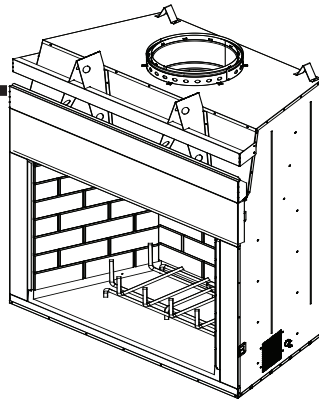


**Models:**  
**Outdoor Woodburning**  
**Castlewood 42**



**CAUTION**



**DO NOT DISCARD THIS MANUAL**

- Important operating and maintenance instructions included.
- Read, understand and follow these instructions for safe installation and operation.
- Leave this manual with party responsible for use and operation.



**⚠ WARNING**



**If the information in these instructions is not followed exactly, a fire may result causing property damage, personal injury, or death.**

- Do not store or use gasoline or other flammable vapors and liquids in the vicinity of this or any other appliance.
- Do not overfire. Overfiring will void your warranty.
- Comply with all minimum clearances to combustibles as specified. Failure to comply may cause house fire.

**⚠ WARNING**



**HOT SURFACES!**

Glass and other surfaces are hot during operation and cool down.

**Hot glass will cause burns.**

- Do not touch glass until it is cooled
  - NEVER allow children to touch glass
  - Keep children away
  - CAREFULLY SUPERVISE children in same room as appliance.
  - Alert children and adults to hazards of high temperatures.
- High temperatures may ignite clothing or other flammable materials.**
- Keep clothing, furniture, draperies and other combustibles away.

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



**⚠ WARNING: For Outdoor Use Only.**

**⚠ WARNING**



**Fire Risk**

- For use with solid wood fuel or decorative gas appliance only.

**Read this manual before installing or operating this fireplace.  
Please retain this owner's manual for future reference.**

***Congratulations!***

Congratulations on selecting a Outdoor Lifestyles wood burning fireplace. The Outdoor Lifestyles fireplace you have selected is designed to provide the utmost in safety, reliability and efficiency.

As the owner of a new fireplace, you'll want to read and carefully follow all of the instructions contained in this owner's manual. Pay special attention to all cautions and warnings.

This owner's manual should be retained for future reference. We suggest you keep it with your other important documents and product manuals.

The information contained in this owner's manual unless noted otherwise, applies to all models and gas control systems.



Your new Outdoor Lifestyles wood burning fireplace will give you years of durable use and trouble-free enjoyment. Welcome to the Outdoor Lifestyles family of fireplace products!

<b>Homeowner Reference Information</b>	<i>We recommend that you record the following pertinent information about your fireplace:</i>
Model Name: _____	Date purchased/installed: _____
Serial Number: _____	Location on fireplace: _____
Dealership purchased from: _____	Dealer phone: _____
Notes: _____	
_____	
_____	

**Listing Label Information/Location**

The model information regarding your specific fireplace can be found on the rating plate located on the smoke shield of the fireplace.

Serial Number
Grate
Fireplace Model

	<b>FIREPLACE NO.</b> <input style="width: 100%;" type="text"/>	WARNING: RISK OF FIRE DAMAGE. REPLACE GRATE WITH HEARTH & HOME TECHNOLOGIES	<b>MODEL NO.</b> <input style="width: 100%;" type="text"/>	<b>MODEL NO.</b> <input style="width: 100%;" type="text"/>	<b>MFG. DATE</b> <input style="width: 100%;" type="text"/>
OUTDOOR FIREPLACE INTENDED FOR USE WITH HEARTH & HOME TECHNOLOGIES LISTED FIREPLACE PARTS. SEE INSTALLATION AND OPERATING INSTRUCTIONS FOR THIS MODEL. ONLY HEARTH & HOME TECHNOLOGIES GLASS DOOR KITS CAN BE INSTALLED ON THIS UNIT.					
CAN/ULC-S610	USE HHT SL SERIES CHIMNEY	CLEARANCE TO CHIMNEY COMBUSTIBLES: 2 IN. MIN.	FIREBOX	IN. MIN.	
DO NOT OVERFIRE. USE ONLY: SOLID WOOD FUEL OR LISTED DECORATIVE GAS APPLIANCE. DO NOT USE A FIREPLACE INSERT OR OTHER PRODUCTS NOT SPECIFIED FOR USE WITH THIS PRODUCT. IF DOORS ARE USED OPERATE FIREPLACE WITH DOORS FULLY OPEN OR CLOSED ONLY. WHEN BURNING A DECORATIVE GAS APPLIANCE IN THE FIREPLACE, ADJUST DAMPER TO THE FULLY OPEN POSITION.		WARNING! THIS FIREPLACE HAS NOT BEEN TESTED WITH AN UNVENTED GAS LOG SET. TO REDUCE THE RISK OF FIRE OR INJURY, DO NOT INSTALL AN UNVENTED GAS LOG SET INTO FIREPLACE.			
UTILISER DU CARBURANT SOLIDE SEULEMENT		IF INSTALLATION OR OPERATING INSTRUCTIONS ARE MISSING CONTACT: HEARTH & HOME TECHNOLOGIES, 7571 215th Street West, Lakeville, MN 55044			 PIN. 4021-723E

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# 1 Listing and Code Approvals

## A. Appliance Certification

This fireplace system has been tested and listed in accordance with **UL 127** and **CAN/ULC-S610-M87** standards by Underwriters Laboratories Inc. for installation and operation in the United States and Canada. This fireplace has been tested and listed for use with the optional components specified in this manual. These optional components may be purchased separately and installed at a later date.

Outdoor Lifestyles is a registered trademark of Hearth & Home Technologies Inc.

### **WARNING**

Improper installation, adjustment, alteration, service or maintenance can cause injury or property damage. Refer to the owner's information manual provided with this fireplace. For assistance or additional information consult a qualified installer, service agency or your dealer.

### **Not intended for use as a primary heat source.**

This fireplace is tested and approved as a decorative fireplace. It should not be factored as a primary heat source in residential heating calculations.

### **WARNING**



#### **Fire Risk**

- **Do not** install or operate damaged fireplace.
- **Do not** modify fireplace.
- Installation other than as instructed by Hearth & Home Technologies Inc. is strictly prohibited.
- **Do not** operate the fireplace without fully assembling all components.
- **Do not overfire.**
- Installation and/or use of any component part not approved by Hearth & Home Technologies.


Hearth & Home Technologies disclaims any responsibility for, and the warranty and agency listing will be voided by the above actions.

### **WARNING**



#### **Fire Risk**

- **WARNING! TO AVOID THE RISK OF DAMAGING FIREPLACE MATERIALS AND INCREASING THE RISK OF SPREADING A FIRE, DO NOT USE THE FIREPLACE TO COOK OR WARM FOOD.**

 **WARNING:** This product and the fuels used to operate this product (wood and wood pellets), and the products of combustion of such fuels, can expose you to chemicals including carbon black, which is known to the State of California to cause cancer and carbon monoxide, which is known to the State of California to cause birth defects or other reproductive harm. For more information go to: [www.P65Warnings.ca.gov](http://www.P65Warnings.ca.gov).

# 2 Getting Started

## A. Design and Installation Considerations

### CAUTION

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

When planning a fireplace installation, it is necessary to determine the following information before installing:

- Where the fireplace is to be installed. See Sections 3 and 4.
- The vent system configuration to be used. See Sections 5 and 6.
- Framing and finishing details. See Sections 3, 6 and 8.
- Whether optional accessories are desired. See Section 12.

### Moisture Resistance:

This outdoor fireplace will shed moderate amounts of water, but is not waterproof. Water and condensing water vapor may enter the chase under certain conditions.

The fireplace will not perform as an exterior wall. Moisture penetration must be considered for construction that places the fireplace in structure walls or on moisture sensitive surfaces.

**When installed on exterior walls:** Hearth & Home Technologies recommends that the fireplace chase be constructed outside the structure's weather envelope. Where the platform meets the wall, use a flashing detail similar to that required for attached decks. Chase platforms, including hearths should slope away from the structure at 1/8 in. to 1/4 in. per foot. The fireplace can be shimmed level.

**When installed on surfaces where water may collect or cause damage:** Hearth & Home Technologies recommends that a drainage pan be placed under the unit. This can be constructed of metal, adhesive polymer membrane (such as ice and water shield) or other suitable materials. A means of drainage out of the pan such as tubes or weep holes should be provided. A slope of 1/8 in. to 1/4 in. per foot towards the drain port is suggested. The fireplace can be shimmed level.

Hearths should slope away from the front of the fireplace and chase at 1/8 in. to 1/4 in. per foot. Spark strips must be on top of any combustible hearth materials used for moisture management.

## B. Non-Combustible Materials

Materials which will not ignite and burn, composed of any combination of the following:

- Steel -Iron
- Brick -Tile
- Concrete -Slate
- Glass -Plasters Materials reported as passing ASTM R 136, Standard Test Method for Behavior of Metals, in a Vertical Tube Furnance aat 750° C

## C. Combustible Materials

Materials made of or surfaced with any of the following materials:

- Wood -Compressed paper
- Plant fibers -Plastic

Any material that can ignite and burn; flame proofed or not, plastered or un-plastered.




## D. Tools and Supplies Needed

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

- |   |                             |
|---|-----------------------------|
| Reciprocating Saw                                 | Framing material            |
| Pliers  | High temp caulking material |
| Hammer  | Gloves                      |
| Phillips screwdriver                              | Framing square              |
| Flat blade screwdriver                            | Electric drill and bits     |
| Plumb line  | Safety glasses              |
| Level   | Tape measure                |
| 1/2-3/4 in. lenght, #6 or #8 self-drilling screws |                             |
| Misc. screws and nails                            |                             |

**Read all the instructions before starting the installation. Follow these instructions carefully during the installation to ensure maximum safety and benifit.**

## E. Inspect Fireplace and Components

 <b>WARNING</b>	
	<b>Fire Risk</b>
	<b>Explosion Risk</b>
Inspect fireplace and components for damage. Damaged parts may impair safe operation.	
<ul style="list-style-type: none"><li>• Do NOT install damaged components.</li><li>• Do NOT install incomplete components.</li><li>• Do NOT install substitute components</li></ul>	

- Carefully remove the fireplace and components from the packaging.  
The fireplace system consists of the following:
- Fireplace / Integral grate/dual cooling air inlet hoods, firescreen, and hearth refractory.

## F. Grate

This fireplace is designed to be used with the grate supplied with this unit or one approved by HHT. The grate will deteriorate over time and will need occasional replacement.

### **Warning! Risk of Fire!**

*Use only the factory-supplied integral grate.*

*Keep logs in place.*

*Allows proper air circulation around the fire.*

## G. Firescreen

The firescreen is provided to control sparks. Keep it closed when the fireplace is in use.

### **WARNING! Risk of Fire or Burns!**

**SCREEN WILL NOT PREVENT BURNING MATERIALS FROM FALLING OUT.**

**SCREEN PULLS OR HANDLES MAY BE HOT.**

## H. Cooling Air

Cooling air is necessary to install the fireplace on a combustible surface and in a combustible enclosure. Two inlet hoods are provided and must be installed, to allow cooling air to be drawn into the enclosure. Ducting between the hoods and the fireplace is not necessary.

The complete structure must be noncombustible if the hoods are not installed.



## I. Molded Brick Panel

- The molded brick panels are shipped separately, but required to contain heat and provide an attractive interior.
- They will deteriorate over time and will need occasional replacement. Small hairline cracks and discoloration are normal and do not affect safety.
- Mortar is not necessary but can be used to enhance the appearance.
- 

## J. Glass Doors (optional)

- If installing the glass door kit, make sure the finished opening should be 38 x 42 inches (965 mm x 167 mm) to allow for door installation.

# 3 Framing and Clearances

	<b>WARNING</b>
	<b>Fire Risk</b> Provide adequate clearances. <ul style="list-style-type: none"><li>• Around air openings</li><li>• To combustibles</li><li>• For service access.</li></ul> Locate fireplace away from traffic areas.

<b>Note:</b> <ul style="list-style-type: none"><li>• Illustrations and photos reflect typical installations and are <u>FOR DESIGN PURPOSES ONLY</u>.</li><li>• Illustrations/diagrams are not drawn to scale.</li><li>• Actual installation/appearance may vary due to individual design preference.</li><li>• Hearth &amp; Home Technologies reserves the right to alter its products.</li></ul>
---

## A. Selecting Fireplace Location

This outdoor fireplace will shed moderate amounts of water, but is not waterproof. Water and condensing water vapor may enter the chase under certain conditions.

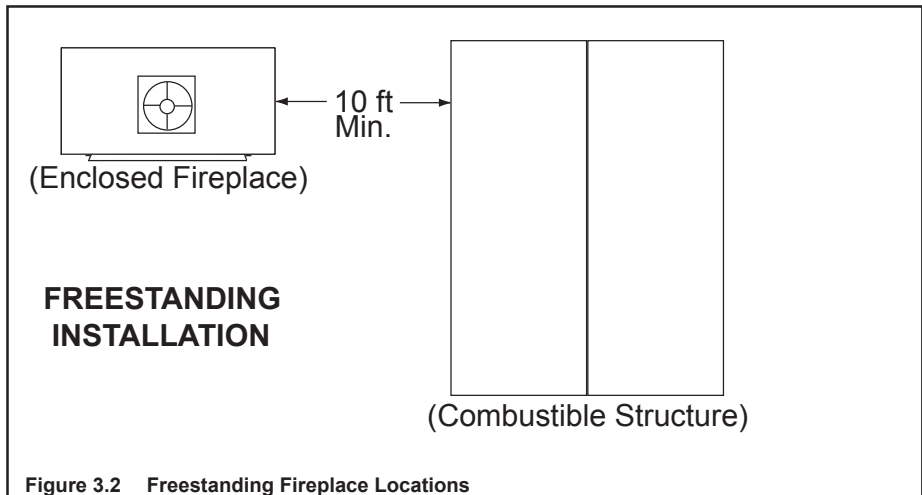
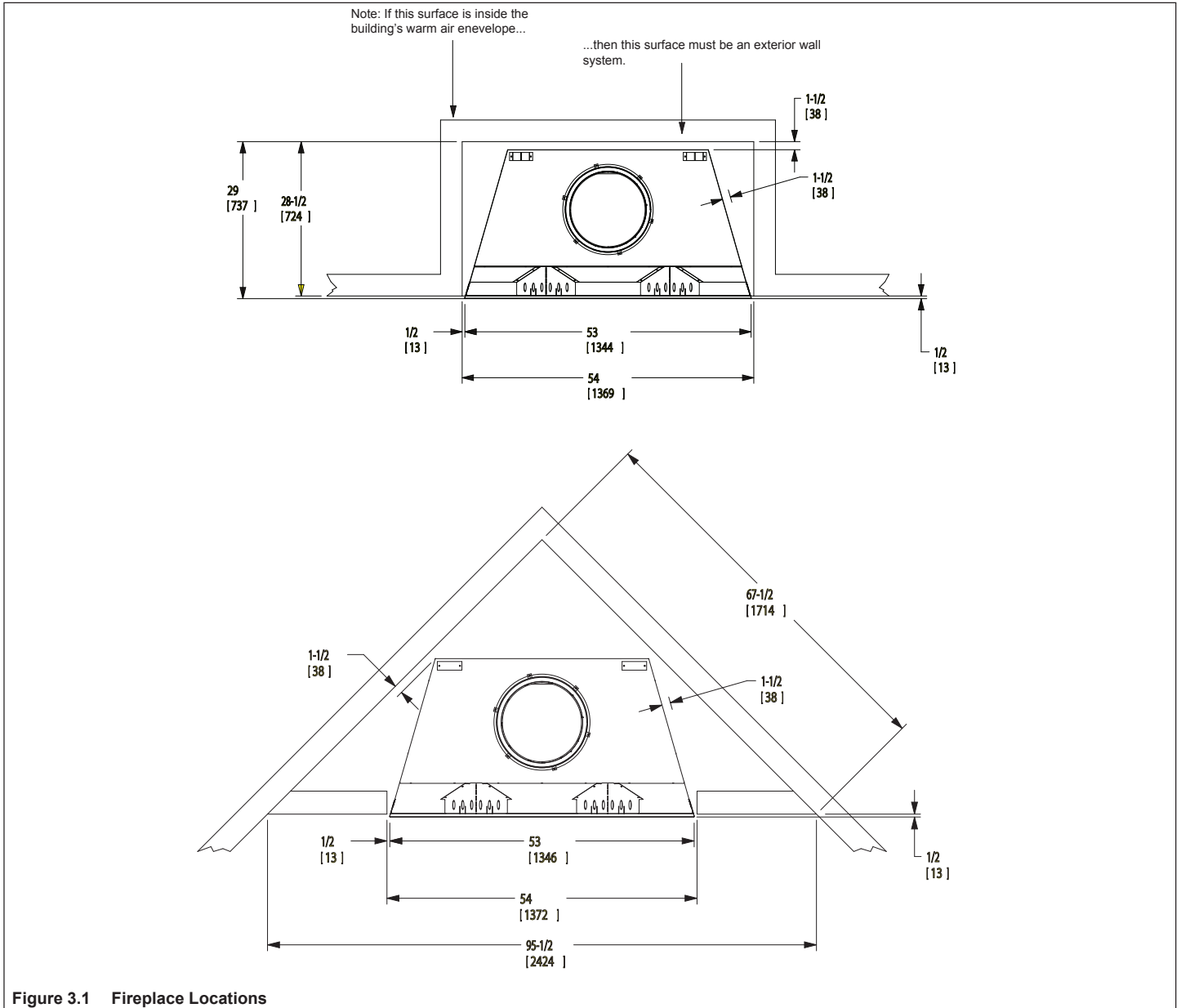
The fireplace will not perform as an exterior wall. Moisture penetration must be considered for construction that places the fireplace against structure walls or on moisture sensitive surfaces.

- **Exterior Walls (see Figure 3.1)**

Hearth & Home Technologies recommends that the fireplace chase be constructed outside the structure's weather envelope. Where the platform meets the wall, use a flashing detail similar to that required for attached decks. Chase platforms, including hearths, should slope away from the structure at 1/8 in. to 1/4 in. per foot. The fireplace can be shimmed level. Build the outside enclosure out of standard building materials, being careful to maintain the minimum air clearances specified in these installation instructions.



