



## HOMEOWNERS GUIDE FOR YOUR WOOD BURNING FIREPLACE

Read this manual carefully before using your wood burning fireplace. Understand and observe all guidelines included in this manual for safe operation of your wood burning fireplace inside your home.

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**KEEP THIS MANUAL. IT CONTAINS IMPORTANT  
HOMEOWNER INFORMATION ABOUT YOUR WOOD  
BURNING FIREPLACE.**

## IMPORTANT SAFETY PRECAUTIONS

The DESA Heating, LLC limited warranty will be voided by, and DESA Heating, LLC will disclaim any responsibility for the following:

1. Improper installation of your DESA Heating, LLC fireplace and DESA Heating, LLC component parts. Consult your installation instructions.
2. Any alteration of DESA Heating, LLC fireplace and/or components.
3. Use of an insert in a DESA Heating, LLC fireplace. DESA Heating, LLC does not recommend or authorize the use of any insert in our fireplaces and will assume no responsibility for any damages caused by an insert.
1. Never start a fire with a liquid fire starter such as gasoline, kerosene, or liquid barbecue starters.
2. Never burn trash or trees (such as Christmas trees) as they can create extremely hot fires and cause sparks that may be hazardous.
3. Never use wood products with synthetic binders. They create creosote in flue system and termination which can be hazardous.
4. Keep children and pets away from hot surfaces to avoid burns. Carefully supervise children when they are in the room with the fireplace. Exposed metal parts and glass doors become very hot.

The safety precautions and operating instructions in this homeowner's guide cannot cover all possible situations that may arise during use. Caution and care must always be used when operating fireplace.

## UNDERSTANDING YOUR FIREPLACE

This firebox has been tested to U.L. 127 test standards and is well insulated for clearances to combustible construction materials used in building a home. Proper clearances are outlined on a label on each component for use by installers and building inspectors to insure compliance.

**Firebox:** The firebox is the portion of your fireplace where the fire is built. It is made of heavy gauge steel lined with brick patterned refractory material (firebrick) on back, sides and bottom (hearth). This is surrounded by another metal enclosure on top, back and bottom. Air space between firebox and outer enclosure provides a circulating feature that has been engineered for a safe and efficient design.

**Chimney System:** The chimney is also made of metal extending from top of fireplace through the roof and capped with a screened termination. Inner liner (flue) of chimney is made of stainless steel and provides for exhaust of gases (carbon monoxide) from the fire. Outer liner is made of galvanized steel and provides passage for cooling air to keep chimney safe at labeled clearance to combustible building materials.

**Damper:** The damper is the metal disk found at base of chimney (flue) and has 2 positions, open and closed. Flue gas damper is located

inside firebox, similar to a conventional masonry fireplace. See fireplace owner's manual for operation.

**Outside Air Kit Operation:** The outside air damper is located on inside of fireplace. See fireplace owner's manual for operation.

*Note: Automatic barometric style dampers are installed on some models.*

**Fan/Blower:** The fan system is designed to enhance the convection principal of your fireplace and is not designed to be a blowing system. The switch located on lower front face of fireplace operates fan.

**Fireplace Grate:** This unit has been equipped with a grate designed to keep operation of fireplace efficient and safe. Do not alter grate. Size and position of grate were engineered to give ideal combustion characteristics for the fire. By keeping logs within grate and not on hearth, you will prevent chance of having a log "spill" or roll out of fireplace. **DO NOT OVERLOAD FIREPLACE.** Piling excessive wood on grate will not increase efficiency and could possibly cause smoke to enter your room. When replacing grate, only replace with a DESA Heating, LLC replacement grate for your fireplace model.

# UNDERSTANDING YOUR FIREPLACE

## Continued

**Fireplace Screen:** The fireplace screen prevents sparks and embers from escaping fireplace. Screen should always be closed when a fire is burning.



**CAUTION: Screen handles will become hot.**

**Fireplace Glass Doors (If Installed):** Glass doors must be fully opened or fully closed during operation of your fireplace. Grate and/or wood should not touch doors.

### AIR CIRCULATION

During operation of fireplace, cool air enters the firebox through lower grills. Heat rises and is expelled into the room through top grill. This is called convection heat.

