INSTALLER: LEAVE THIS MANUAL WTIH THE APPLIANCE.
CONSUMER: RETAIN THIS MANUAL FOR FUTURE REFERENCE.



# INSTALLATION AND OPERATION INSTRUCTIONS

CERTIFIED UNDER CANADIAN AND AMERICAN NATIONAL STANDARDS: ANSI Z21.50 • CSA 2.22 FOR VENTED GAS FIREPLACE.



GD19P

**PROPANE** 

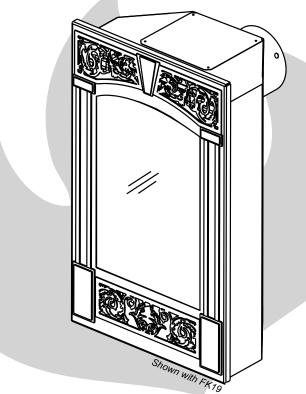
CERTIFIED FOR CANADA AND UNITED STATES USING ANSI/CSA METHODS.

### SAFETY INFORMATION

# **▲** WARNING

If the information in these instructions are not followed exactly, a fire or explosion may result causing property damage, personal injury or loss of life.

- Do not store or use gasoline or other flammable vapors and liquids in the vicinity of this or any other appliance.
- WHAT TO DO IF YOU SMELL GAS:
  - Do not try to light any appliance.
  - Do not touch any electrical switch; do not use any phone in your building.
  - Immediately call your gas supplier from a neighbour's phone. Follow the gas supplier's instructions.
  - If you cannot reach your gas supplier, call the fire department.
- Installation and service must be performed by a qualified installer, service agency or the supplier.













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### **RETAIN THIS MANUAL FOR FUTURE REFERENCE**

# **▲** WARNING

- Do not burn wood or other materials in this fireplace.
- Adults and especially children should be alerted to the hazards of high surface temperatures and should stay away to avoid burns or clothing ignition. Supervise young children when they are in the same room as the fireplace.
- Clothing or other flammable material should not be placed on or near the fireplace.
- Due to high temperatures, the fireplace should be located out of traffic and away from furniture and draperies.
- Ensure you have incorporated adequate safety measure to protect infants/toddlers from touching hot surfaces.
- Even after the fireplace is out, the glass and/or screen will remain hot for an extended period of time.
- Check with your local hearth specialty dealer for safety screens and hearth guards to protect children from hot surfaces. These screens and guards must be fastened to the floor.
- Any safety screen or guard removed for servicing must be replaced prior to operating the fireplace.
- It is imperative that the control compartments, burners and circulating blower and its passageway in the fireplace and venting system are kept clean. The fireplace and its venting system should be inspected before use and at least annually by a qualified service person. More frequent cleaning may be required due to excessive lint from carpeting, bedding material, etc. The fireplace area must be kept clear and free from combustible materials, gasoline and other flammable vapours and liquids.
- Under no circumstances should this fireplace be modified.
- This fireplace must not be connected to a chimney flue pipe serving a separate solid fuel burning appliance.
- Do not use this fireplace if any part has been under water. Immediately call a qualified service technician to inspect the fireplace and to replace any part of the control system and any gas control which has been under water.
- Do not operate the fireplace with the glass door removed, cracked or broken. Replacement of the glass should be done by a licensed or qualified service person.
- Do not strike or slam shut the fireplace glass door.
- This fireplace uses and requires a fast acting thermocouple. Replace only with a fast acting thermocouple supplied by Wolf Steel Ltd.
- Pressure relief doors must be kept closed while the fireplace is operating to prevent exhaust fumes containing carbon monoxide, from entering into the home. Temperatures of the exhaust escaping through these openings can also cause the surrounding combustible materials to overheat and catch fire.
- Only doors/optional fronts certified with the appliance shall be used.

NAPOLEON® products are manufactured under the strict Standard of the world recognized ISO 9001: 2000 Quality Assurance Certificate.

NAPOLEON® products are designed with superior components and materials, assembled by trained craftsmen who take great pride in their work. The burner and valve assembly are leak and test-fired at a quality test station. The complete fireplace is test-fired and thoroughly inspected by a qualified technician before packaging to ensure that you, the customer, receives the quality product that you expect from NAPOLEON®.

### NAPOLEON® GAS FIREPLACE PRESIDENT'S LIFETIME LIMITED WARRANTY

The following materials and workmanship in your new NAPOLEON® gas fireplace are warranted against defects for as long as you own the fireplace. This covers: combustion chamber, heat exchanger, stainless steel burner, phazer<sup>TM</sup> logs and embers, ceramic glass (thermal breakage only), gold plated parts against tarnishing, porcelainized enamelled components and aluminium extrusion trims.

Electrical (110V and millivolt) components and wearable parts such as blowers, gas valves, thermal switch, switches, wiring, remote controls, ignitor, gasketing, and pilot assembly are covered and NAPOLEON® will provide replacement parts free of charge during the first year of the limited warranty. Light bulbs are not covered by this warranty.

Labour related to warranty repair is covered free of charge during the first year. Repair work however, requires the prior approval of an authorized company official. Labour costs to the account of Napoleon® are based on a predetermined rate schedule and any repair work must be done through an authorized Napoleon® dealer.

### **CONDITIONS AND LIMITATIONS**

NAPOLEON® warrants its products against manufacturing defects to the original purchaser only -- i.e., the individual or legal entity (registered customer) whose name appears on the warranty registration card filed with NAPOLEON® -- provided that the purchase was made through an authorized NAPOLEON® dealer and is subject to the following conditions and limitations:

This factory warranty is nontransferable and may not be extended whatsoever by any of our representatives.

The gas fireplace must be installed by a licensed, authorized service technician or contractor. Installation must be done in accordance with the installation instructions included with the product and all local and national building and fire codes.

This limited warranty does not cover damages caused by misuse, lack of maintenance, accident, alterations, abuse or neglect and parts installed from other manufacturers will nullify this warranty.

This limited warranty further does not cover any scratches, dents, corrosion or discolouring caused by excessive heat, abrasive and chemical cleaners nor chipping on porcelain enamel parts, mechanical breakage of PHAZER™ logs and embers, nor any venting components used in the installation of the fireplace.

NAPOLEON® warrants its stainless steel burners against defects in workmanship and material for life, subject to the following conditions: During the first 10 years NAPOLEON® will replace or repair the defective parts at our option free of charge. From 10 years to life, NAPOLEON® will provide replacement burners at 50% of the current retail price.

In the first year only, this warranty extends to the repair or replacement of warranted parts which are defective in material or workmanship provided that the product has been operated in accordance with the operation instructions and under normal conditions.

After the first year, with respect to this President's Limited Lifetime Warranty, NAPOLEON® may, at its discretion, fully discharge all obligations with respect to this warranty by refunding to the original warranted purchaser the wholesale price of any warranted but defective part(s).

After the first year, NAPOLEON® will not be responsible for installation, labour or any other costs or expenses related to the reinstallation of a warranted part, and such expenses are not covered by this warranty.

Notwithstanding any provisions contained in this President's Limited Lifetime Warranty, NAPOLEON®'S responsibility under this warranty is defined as above and it shall not in any event extend to any incidental, consequential or indirect damages.

This warranty defines the obligations and liability of NAPOLEON® with respect to the NAPOLEON® gas fireplace and any other warranties expressed or implied with respect to this product, its components or accessories are excluded.