- **Freestanding Installations (see Figure 3.2)**  
When installing this fireplace as a freestanding fireplace in your yard, it must be enclosed to prevent impact damage to the fireplace.
- **Porch and Patio Installations**  
The fireplace will not perform as an exterior wall. Hearth & Home Technologies recommends that the fireplace chase be constructed outside the structure's weather envelope. Where the platform meets the wall, use a flashing detail similar to that required for attached decks. Chase platforms, including hearths should slope away from the structure at 1/8 in. to 1/4 in. per foot. The fireplace can be shimmed level.
- **The cooling air hoods MUST be used if installing in a combustible enclosure.** Ducting is not necessary between the hoods and the fireplace.
- If fireplace is installed on cement and totally enclosed with non combustilbe materials (i.e. metal studs, cement board, etc.) the cooling air hoods do not need to be installed.
- **When Installed on Surfaces Where Water May Collect or Cause Damage:**  
Hearth & Home Technologies recommends that a drainage pan be placed under the unit. This can be constructed of metal, adhesive polymer membrane (such as ice and water shield) or other suitable materials. A means of drainage out of the pan such as tubes or weep holes should be provided. A slope of 1/8 in. to 1/4 in. per foot towards the drain port is suggested. The fireplace can be shimmed level. Hearths should slope away from the front of the fireplace and chase at 1/8 in. to 1/4 in. per foot. Spark strips must be used on top of any combustible hearth materials used for moisture management.







## B. Clearances

	<b>WARNING</b>
	<p><b>Fire Risk</b></p> <ul style="list-style-type: none"><li>• Comply with all minimum clearances to combustibles as specified.</li><li>• Framing or finishing material used on the front of, or in front of, the appliance closer than the minimums listed, must be constructed entirely of noncombustible materials (i.e., steel studs, concrete board, etc.).</li></ul> <p>Failure to comply may cause fire.</p>

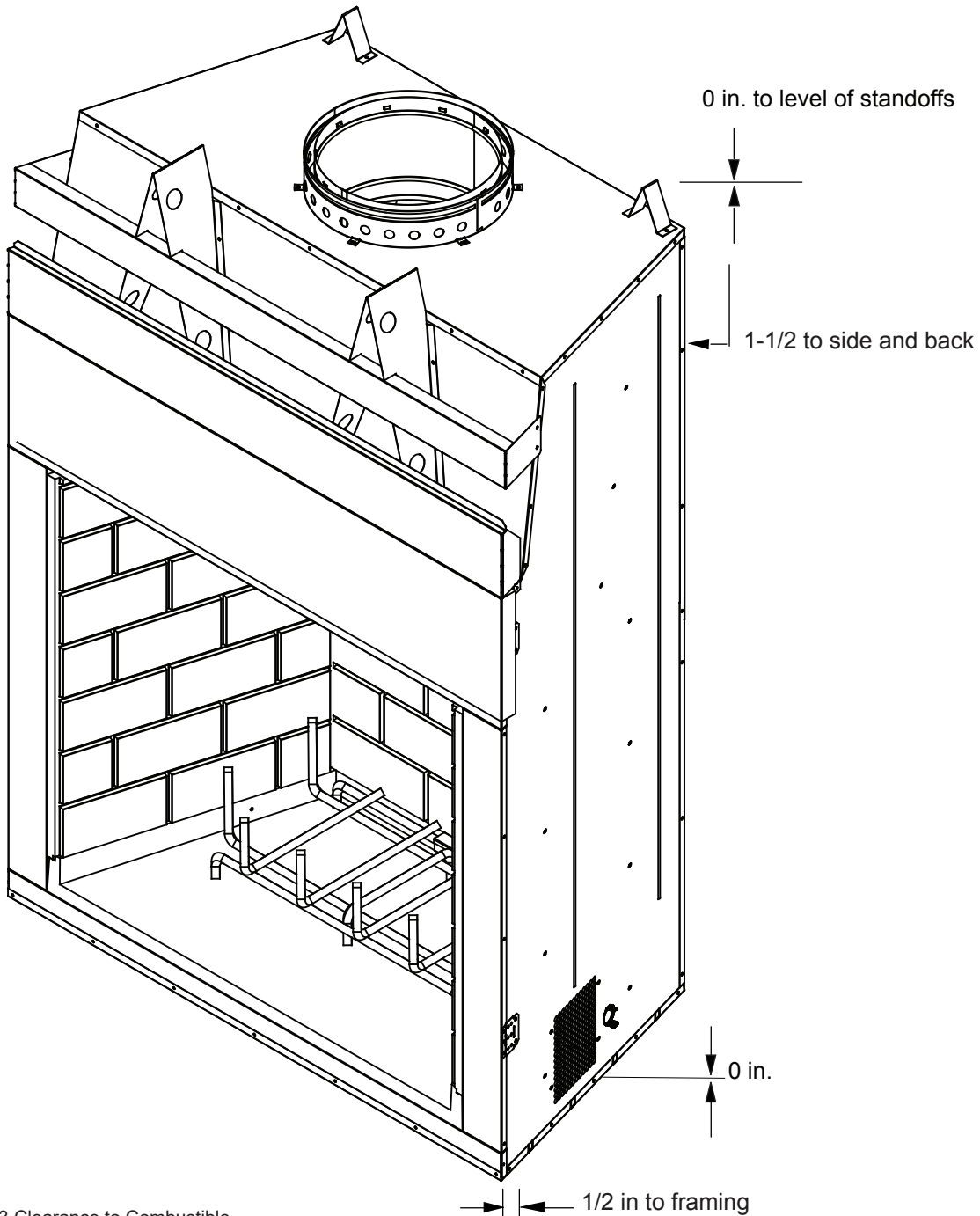
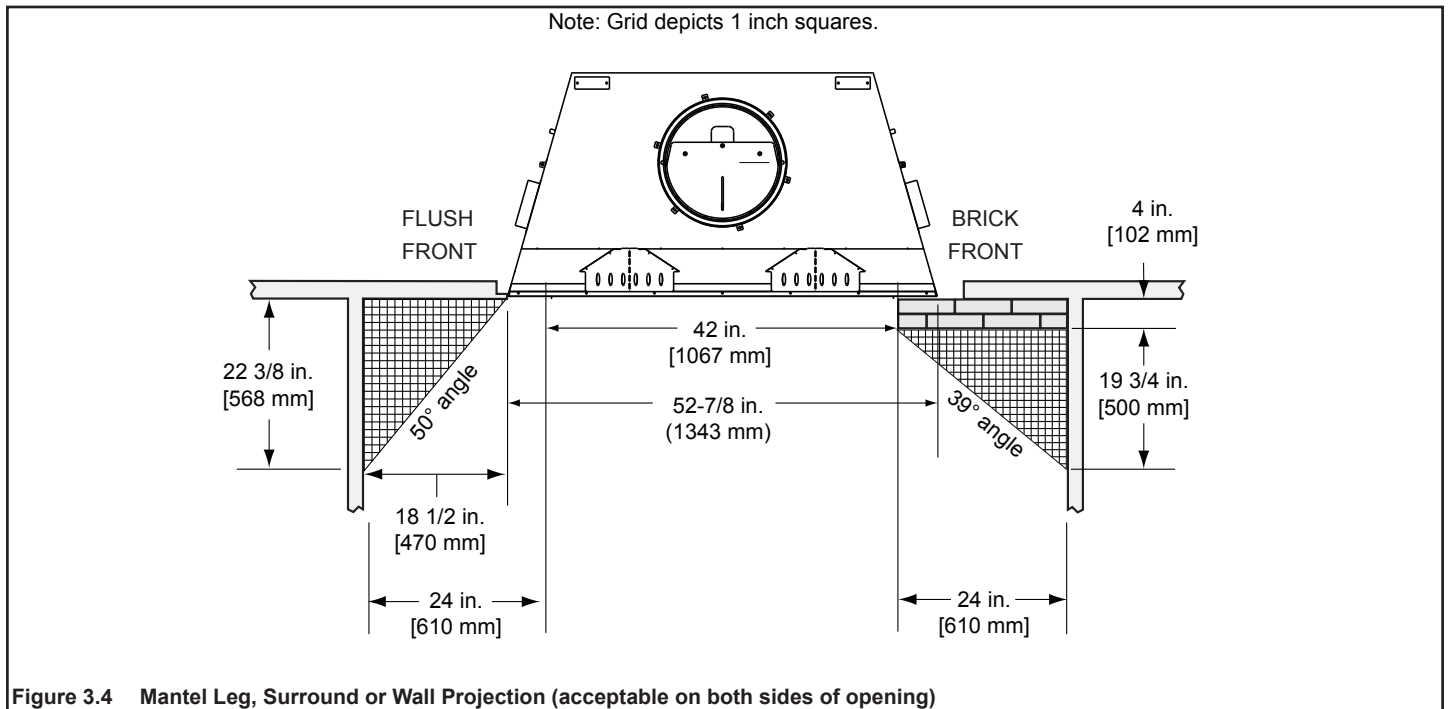


Figure 3.3 Clearance to Combustible

### C. Sidewalls/Surrounds

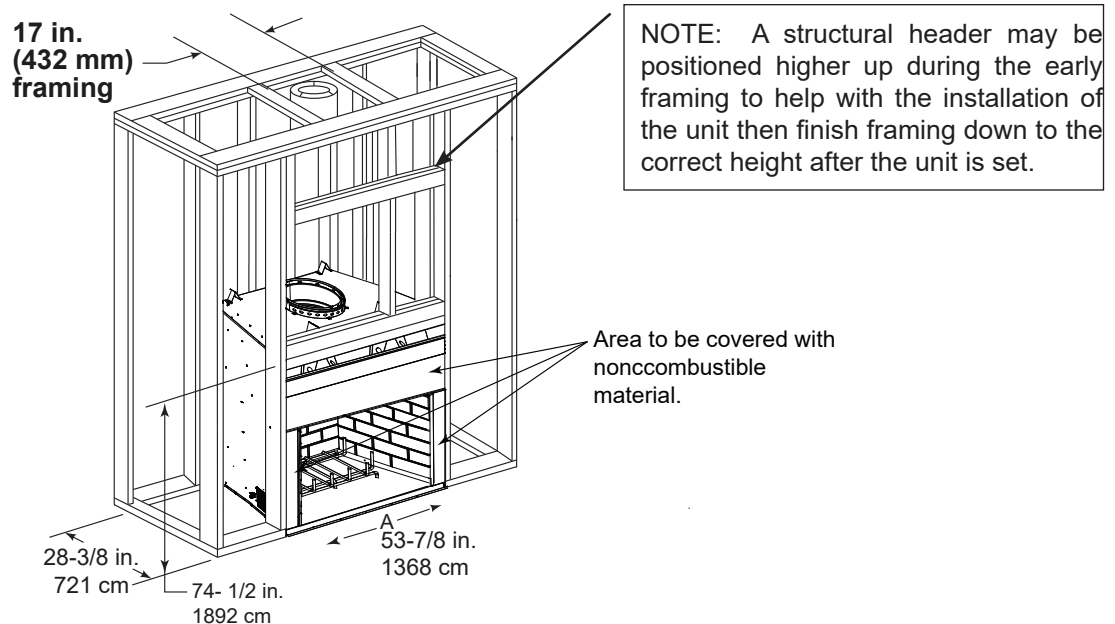
- Locate adjacent combustible sidewalls a minimum of 24 in. (610 mm) from fireplace opening.
- Mantle leg, surround, stub wall, whether combustible or non-combustible, may be constructed as shown in Figure 3.4.



### D. Frame the Fireplace

When typical combustible framing (2x4 lumber shown) is used, cooling air hoods are required. If the total structure is non-combustible, cooling air hoods are not necessary. See Figure 3.4.

- Observe all required air space clearances to combustible materials as shown in Figure 3.5.



## E. Chimney Requirements

When planning your fireplace location, the chimney construction and necessary clearances must be considered. The fireplace system and chimney components have been tested to provide flexibility in construction. The following figures are the minimum distances from the base of the fireplace.

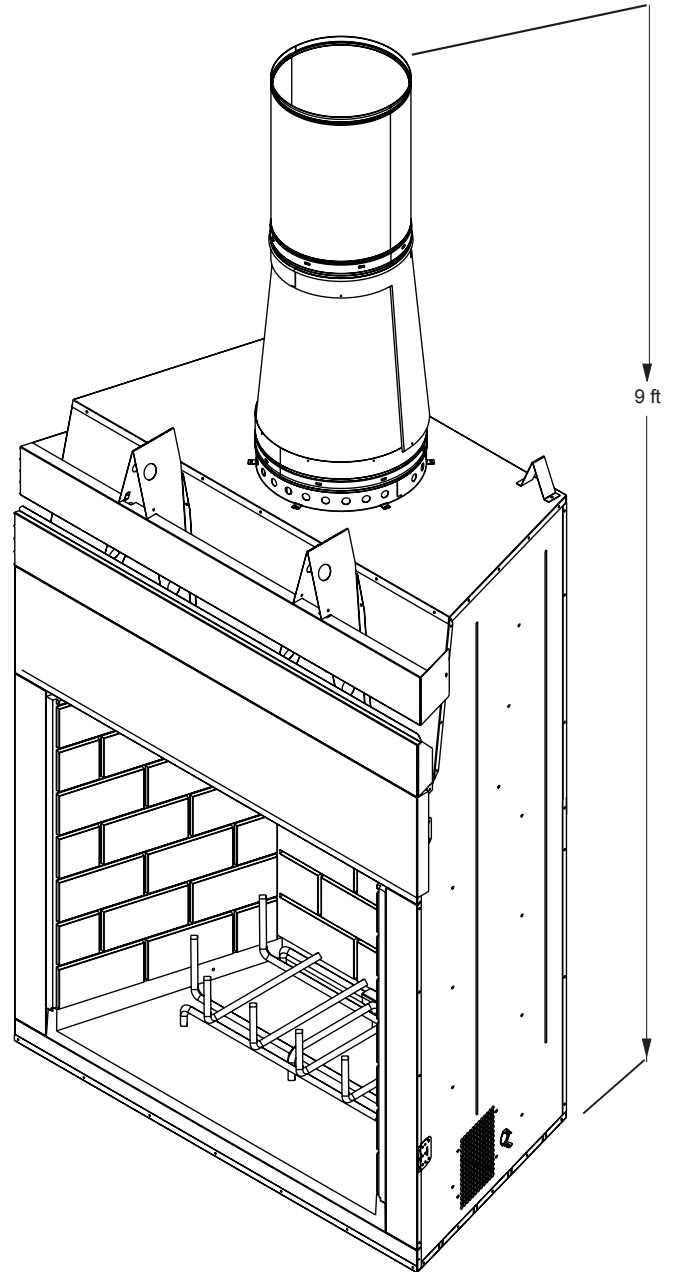
- Minimum overall straight height is 10 ft If the fireplace is freestanding and a minimum of 10 ft from a combustible structure. See Figure 3.2.
- Chimney must extend 2 ft (.6 m) above any portion of the roof within 10 ft (3048 mm) of the chimney. Refer to Figure 6.2.

	FT	M
• MINIMUM HEIGHT WITH OFFSET/RETURN	16	4.42
• MAXIMUM HEIGHT	90	27.43
• MAXIMUM CHIMNEY LENGTH BETWEEN AN OFFSET AND RETURN	20	6.1
• MAXIMUM DISTANCE BETWEEN CHIMNEY STABILIZERS	35	10.67
• DOUBLE OFFSET/RETURN MINIMUM HEIGHT	24	7.32
• MAXIMUM UNSUPPORTED CHIMNEY LENGTH BETWEEN THE OFFSET AND RETURN	6	1.83
• MAXIMUM UNSUPPORTED CHIMNEY HEIGHT ABOVE THE FIREPLACE	35	10.67
• MINIMUM OVERALL STRAIGHT HEIGHT IF FIREPLACE IS FREESTANDING	10	1.95
• MINIMUM STRAIGHT HEIGHT	14.5	4.42

\* Transition section standard with unit and 1 foot section of chimney will meet the minimum 10 ft. for free standing installs.

SLA10 (for Canada) and CAK8A required for Canada installation

NOTE: Offset can come off transition cone in all instances,,,freestanding or otherwise.




# 4 Installation of Fireplace

## A. Secure the Fireplace

### Position the Fireplace

This fireplace may be placed on either a combustible or noncombustible continuous flat surface. Follow the instructions for framing in Section 3.D. Slide the fireplace into position. Be sure to provide the minimum air clearance at the sides and back of the fireplace assembly. See Section 3.B.



### ⚠ WARNING

**Fire Risk!**

Prevent contact with sagging, loose insulation. Do NOT instal against vapor barriers or exposed insulation. Cooling Air Hoods must be installed if instaling on a combustible surface.

### Level the Fireplace

Level the fireplace side-to-side and front-to-back. Shim with noncombustible material, such as sheet metal, as necessary. Secure the fireplace (using the nailing flanges located on either side of the fireplace) to the vertical framing.

**Note:** When elevating the fireplace above the hearth extension the front of the elevated platform must be protected with a protective metal hearth strip.

**Important:** To ensure proper fit of the glass doors, check the fireplace opening for square. Measure diagonal distances of the opening to make sure they are equal. If they are not, continue to shim the fireplace until those diagonals are equal.

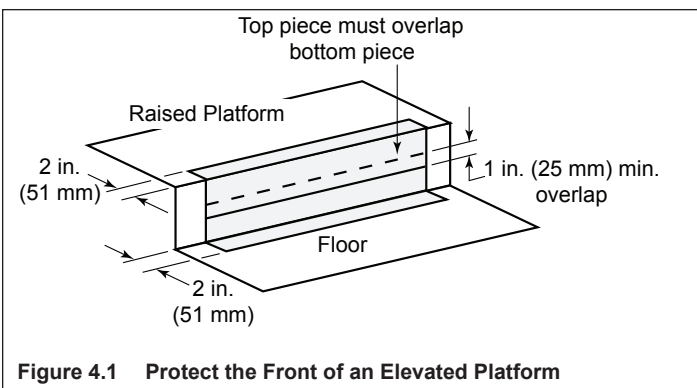


Figure 4.1 Protect the Front of an Elevated Platform

### Place the Protective Metal Hearth Strips

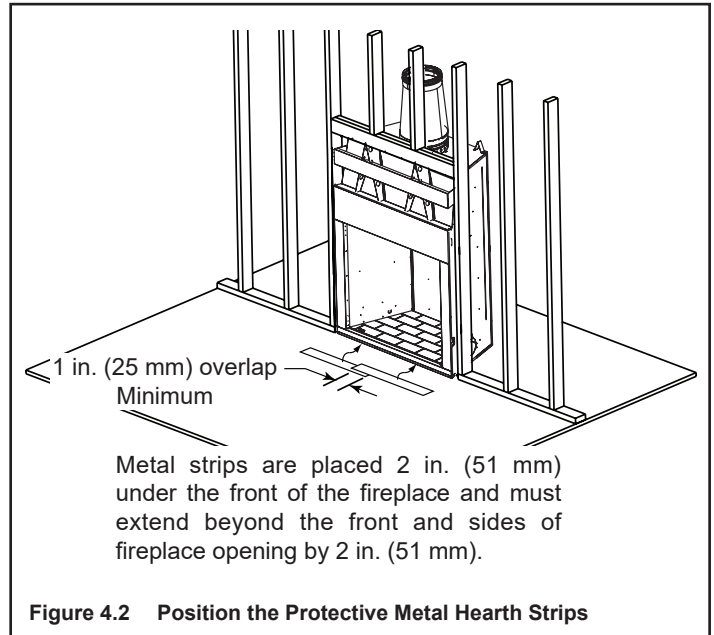



Figure 4.2 Position the Protective Metal Hearth Strips

Included with your fireplace you will find two metal hearth strips measuring approximately 26 in. x 4 in. (660 mm x 102 mm). These strips are used to provide added protection where the fireplace and the hearth extension meet when installed on a combustible service.

