DTO146	Octagon Decor Cap	LDS46	Decor Shroud 48 x 72
DTS134	Square Decor Cap		
DTS146	Square Decor Cap		

B. Accessories

WARNING! Risk of Fire and Electric Shock! *Use ONLY Hearth & Home Technologies-approved optional accessories with this appliance. Using non-listed accessories could result in a safety hazard and will void the warranty.*

Contact your dealer for more information and details, such as color options, on individual accessories. A qualified service technician must install the approved accessories. Operate installed accessories according to the included instructions.

Note: Some optional accessories must be installed at the time of appliance installation. See Section 2.A.

Options:

Remote Controls, Wall Controls and Wall Switches	
IFT-RC150U	IntelliFire Touch wireless wall switch
IFT2-RC450	IntelliFire Touch remote control (Shipped standard)
IntelliFire Wi-Fi module with IntelliFire App	
IFT-WFM	IntelliFire Touch Wi-Fi module
SafeSurface Barrier Glass (Required for Operation)	
GLASS-SS-48 / GLASS-SS-60 / GLASS-SS-72	SafeSurface Barrier Glass Quantity 2 required for See-Through models
Refractory Kit (Required for Operation)	
BGK-MAR-PR-48 / BGK-MAR-PR-60 / BGK-MAR-PR-72 / BGK-MAR-PR-ST	Marbled Glass Liner
BGK-PR-48 / BGK-PR-60 / BGK-PR-72 / BGK-PR-ST	Black Glass Liner
BGK-FL-PR-48 / BGK-FL-PR-60 / BGK-FL-PR-72 / BGK-FL-PR-ST	Fluted Glass Liner
ACT-PR-48 / ACT-PR-60 / ACT-PR-72 / ACT-PR-ST	Architectural Stone Refractory
COL-PR-48 / COL-PR-60 / COL-PR-72 / COL-PR-ST	Stone Column Fiber Refractory
Trap Cap Adapter Kit (Required for all horizontally terminated installations)	
HZTERM-ADP	Horizontal Termination Adapter Kit
Heat Management Systems Kits	
LPR-HEAT-DUCT	Heat Duct Kit
Glass Media (Required to Complete)	
MEDIA-CP (5 lb bag)	Crushed glass media - Copper
MEDIA-CY (5 lb bag)	Crushed glass media - Crystal
MEDIA-GT (5 lb bag)	Crushed glass media - Graphite
MEDIA-SM (5 lb bag)	Crushed glass media - Smoked Embers Reference Table 11.1 for total glass media purchase requirements
Stone media	
STONES-48 / STONES-60 / STONES-72	Stone Media Installation of glass media required with all stone media kits
Log Sets	
BIRLG-LIN-SM / BIRLG-LIN-LG	Birch Logs 48 / 60 / 72
DWLG-LIN-SM / DWLG-LIN-LG	Driftwood Logs 48 / 60 / 72
OAKLG-LIN-SM / OAKLG-LIN-LG	Oak Logs 48 / 60 / 72 Installation of glass media required with all log sets
Indoor / Outdoor Kit (See-Through Models Only)	
ODK-PR-48 / ODK-PR-60 / ODK-PR-72	Outdoor Kit
Appliance Carry Handle	
CARRY-HANDLE	Quantity 1 handle per kit

C. QR Codes

Instructions for PRIMO-II components that are required or shipped standard with the appliance and optional accessories can be viewed by scanning the QR codes below.

Training Video

INSTALL/ SERVICE VIDEO

Required / Shipped Standard

VENT COMPONENTS

HZTERM-ADP

(Required for all horizontal terminations)

RC450 USER GUIDE

REFRACTORY INSTALLATION

(Black, Marbled, and Fluted Glass Liner)

REFRACTORY INSTALLATION

(Architectural Stone and Stone Column)

Optional Accessories

CARRY-HANDLE

INDOOR/OUTDOOR KIT

LPR-HEAT-DUCT

LOG SET INSTALLATION

FAN REPLACEMENT KIT

Heat & Glo, a brand of Hearth & Home Technologies
7571 215th Street West, Lakeville, MN 55044
www.heatnglo.com

Please contact your Heat & Glo dealer with any questions or concerns.
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