NAPOLEON® neither assumes, nor authorizes any third party to assume, on its behalf, any other liabilities with respect to the sale of this product. NAPOLEON® will not be responsible for: over-firing, downdrafts, spillage caused by environmental conditions such as rooftops, buildings, nearby trees, hills, mountains, inadequate vents or ventilation, excessive venting configurations, insufficient makeup air, or negative air pressures which may or may not be caused by mechanical systems such as exhaust fans, furnaces, clothes dryers, etc.

Any damages to fireplace, combustion chamber, heat exchanger, brass trim or other component due to water, weather damage, long periods of dampness, condensation, damaging chemicals or cleaners will not be the responsibility of NAPOLEON®.

The bill of sale or copy will be required together with a serial number and a model number when making any warranty claims from your authorized dealer. The warranty registration card must be returned within fourteen days to register the warranty.

NAPOLEON® reserves the right to have its representative inspect any product or part thereof prior to honouring any warranty claim.

### **GENERAL INSTRUCTIONS**

THIS GAS FIREPLACE SHOULD BE INSTALLED AND SERVICED BY A QUALIFIED INSTALLER to conform with local codes. Installation practices vary from region to region and it is important to know the specifics that apply to your area.

### for example: in Massachusetts State:

- The fireplace damper must be removed or welded in the open position prior to installation of a fireplace insert or gas log.
- A carbon monoxide detector is required in all rooms containing gas fired appliances.
- The appliance off valve must be a "T" handle gas cock.
- · The flexible connector must not be longer than 36 inches.
- The appliance is not approved for installation in a bedroom or bathroom unless the unit is a direct vent sealed combustion product.
- WARNING: This product must be installed by a licensed plumber or gas fitter when installed within the commonwealth of Massachusetts.

In absence of local codes, install to the current CAN1-B149 Installation Code in Canada or to the National Fuel Gas Code, ANSI Z223.1, and NFPA 54 in the United States. Mobile home installation must conform with local codes. In the absence of local codes, install to the current standard for gas equipped mobile housing CAN/CSA Z240 MH Series in Canada or the manufactured home construction and safety standard, Title 24 CFR, part 3280, or the Fire Safety Criteria for manufactured home installations, Sites and Community Standard ANSI/NFPA 501A in the United States.

# Objects placed in front of the fireplace must be kept a minimum of 48" away from the front face of the unit.

The fireplace and its individual shutoff valve must be disconnected from the gas supply piping system during any pressure testing of that system at test pressures in excess of ½ psig (3.5 kPa). The fireplace must be isolated from the gas supply piping system by closing its individual manual shutoff valve during any pressure testing of the gas supply piping system at test pressures equal to or less than ½ psig (3.5 kPa).

When the fireplace is installed directly on carpeting, vinyl tile or other combustible material other than wood flooring, the fireplace shall be installed on a metal or wood panel extending the full width and depth.

The fireplace, when installed with a blower, must be electrically connected and grounded in accordance with local codes. In the absence of local codes, use the current CSA C22.1 CANADIAN ELECTRICAL CODE in Canada or the ANSI/NFPA 70 NATIONAL ELECTRICAL CODE in the United States.



We suggest that our gas hearth products be installed and serviced by professionals who are certified in the U.S. by the National Fireplace Institute® (NFI) as NFI Gas Specialists.

### GENERAL INFORMATION

FOR YOUR SATISFACTION, THIS FIREPLACE HAS BEEN TEST-FIRED TO ASSURE ITS OPERATION AND QUALITY!

Minimum inlet gas supply pressure is 4.5 inches water column for natural gas and 11 inches water column for propane. Maximum inlet gas pressure is 7 inches water column for natural gas and 13 inches water column for propane. When the valve is set to "HI", the manifold pressure under flow conditions is 3.5 inches water column for natural gas and 10 inches water column for propane. When the fireplace is installed at elevations above 4,500ft, and in the absence of specific recommendations from the local authority having jurisdiction, the certified high altitude input rating shall be reduced at the rate of 4% for each additional 1,000ft.

Expansion / contraction noises during heating up and cooling down cycles are normal and to be expected.

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

Maximum input is 11,500 BTU/hr for natural gas. Maximum output for natural gas is 8,600 BTU/hr at an efficiency of 75%. Maximum input is 11,000 BTU/hr for propane. Maximum output for propane gas is 8,250 BTU/hr at an efficiency of 75%.

# Provide adequate accessibility clearance for servicing and operating the fireplace.

### Never obstruct the front opening of the fireplace.

Provided that the clearance to combustibles are achieved, the most desirable and beneficial location for a Napoleon® fireplace is in the centre of a building, thereby allowing the most efficient use of the heat created. The location of windows, doors and the traffic flow in the room where the fireplace is to be located should be considered. If possible, you should choose a location where the vent will pass through the house without cutting a floor or roof joist.

**RATING LABEL LOCATION:** The rating label is located under the control panel and is chained to the fireplace.

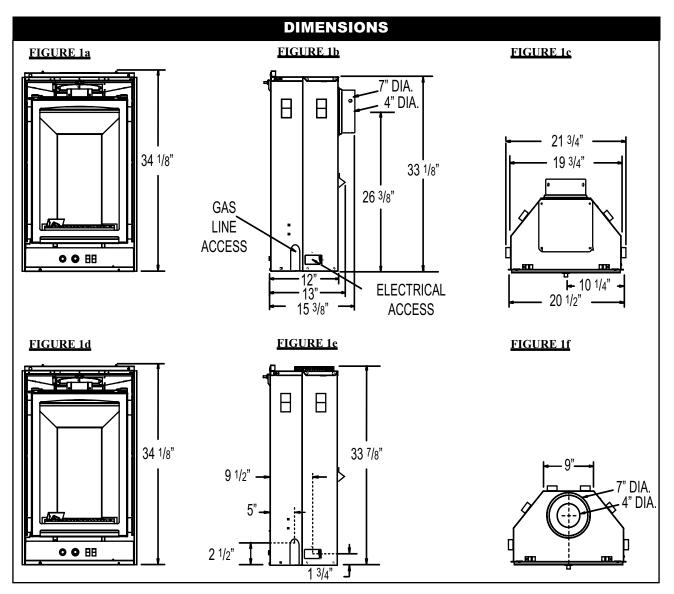
DO NOT REMOVE.

### **CARE OF GLASS AND PLATED PARTS**

Do not use abrasive cleaners to clean these parts. Buff lightly with a clean dry cloth.

The glass is  $^3/_{16}$ " ceramic glass available from your Napoleon® / Wolf Steel Ltd. dealer. **DO NOT SUBSTITUTE MATERIALS**. Clean the glass after the first 10 hours of operation with a recommended gas fireplace glass cleaner. Thereafter clean as required. **DO NOT CLEAN GLASS WHEN HOT!** If the glass is not kept clean permanent discolouration and / or blemishes may result.





# **VENTING**

### **VENTING LENGTHS AND AIR TERMINAL LOCATIONS**

Use only Wolf Steel, Simpson Dura-Vent, Selkirk Direct Temp or American Metal Amerivent venting components. Minimum and maximum vent lengths, for both horizontal and vertical installations, and air terminal locations for either system are set out in this manual and must be adhered to. For Simpson Dura-Vent, Selkirk Direct Temp and American Metal Amerivent, follow the installation procedure provided with the venting components.