During periods of extremely cold weather, when fireplace is not being used, the exact opposite may happen. Warm room air will enter upper grill due to extreme cold air near outside of metal firebox. Air cools, drops and re-enters room through lower grill.

This may be an indication the cold climate installation procedure was not used.



**WARNING: Never block a vent or grill of the fireplace. This is important to the cooling of the fireplace and assures a safe and proper operation as designed.**

## OPERATING YOUR FIREPLACE

1. Keep grate in brackets provided.
2. Open flue damper. During operation damper must be in FULLY OPENED POSITION. In cold weather, to assure proper draw, preheat flue by burning a crumpled newspaper in damper area after damper has been fully opened.
3. Open combustion air damper (automatic on some models).
4. Build a fire using the following method:
  - Use seasoned dry wood (should be seasoned at least 1 year)
  - Crisscross small pieces of wood and place crumpled newspaper under it
  - Place 3 logs on grate. DO NOT OVERLOAD FIREPLACE. Piling excessive wood on the grate will not increase efficiency and could cause smoke spillage.
  - Light newspaper
5. Fireplace glass doors, if installed, must be in fully opened or fully closed position during operation of fireplace.



**CAUTION: Close screen before closing glass doors.**



**WARNING: Fireplaces equipped with glass doors should be operated only with doors fully opened or doors fully closed. Doors, if left partly open, may draw gas and flame out of the fireplace opening creating risks of both fire and smoke. Doors should warm gradually to prevent breakage.**

6. After fire has burned out, do not close damper until embers and ashes have had a chance to completely cool and you are certain there are no warm embers.
7. Dispose of ashes by using a metal container with a tight lid. Do not remove ashes until you are certain they are burned out and have cooled completely.

**This fireplace is not intended to be used as a substitute for a furnace to heat an entire home. Use for supplementary heat only.**

## WOOD SELECTION

Selecting the right wood depends on your preference for comfort, aroma and visual image. If you want a constant heat output, a short flame with a glowing coals type of fire, select a hardwood. If you want a short hot fire for damp and chilly mornings, select a softer wood. The following chart is a guide to aid in wood selection. Woods at the top of chart are harder woods and those at bottom of chart are softer. Aromatic woods are best from nut and fruit trees such as hickory, apple, cherry, beech, etc. Heat value from harder woods is better than from softer. It is important to burn wood that has been seasoned. Seasoning reduces moisture content for a good steady fire and less creosote output. The recommended length of time for proper seasoning is about 1 year.

Wood Type	Density
Dogwood	0.70 - 0.79
Hickory	0.70 - 0.74
Oak	0.60 - 0.73
Beech	0.64 - 0.66
Hard Maple	0.58 - 0.65
Birch	0.55 - 0.64
Mulberry	0.59 - 0.63
Apple	0.58 - 0.62
Ash	0.57 - 0.61
Southern Pine	0.51 - 0.60
Elm	0.50 - 0.59
Walnut	0.52 - 0.55
Soft Maple	0.47 - 0.54
Cherry	0.50 - 0.52
Sycamore	0.49 - 0.52
Douglas Fir	0.45 - 0.51
Chestnut	0.42 - 0.44
Spruce	0.41 - 0.44
Hemlock	0.40 - 0.42
Redwood	0.33 - 0.40
Aspen	0.37 - 0.39
White Pine	0.35 - 0.37

## CLEANING AND MAINTENANCE

### CREOSOTE

When wood burns slowly, it produces tar and other organic vapors which, when combined with expelled moisture, forms creosote. Creosote vapors condense in relatively cool chimney flue of a slow burning fire.

As a result, creosote residue accumulates on flue lining. When ignited, this creosote makes an extremely hot fire. Chimney should be inspected at least twice a year during heating season to determine if creosote build-up has occurred. If creosote has accumulated, it should be removed to reduce risk of chimney fire. **It is recommended that you use a professional chimney sweep.**

### Removing Creosote

In order to remove creosote from flue, termination cap must be removed.