Slide each metal strip 2 in. (51 mm) under the front edge of the fireplace. The individual pieces must overlap each other by 1 in. (25 mm) minimum in the middle of the fireplace to provide continuous coverage of the floor. See Figure 4.2. These metal strips should extend from the front and sides of the fireplace opening by 2 in. (51 mm).



### ⚠ WARNING

**Fire Risk!**

- Metal hearth strips **MUST** be installed. Sparks or embers may ignite flooring.

**NOTE:** If using a chase, consider where and how the chimney will run. If there are obstacles that might be in the way, it may be necessary to make the chase larger than shown to allow for offsets to be used.

## B. Install Cooling Air Hoods

**WARNING!** Cooling air must be provided when installing in combustible enclosure or on combustible surface.

- Locate cooling air hoods to prevent blockage from leaves, snow/ice, or other debris. Blockages could cause the unit to overheat.
- Recommended bottom of a 7-3/4" X 7-3/4" square hole or 7-3/4" diameter hole 12" minimum above bottom of unit. See Figure 4.4.
- Do Not place cooling air hood close to exhaust vent.
- The outside air hood can be painted to match/accent the color of the structure.

**Caution! Risk of Fire or Asphyxiation!** Do not draw outside air from wall, floor, or ceiling cavity, or enclosed spaces such as an attic or garage.

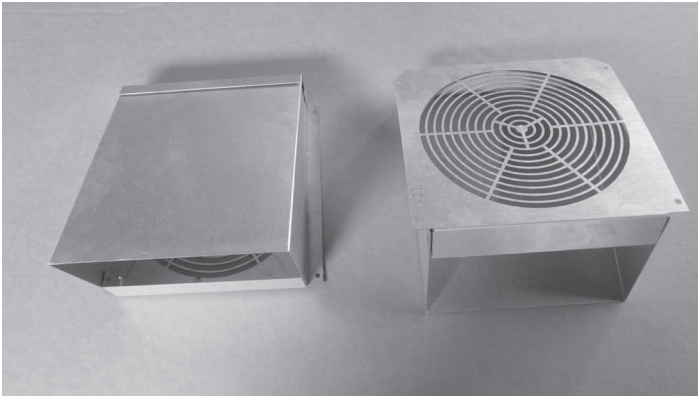


Figure 4.3 Cooling Hoods

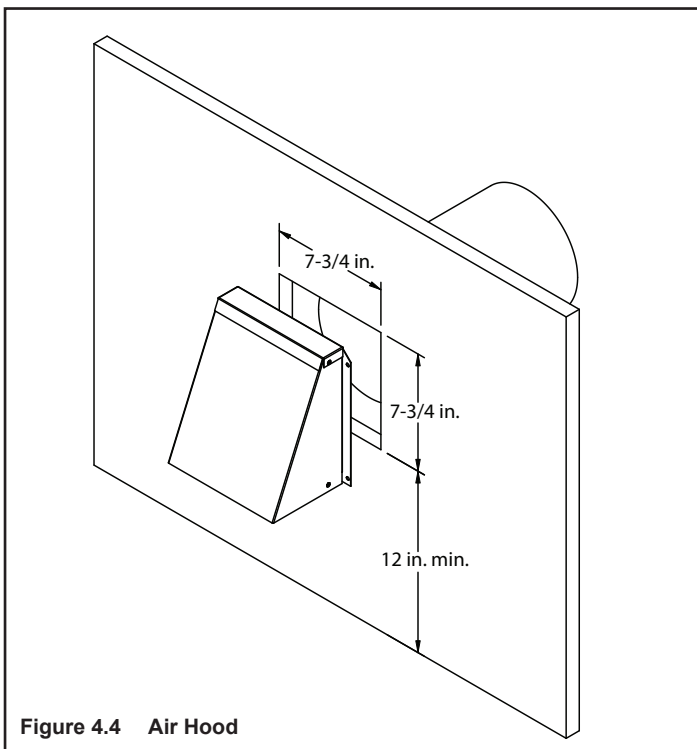


Figure 4.4 Air Hood

# 5 Chimney Assembly

## A. Chimney Requirements


Vertical distances are measured from the base of the fireplace.

- Minimum overall straight height is 10 ft. if the fireplace is freestanding and a minimum of 10 ft from a combustible structure.
- Chimney must extend 2 ft (.6 m) above any portion of the roof within 10 ft (3 m) of the chimney. To determine the chimney components needed to complete your particular installation, follow the steps below:
- Determine the total vertical height of the fireplace installation. This dimension is measured from the base of the fireplace assembly to the point where the smoke exits the termination cap.
- Subtract the effective height of the fireplace assembly from the overall height of the fireplace installation (measured from the base of the fireplace to the bottom of the termination cap).
- Refer to Table 5.1 to determine what components must be selected to complete the fireplace installation.
- Determine the number of ceiling firestops, stabilizers, roof flashing, etc. required to complete the fireplace installation.


	FT	M
• MINIMUM HEIGHT WITH OFFSET/RETURN	16	4.42
• MAXIMUM HEIGHT	90	27.43
• MAXIMUM CHIMNEY LENGTH BETWEEN AN OFFSET AND RETURN	20	6.1
• MAXIMUM DISTANCE BETWEEN CHIMNEY STABILIZERS	35	10.67
• DOUBLE OFFSET/RETURN MINIMUM HEIGHT	24	7.32
• MAXIMUM UNSUPPORTED CHIMNEY LENGTH BETWEEN THE OFFSET AND RETURN	6	1.83
• MAXIMUM UNSUPPORTED CHIMNEY HEIGHT ABOVE THE FIREPLACE	35	10.67
• MINIMUM OVERALL STRAIGHT HEIGHT IF FIREPLACE IS FREESTANDING	10	1.95
• MINIMUM STRAIGHT HEIGHT	14.5	4.42

\* Transition section standard with unit and 1 foot section required in addition as minimum.


**Note:** A maximum of two pairs of offsets and returns may be used.



### WARNING



*Fire Risk*  
Must maintain 2 in. (51 mm) air clearance to insulation and other combustible materials.  
**Warning: DO NOT PACK REQUIRED AIR SPACES WITH INSULATION OR OTHER MATERIALS.**



### CAUTION

- Do NOT connect this fireplace to a chimney flue servicing another appliance.
- Do NOT connect to any air distribution duct or system.

**Table 5.1**

HEIGHT OF CHIMNEY COMPONENTS		in.	mm
US	Canada ONLY		
<b>Chimney Stabilizer</b>			
SL11	SL4	4-3/4	121
<b>Ceiling Firestops</b>			
FS538	FS538	0	0
FS540	FS540	0	0
<b>Offsets/Returns</b>			
SL1130	SL430	14-1/2	368
<b>Chimney Sections*</b>			
SL1106	SL406	4-3/4	121
SL1112	SL412	10-3/4	273
SL1118	SL418	16-3/4	425
SL1136	SL436	34-3/4	883
SL1148	SL448	46-3/4	1187
n/a	SLA10	16-3/4	425

\* Dimensions reflect effective height.

## B. Assemble the Chimney Sections

**WARNING! Risk of Fire! DO NOT** install substitute or damaged chimney components.

- Use only those components described in this manual. Substitute or damaged chimney components could impair safe operation and cause overheating and fire.

- Support the pipe during construction and check to be sure inadvertent loading has not dislodged the chimney section from the fireplace or at any chimney joint.
- Attach the transition section to the top of the fireplace.
- Place inner flue to the inside of the chimney section below it. Place the outer casing outside the outer casing of the chimney section below it. Refer to Figure 5.1.

**NOTICE: CHIMNEY SECTIONS CANNOT BE DISASSEMBLED ONCE LOCKED TOGETHER. PLAN AHEAD!**

- Lock chimney sections and/or offsets/returns together by pushing downward until the top section meets the stop bead on the lower section.
- Pull on the top section to make sure it is fully engaged and will not separate.
- You may use #6 or #8 sheet metal screws no longer than 1/2 in. (13 mm) to fasten chimney sections together. Do NOT penetrate inner flue.
- Fasten offset/returns to chimney sections. Insert the screws (provided) through the predrilled holes. Do NOT penetrate inner flue.
- Secure chimney returns with hanger straps (provided); fasten to studs or joists.
- Vertical straight runs of chimney must be supported every 35 ft (10.7 m).

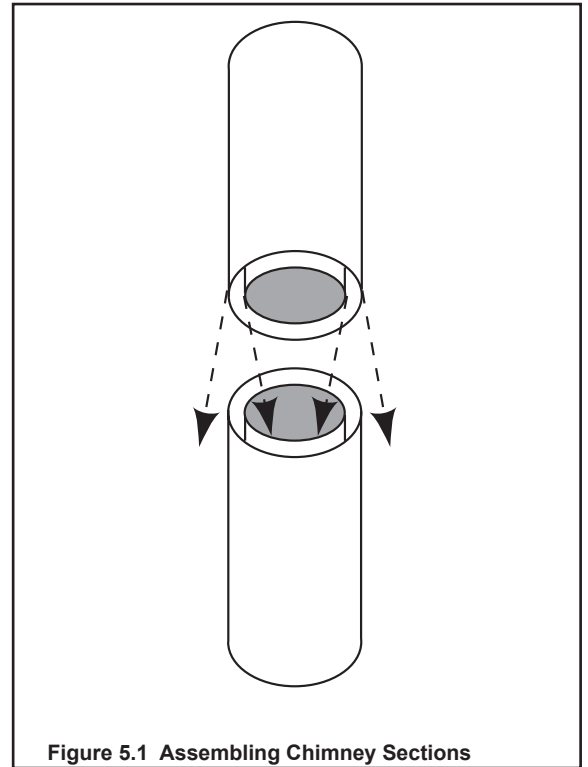


Figure 5.1 Assembling Chimney Sections



## C. Installing the Attic Insulation Shield

**WARNING! Risk of Fire!** You MUST install an attic installation shield when there is any possibility of insulation or other combustible material coming into contact with the chimney.

- **DO NOT** pack insulation between the chimney and the attic insulation shield.
- Failure to keep insulation and other materials away from the chimney pipe could cause a fire.
- **DO NOT** offset chimney inside insulation shield.
- Combustible material may come into contact with the attic insulation shield as long as the required clearances are maintained to the chimney pipe.

Installation of a ceiling firestop is required:

Note: In Canada a CAS10 must also be installed. See instructions provided with kit.

- Refer to Figures 5.3, 5.4, and 5.5.
- If the attic shield is pre-rolled continue. If it is a flat part, try to roll it up to aid in wrapping it around the chimney.
- Pre-bend all the tabs in at the top to 45 degrees.
- Wrap the shield (around the chimney if already installed) until you have an overlap and the three holes on each side match up (large holes on top).
- Insert three screws into the matching holes to form a tube starting at the bottom.
- Bend the tabs on the bottom of the tube inward to 90 degrees to maintain chimney air space.
- Rest the insulation shield on the ceiling firestop below.
- Tape off any openings around the bottom.

If you want to make a custom shield or barrier, follow these guidelines:

- Metal is preferred, although any material stiff enough to hold back the insulation can be used.

**WARNING! Risk of Fire!** Use of cardboard or other materials that can deflect under humidity or other environmental conditions is not recommended.

- The shield or barrier must be tall enough to extend above the insulation and prevent blown-in insulation from spilling into the cavity and accommodate the amount of insulation as required by the National Building Code.
- Maintain specified air spaces around chimney.
- Check instructions and local codes for further details.

### Double-check the Chimney Assembly

Continue assembling the chimney sections up through the ceiling firestops as needed. While doing so, be aware of the height and unsupported chimney length limitations given under Section 5.A.

Check each section by pulling up slightly from the top to ensure proper engagement before installing the succeeding sections. If they have been connected correctly, they will not disengage when tested.

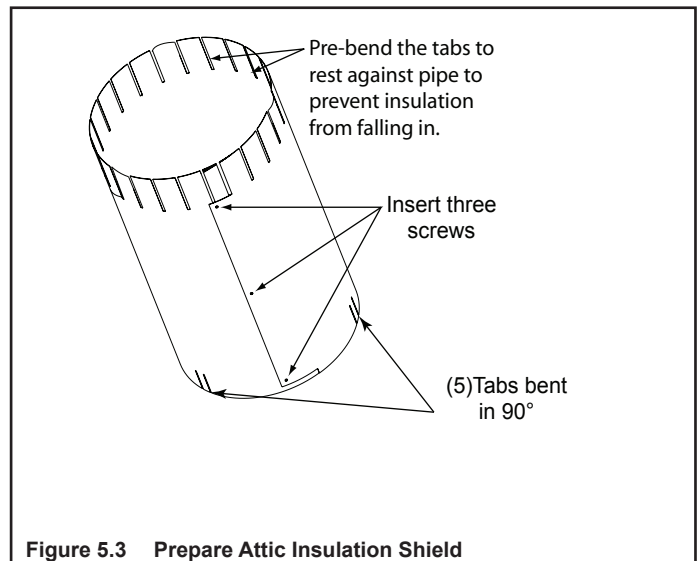


Figure 5.3 Prepare Attic Insulation Shield

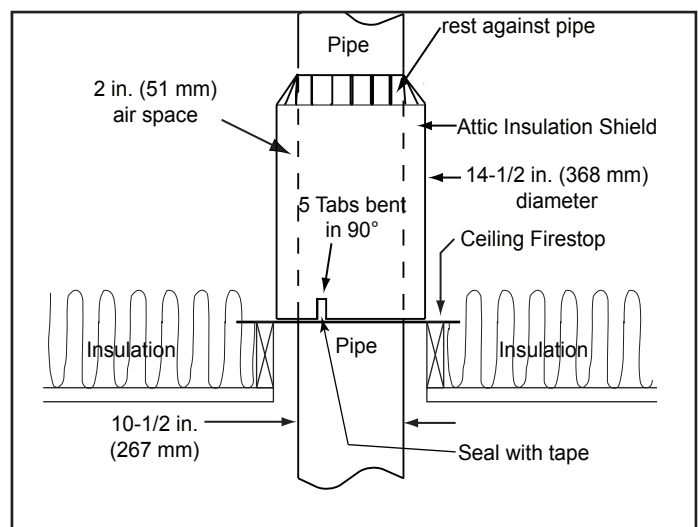


Figure 5.4 Install Attic Insulation Shield (firestop above ceiling)

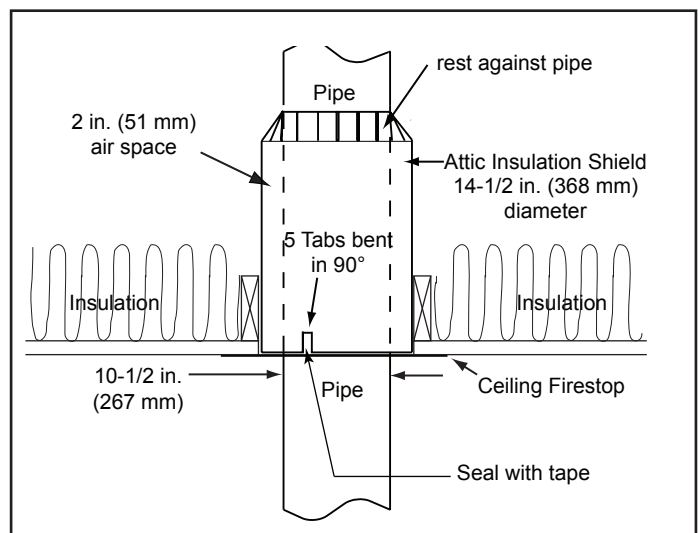


Figure 5.5 Install Attic Insulation Shield (firestop below ceiling)



**Note:** The chimney must be enclosed from the fireplace to the attic maintaining the 2 inch clearances.

## D. Using Offsets/Returns

To bypass any overhead obstructions, the chimney may be offset using an offset/return.

An offset and return may be attached together or a chimney section(s) may be used between an offset and return.

Perform the following steps to determine the correct chimney component combination for your particular installation:

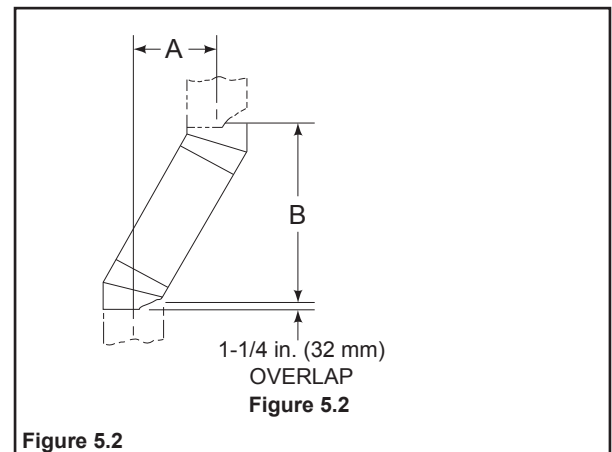
	<b>WARNING</b>
	<p><b>Fire Risk</b></p> <ul style="list-style-type: none"> <li>Draft will be restricted if offsets/returns greater than 30° are used.</li> </ul>

**Table 5.2**

A		B		SL1106 SL406	SL1112 SL412	SL1118 SL418	SL1136 SL436	SL1148 SL448
in.	mm	in.	mm					
4 7/8	124	17 7/8	454	-	-	-	-	-
7 1/4	184	2 2	559	1	-	-	-	-
9 3/4	248	26 1/8	664	2	-	-	-	-
10 1/4	260	27 1/4	692	-	1	-	-	-
12 3/4	324	31 3/8	797	1	1	-	-	-
13 1/4	337	32 3/8	822	-	-	1	-	-
15 3/4	400	36 5/8	930	-	2	-	-	-
18 1/8	460	40 3/4	1035	1	2	-	-	-
18 3/4	476	41 3/4	1060	-	1	1	-	-
21 3/4	552	47	1194	-	-	2	-	-
22 1/4	565	48	1219	-	-	-	1	-
24 3/4	629	52 1/8	1324	1	-	-	1	-
27 3/4	705	57 3/8	1457	-	1	-	1	-
28 1/4	718	58 3/8	1483	-	-	-	-	1
30 3/4	781	62 1/2	1588	1	-	-	-	1
33 3/4	857	67 3/4	1721	-	1	-	-	1
36 3/4	933	73	1854	-	-	1	-	1
39 3/4	1010	78 1/8	1984	-	-	-	2	-
41 1/8	1045	82 3/8	2092	1	-	-	2	-
45 3/4	1162	88 1/2	2248	-	-	-	1	1
48 1/8	1222	92 3/4	2356	1	-	-	1	1
51 3/4	1314	98 7/8	2511	-	-	-	-	2

Proper assembly of air cooled chimney parts results in an overlap of chimney joints of 1-1/4 in. (32 mm). Effective length is built into this table.