For vent systems that provide seals on the inner exhaust flue, only the outer air intake joints must be sealed using red high temperature silicone (RTV). this same sleant may be used on both the inner exhaust and outer intake vent pipe joints of all other approved vent systems except for the exhaust vent pipe connection to the fireplace flue collar which must be sealed using the black high temperature sealant Mill Pac.

The connection between the adaptor for these systems and the fireplace flue collar must be sealed using the black high temperature sealant Mill Pac (not supplied).

A starter adaptor must be used with the following vent systems and may be purchased from the corresponding supplier:

PART 4"/7" SUPPLIER

Duravent W175-0053 Wolf Steel

Amerivent 4DSC-N2 American Metal

Direct Temp 4DT-AAN Selkirk

For Simpson Dura-Vent, Selkirk Direct Temp and American Metal Amerivent, follow the installation procedure found on the website for your venting supplier:

### **VENTING SUPPLIER**

Simpson Dura-Vent Selkirk Direct Temp American Metal Amerivent

### **WEBSITE ADDRESS**

www.duravent.com www.selkirkcorp.com www.americanmetalproducts.com

### **VENTING LENGTHS AND AIR TERMINAL LOCATIONS CONTINUED**

When using Wolf Steel venting components, use only approved Wolf Steel rigid / flexible components with the following termination kits:Wall Terminal Kit GD222, or 1/12 to 7/12 Pitch Roof Terminal Kit GD110, 8/12 to 12/12 Roof Terminal Kit GD111, Flat Roof Terminal Kit GD112 or Periscope Kit GD201 (for wall penetration below grade). With flexible venting, in conjunction with the various terminations, use either the 5 foot Vent Kit GD220 or the 10 foot Vent Kit GD330.

The maximum allowable vertical vent length is 35 feet, the minimum is 3 feet.

For optimum flame appearance and fireplace performance, keep the vent length and number of elbows to a minimum. The air terminal must remain unobstructed at all times. Examine the air terminal at least once a year to verify that it is unobstructed and undamaged.

Horizontal runs may have a 0" rise per foot in all cases using Wolf Steel or Simpson Dura-Vent rigid, Selkirk Direct Temp, American Metal Amerivent or Wolf Steel flexible venting components when venting.

For optimum performance, it is recommended that horizontal runs have a minimum 1" rise per foot when using any of these vent systems.

Wolf Steel, Simpson Dura-Vent, Selkirk Direct Temp and American Metal Amerivent venting systems must not be combined.

### **VENT INSTALLATIONS**

For safe and proper operation of the fireplace follow the venting instruction exactly.

Deviation from the minimum or the maximum vertical vent length can create difficulty in burner start-up and/or carboning.

Under extreme vent configurations, allow several minutes (5-15) for the flame to stabilize after ignition.

Vent lengths that pass through unheated spaces (attics, garages, crawl spaces) should be insulated with the insulation wrapped in a protective sleeve to minimize condensation.

Provide a means for visually checking the vent connection to the fireplace after the fireplace is installed.

Use a firestop, vent pipe shield or attic insulation shield when penetrating interior walls, floor or ceiling.

### HORIZONTAL VENT SECTIONS

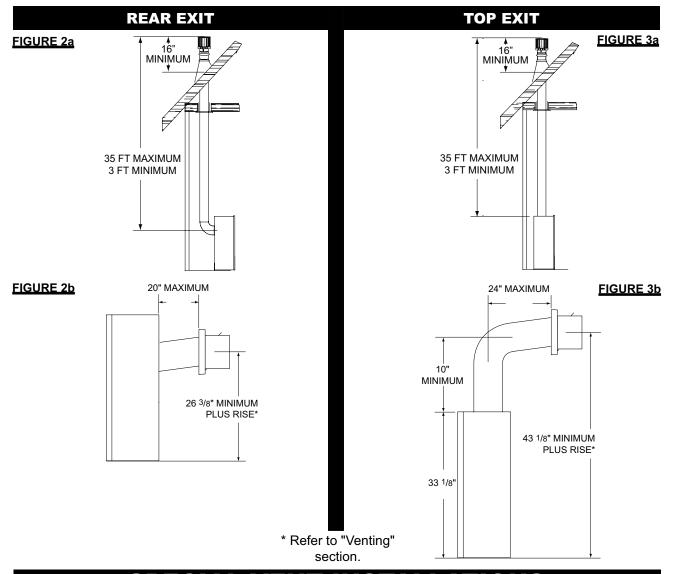
A minimum clearance of 1" at the bottom and sides and 2" at the top of the vent pipe in all horizontal runs to combustibles is required. Use firestop spacer W010-1774 (supplied).

### **VERTICAL VENT SECTIONS**

A minimum of 1" all around the vent pipe on all vertical runs to combustibles is required except for clearances in fireplace enclosures. See "Minimum Enclosure Clearances" section. Use firestop spacer W500-0096 (not supplied).

FOR SPECIFIC VENTING PARAMETERS, REFER TO PAGES 10-15.

### TYPICAL VENT INSTALLATIONS



### SPECIAL VENT INSTALLATIONS

### PERISCOPE TERMINATION

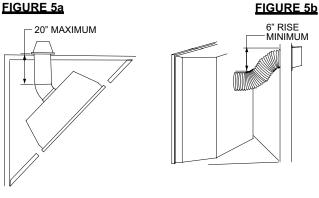
Use the GD201 periscope kit to locate the air termination above grade. The periscope must be installed so that when final grading is completed, the bottom air slot is located a minimum of 12" above grade. The maximum allowable vent length is 10 ft.

# FIGURE 4b FIGURE 4b 12" MINIMUM 24" MINIMUM MINIMUM MINIMUM MAYIMUM 10ET VENT LENGTH

MAXIMUM 10FT VENT LENGTH
TOP EXIT INSTALLATION REAR EXIT INSTALLATION

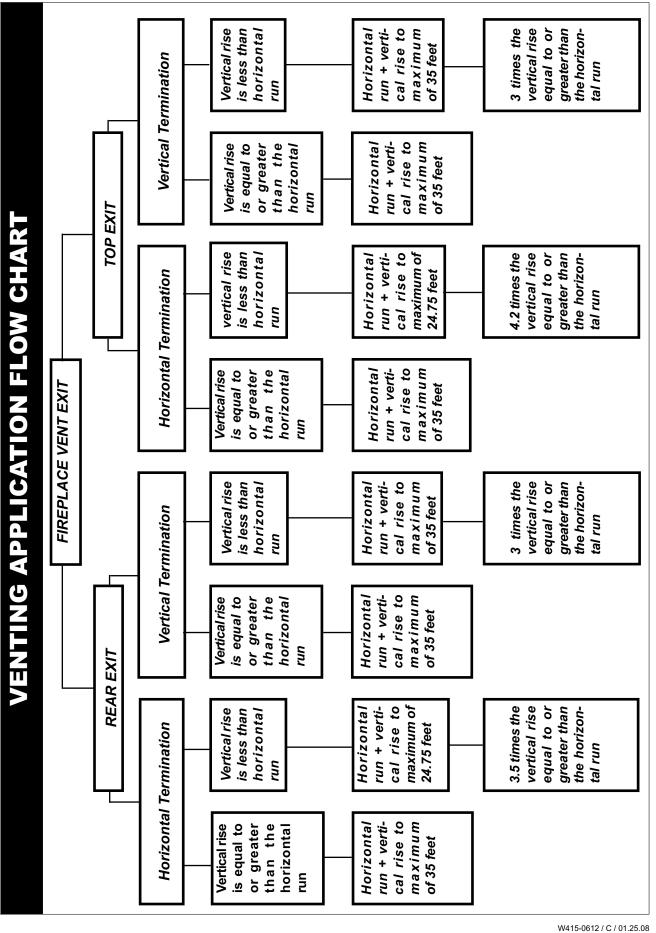
### **CORNER TERMINATION**

The maximum vent length for a corner installation is 20" of horizontal run, in addition to the 45° offset. In this case zero rise is acceptable when using rigid. See FIGURE 5a. Flexible venting must maintain a 6" rise. See FIGURE 5b.