1. Close damper before cleaning flue as fine soot can become airborne in the home.
2. If termination is round top (3 feet of exposed pipe with round cap) remove 3 sheet metal screws that secure termination to last section of pipe and lift off cap.

3. For square chase termination with pyramid cap, remove screws that secure top at four corners.
4. Place termination top aside.
5. After cleaning is completed open damper and collect debris in trash container. A professional chimney sweep has all tools and experience necessary to complete this job.
6. Be certain to clean all loose debris from termination before replacing.
7. Before installing a vented or vent-free gas log set in a solid fuel burning fireplace, chimney flue and firebox must be cleaned of soot, creosote, ashes and loose paint by a qualified chimney cleaner. Creosote will ignite if highly heated. Inspect chimney flue for damage. If damaged, operate vent-free gas log heater with flue damper closed.
8. Replace termination cap with screws.

# CLEANING AND MAINTENANCE

## Continued

### REFRACTORY

The brick refractory on the interior of your fireplace (sides, back and bottom) is manufactured with a high quality cement mixture and reinforced with a wire mesh.

In a new fireplace or one with new refractory, allow refractory to cure for 24 hours. When building a fire, build a small one for the first 3 or 4 fires. The refractory is subjected to expansion and contraction from the heating and cooling of firebox during operation. It is acceptable to operate the fireplace with cracks of 1/64" wide.

If a crack should develop that is larger than the hairline crack described, take the following corrective measures:

1. Patch crack with a refractory patching cement available at fireplace shops or hardware stores. The refractory must still be in one piece to patch.

2. Replace refractory panel (see fireplace owner's manual). DO NOT continue to use your fireplace if your refractory has a crack that exceeds 1/64".

Refractories are available through your service dealer.

### GRATE

If grate deteriorates or is distorted, replace with DESA Heating, LLC grate designed for your fireplace (see fireplace owner's manual).

### GLASS DOORS

Clean glass with any commercial glass cleaner or soap and water. Do not use any abrasive material to clean glass. Do not clean glass with cool water if glass is still hot from use. Let doors dry completely before building the next fire.

## TROUBLESHOOTING

### SMOKE

This fireplace has been designed to operate without smoke spillage into the room when installed and operated properly. In the event a smoking problem does occur, check for one of the following conditions:

1. Outside environmental conditions adversely affecting draft.
2. Lack of ventilation due to a tightly insulated house could prevent the fireplace from drawing properly. If this happens, open a window a small amount while operating fireplace.
3. Other appliances competing for available air in a tightly sealed home. These could be heating appliances, kitchen exhaust fans and bathroom exhaust fans.
4. Relationship of your house to hills, trees and nearby taller buildings can affect wind conditions which can have a direct effect on your fireplace operation.
5. Chimney termination not installed to proper height.
6. Blockage of flue or termination cap.
7. Flue and termination caked with creosote buildup.
8. Grate too close to front of fireplace, not positioned behind smoke shelf. Position grate in designated area on brackets.

9. Damper not in fully opened position.
10. Outside air damper not in opened position.
11. Operating fireplace with partially opened doors.
12. Additional chimney pipe(s) may be necessary under certain conditions. (Additional chimney pipe available as accessory item.)

**IMPORTANT:** For see-through and peninsula models, air currents in the room can cause some smoke spillage.

### COLD AIR DRAFTS

In cold areas you must take special precautions and follow COLD CLIMATE installation instructions in your owner's manual.

If cold air drafts are present when your fireplace is not in operation check the following:

1. Air coming out of fireplace opening. Close damper.
2. Air near sides of firebox interior. Close outside combustion air damper.
3. Air coming in around sides of fireplace, between fireplace and wall. Make sure fireplace frame has been caulked to enclosure of frame.

## TROUBLESHOOTING

### Continued

4. Air from bottom grill (circulating units only). Make sure fireplace enclosure and base have been insulated according to cold climate installation instructions in owner's manual.