- Measure how far the chimney needs to be shifted to enable it to avoid the overhead obstacle. See Figure 5.1. Use dimension “A” to determine chimney section required to achieve the needed shift.
- After determining the offset dimension, refer to Table 5.2 and find the “A” dimension closest to but not less than the distance of shift needed for your installation.
- The “B” dimension that coincides with the “A” dimension represents the required vertical clearance that is needed to complete the offset and return.
- Read across the chart and find the number of chimney sections required and the model number of those particular chimney parts.
- Whenever the chimney penetrates a floor/ceiling, a ceiling firestop must be installed.
- The effective height of the fireplace assembly is measured from the base of the fireplace to the top of the starter collar. See Dimensions in Section 12.




**Example:** Your “A” dimension from Figure 5.2 is 14 1/2 in. (368 mm). Using Table 5.2 the dimension closest to, but not less than 14 1/2 in. (368 mm) is 15 3/4 in. (400 mm) using a 30° offset/return. It is then determined from the table that you would need 36 5/8 in. (930 mm) (Dimension “B”) between the offset and return. The chimney components that best fit your application are two SL1112s or SL412s.

# 6 Complete the Enclosure

## A. Chimney Termination

### Chimney Termination Requirements (see Figure 6.1)

- Must have a cap approved and listed for this fireplace system
- Must not be located where it will become plugged by snow or other material
- Must terminate at least 3ft (914 mm) about the roof and at least 2 ft (610mm) above any portion of the roof within 10 ft. (305mm)
- Must be located away from trees or other structures



**WARNING**

**Fire Risk**

- Must maintain 2 in. (51 mm) air clearance to insulation and other combustible materials.

## B. Chase Top

A metal chase top is required to seal the top of the chase around the chimney pipe. The top should include a turn-down and drip edge to prevent water from seeping into the chase. Provide a 1/8 in. (3 mm) gap around the flue pipe and slope the top downward away from the penetration.

- All seams must be caulked to prevent leaks.
- A chase installation must use a chase top. Chase tops are available from your HHT dealer or may be field constructed.
- Attach the chase top to the top of the chase.

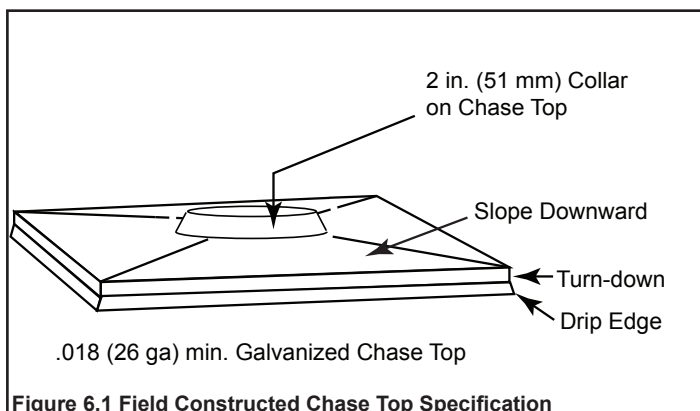



Figure 6.1 Field Constructed Chase Top Specification

## C. Install the Termination Cap

**Note:** To protect against the effect of corrosion on those parts exposed to the weather, the termination cap can be painted with a rust-resistant paint.



**WARNING**

**Fire Risk**

- The minimum overlap of cap to pipe **MUST** be met or chimney may separate from cap.

Separation allows sparks, heat and embers to escape.

Install the chimney sections up through the chase enclosure and refer to termination cap instructions.

NOTE: TR11/TR444 Round Termination Cap and TR11T/TR442 Round Telescoping Termination Cap not recommended for Installations less than 20 feet.

## ST1175/ST475 Square Termination Cap

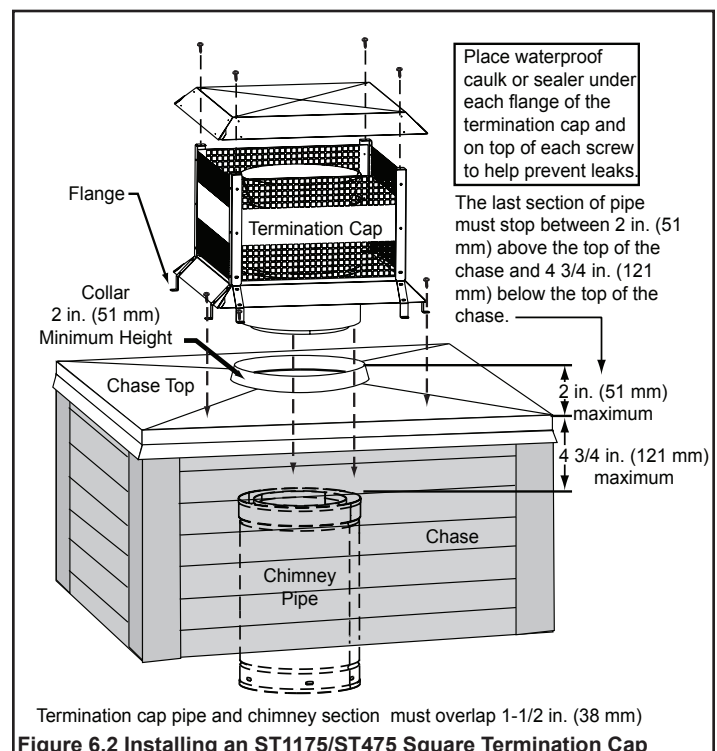


Figure 6.2 Installing an ST1175/ST475 Square Termination Cap

## TCT1175 Terra Cotta Cap

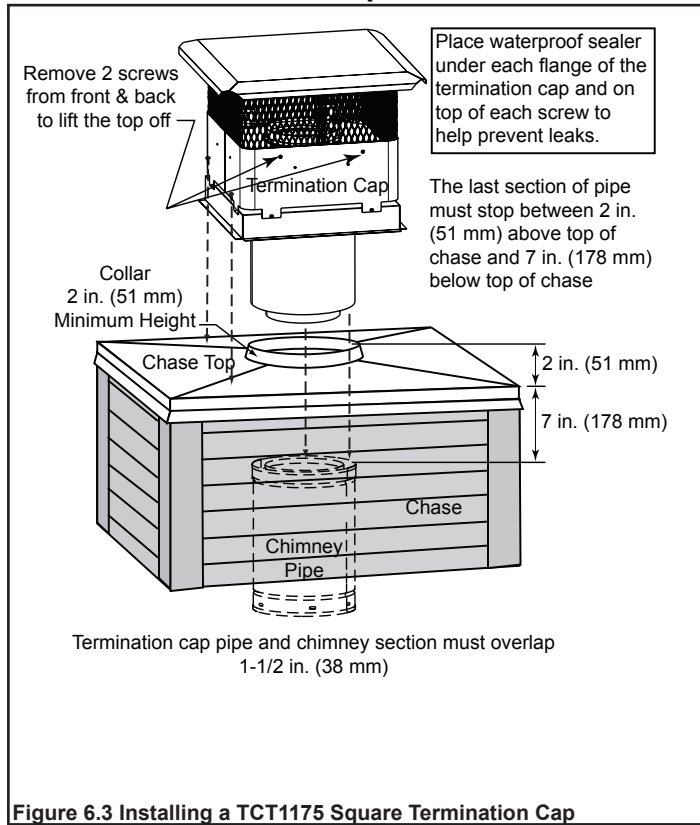


Figure 6.3 Installing a TCT1175 Square Termination Cap

# 7 Installation of Molded Brick Panel

## A. Install Hearth Molded Brick Panel

1. Put a level on fireplace to verify it is level side to side and front to back.
2. While the hearth is removed from the fireplace, measure all 4 corners to determine the variance from corner to corner. See Figure 7.1.
3. Shim the low corners of the hearth refractory by installing the metal pieces provided on the fireplace bottom. See Figure 7.2.
4. Put a level on the top flange of the refractory and shim as necessary from side to side or front to back. See Figure 7.3.

Note: The top flange of the hearth should be level to allow the sides and back to be installed with minimal gaps. The hearth slopes towards the front of the unit approximately 1/4".



Figure 7.1.



Figure 7.2.



Figure 7.3.

## B. Install Back Molded Brick Panel

- Refer to Figure 7.4.
- Set the grate retainer in place, in the notch in the hearth.
- Install the back panel. Center from side to side.
- Install rear refractory retainer.

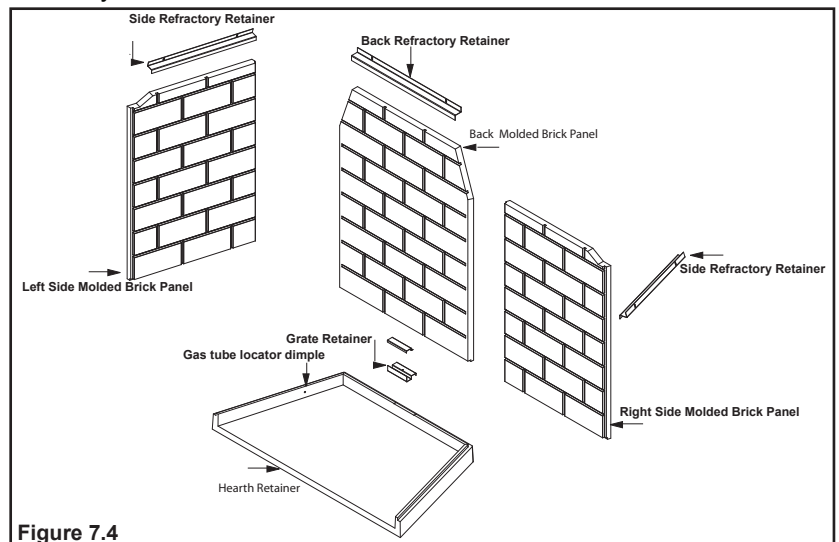


Figure 7.4

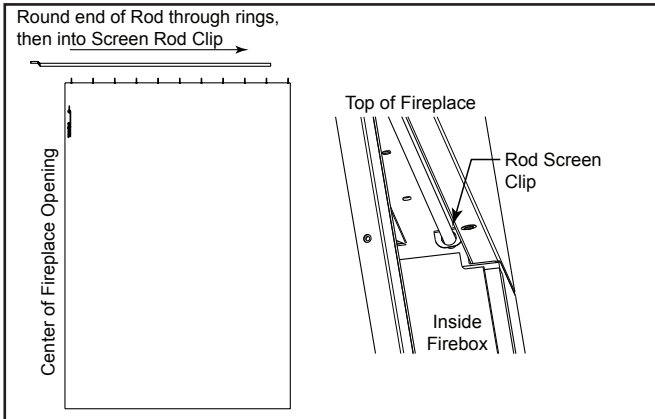
## C. Install Side Molded Brick Panel

- Remove screen rods.
- Remove smoke shield
- Install side panel by lifting up, setting on top flange of hearth and slide towards back of unit until it meets up with back panel.
- Install refractory retainer
- Install second side panel following the steps above. Replace the smoke shield.
- Install refractory retainer.



## D. Install Screens

- Lay one screen panel flat and slide the round end of the rod through the rings starting at the handle side of the screen. Leave the last ring off the rod.
- Insert the rod through the hole in the bracket. Slip the last ring over the rod on the other side of the bracket.
- Fasten the flat end of the screen rod back in place using the screw removed earlier.
- Repeat for the other screen panel



## E. Mortar (Optional)

The brick panels have been designed for installation without the use of mortar being necessary. If the look of mortar is preferred, it is available and can be installed. Follow the directions on the container for mixing.

The mortar can be applied with a mortar bag or troweled on. Applying with mortar bag may be easiest and less messy. Clean sparingly as paint will rub off and may need to be touched up. Touch up paint is available as an accessory.

**VERY IMPORTANT: Allow the mortar 72 hours to cure before operating the fireplace.**

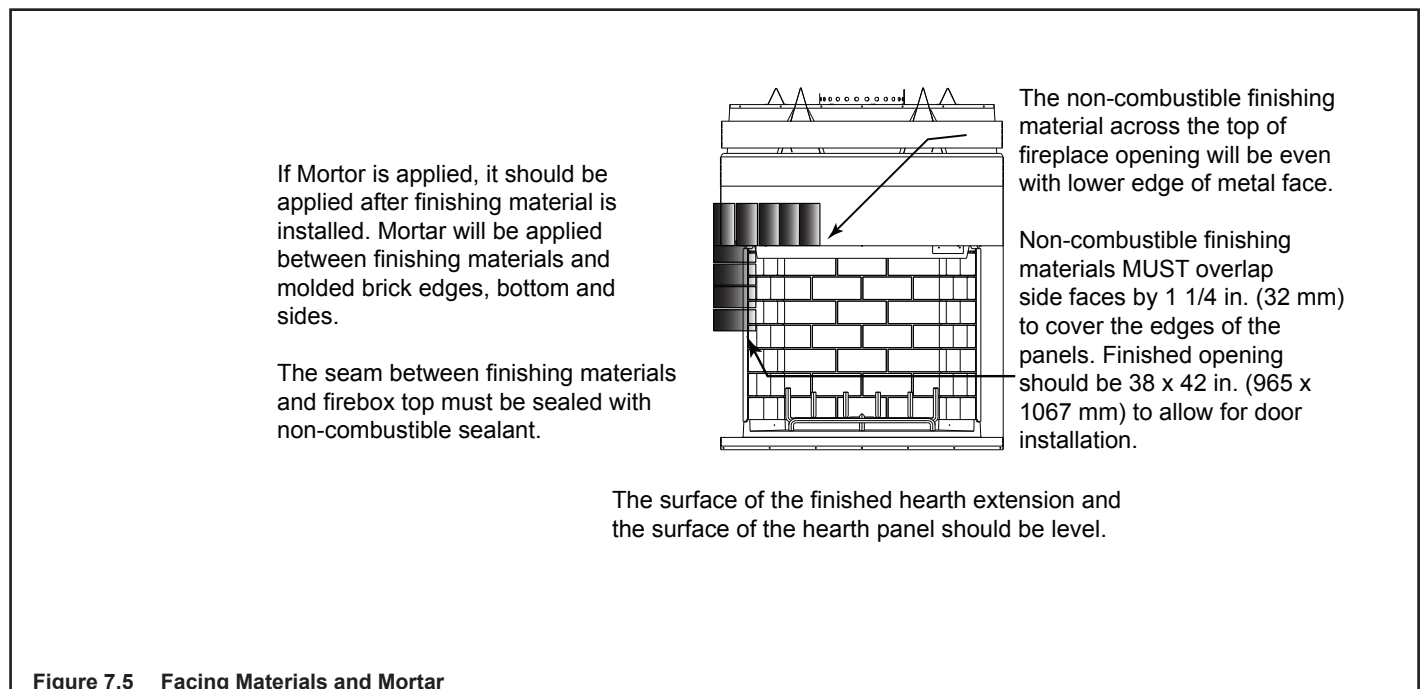


Figure 7.5 Facing Materials and Mortar

## F. Grate

- Install the grate If a gas log set is not going to be installed.
- Position the rear grate bar in the Grate Retainer
- Position the top of the grate retainer over the rear grate bar and fasten in place with screw provided.
- 

## G. Glass Doors (optional)

- If installing the glass door kit, make sure the finished opening should be 38 x 42 inches (965 x 167 mm) to allow for door installation.

# 8 Accessories

## A. Gas Log/Lighter Provisions

A certified gas log lighter or decorative gas log set can be installed in this fireplace.

### Vented Gas Logs

- Maximum input is 100,000 BTU/hr.
- Decorative gas appliance must be certified to **ANSI Z21.60** "Standard for Decorative Gas Appliances for Installation in Vented Fireplaces".
- Must be installed in accordance with the **National Fuel Gas Code, ANSI Z223.1**.
- A log set must incorporate a gas shutoff.
- A locating dimple is on both sides of the hearth refractory. Determine if a gas line is necessary and drill with a 1" in. masonry bit. Drill parallel with the back of the fireplace.
- We recommend you seal refractory around pipe with fireplace mortar or high temperature, noncombustible sealant.
- Repack insulation from the knockout around the pipe.
- Maintain 1-1/2 in. (38 mm) air space around the pipe for 4 in. (102 mm) beyond the fireplace.
- See Figure 8.1.

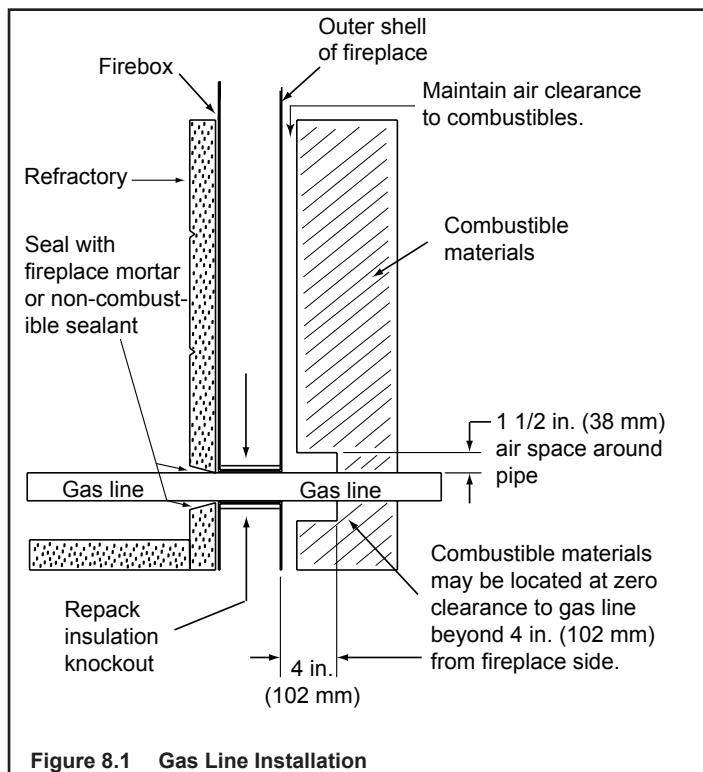


Figure 8.1 Gas Line Installation

### ⚠ WARNING



#### Asphyxiation Risk

Gas fire generates fumes.