M	NIMUM AIR	R TERMINAI	L LOCATION CLEARANCES
	FIGURE 6	C H.	
	INSTALL		
	CANADIAN	U.S.A.	
Α	12 INCHES	12 INCHES	Clearance above grade, veranda porch, deck or balcony.
В	12 INCHES	9 INCHES	Clearance to windows or doors that open.
С	12 INCHES*	12 INCHES*	Clearance to permanently closed windows.
D	18 INCHES**	18 INCHES**	Vertical clearance to ventilated soffit located above the terminal within a horizontal distance of 2 feet from the centerline of the terminal.
E	18 INCHES**	18 INCHES**	Clearance to unventilated soffit.
F	0 INCHES	0 INCHES	Clearance to an outside corner wall.
	0 INCHES***	0 INCHES***	Clearance to an inside <b>non</b> -combustible corner wall or protruding <b>non</b> -combustible obstructions (chimney, etc.).
G	2 INCHES***	2 INCHES***	Clearance to an inside combustible corner wall or protruding combustible obstructions ( vent chase, etc.).
н	3 FEET	3 FEET****	Clearance to each side of the centerline extended above the meter / regulator assembly to a maximum vertical distance of 15ft.
I	3 FEET	3 FEET****	Clearance to a service regulator vent outlet.
J	12 INCHES	9 INCHES	Clearance to a non-mechanical air supply inlet to the building or a combustion air inlet to any other appliance.
K	6 FEET	3 FEET†	Clearance to a mechanical air supply inlet.
ᆫ	7 FEET‡	7 FEET****	Clearance above a paved sidewalk or paved driveway located on public property unless fitted with a heat shield kit GD-301.
М	12 INCHES††	12 INCHES****	Clearance under a veranda, porch, deck or balcony.
N	16 INCHES	16 INCHES	Clearance above the roof.
0	2 FEET†*	2 FEET†*	Clearance from an adjacent wall including neighbouring buildings.

- \* Recommended to prevent condensation on windows and thermal breakage
- \*\* It is recommended to use a heat shield and to maximize the distance to vinyl clad soffits.
- \*\*\* The periscope GD-201 requires a minimum 18 inches clearance from an inside corner.
- \*\*\*\* This is a recommended distance. For additional requirements check local codes.
- † 3 feet above if within 10 feet horizontally.
- A vent shall not terminate directly above a sidewalk or paved driveway that is located between two single family dwellings and serves both dwellings.
- †† Permitted only if the veranda, porch, or deck is fully open on a minimum of two sides beneath the floor.
- †\* Recommenced to prevent recirculation of exhaust products. For additional requirements check local codes.



### **DEFINITIONS**

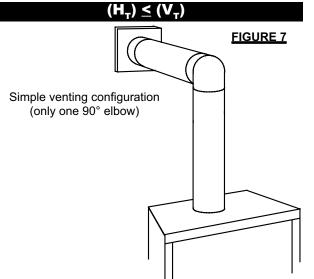
For the following symbols used in the venting calculations and examples are:

- > greater than
- equal to or greater than
- < less than
- ≤ equal to or less than
- $\mathbf{H_T}$  total of both horizontal vent lengths  $(\mathbf{H_R})$  and offsets  $(\mathbf{H_O})$  in feet
- **H**<sub>R</sub> combined horizontal vent lengths in feet
- **H<sub>o</sub>** offset factor: .03(total degrees of offset 90°\*) in feet
- $\mathbf{V}_{\mathbf{T}}$  combined vertical vent lengths in feet

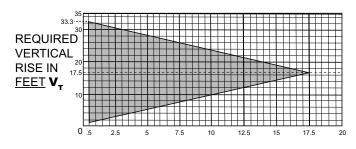
ELBOW \	/ENT LENGT	H VALUES
	<u>feet</u>	<u>inches</u>
1°	0.03	0.5
15°	0.45	6.0
30°	0.9	11.0
45°	1.35	16.0
90°*	2.7	32.0

\* the first 90° offset has a zero value and is shown in the formula as  $-90^{\circ}$ 

### **TOP EXIT / HORIZONTAL TERMINATION**



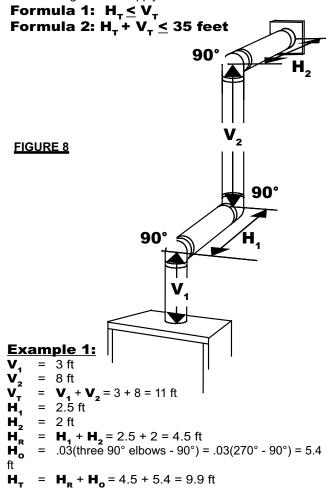
See graph to determine the required vertical rise  $\bm{V_T}$  for the required horizontal run  $\bm{H_T}$ 



HORIZONTAL VENT RUN PLUS OFFSET IN FEET H.

The shaded area within the lines represents acceptable values for  $H_{\tau}$  and  $V_{\tau}$  .

For vent configurations requiring more than one 90° elbow, the following formulas apply:



 $\mathbf{H_T} + \mathbf{V_T} = 9.9 + 11 = 20.9 \text{ ft}$ 

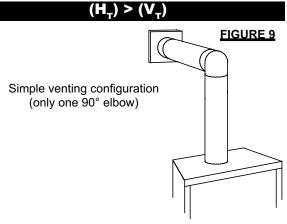
Formula 1:  $\mathbf{H}_{\mathbf{T}} \leq \mathbf{V}_{\mathbf{T}}$ 

Formula 2:  $\mathbf{H_T} + \mathbf{V_T} \leq 35$  feet

 $20.9 \le 35$ 

Since both formulas are met, this vent configuration is acceptable.

### TOP EXIT / HORIZONTAL TERMINATION



See graph to determine the required vertical rise  $V_{_{\! T}}$  for the required horizontal run  $H_{_{\! T^*}}$ 

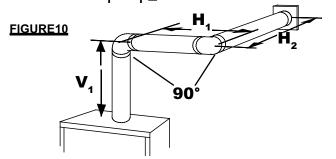
150 **REQUIRED** 140 **VERTICAL** RISE IN 130 INCHES V, 120 110 100 90 80 70 60 50 40 30 20 10 10 20 15

HORIZONTAL VENT RUN PLUS OFFSET IN FEET H.

The shaded area within the lines represents acceptable values for  $H_{\tau}$  and  $V_{\tau}$ .