*Note: After all measures to avoid cold air drafts have been taken, there may still be a slight cold air draft coming through the louver and other areas. This may be due to circumstances beyond the manufacturer's control, such as airflow around the structure and tightness of the home (creating negative pressure), etc.*

### ASH DISPOSAL

Ashes should be placed in a metal container with a tight fitting lid. Closed container of ashes should be placed on a noncombustible floor or on the ground. The container should be kept well away from all combustible ma-

terials pending final disposal. If ashes are disposed of by burial in soil or otherwise locally dispersed, they should be retained in closed container until cinders have thoroughly cooled.

### GLASS DOORS

Glass doors used by DESA Heating, LLC are tempered (safety) glass and have been tested to national standards. When glass breaks during use it could be for the following reasons:

1. Fire is too large
2. Logs are too close to glass. Logs and any burning material should not touch glass. This may cause glass to break.
3. Heat has built up too fast.

Continued operation at excessively high temperatures may cause glass to partially lose it's temper and break.

## FIREPLACE ACCESSORIES

### GLASS DOORS

Bifold glass doors are standard with DESA Heating, LLC fireplace. For replacement, refer to fireplace installation instructions in your owner's manual.

*Note: Use of glass doors other than those manufactured by DESA Heating, LLC voids warranty and may create a potentially hazardous condition.*

Refer to installation instructions that come with door kit for installation details. Glass door kits can be installed before, during or after fireplace has been installed.

### GAS LOGS

A full line of vented and vent-free DESA Heating, LLC gas logs is available. See your dealer or distributor for details or visit [www.desatech.com](http://www.desatech.com).

### FANS/BLOWERS

This accessory is designed to enhance the convection principle (see [Air Circulation](#), page 3). It is not designed as a blowing system.

## CUSTOMER SERVICE

You may have further questions about installation, operation or troubleshooting. If so, contact your dealer or distributor. If further help is needed, contact DESA Heating, LLC at 1-866-672-6040. When calling please have your model and serial numbers of your heater ready.

*Note: The serial number and other pertinent information can be found on the rating plate located behind the screen near upper right corner of firebox. In some models it may be located vertically on side panel.*

You can also visit DESA Heating, LLC's web site at [www.desatech.com](http://www.desatech.com).

# **20 YEAR LIMITED WARRANTY**

## **Factory Built Wood Burning Fireplace Components**

### **KEEP THIS WARRANTY**

Model (located on product or identification tag) \_\_\_\_\_

Serial No. (located on product or identification tag) \_\_\_\_\_

Date Purchased \_\_\_\_\_

Keep receipt for warranty verification.

DESA Heating, LLC warrants the factory built wood burning fireplace components are free from defects in material or workmanship for a 20 year limited warranty from the date of original purchase.

#### **120 DAY NO COST REPAIR OR REPLACEMENT PARTS WARRANTY**

1. Grates
2. Safety Screen
3. Blower
4. Glass Door Assembly

\*Glass panels are warranted against breakage due to heat from the firebox. Breakage during installation or movement of product after purchase is not covered under this written warranty.

#### **REFRACTORY WARRANTY**

##### **FIRST YEAR**

DESA Heating, LLC warrants the refractory (except hairline cracks 1/16" W), one year from the date of purchase to be free from defects in material and workmanship.

If the original owner of a DESA Heating, LLC wood burning fireplace believes any of the refractory parts have failed during the one year from date of purchase, the homeowner should contact the nearest DESA dealer or distributor for replacement. DESA Heating, LLC will pay up to \$50 towards labor installation of replacement refractory. DESA Heating, LLC will ship the refractory using prepaid freight to the dealer or distributor.

##### **SECOND THROUGH 20TH YEAR**

DESA Heating, LLC will supply refractory replacement parts at the current list price that is in effect at the time of replacement. DESA Heating, LLC will assume no responsibility for any labor or freight charges associated with replacement during second through 20 years.

#### **FIREPLACE WARRANTY**

##### **FIRST YEAR**

If the original owner of a DESA Heating, LLC wood burning fireplace believes any part (including chimney and chimney components) has failed during the first year from date of purchase due to materials or workmanship, the nearest dealer or distributor should be notified.