### ⚠ WARNING



#### Fire Risk

- For use with solid wood fuel or decorative gas appliance only.

### ⚠ WARNING



#### Fire Risk

#### Explosion Risk

Inspect appliance and components for damage. Damaged parts may impair safe operation.

- Do NOT install damaged components.
  - Do NOT install incomplete components.
  - Do NOT install substitute components
- Report damaged parts to dealer.

### Unvented Gas Logs

**CAUTION!** If an unvented gas appliance is installed in the fireplace, the gas appliance must only be operated with the fireplace glass door fully open (if included). Only unvented gas log sets which have been found to comply with the standard for unvented room heaters, ANSI Z21.11.2, are to be installed in this fireplace. If an unvented gas appliance is installed it must incorporate an automatic shutoff device, and must be installed in accordance with the National Fuel Gas Code Z223.1, Latest edition.



# 9 Finishing

## A. Non-combustible Materials

- Materials which will not ignite and burn, composed of any combination of the following:
  - Steel
  - Iron
  - Brick
  - Tile
  - Concrete
  - Slate
  - Glass
  - Plasters
- Materials reported as passing **ASTM E 136, Standard Test Method for Behavior of Metals, in a Vertical Tube Furnace at 750° C**

## B. Combustible Materials

- Materials made of or surfaced with any of the following materials:
  - Wood
  - Compressed paper
  - Plant fibers
  - Plastic
- Any material that can ignite and burn; flame proofed or not, plastered or un-plastered

## C. Hearth Extension

**WARNING! Risk of fire! High temperatures, sparks, embers or other burning material falling from the fireplace may ignite flooring or concealed combustible surfaces.**

- Metal hearth strips **MUST** be installed (Section 7.C.).
- Hearth extensions **MUST** be installed exactly as specified.

Table 12.1

$$R = 1/k \times \text{inches of thickness}$$

- You **MUST** use a hearth extension with this fireplace.
- This fireplace has been tested and approved for use with a hearth extension insulated to a minimum R value of 2.32.
- The hearth extension material **MUST** be covered with tile, stone or other non-combustible material.
- Manufactured hearth materials will usually have a published **R value** (resistance to heat) or **k value** (conductivity of heat). Refer to the formula in Table 12.1 to convert a k value to an R value,
- Refer to Table 12.2 for hearth extension insulation alternatives.

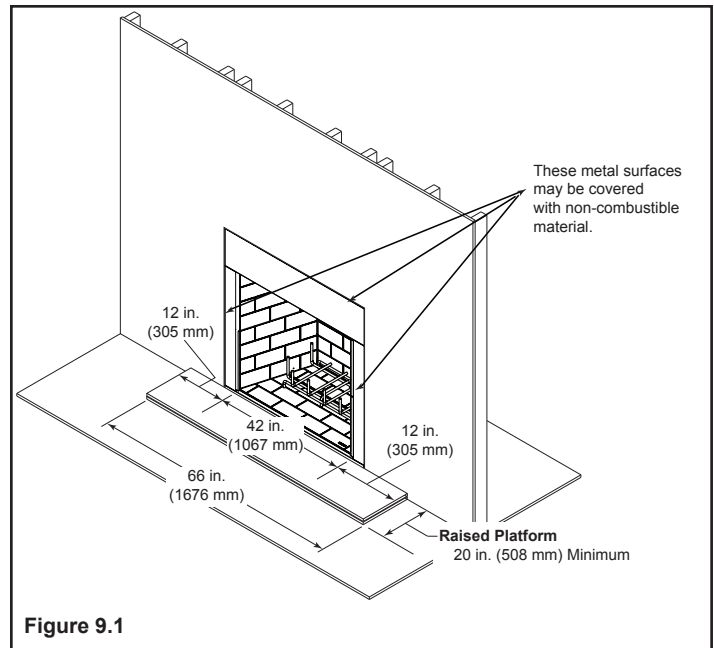


Figure 9.1

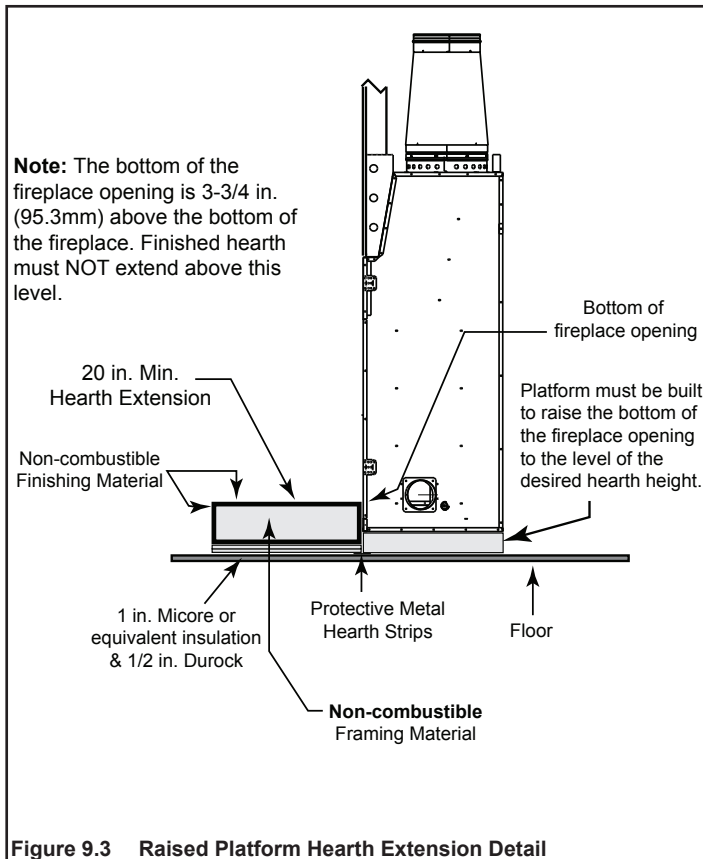
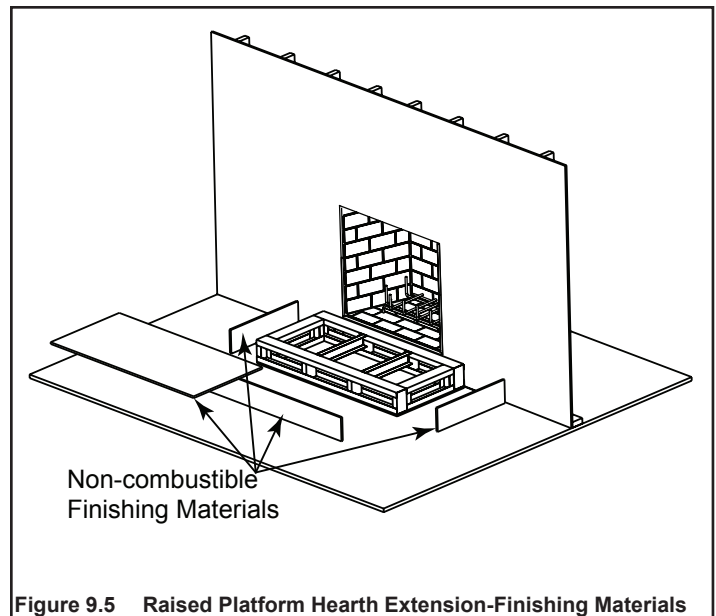
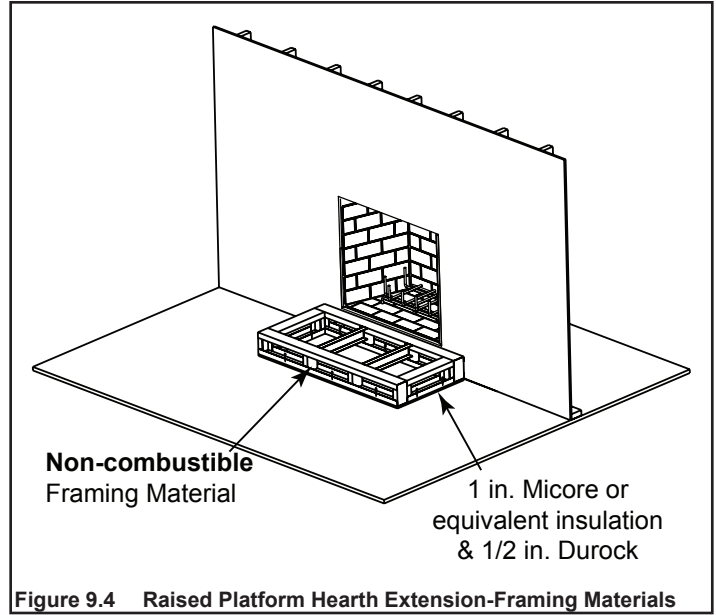
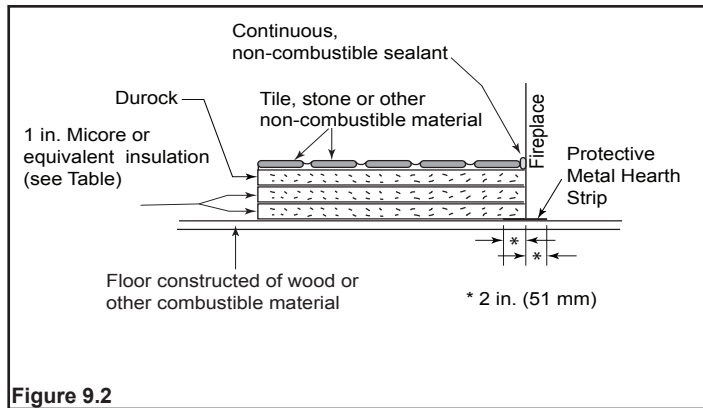
► Table 12.2

Hearth Extension Insulation Alternatives-Total minimum R Value must equal 2.32			
Material	k per inch thick	R per inch thick	Minimum thickness required
Hearth & Home HX3, HX4 (Micore 300™)	0.49	2.06	1-1/8 in. (28.6 mm)
USG Micore 160™	0.39	2.54	1 in. (25.4 mm)
USG Durock™ Cement Board	1.92	0.52	4-1/2 in. (114.3 mm)
Cement Mortar	5.0	0.20	11-1/2 in. (292.1 mm)
Common Brick	5.0	0.20	11-1/2 in. (292.1 mm)
Ceramic Tile	12.50	0.08	29 in. (736.6 mm)
Armstrong™ Privacy Guard Plus	0.46	2.18	1-1/16 in. (27 mm)
Marble	14.3 to 20.0	0.07 to 0.05	33-1/8 to 46-1/2 in. (841 to 1181 mm)

## D. Raised Hearth Extension Framing

The hearth framing must be constructed of non-combustible materials (Figure 9.2) and placed on 1/2 in. Durock and 1 in. Micore (or equivalent material) (Figure 9.4). When creating the platform, allow for the thickness of the **non-combustible** finishing materials (Figure 9.5).

**IMPORTANT!** Hearth extension design must be determined before installation of fireplace.



Hearths should slope away from the front of the fireplace and chase at 1/8 in. to 1/4 in. per foot. Spark strips must be on top of any combustible hearth materials used for moisture management.

## E. Non-combustible Sealant

After completing the framing and applying the facing materials over the framing, a bead of 300° F minimum non-combustible sealant or mortar must be used to close off any gaps at the top and sides between the fireplace and hearth.

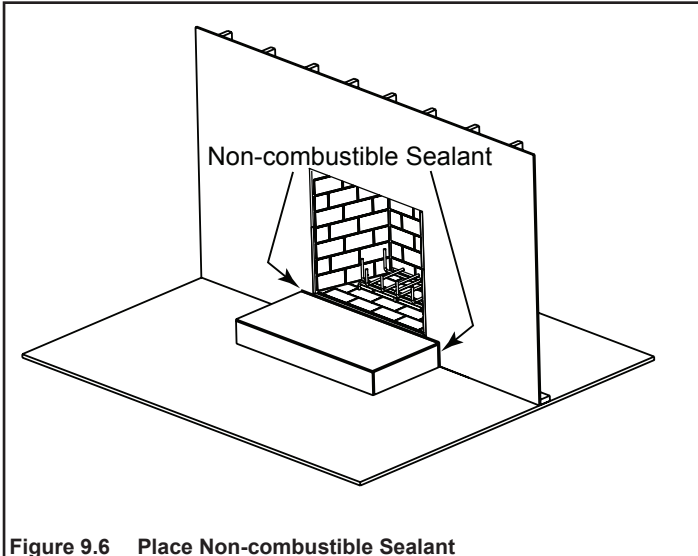


Figure 9.6 Place Non-combustible Sealant

## F. Finishing Material

Refer to Sections 9.A. and Sections 9.B. for combustible/non-combustible materials. Refer to Figure 9.8 for non-combustible zone if cooling air hoods are installed.

**WARNING! Risk of Fire! You must maintain clearances.**

- Use only non-combustible framing material below standoffs.
- Sheetrock, wood or other combustibles must NOT be used as sheathing or facing in the non-combustible zone.
- **DO NOT** cover metal fireplace front with combustible materials.
- Install combustible materials only to specified clearances on top front and side edges.
- Complete framing and apply drywall over framing.
- A bead of 300-deg F minimum non-combustible sealant must be used to close off any gaps at the top and sides between the fireplace and drywall to prevent cold air leaks.
- Large gaps can be bridged with fiberglass rope gasket.
- Only non-combustible materials may be used to cover the metal fireplace front.