For vent configurations requiring more than one 90° elbow the following formulas apply:

Formula 1:  $H_{\tau} \le 4.2 V_{\tau}$ Formula 2:  $H_{\tau} + V_{\tau} \le 24.75$  feet



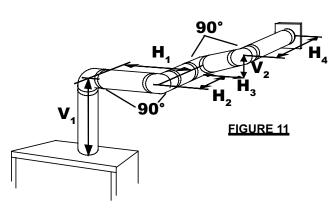
### Example 2:

$$V_1$$
 =  $V_T$  = 6 ft  
 $H_1$  = 3 ft  
 $H_2$  = 5 ft  
 $H_R$  =  $H_1$  +  $H_2$  = 3 + 5 = 8 ft  
 $H_0$  = .03(two 90° elbows - 90°) = .03(180° - 90°) = 2.7 ft  
 $H_T$  =  $H_R$  +  $H_0$  = 8 + 2.7 = 10.7 ft  
 $H_T$  +  $V_T$  = 10.7 + 6 = 16.7  
Formula 1:  $H_T \le 4.2 V_T$   
 $4.2 V_T$  = 4.2 x 6 = 25.2 ft

Formula 2:  $\mathbf{H_T + V_T \leq 24.75}$  feet  $16.7 \leq 24.75$ 

Since both formulas are met, this vent configuration is acceptable.

### Example 3:



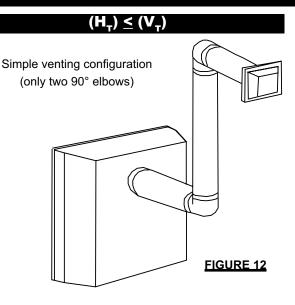
$$\begin{array}{lll} \textbf{V_1} & = 4 \text{ ft} \\ \textbf{V_2} & = 1.5 \text{ ft} \\ \textbf{V_T} & = \textbf{V_1} + \textbf{V_2} = 4 + 1.5 = 5.5 \text{ ft} \\ \textbf{H_1} & = 2 \text{ ft} \\ \textbf{H_2} & = 1 \text{ ft} \\ \textbf{H_3} & = 1 \text{ ft} \\ \textbf{H_4} & = 1.5 \text{ ft} \\ \textbf{H_R} & = \textbf{H_1} + \textbf{H_2} + \textbf{H_3} + \textbf{H_4} = 2 + 1 + 1 + 1.5 = 5.5 \text{ ft} \\ \textbf{H_0} & = .03 (\text{four } 90^\circ \text{ elbows } - 90^\circ) = .03 (360^\circ - 90^\circ) = 8.1 \text{ ft} \\ \textbf{H_T} & = \textbf{H_R} + \textbf{H_0} = 5.5 + 8.1 = 13.6 \text{ ft} \\ \textbf{H_T} + \textbf{V_T} & = 13.6 + 5.5 = 19.1 \text{ ft} \end{array}$$

Formula 1: 
$$\mathbf{H_T} \leq \mathbf{4.2} \ \mathbf{V_T}$$
  
 $\mathbf{4.2} \ \mathbf{V_T} = 4.2 \times 5.5 = 23.1 \ \mathrm{ft}$ 

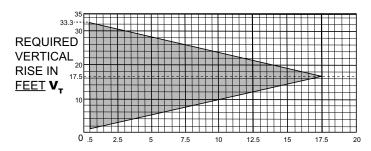
Formula 2:  $\mathbf{H_T + V_T} \leq 24.75$  feet 19.1  $\leq 24.75$ 

Since both formulas are met, this vent configuration is acceptable.

# / HORIZONTAL



See graph to determine the required vertical rise  $\boldsymbol{V}_{\scriptscriptstyle{\boldsymbol{T}}}$  for the required horizontal run H,

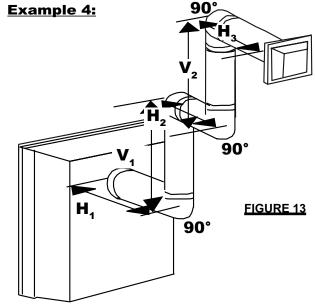


HORIZONTAL VENT RUN PLUS OFFSET IN FEET H,

The shaded area within the lines represents acceptable values for  $H_{\tau}$  and  $V_{\tau}$ .

For vent configurations requiring more than two 90° elbows the following formulas apply:

Formula 1:  $H_{\tau} \leq V_{\tau}$ Formula 2:  $H_{\tau} + V_{\tau} \leq 35$  feet



$$\begin{array}{lll} \textbf{V_1} & = 9 \text{ ft} \\ \textbf{V_2} & = 6 \text{ ft} \\ \textbf{V_T} & = \textbf{V_1} + \textbf{V_2} = 9 + 6 = 15 \text{ ft} \\ \textbf{H_1} & = 3 \text{ ft} \\ \textbf{H_2} & = 2 \text{ ft} \\ \textbf{H_3} & = 1.5 \text{ ft} \\ \textbf{H_6} & = \textbf{H_1} + \textbf{H_2} + \textbf{H_3} = 3 + 2 + 1.5 = 6.5 \text{ ft} \\ \textbf{H_0} & = .03 (\text{four } 90^\circ \text{ elbows } - 90^\circ) \\ & = .03 (90 + 90 + 90 + 90 - 90) = 8.1 \text{ ft} \\ \textbf{H_T} & = \textbf{H_R} + \textbf{H_0} = 6.5 + 8.1 = 14.6 \text{ ft} \\ \textbf{H_T} + \textbf{V_T} & = 14.6 + 15 = 29.6 \text{ ft} \\ \end{array}$$

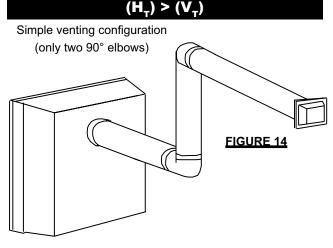
Formula 1:  $H_{\tau} \leq V_{\tau}$ 

14.6 ≤ 15  $H_T + V_T \le 35$  feet Formula 2:

Since both formulas are met, this vent configuration is acceptable.

# / HORIZONTAL T

Example 5:

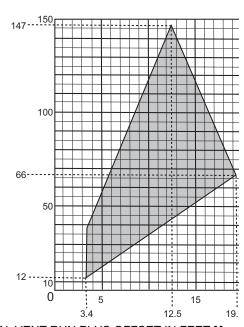


45° FIGURE 15 H₄ 90°

90°

See graph to determine the required vertical rise  $\boldsymbol{V}_{\scriptscriptstyle{\boldsymbol{\tau}}}$  for the required horizontal run H\_





HORIZONTAL VENT RUN PLUS OFFSET IN FEET H.

The shaded area within the lines represents acceptable values for  $H_{\tau}$  and  $V_{\tau}$ .