The dealer or distributor will determine extent of necessary replacement parts with troubleshooting or visits to installation site. The on site examination is the sole judgment of the factory representative. The factory representative will determine if the part failed due to materials or workmanship. In the event the part has failed due to materials or workmanship, DESA Heating, LLC will either repair or replace the necessary part(s) without charge to the owner. DESA Heating, LLC will also pay the dealer or distributor service call. DESA warranty allows up to \$50 per warranty claim.

##### **SECOND THROUGH FIFTH YEAR**

2 through 5 years from original date of purchase, DESA Heating, LLC will warrant the wood burning fireplace and part(s) from defects in material or workmanship under the following terms: homeowner must contact an authorized DESA dealer or distributor for troubleshooting and examination of part. The factory representative will determine if the part failed due to materials or workmanship. In the event the part has failed due to materials or workmanship, DESA Heating, LLC will either repair or replace the necessary part(s) without charge to the owner. During this time, second through fifth year, the homeowner is responsible for freight of part shipment and installation services.

##### **SIXTH THROUGH TENTH YEAR**

At the end of the above 5 year period of free part replacement, DESA Heating, LLC will replace any part which fails due to materials or workmanship under the following terms: homeowner must contact an authorized DESA dealer or distributor for troubleshooting and examination of part. The factory representative will determine if the part failed due to materials or workmanship. In the event the part has failed due to materials or workmanship, DESA Heating, LLC will provide a replacement part (if part is available) at the current list price to the homeowner. The homeowner is responsible for freight of part shipment and installation services.

# 20 YEAR LIMITED WARRANTY

## Continued

### ELEVENTH THROUGH TWENTIETH YEAR

From the eleventh through twentieth year from original date of purchase, DESA Heating, LLC will replace the part(s) that fails due to material or workmanship under the following terms: the homeowner should contact the nearest DESA dealer or distributor for examination of fireplace or part. The on site examination is the sole judgment of the factory representative. The factory representative will determine if the part failed due to materials or workmanship. In the event the part has failed due to materials or workmanship, DESA Heating, LLC will provide the replacement part (if part is available) at the current list price. The homeowner must pay any and all cost for removal of original part, shipment of replacement part, cost of replacement part, and installation of replacement part.

### NOTIFICATION OF DEFECT

A DESA Heating, LLC dealer or distributor should be contacted directly by the owner for any service, including service under these WARRANTIES. The repair and replacement of any defective part covered by these warranties is in the responsibility of the nearest DESA dealer or distributor.

### EXCLUSION OF INCIDENTAL, SPECIAL, AND CONSEQUENTIAL DAMAGES

DESA Heating, LLC shall have no liability for any incidental, special, or consequential damages arising from the sale or use of the firebox.

### LEGAL RIGHTS

This warranty gives you specific legal rights and you may also have other rights, which may vary from state to state.

### EXCLUSIONS

These warranties do not apply and DESA Heating, LLC assumes no responsibility for any damages that result due to the following:

1. Improper installation of firebox.
2. In any case where firebox and/or components have been altered in any way.
3. In any case where the sole judgment of DESA Heating, LLC, the fireplace has been misused, abused, used negligently or suffered damage.
4. In any case where the firebox has been moved from its original installation site.
5. In any case where a poor draft is caused by air conditioning systems or any other mechanical devices such as heating systems, exhaust fans or by adverse environmental factors. DESA Heating, LLC is not responsible for smoking caused by inadequate chimney heights resulting from adjoining roof structure, buildings or nearby trees and structure which cause unusual wind conditions resulting in a downdraft or inadequate ventilation or drafting caused by tight sealed construction.
6. In any case of the use of unapproved fuels and/or air handling devices.
7. This limited warranty does not apply to a chimney fire due to lack of adequate cleaning (refer to operating instructions) of creosote build-up.
8. DESA Heating, LLC assumes no responsibility for defects or damages caused by any modification to the fireplace or the installation of devices not approved by DESA Heating, LLC in writing.

In the event a factory representative visits the installation site and the repair is not covered under warranty, the homeowner will be billed for the dealer/distributor assessment as well as travel and other expenses incurred by DESA Heating, LLC.

These warranties are given in lieu of any other express warranties. DESA Heating, LLC does not authorize any person or representative to make any representations to the contrary in connection with the sale of a built-in firebox.



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