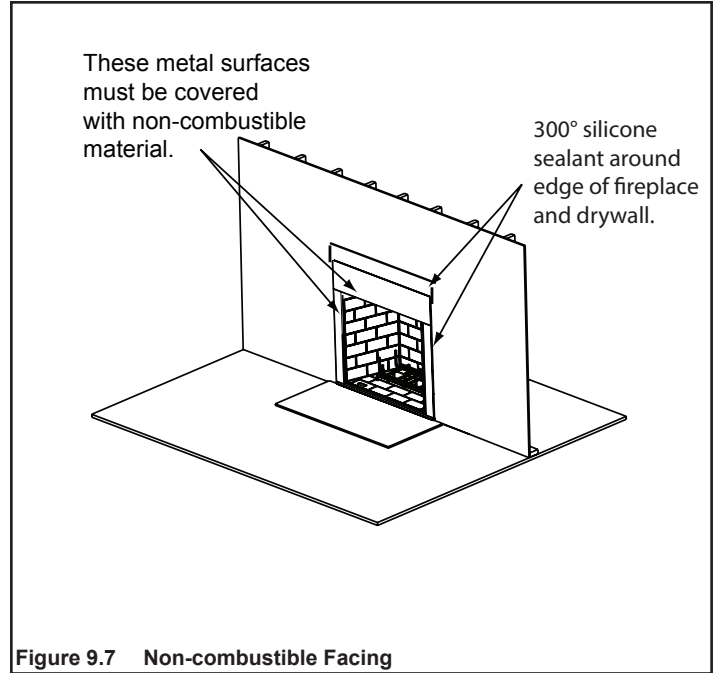


Figure 9.7 Non-combustible Facing

**WARNING! Risk of Fire!** Use only non combustible material when cooling hoods are not installed.

**Note: We recommend mortar be applied after facing materials are installed. Refer to Section 7.E**

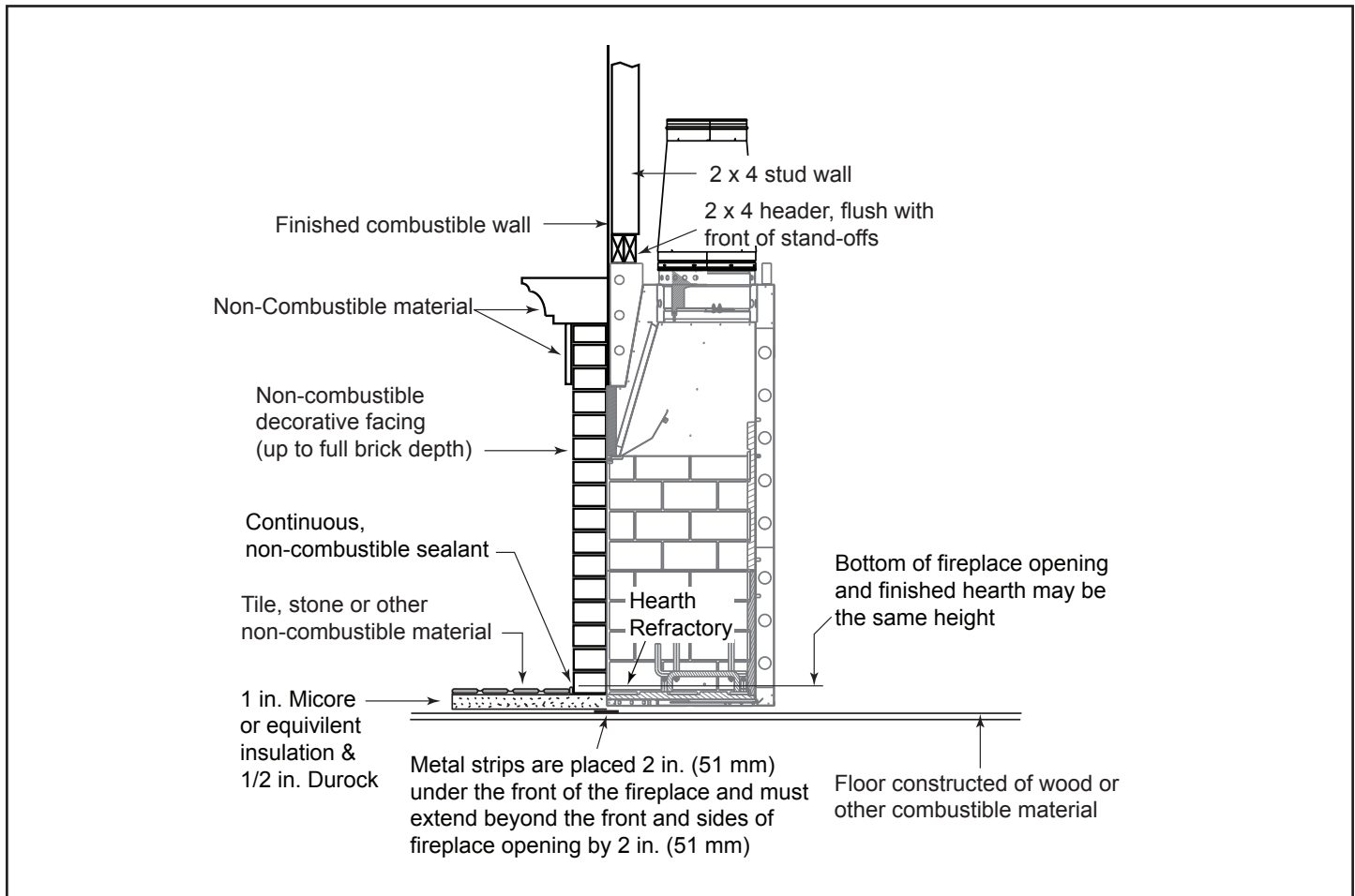


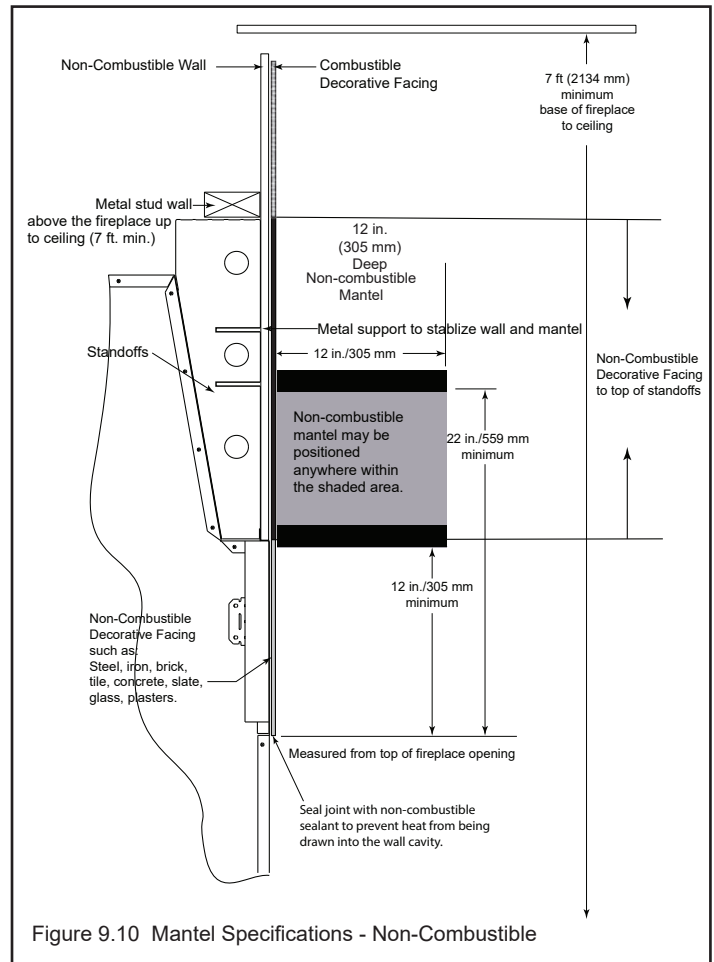
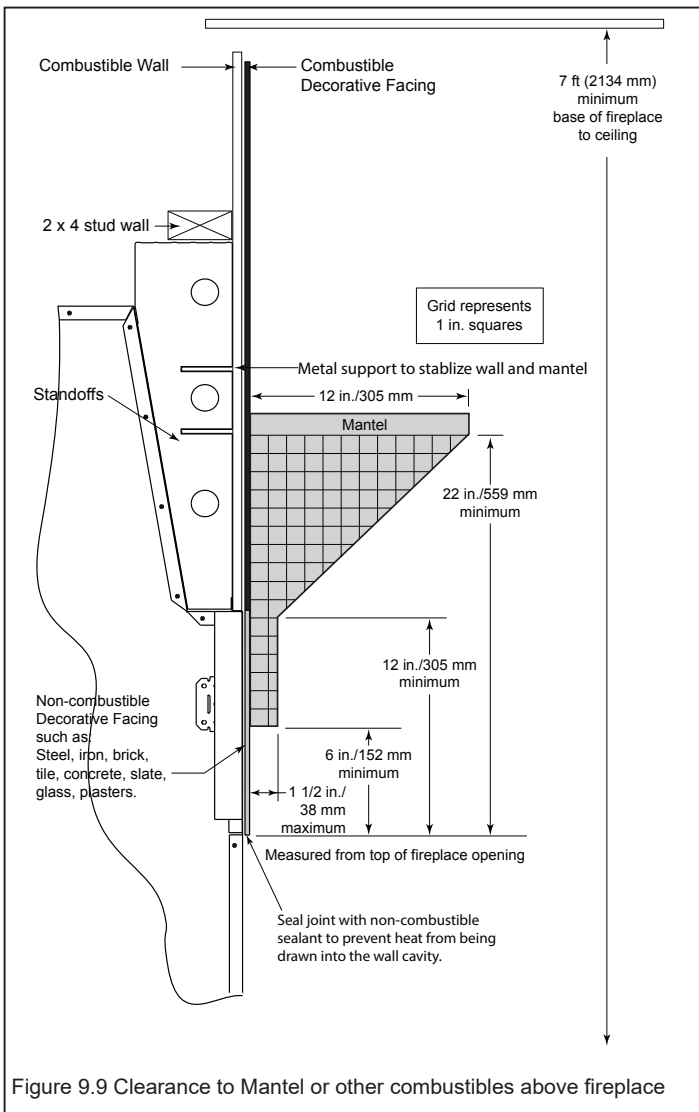
Figure 9.8 Decorative Facing

## G. Mantel




- Refer to the shaded areas of Figure 9.9 for the location and dimensions of a combustible mantel.
- A combustible mantel may be positioned no lower than 22 in. (508 mm) above the top of the fireplace opening.
- A combustible mantel may have a maximum depth of 12 in. (305 mm).
- Combustible trim and materials cannot be placed within 6 in. (152mm) of the fireplace opening (top or sides).
- Combustible materials projecting more than 1 1/2 in. (38 mm) shall not be placed within 12 in. (305 mm) from the top of the fireplace opening.
- Combustible trim must not cover the metal surfaces of the fireplace.
- Mantel clearance is in accordance with **Section 7-3.3.3 of ANSI/NFPA211.**

### **WARNING! Risk of Fire!**

- *You must seal around the finishing material to fireplace.*



# 10 Operating Instructions

 <b>WARNING</b>	
	<b>Fire Risk</b> <ul style="list-style-type: none"><li>• Do not operate fireplace before reading and understanding operating instructions.</li></ul>
	Failure to operate fireplace properly may cause fire.



## A. General Information



Fireplaces, as well as other woodburning appliances, have been used safely for many years. It has been our experience that most problems are caused by improper installation and operation of the fireplace. Make certain that installation and operation of the fireplace system is in accordance with these instructions.



It is extremely important that the fire be supervised whenever the fireplace is in use. It is also recommended that an annual inspection be performed on the fireplace system to determine if the flue system needs to be cleaned, or as in the case of any appliance, if minor repairs are required to maintain the system in top operating condition.

## B. Grate

The factory installed integral grate must be used to hold the logs from falling out of an open fireplace and to allow air to pass between the burning logs. It is important to keep the fire off the hearth and to allow the ashes to collect beneath the fire, thereby forming a layer of additional heat protection.

 <b>WARNING</b>	
	<b>Fire Risk</b> <ul style="list-style-type: none"><li>• Use only factory installed integral grate. May cause overfire.</li></ul>

 <b>WARNING</b>	
	<b>HOT SURFACES!</b> Glass and other surfaces are hot during operation and cool down. <b>Hot glass will cause burns.</b> <ul style="list-style-type: none"><li>• Do not touch glass until it is cooled</li><li>• NEVER allow children to touch glass</li><li>• Keep children away</li></ul>
<ul style="list-style-type: none"><li>• CAREFULLY SUPERVISE children in same room as appliance.</li><li>• Alert children and adults to hazards of high temperatures.</li></ul> <b>High temperatures may ignite clothing or other flammable materials.</b> <ul style="list-style-type: none"><li>• Keep clothing, furniture, draperies and other combustibles away.</li></ul>	

 <b>WARNING</b>	
	<b>Fire Risk</b> <ul style="list-style-type: none"><li>• For use with solid wood fuel or decorative gas appliance only.</li></ul>



### C. Clear Space Near the Fireplace

Combustible materials must not be stored on the hearth extension. Outdoor room furnishings such as chairs or other combustibles must be at least 4 ft (1.22 m) from the open front of the fireplace.

**THERE IS NOT A FLUE DAMPER, THEREFORE UNIT CANNOT BE INSTALLED INDOORS.**

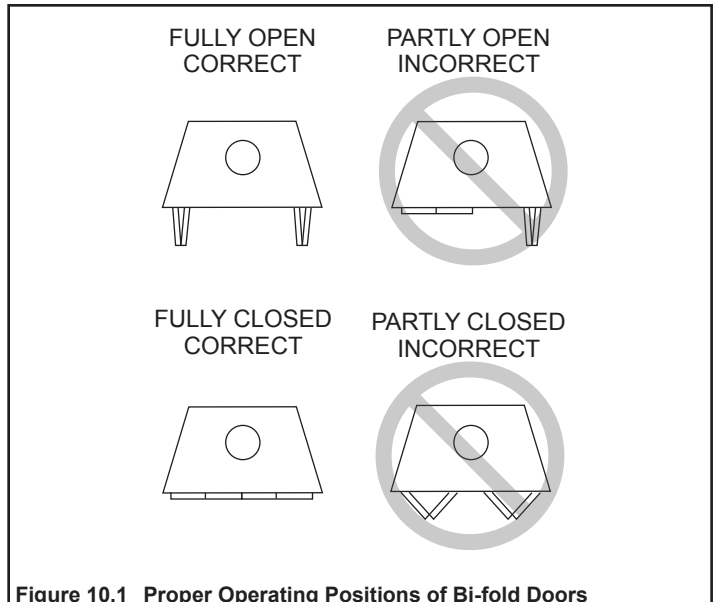
### D. Firescreen



A firescreen is always provided to control sparks. It must be closed whenever the fireplace is in use. Glass doors or firescreens must not be used to hold burning material inside the fireplace. Only those glass doors specifically tested and listed for use with the specific fireplace model should be used. Screens should be closed when the glass doors are closed.

 <b>WARNING</b>	
	<b>Fire Risk</b>
	<ul style="list-style-type: none"><li>• Close firescreen when burning fireplace.</li><li>• Do not use firescreen or glass doors to hold burning material in fireplace.</li></ul>
	Firescreen controls sparks. Glass may break or burning material may roll out.

### E. Glass Doors

Most efficient fireplace operation using glass doors is with the doors open. When the doors are open the screen must be closed. Only Hearth & Home Technologies glass doors may be used. See Figure 10.1 for proper glass door operation.



 <b>WARNING</b>	
	<b>Fire Risk</b>
	<b>Smoke Risk</b>
	<ul style="list-style-type: none"><li>• Doors must be fully opened or fully closed when operating fireplace.</li></ul> Partially opened doors may draw flame, smoke or heat from fireplace.



## F. Wood Fuel

### Firewood

Your fireplace performance depends on the quality of the firewood you use. All seasoned wood, regardless of species, contains about 8,000 BTU's per pound, and hardwoods have a greater density than soft woods. A piece of hardwood will contain about 60% more BTU's than an equal size piece of soft wood. Firewood is commonly sold by the cord (128 cu. ft.). A cord of seasoned oak (hardwood) would contain about 60% more potential energy than a cord of seasoned pine (soft wood).

Examples of soft wood trees are Douglas fir, pine, spruce, and cedar, poplar, aspen and alder. Soft woods require less time to dry, burn faster and are easier to ignite than hardwoods.

Examples of hardwood trees are oak, maple, apple, and birch. Hardwoods require more time to season, burn slower and are usually harder to ignite than soft woods.

The best wood fuel is a combination of soft wood and hardwood. Start the fire with soft wood; the fire will give off quick heat to bring the fireplace up to operating temperature, and then the hardwood can be added for slow, even heat and longer burn time.

### Moisture

Regardless of which species of wood you burn, the single most important factor that effects the way your fireplace operates is the amount of moisture in the wood. The majority of the problems fireplace owners experience are caused by trying to burn wet, unseasoned wood.

Freshly cut wood can be as much water as it is wood, having a moisture content of around 50%. Imagine a wooden bucket that weighs about eight pounds. Fill it with a gallon of water, put it in the fireplace and try to burn it. This sounds ridiculous but that is exactly what you are doing if you burn unseasoned wood.



## Seasoning



Seasoned firewood is nothing more than wood that is cut to size, split and air dried to a moisture content of around 20%. The time it takes to season wood varies from around nine months for soft woods to as long as eighteen months for hardwoods. The key to seasoning wood is to be sure it has been split, exposing the wet interior and increasing the surface area of each piece. A tree that was cut down a year ago and not split is likely to have almost as high a moisture content now as it did when it was cut.

The following guideline will ensure properly seasoned wood:

- Stack the wood to allow air to circulate freely around and through the woodpile.
- Elevate the woodpile off the ground to allow air circulation underneath.
- The smaller the pieces, the faster the drying process. Any piece over 6 in. (152 mm) in diameter should be split.
- Cover the top of the woodpile for protection from rain and snow. Avoid covering the sides and ends completely. Doing so may trap moisture from the ground and impede air circulation.

The problems with burning wet, unseasoned wood are twofold: First, you will receive less heat output from wet wood because it requires energy in the form of heat to evaporate the water trapped inside. This is wasted energy that should be used for heating your home. Secondly, this moisture evaporates in the form of steam which has a cooling effect in your fireplace and chimney system. When combined with tar and other organic vapors from burning wood it will form creosote which condenses in the relatively cool fireplace and chimney.

 <b>WARNING</b>	
	<b>Fire Risk</b> <ul style="list-style-type: none"><li>• Do NOT burn wet or green wood.</li><li>• Store wood in dry location.</li><li>• Stack wood so both ends are exposed to air.</li></ul> <p>Wet, unseasoned wood can cause accumulation of creosote.</p>

 <b>WARNING</b>	
	<b>Fire Risk</b> <p>Do NOT store wood:</p> <ul style="list-style-type: none"><li>• Closer than required clearances to combustibles to fireplace.</li><li>• Within space required for loading or ash removal.</li></ul>

## G. Starting a Fire

Place crumpled or twisted paper under the fireplace grate. Loosely arrange kindling or small pieces of wood to form a layer above the paper.

The fires must be built on the fireplace grate, without danger of the burning fuel falling out of the fireplace opening.

Light the paper and add small pieces of wood until a hot bed of embers has been established.

After establishing the fire bed, and the small firewood is burning briskly, add a minimum of three average sized pieces of split firewood, place the wood in such a manner to allow combustion air and flames between them.

**Note:** When first lighting your fireplace, it may be necessary to pre-warm the flue to establish a draft. This is done by holding a rolled up piece of burning newspaper under the flue for a few moments. This will help reduce smoke spillage during start-up.

**Note:** The first three or four fires should be of moderate size to allow the oils and binders to be burned from the fireplace and the refractory and paint to cure. You may notice an industrial odor the first few fires. This is considered normal.

### CAUTION

Odors and vapors released during initial operation.

- Curing of high temperature paint.
- Open windows for air circulation.

Odors may be irritating to sensitive individuals.



### ⚠ WARNING

#### Fire Risk

Keep combustible materials, gasoline and other flammable vapors and liquids clear of fireplace.

- Do NOT store flammable materials close to the fireplace.
- Do NOT use gasoline, lantern fuel, kerosene, charcoal lighter fluid or similar liquids to start or “freshen up” a fire in this fireplace.
- Keep all such liquids well away from the fireplace while it is in use.

Combustible materials may ignite.

# 11 Troubleshooting

## A. Diagnostics and Problem Solving

### I can't get a good fire going. What am I doing wrong?

Diagnostic Questions	Possible Causes of Condition	Solutions
Is there enough paper/starter?	<ul style="list-style-type: none"> <li>• Insufficient heat to ignite kindling</li> </ul>	Use more paper/starter.
Is there enough kindling? Is the kindling dry?	<ul style="list-style-type: none"> <li>• Insufficient heat to ignite fuel</li> </ul>	Use more dry kindling.
Is there enough or too much wood? Is it too large? Is it dry enough?	<ul style="list-style-type: none"> <li>• Insufficient heat to establish draft</li> <li>• Insufficient air passage</li> <li>• Insufficient surface area</li> <li>• Ignition temperature high due to moisture</li> </ul>	Use small split wood that is well seasoned (split, covered on top at least 6 months, preferably a year).
Are there adequate air spaces between fuel pieces?	<ul style="list-style-type: none"> <li>• Insufficient combustion air and exposed surface area</li> </ul>	Arrange kindling and wood for air movement.
Is the chimney pre-warmed?	<ul style="list-style-type: none"> <li>• Exposed, cold chimney down drafting</li> </ul>	Use lighted rolled newspaper at throat or flue opening to start upward movement.
Does the kindling, wood not ignite?	<ul style="list-style-type: none"> <li>• Condition, amount, arrangement of kindling and fuel</li> </ul>	Use more, drier, well-spaced kindling and fuel.
Does the kindling ignite, but the fuel doesn't?	<ul style="list-style-type: none"> <li>• Amount of kindling</li> <li>• Condition of fuel</li> </ul>	Use more kindling; use smaller, dry wood.
Does the fuel ignite, but not burn well?	<ul style="list-style-type: none"> <li>• Condition of fuel</li> <li>• Draft problem</li> </ul>	Use well-seasoned wood and sufficient amount; turn exhaust fans off; open window slightly. Perform Simplified House Pressure Test.

### I don't get enough/any heat from the fireplace. What can I do about it?

Diagnostic Questions	Possible Causes of Condition	Solutions
How much wood is used for fire?	<ul style="list-style-type: none"> <li>• Insufficient fuel</li> </ul>	Make larger fires.
How well seasoned is the wood?	<ul style="list-style-type: none"> <li>• Condition of fuel</li> </ul>	Burn seasoned wood: covered on top, split and stacked for 9 months to 2 years.
How much heat output do you expect?	<ul style="list-style-type: none"> <li>• Unrealistic expectations</li> </ul>	Explanation of decorative nature of fireplace; suggestion of approved fireplace insert.

### The fireplace burns the wood too fast. What can I do?

Diagnostic Questions	Possible Causes of Condition	Solutions
Do you have glass doors?	<ul style="list-style-type: none"> <li>• Need to slow air intake</li> </ul>	Add glass doors.
What is the condition of the wood?	<ul style="list-style-type: none"> <li>• Extremely dry wood</li> </ul>	Mix in less seasoned wood after fire established.