For vent configurations requiring more than two 90° elbows the following formulas apply:

Formula 1:  $H_{\tau} \le 3.5V_{\tau}$ Formula 2:  $H_{\tau} + V_{\tau} \le 24.75$  feet

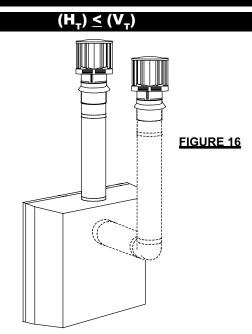
$$\begin{array}{lll} \textbf{V_1} & = 4 \text{ ft} \\ \textbf{V_2} & = 1.5 \text{ ft} \\ \textbf{V_T} & = \textbf{V_1} + \textbf{V_2} = 4 + 1.5 = 5.5 \text{ ft} \\ \textbf{H_1} & = 2 \text{ ft} \\ \textbf{H_2} & = 1 \text{ ft} \\ \textbf{H_3} & = 1 \text{ ft} \\ \textbf{H_4} & = 1.5 \text{ ft} \\ \textbf{H_6} & = \textbf{H_1} + \textbf{H_2} + \textbf{H_3} + \textbf{H_4} = 2 + 1 + 1 + 1.5 = 5.5 \text{ ft} \\ \textbf{H_0} & = 0.3 (\text{four } 90^\circ \text{ elbows} + \text{one } 45^\circ \text{ elbow} - 90^\circ) \\ & = .03 (90 + 90 + 90 + 90 + 45 - 90) = 9.45 \text{ ft} \\ \textbf{H_T} & = \textbf{H_R} + \textbf{H_0} = 5.5 + 9.45 = 14.95 \text{ ft} \\ \textbf{H_T} + \textbf{V_T} & = 14.95 + 5.5 = 20.45 \text{ ft} \end{array}$$

Formula 1:  $\mathbf{H_{T}} \le 3.5\mathbf{V_{T}}$  $3.5\mathbf{V_{T}} = 3.5 \times 5.5 = 19.25 \text{ ft}$  $14.95 \le 19.25$ 

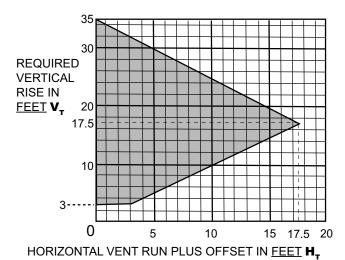
 $H_{\tau} + V_{\tau} \le 24.75$  feet  $20.45 \le 24.75$ Formula 2:

Since both formulas are met, this vent configuration is acceptable.

# REAR EXIT VERTICAL TERMINATIO



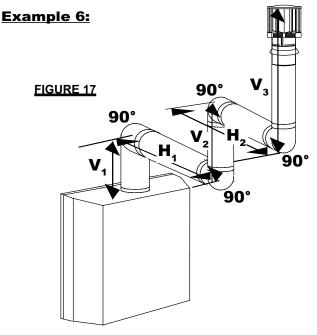
See graph to determine the required vertical rise  $\boldsymbol{V_{\scriptscriptstyle T}}$  for the required horizontal run H<sub>+</sub>.



The shaded area within the lines represents acceptable values for  $H_{\tau}$  and  $V_{\tau}$ .

For vent configurations requiring more than zero 90° elbow (top exit) or one 90° elbow (rear exit), the following formulas apply:

Formula 1:  $H_T \le V_T$ Formula 2:  $H_T + V_T \le 35$  feet



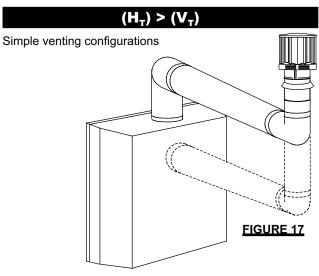
$$\begin{array}{lll} \textbf{V_1} & = 3 \text{ ft} \\ \textbf{V_2} & = 6 \text{ ft} \\ \textbf{V_3} & = 8 \text{ ft} \\ \textbf{V_T} & = \textbf{V_1} + \textbf{V_2} + \textbf{V_3} = 3 + 6 + 8 = 17 \text{ ft} \\ \textbf{H_1} & = 2 \text{ ft} \\ \textbf{H_2} & = 2.5 \text{ ft} \\ \textbf{H_R} & = \textbf{H_1} + \textbf{H_2} = 2 + 2.5 = 4.5 \text{ ft} \\ \textbf{H_0} & = .03 (\text{four } 90^\circ \text{ elbows } - 90^\circ) \\ & = .03 (90 + 90 + 90 + 90 - 90) = 8.1 \text{ ft} \\ \textbf{H_T} & = \textbf{H_R} + \textbf{H_0} = 4.5 + 8.1 = 12.6 \text{ ft} \\ \textbf{H_T} + \textbf{V_T} & = 12.6 + 17 = 29.6 \text{ ft} \\ \end{array}$$

 $\mathbf{H_{T}} \leq \mathbf{V_{T}}$   $12.6 \leq 17$ Formula 1:

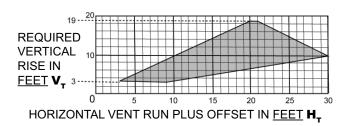
 $H_{\scriptscriptstyle T}$  +  $V_{\scriptscriptstyle T}$   $\leq$  35 feet Formula 2:

 $29.6 \le 35$ 

Since both formulas are met, this vent configuration is acceptable.



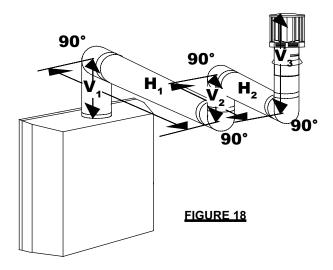
See graph to determine the required vertical rise  ${\bf V_T}$  for the required horizontal run  ${\bf H_T}$ 



The shaded area within the lines represents acceptable values for  $H_{\tau}$  and  $V_{\tau}$  .

For vent configurations requiring more than two 90° elbow (top exit) or one 90° elbow (rear exit), the following formulas apply:

Formula 1:  $H_{\tau} \le 3V_{\tau}$ Formula 2:  $H_{\tau} + V_{\tau} \le 35$  feet



Example 7:  $V_1$  = 2 ft  $V_2$  = 1 ft  $V_3$  = 1.5 ft  $V_7$  =  $V_1 + V_2 + V_3 = 2 + 1 + 1.5 = 4.5$  ft  $H_1$  = 6 ft  $H_2$  = 2 ft  $H_R$  =  $H_1 + H_2 = 6 + 2 = 8$  ft  $H_0$  = .03(four 90° elbows - 90°) = .03(90 + 90 + 90 + 90 - 90) = 8.1 ft  $H_7$  =  $H_R + H_0 = 8 + 8.1 = 16.1$  ft  $H_7 + V_7 = 16.1 + 4.5 = 20.6$  ft Formula 1:  $H_7 \le 3V_7$  $3V_7 = 3 \times 4.5 = 13.5$  ft

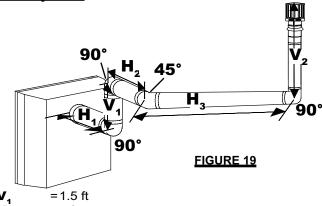
Since this formula is not met, this vent configuration is <u>un</u>acceptable.

Formula 2:  $\mathbf{H_T} + \mathbf{V_T} \leq \mathbf{35}$  feet  $20.6 \leq 35$ 

16.1 > 13.5

Since only formula 2 is met, this vent configuration is unacceptable and a new fireplace location or vent configuration will need to be established to satisfy both formulas.

### Example 8:



 $\begin{array}{lll} \textbf{V_1} & = 1.5 \text{ ft} \\ \textbf{V_2} & = 5 \text{ ft} \\ \textbf{V_T} & = \textbf{V_1} + \textbf{V_2} = 1.5 + 5 = 6.5 \text{ ft} \\ \textbf{H_1} & = 1 \text{ ft} \\ \textbf{H_2} & = 1 \text{ ft} \\ \textbf{H_3} & = 10.75 \text{ ft} \\ \textbf{H_6} & = \textbf{H_1} + \textbf{H_2} + \textbf{H_3} = 1 + 1 + 10.75 = 12.75 \text{ ft} \\ \textbf{H_0} & = .03 (\text{three } 90^\circ \text{ elbows} + \text{one } 45^\circ \text{ elbow} - 90^\circ) \\ & = .03 (90 + 90 + 90 + 45 - 90) = 6.75 \text{ ft} \\ \textbf{H_T} & = \textbf{H_R} + \textbf{H_0} = 12.75 + 6.75 = 19.5 \text{ ft} \\ \textbf{H_T} + \textbf{V_T} & = 19.5 + 6.5 = 26 \text{ ft} \end{array}$ 

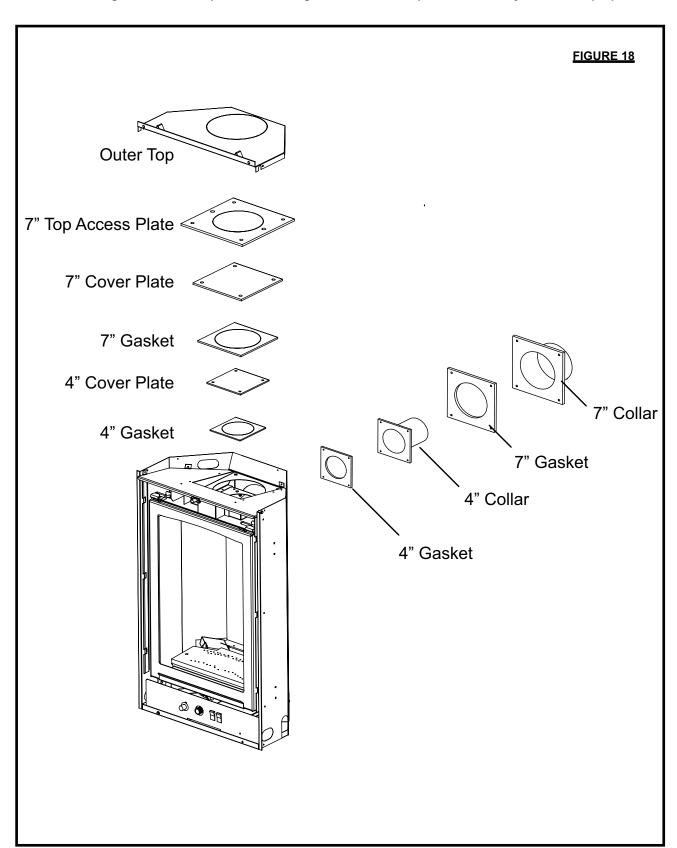
Formula 1:  $\mathbf{H_{T}} \leq \mathbf{3V_{T}}$   $\mathbf{3V_{T}} = 3 \times 6.5 = 19.5 \text{ ft}$  19.5 = 19.5Formula 2:  $\mathbf{H_{T}} + \mathbf{V_{T}} \leq \mathbf{35} \text{ feet}$ 

ormula 2:  $H_{\tau} + V_{\tau} \le 35$  feet  $26 \le 35$ 

Since both formulas are met, this vent configuration is acceptable.

### TOP EXIT CONVERSION

In order to convert the venting configuration from a *rear exit to a top exit*, remove the components as illustrated: When reinstalling in the alternate position: Check gaskets for tears, replace if necessary to ensure a proper seal.



### INSTALLATION

### WALL AND CEILING PROTECTION

For optimum performance, it is recommended that horizontal runs have a minimum 1" rise per foot when using Simpson Dura-Vent, Selkirk Direct Temp, American Metal Amerivent, or Wolf Steel rigid or flexible vent components.

For safe and proper operation of the fireplace, follow the venting instructions exactly.

### HORIZONTAL INSTALLATION

This application occurs when venting through an exterior wall. Having determined the correct height for the air terminal location, cut and frame a hole in the exterior wall 9 7/8" wide by 11 3/8" high to accommodate the firestop assembly. Dry fit the firestop assembly before proceeding to ensure the brackets on the rear surface fit to the inside surface of the horizontal framing. Firestop spacer and shield do not limit the thickness of a wall. For wall construction when using less than 2" x 6" framing, the shield must be cut to suit.

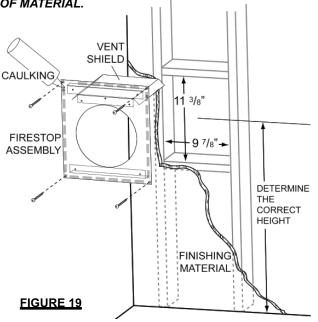
As an alternative to framing, the vent pipe can be enclosed in the wall using Napoleon® vent sleeve VS47KT.

# N<u>OTE</u>: THE FIRESTOP ASSEMBLY MUST BE INSTALLED WITH THE VENT SHIELD TO THE TOP.

The length of the vent shield may be cut shorter for combustible walls that are less than 8 1/2" thick but the vent shield must extend the full depth of the combustible wall.

- 1. Apply a bead of caulking (not supplied) around the corner edge of the inside surface of the firestop assembly, fit the firestop assembly to the hole and secure using the 4 screws (W570-0026) supplied in your manual baggie.
- 2. Once the vent pipe is installed in its final position, apply high temperature sealant W573-0002 (not supplied) between the pipe and the firestop.

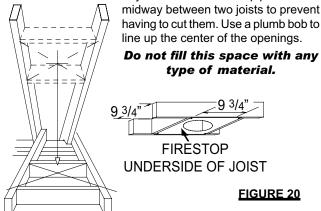
NOTE: DO NOT FILL THE CAVITY BETWEEN THE PIPE / LINER AND THE FIRESTOP SLEEVE WITH ANY TYPE OF MATERIAL.



### **VERTICAL INSTALLATION**

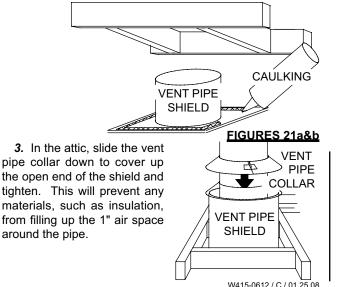
This application occurs when venting through a roof. Installation kits for various roof pitches are available from your Napoleon® dealer. See Accessories to order the specific kit required.

**1.** Determine the air terminal location, cut and frame a 9 3/4" square opening in the ceiling and the roof to provide the minimum clearance between the vent pipe and any combustible material. Try to center the vent pipe location

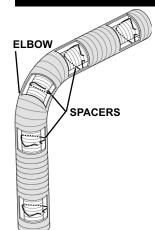


A vent pipe shield will prevent any materials such as insulation, from filling up the 1" air space around the pipe. Nail headers between the joist for extra support.

2. Apply a bead of caulking (not supplied) to the framework or to the Wolf Steel vent pipe shield plate or equivalent (in the case of a finished ceiling), and secure over the opening in the ceiling. A firestop must be placed on the bottom of each framed opening in a roof or ceiling that the venting system passes through. Apply a bead of caulking all around and place a firestop spacer over the vent shield to restrict cold air from being drawn into the room or around the fireplace. Ensure that both spacer and shield maintain the required clearance to combustibles. Once the vent pipe is installed in its final position, apply sealant between the pipe and the firestop assembly.