# 12 Maintenance and Servicing the Fireplace

## A. Disposal of Ashes

Ashes should be placed in a metal container with a tight-fitting lid. The closed container of ashes should be placed on a noncombustible floor or on the ground, well away from all combustible materials, pending final disposal. If the ashes are disposed of by burial in soil or otherwise locally dispersed, they should be retained in the closed container until all embers have thoroughly cooled.

**WARNING**

**Fire Risk**  
Disposal of ashes

- Ashes should be placed in metal container with tight fitting lid.
- Do not place metal container on combustible surface.
- Ashes should be retained in closed container until all embers have thoroughly cooled.

**WARNING**

**Fire Risk**  
Prevent creosote buildup

- Inspect chimney once every two months during heating season.
- Remove creosote to reduce risk of chimney fire.
- Ignited creosote is extremely HOT.

## B. Chimney Inspection/Cleaning

Inspect the chimney internally for obstructions and construction damage. Flue pipe joints and seams must be continuous and mechanically tight.

The chimney should be inspected once every two months during the heating season.

If creosote has accumulated, it should be removed to reduce the risk of a chimney fire.

Refer to Figure 12.1 to remove/reinstall termination caps.

## C. Firebox Refractory

Check firebox refractory for excessive cracks or gaps. If cracks exceed 1/4 in. (6 mm) in width the refractory should be replaced. See Section 12 for replacement information.

**WARNING**

**Fire Risk**

- Inspect fireplace refractory annually. Crumbling, deteriorated refractory can allow overheating of surrounding materials.

**Note:** As you use the fireplace, expansion and contraction will cause minor cracking of the refractory. This is normal, unavoidable, and will not affect the performance of the fireplace. If the cracks become large enough that the metal behind the refractory is exposed or large pieces fall out, the panels should be replaced.

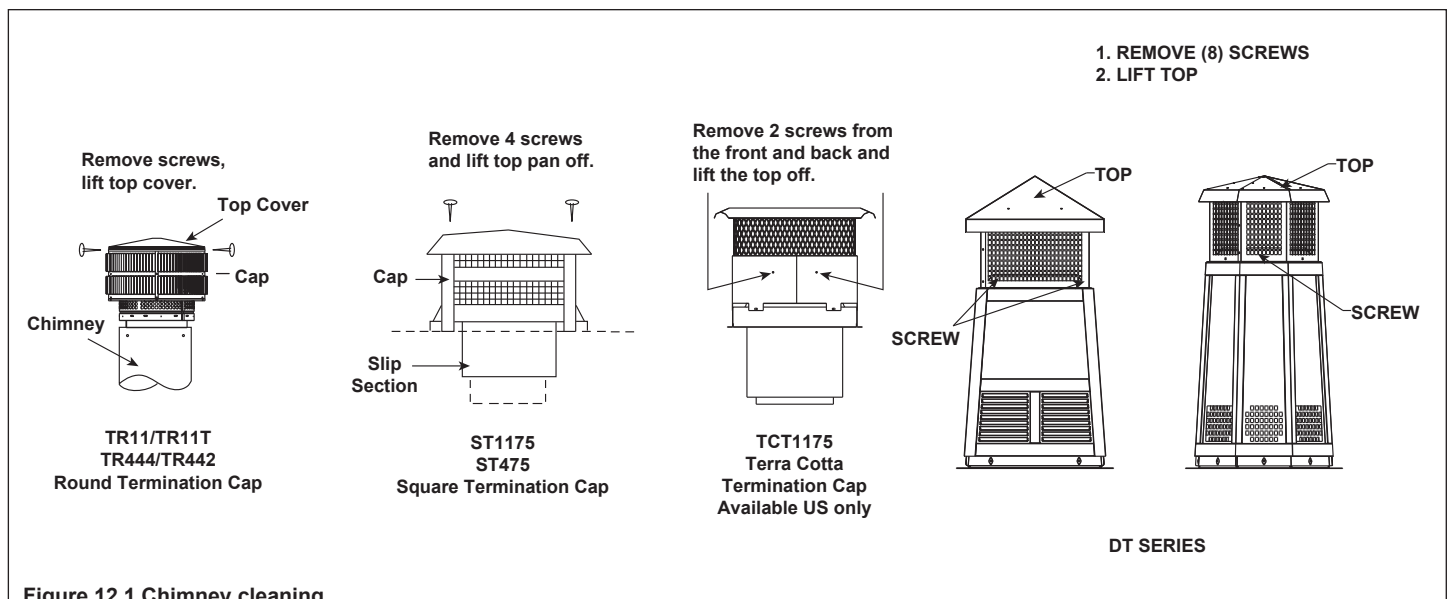



Figure 12.1 Chimney cleaning


**CAUTION**



Handle glass assembly with care.  
**When cleaning glass door:**

- Avoid striking, scratching or slamming glass.
- Do NOT use abrasive cleaners.
- Use a hard water deposit glass cleaner on white film.
- Do NOT clean glass when it is hot.

**WARNING**




**Fire Risk**


- Do not use chimney cleaners or flame colorants in your fireplace.

Will corrode chimney.

**WARNING**



**Asphyxiation Risk**



**Fire Risk**

Annual inspection by qualified technician recommended.

**Check:**

- Condition of doors, surrounds and fronts
- Condition of glass and glass assembly
- Obstructions of combustion and ventilation air
- Gas connections and fittings (if present)
- Obstructions of termination cap
- Refractory panels

**Clean:**

- Glass
- Air passageways, grilles

**D. Maintenance Task List**

Inspect	Maintenance Tasks
Screens	1 Assess condition of screen and replace as necessary. Screens are required.
	2 Verify maintenance of proper clearance to combustible household objects.
Glass Doors	1 Inspect glass panels for cracks. Replace if this condition is present.
	2 Confirm there is no damage to glass or glass frame. Replace as necessary.
	3 Clean glass using a non-abrasive cleaner such as Brasso®.
Circulation Compartment	1 Remove any foreign objects.
	2 Verify unobstructed air circulation.
Firebox	1 Inspect condition of refractory. Replace if crumbly, deteriorated, or if cracks exceed 1/4 in. (6 mm).
Chimney	1 Inspect for blockage or obstruction such as bird nests, leaves, etc.
	2 Confirm that termination cap remains clear and unobstructed by plants, etc.
	3 Verify that termination cap clearance to subsequent construction (building additions) has been maintained.
	4 Inspect for corrosion or separation.
	5 Verify weather stripping, sealing and flashing remain intact.
	6 Inspect for creosote and remove as needed. (See Sections 10 and 11)
Grate	1 If grate burns out, it should be replaced only with the grate specified on the rating plate and in the replacement parts list for this fireplace.

**E. Chimney Fire**

In the event of a chimney fire:

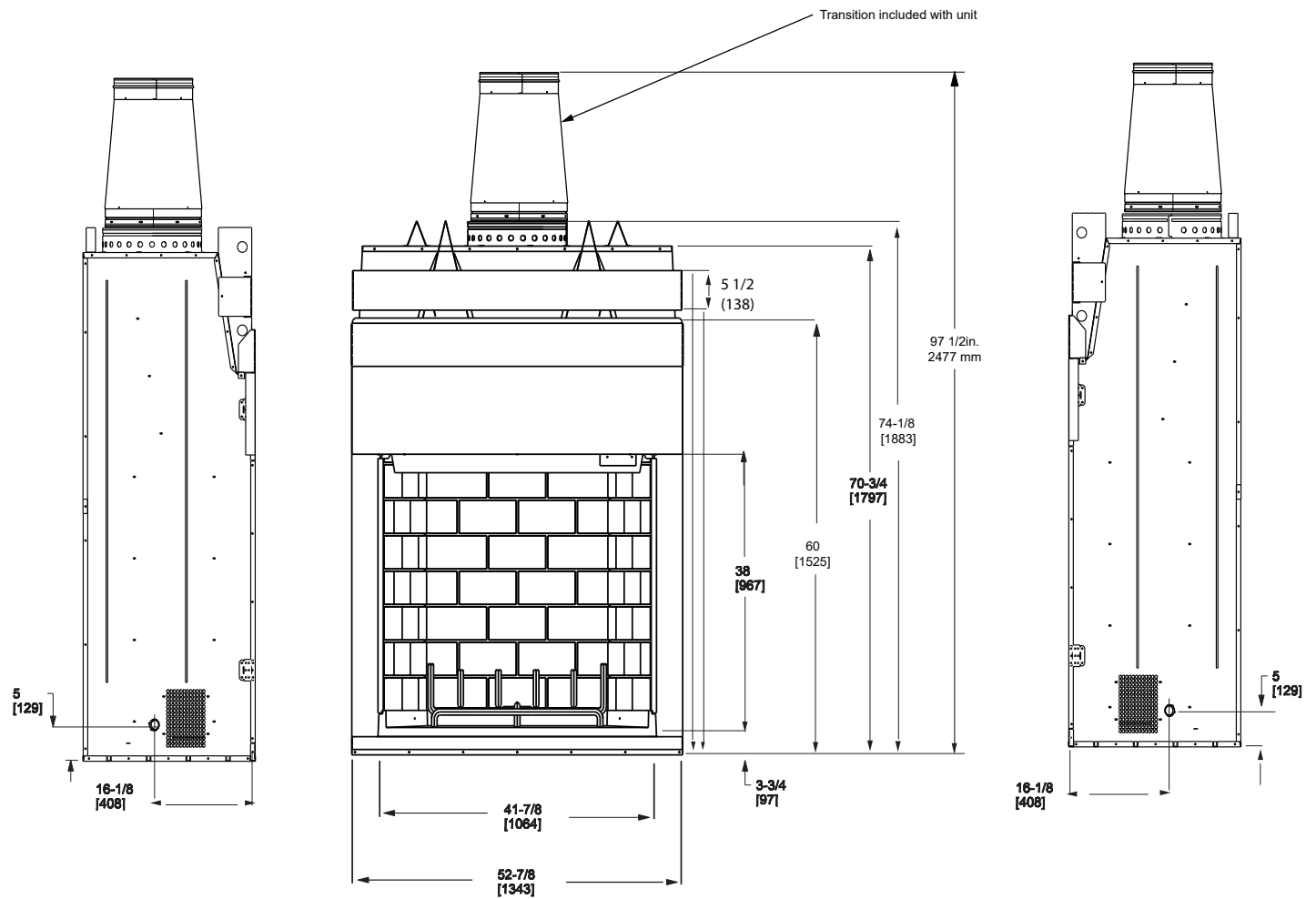
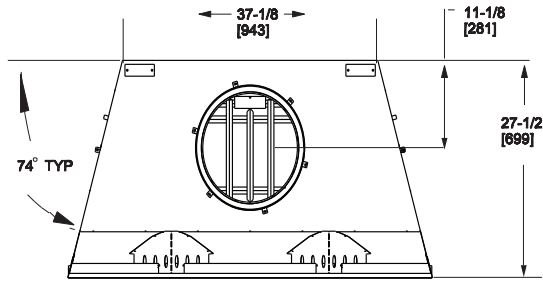
- Have the chimney and adjacent structure inspected by qualified professionals. Hearth & Home Technologies recommends that NFI or CSIA certified professionals, or technicians under the direction of certified professionals, conduct a minimum of an **NFPA 211 Level 2** inspection of the chimney.

- Replace components of the chimney and fireplace as specified by the professionals.
- Ensure all joints are properly engaged and the chimney is properly secured.

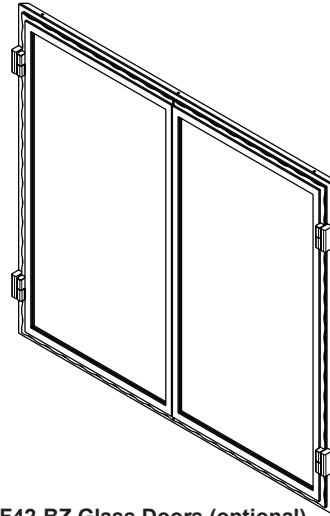
A chimney fire can permanently damage your chimney system. Failure to replace damaged components and make proper repairs creates risk of fire.

# 13 Reference Materials

## A. Fireplace Dimensions



## B. Optional Components



ODGF42-BZ Glass Doors (optional)

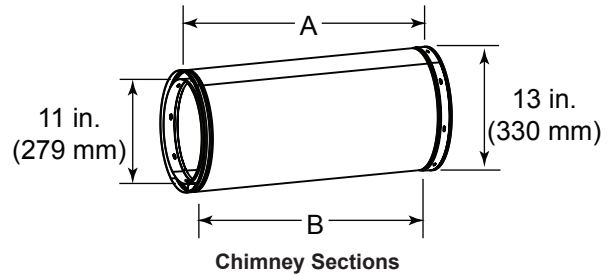
**See your Hearth & Home dealer for a complete list of optional components.**



## C. Chimney Components

The following pictures show only those chimney components which may be safely used with this fireplace.

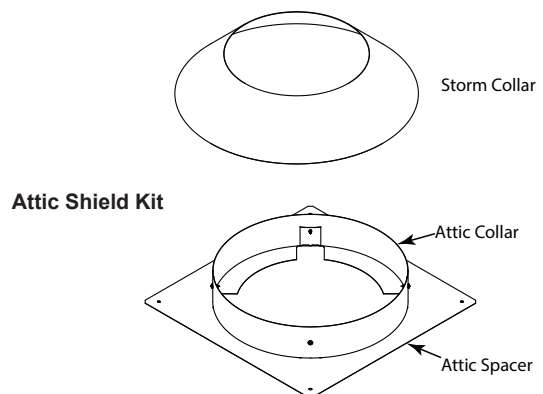
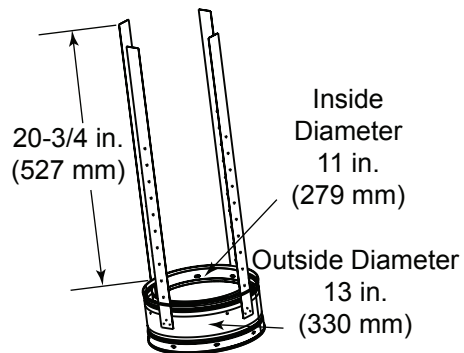
Catalog #		Description
US	CAN	
CAK8A	CAK8A	Chimney Air Kit
n/a	SLA10	Adapter 11 in. (457mm) long
ID4	ID4	Insulated Duct/Outside Air
UD4	UD4	Uninsulated Duct/Outside Air
SL1106	SL406	Chimney Section - 6 in. (152 mm) long
SL1112	SL412	Chimney Section - 12 in. (305 mm) long
SL1118	SL418	Chimney Section - 18 in. (457 mm) long
SL1136	SL436	Chimney Section - 36 in. (914 mm) long
SL1148	SL448	Chimney Section - 48 in. (1219 mm) long
SL11	SL4	Chimney Stabilizer
	CAS10	Attic Shield Kit
SL1130	SL430	Chimney Offset/Return - 30 deg
FS538	FS538	Ceiling Firestop - Straight
FS540	FS540	Ceiling Firestop - 30 deg
AS10	AS10	Straight Attic Insulation Shield, 24 in. (610 mm)
JB577	JB577	Chimney Joint Band
CB576	CB576	Chimney Bracket
RF570	RF570	Roof Flashing - Flat to 6/12 Pitch
RF571	RF571	Roof Flashing - 6/12 to 12/12 Pitch
TR11	TR444	Round Termination Cap
TR11T	TR442	Round Telescoping Termination Cap
TCT1175		Terra Cotta Termination Cap
ST1175	ST475	Square Termination Cap
DTO134	DTO134	Short Octagon Decorative Cap
DTO146	DTO146	Tall Octagon Decorative Cap
DTS134	DTS134	Short Square Decorative Cap
DTS146	DTS146	Tall Square Decorative Cap
CT56	CT56	Chase Top
LDS33	LDS33	Decorative Shroud - 3 ft x 3 ft (.91 m x .91 m)
LDS46	LDS46	Decorative Shroud - 4 ft x 6 ft (1.22 m x 1.83 m)
LDS-BV	LDS-BV	Decorative Shroud - 26 in. x 26 in. (660 mm x 660 mm)
		Field Constructed Shrouds (See "Woodburning Termination Cap")
CT-11A	n/a	Adapter-May be used with the following Copper Caps
	n/a	CT-Series
	n/a	DT-Series



Catalog #	A		B	
	in	mm	in	mm
SL1106	6	152	4-3/4	121
SL1112	12	305	10-3/4	273
SL1118	18	457	16-3/4	425
SL1136	36	914	34-3/4	883
SL1148	48	1219	46-3/4	1187

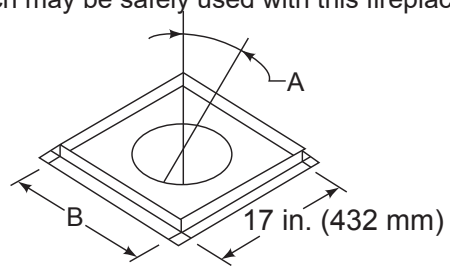
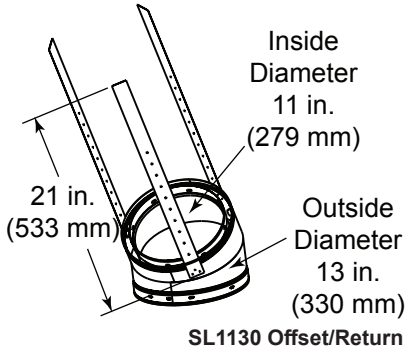
**A = Actual Length**

**B = Effective Length (length of chimney part after it has been snapped to another)**

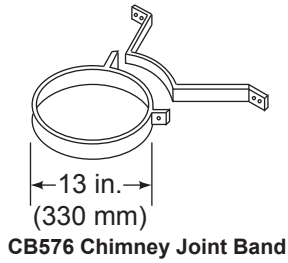
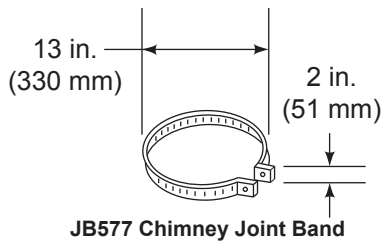


### C. Chimney Components Continued

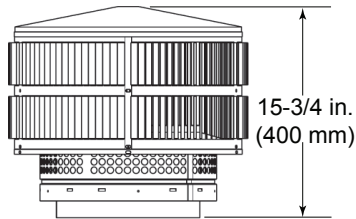
The following pictures show only those chimney components which may be safely used with this fireplace.



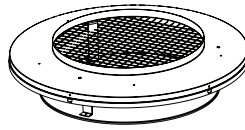
Catalog #	A	B	
FS538	0-deg.	17 in.	432 mm
FS540	30-deg.	26 in.	660 mm



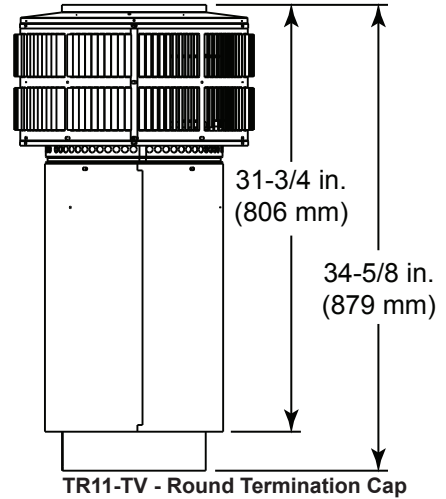
## D. Termination caps



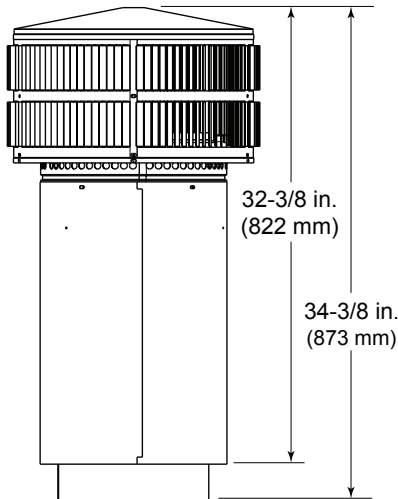
TR11 - Round Termination Cap



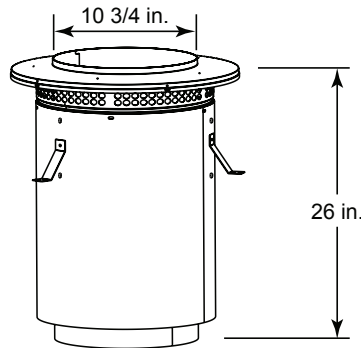
TR-TVK



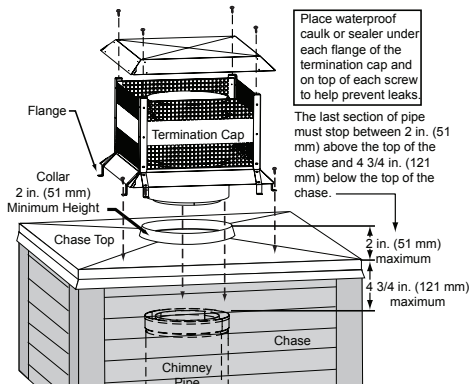
TR11-TV - Round Termination Cap



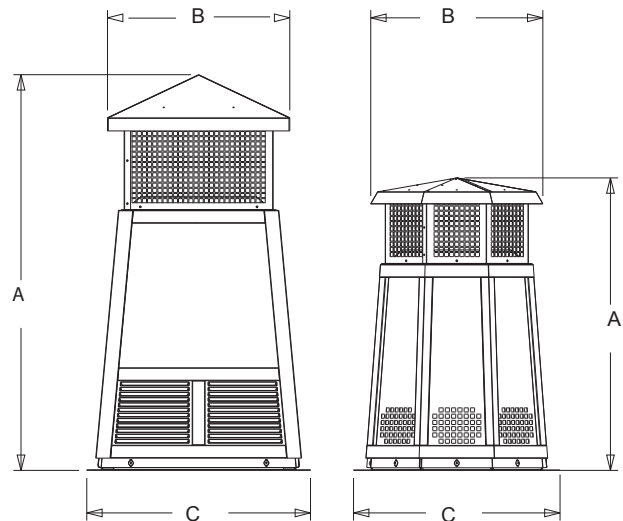
TR11T - Round Telescoping Termination Cap



CT11-A Adapter

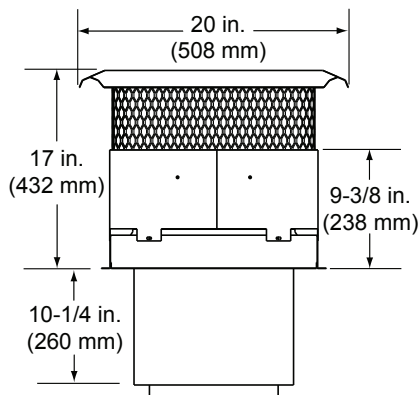


ST1175 - Square Termination Cap



DTS134/DTS146

DTO134/DTO146 Decorative Caps



TCT1175 - Terra Cotta Cap

	A	B	C
DTO134			
in	34	20	24
mm	864	508	610
DTO146			
in	46	22.7	26
mm	1168	576	660
DTS134			
in	34	21.18	24
mm	864	538	610
DTS146			
in	46	21.18	26
mm	1168	538	660

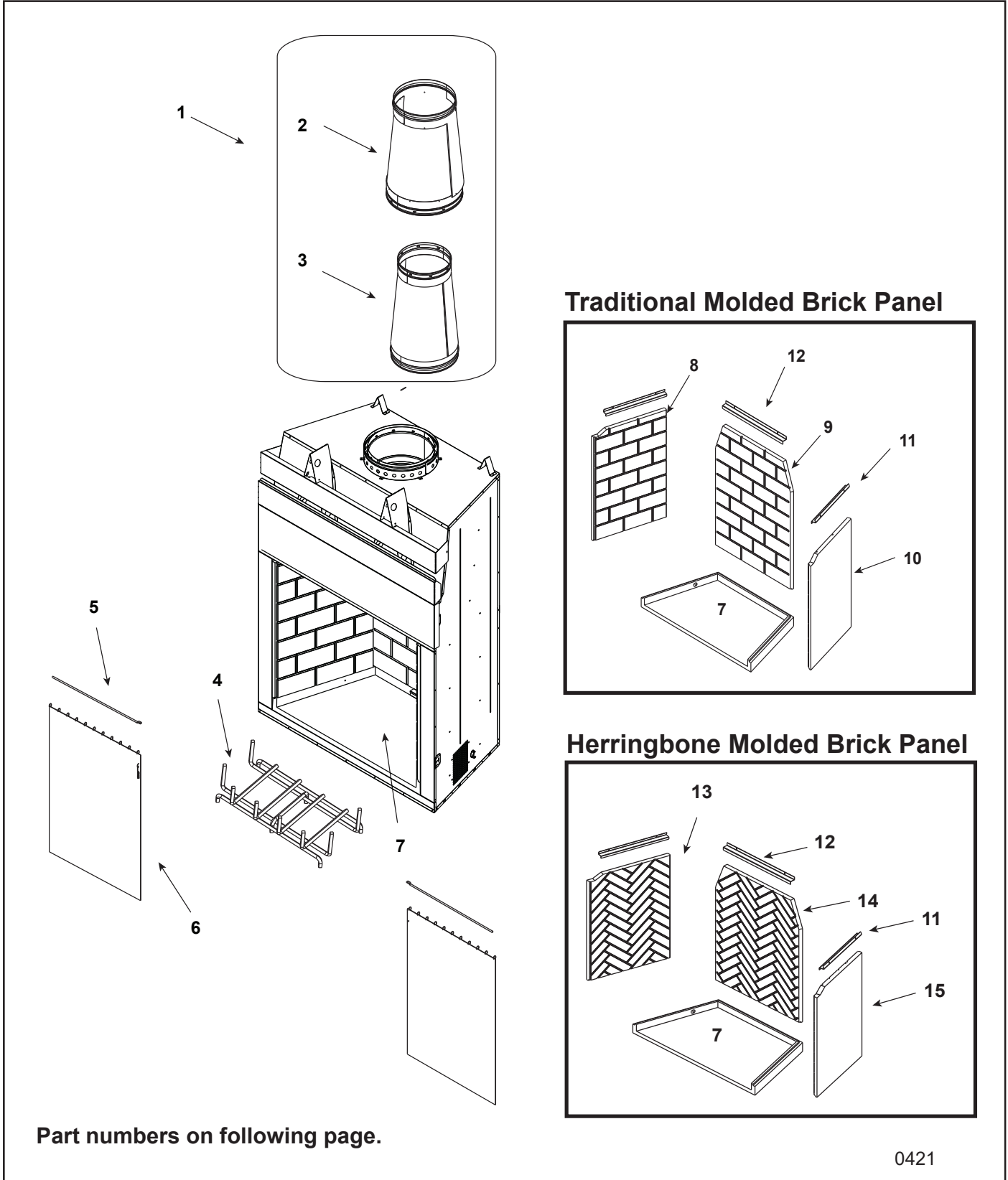


**Service Parts**

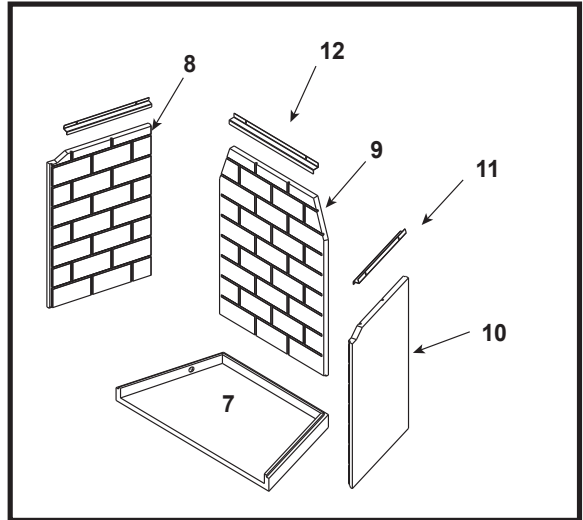
42 in. Woodburning Fireplace

**ODCASTLEWD-42**

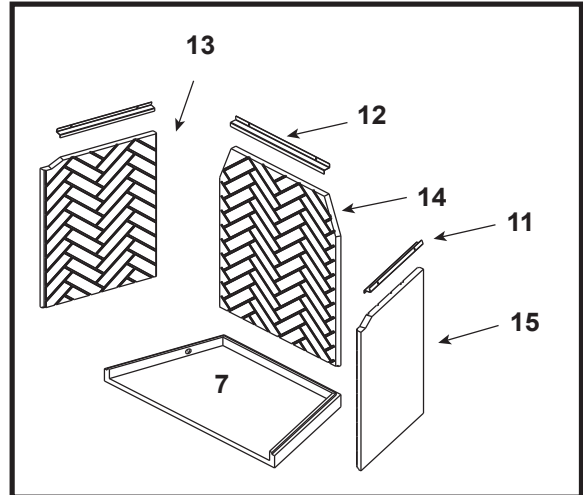
Beginning Manufacturing Date: July 2010  
Ending Manufacturing Date: Active



**Traditional Molded Brick Panel**



**Herringbone Molded Brick Panel**



Part numbers on following page.

0421



by hearth & home technologies®

**Service Parts**

**ODCASTLEWD-42**

Beginning Manufacturing Date: July 2010

Ending Manufacturing Date: Active

**IMPORTANT: THIS IS DATED INFORMATION.** Parts must be ordered from a dealer or distributor. **Hearth and Home Technologies does not sell directly to consumers.** Provide model number and serial number when requesting service parts from your dealer or distributor.



**Stocked  
at Depot**

ITEM	DESCRIPTION	COMMENTS	PART NUMBER	
1	Transition Assembly		4059-044	
2	Outer Transition Assembly		24377	
3	Inner Transition Collar		4059-148	
	Nailing Flange		31190	
	Starter Collar		4059-137	
4	Grate Assembly		GR29	
	Grate Retainer	Top	4070-123	
		Bottom	4070-115	
5	Screen Rod	Qty 2 req	4070-301	Y
	Screen Rod Clips	Qty 2 req	SRV4059-111	
6	Firescreen Assembly	Qty 2 req	4070-015	Y
	Smoke shield		SRV4070-251	
7	Hearth Molded Brick Panel		SRV4070-130	
	Hearth Shims	Pkg of 10	4070-124/10	Y
<b>Traditional Molded Brick Panel</b>				
8	Left Panel		SRV4070-131	
9	Rear Panel		SRV4070-133	
10	Right Panel		SRV4070-132	
11	Side Refractory Retainer	Qty 2 req	4070-108	
12	Rear Refractory Retainer		4070-106	
<b>Herringbone Molded Brick Panel</b>				
11	Side Refractory Retainer	Qty 2 req	4070-108	
12	Rear Refractory Retainer		4070-106	
13	Left Panel		SRV4070-134	
14	Rear Panel		SRV4070-136	
15	Right Panel		SRV4070-135	
	Mortor	10 lb. Bucket	MMMORTR	
	Outside Air Hood	Qty 2 req	4070-019	
	Refractory Fastener Pack	8 #8 Screws	4025-026	

## F. Warranty

### Outdoor Lifestyles by Hearth & Home Technologies™ Limited Lifetime Warranty

Hearth & Home Technologies (“HHT”) extends the following warranty for all Outdoor Lifestyles by HHT™ brand products (“Products”) that are purchased from an HHT authorized dealer.

#### **WARRANTY COVERAGE:**

HHT warrants to the original owner of the Product at the site of installation, and to any transferee taking ownership of the Product at the site of installation within one year following the date of original purchase, that the Product will be free from defects in materials and workmanship at the time of manufacture. After installation, if covered components manufactured by HHT are found to be defective in materials or workmanship during the applicable warranty period, HHT will, at its option, repair or replace the covered components. This warranty is subject to conditions, exclusions and limitations as described below.

#### **WARRANTY PERIOD:**

The warranty period begins on the earlier of: (i) the date of invoice for the Product; (ii) in the case of new home construction, the date of first occupancy of the residence or six months after the date of sale of the Product by an HHT authorized dealer, whichever occurs first; or (iii) the date 24 months following the date of Product shipment from HHT, regardless of the invoice or occupancy date.

#### **WARRANTY CONDITIONS:**

- The Limited Lifetime Warranty covers Products that are purchased through a HHT authorized dealer or distributor. A list of HHT authorized dealers is available on the HHT branded websites.
- This warranty is only valid while the Product remains at the site of original installation.
- Contact your installing dealer for warranty service. If the installing dealer is unable to provide necessary parts, contact the nearest HHT authorized dealer. Additional service fees may apply if you are seeking warranty service from a dealer other than the dealer from whom you originally purchased the Product.
- Check with your dealer in advance for any costs to you when arranging a warranty call. Travel and shipping charges for parts are not covered by this warranty.
- The Product body, metal firebox and heat exchanger carry the Limited Lifetime Warranty from the date of installation.
- The following components do not carry the Limited Lifetime Warranty but are warranted as follows:
  - One Year from Date of Installation:
    - Gas and Electrical Components or Gaskets
    - Nickel Plated Materials
      - Excludes tarnishing
    - Glass Breakage, Logs/Refractory/Glass Panels due to thermal breakage
      - Surface, hairline cracks, scratches and slight color changes are not covered
    - Venting, optional accessories, optional glass doors
    - Labor Associated with Warranty Service Work

#### **WARRANTY EXCLUSIONS:**

This warranty does not cover the following:

- Changes in surface finishes as a result of normal use. As a heating appliance, some changes in color of interior and exterior surface finishes may occur; this is not a flaw and not covered under warranty.
- Damage to printed, plated, or enameled surfaces caused by fingerprints, accidents, misuse, scratches, melted items, or other external sources and residues left on surfaces from the use of abrasive cleaners or polishes.
- Repair or replacement of parts that are subject to normal wear and tear during the warranty period. These parts include: paint, firebricks, grates, flame guides and the discoloration of glass.
- Minor expansion, contraction, or movement of certain parts causing noise. These conditions are normal and complaints related to this noise are not covered by this warranty.

## Warranty (continued)

- Damages resulting from: (1) failure to install, operate, or maintain the Product in accordance with the installation instructions, operating instructions, and listing agent identification label furnished with the Product; (2) failure to install the Product in accordance with local building codes; (3) shipping or improper handling; (4) improper operation, abuse, misuse, continued operation with damaged, corroded or failed components, accident, or incorrectly performed repairs; (5) inadequate ventilation, negative pressure or environmental conditions, including, without limitation: hail, snow, ice, fallen branches, flooding, water damage and fading of color; (6) use of fuels other than those specified in the operating instructions; (7) installation or use of components not supplied with the Product or any other components not expressly authorized and approved by HHT; (8) modification of the Product not expressly authorized and approved by HHT in writing; and/or (9) interruptions or fluctuations of electrical power supply to the Product.
- Non-HHT venting components, hearth components or other accessories used in conjunction with the Product.
- Any part of a pre-existing fireplace system in which an insert or a decorative gas appliance is installed.
- The Product's capability to heat the desired space. Information is provided to assist the consumer and the dealer in selecting the proper appliance for the application. Consideration must be given to the Product's location and configuration and environmental conditions.

### **This warranty is void if:**

- The Product has been over-fired or operated in atmospheres contaminated by chlorine, fluorine, or other damaging chemicals. Over-firing can be identified by, but not limited to, warped plates or tubes, rust colored cast iron, bubbling, cracking and discoloration of steel or enamel finishes and cracking or spalling of refractory or cementitious materials.
- The Product is subjected to prolonged periods of dampness, condensation, ice or snow.
- There is any damage to the Product or other components due to water or weather damage which is the result of, but not limited to, improper chimney or venting installation.

### **LIMITATIONS OF LIABILITY:**

Repair or replacement in accordance with the provisions of this warranty will be the owner's exclusive remedy for and will constitute HHT's sole obligation under this warranty, under any other warranty (express or implied), or in contract, tort or otherwise; provided, however, that if HHT is unable to provide repair or replacement in an expedient and cost effective manner, HHT may discharge all such obligations by refunding the purchase price of the Product. No employee, agent, dealer, or other person is authorized to give any warranty on behalf of HHT. TO THE EXTENT ALLOWED BY LAW, HHT MAKES NO OTHER WARRANTY, EXPRESS OR IMPLIED, INCLUDING ANY WARRANTY OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE. HHT WILL NOT BE LIABLE FOR ANY CONSEQUENTIAL OR INCIDENTAL DAMAGES ARISING OUT OF DEFECTS IN OR USE OF THE PRODUCTS. Some states do not allow exclusions or limitation of incidental or consequential damages, so these limitations may not apply to you. This warranty gives you specific rights; you also may have other rights, which vary from state to state. The duration of any implied warranty is limited to the duration of the warranty period specified herein.

**G. Contact Information**



**Please contact your Outdoor Lifestyles dealer with any questions or concerns.**

For the number of your nearest Outdoor Lifestyles dealer, please visit [www.hearthnhome.com](http://www.hearthnhome.com).

**– NOTES –**

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**CAUTION**

**DO NOT DISCARD THIS MANUAL**



- Important operating and maintenance instructions included.
- Read, understand and follow these instructions for safe installation and operation.
- Leave this manual with party responsible for use and operation.