### **USING FLEXIBLE VENT COMPONENTS**

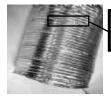


# **AWARNING**

Do not allow the 4" flexible vent pipe to bunch up on horizontal or vertical runs and elbows. Keep it pulled tight. A 1 1/4" air gap between the 4" and 7" flexible vent pipes all around is required for safe operation. A spacer is required at the start, middle and end of each elbow to ensure this gap is maintained. Spacers are attached to the 4" flexible vent pipe at predetermined intervals to maintain a 1-1/4" air gap to the 7" flexible vent pipe. These spacers must not be removed.

Use only approved flexible vent pipe kits marked:

### FIGURES 22a&b





"Wolf Steel Approved Venting" as identified by the stamp only on the 7" flexible vent pipe.

Six inches (6") is the minimum bend radius allowed for the seven inch (7") diameter flexible vent pipe.

For optimum performance it is recommended that all horizontal runs have a minimum 1" rise per foot using flexible vent components.

For safe and proper operation of the fireplace, follow the venting instructions exactly.

All 4" flexible vent pipe and 7" flexible vent pipe joints may be sealed using high temperature sealant W573-0002 (not supplied) or the high temperature sealant W573-0002 Mill Pac (not supplied). However, the high temperature sealant W573-0007 Mill Pac (not supplied) must be used on the joint connecting the 4" flexible vent and the exhaust flue collar.

### **HORIZONTAL AIR TERMINAL INSTALLATION**

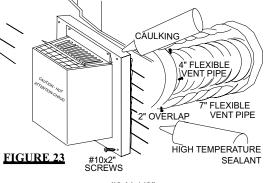
For safe and proper operation of the fireplace, follow the venting instructions exactly.

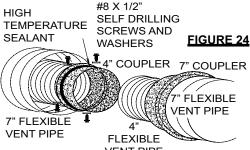
1. Stretch the 4" flexible vent pipe to the required length taking into account the additional length needed for the finished wall surface. Slip the vent pipe a minimum of 2" over the inner sleeve of the air terminal and secure with 3 #8 screws. Apply a heavy bead of the high temperature sealant W573-0007 (not supplied).

<u>NOTE:</u> If using pipe clamps to connect vent components, 3 screws must also be used to ensure the connection cannot slip off.

- **2.** Using the 7" flexible vent pipe, slide over the outer combustion air sleeve of the air terminal and secure with 3 #8 screws. Seal using high temperature sealant W573-0002 (not supplied).
- **3.** Insert the vent pipes through the firestop maintaining the required clearance to combustibles. Holding the air terminal (lettering in an upright, readable position), secure to the exterior wall and make weather tight by sealing with caulking (not supplied).
- **4.** If more vent pipe needs to be used to reach the fireplace, couple them together as illustrated. The vent system must be supported approximately every 3 feet for both vertical and horizontal runs. Use noncombustible strapping to maintain the minimum 1" clearance to combustibles.

The air terminal mounting plate may be recessed into the exterior wall or siding by  $1\frac{1}{2}$ ", the depth of the return flange.





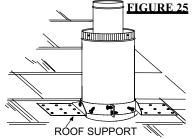
### **VERTICAL AIR TERMINAL INSTALLATION**

1. Fasten the roof support to the roof using the screws provided. The roof support is optional. In this case the venting is to be adequately supported using either an alternate method suitable to the authority having jurisdiction or the optional roof support. Figure 25.

**2.** Stretch the 4" flexible vent pipe to the required length. Slip the 4" flexible vent pipe a minimum of 2" over the inner sleeve of the air terminal connector and secure with 3 #8 screws. Seal using a heavy bead of high temperature sealant W573-0007 (not supplied). Figure 26.

<u>NOTE:</u> If using pipe clamps to connect vent components, 3 screws must also be used to ensure the connection cannot slip off.

**3.** Repeat using the 7" flexible vent pipe, using a heavy bead of high temperature sealant W573-0002 (not supplied). Figure 26.



INNER

FIGURE 26

TEMPERATURE SEALANT

4" FLEXIBLE VENT PIPE

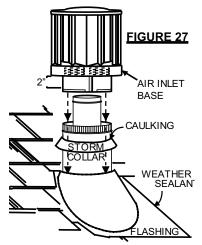
7" FLEXIBLE

VENT PIPE

AIR

CONNECTOR

- **4.** Thread the air terminal connector / vent pipe assembly down through the roof. The air terminal must be located vertically and plumb. Attach the air terminal connector to the roof support, ensuring that the top of the air terminal is 16" above the highest point that it penetrates the roof. Figure 27. **DO NOT CLAMP THE FLEXIBLE VENT PIPE.**
- **5.** Remove nails from the shingles, above and to the sides of the chimney. Place the flashing over the air terminal connector leaving a min. 3/4" of the air terminal connector showing above the top of the flashing. Slide the flashing underneath the sides and upper edge of the shingles. Ensure that the air terminal connector is properly centred within the flashing,

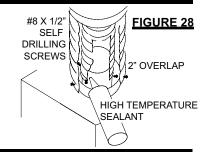


giving a 3/4" margin all around. Fasten to the roof. Do not nail through the lower portion of the flashing. Make weather-tight by sealing with caulking. Where possible, cover the sides and top edges of the flashing with roofing material. Figure 27.

- 6. Aligning the seams of the terminal and air terminal connector, place the terminal over the air terminal connector making sure the vent pine goes into the hole in
- connector making sure the vent pipe goes into the hole in the terminal. Secure with the three screws provided. Figure 27.
- **7.** Apply a heavy bead of weatherproof caulking 2" above the flashing. Note: Maintain a minimum 2" space between the air inlet base and the storm collar. Install the storm collar around the air terminal and slide down to the caulking. Tighten to ensure that a weather-tight seal between the air terminal and the collar is achieved. Figure 27.
- 8. If more vent pipe needs to be used to reach the fireplace, couple them together as illustrated. The vent system must be supported approximately every 3 feet for both vertical and horizontal runs. Use noncombustible strapping to maintain the minimum 1" clearance to combustibles. Figure 24.

### FIREPLACE VENT CONNECTION

- **1.** Install the 4" flexible vent pipe to the fireplace. Secure with 3 screws and flat washers. Seal the joint and screw holes using the high temperature sealant W573-0007 (not supplied).
- **2.** Install the 7" flexible vent pipe to the fireplace. Attach and seal the joints using the high temperature sealant W573-0002 (not supplied).



# **USING RIGID VENT COMPONENTS**

The vent system must be supported approximately every 3 feet for both vertical and horizontal runs. Use Wolf Steel vent spacers *W615-0033* every 3 feet on either side of each elbow to maintain the minimum 1½" clearance between the 7" rigid vent pipe and 4" rigid vent pipes. Use Napoleon® support ring assembly *W010-0370* or equivalent noncombustible strapping to maintain the minimum clearance to combustibles for both vertical and horizontal runs.

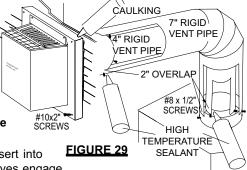
### HORIZONTAL AIR TERMINAL INSTALLATION

- **1.** Move the fireplace into position. Measure the vent length required between terminal and fireplace taking into account the additional length needed for the finished wall surface and any 1½" overlaps between venting components.
- **2.** Apply high temperature sealant W573-0007 (not supplied) to the outer edge of the 4" inner collar of the fireplace. Attach the first 4" rigid vent pipe component and secure using 3 self tapping screws. Repeat using the 7" rigid vent pipe component.

NOTE: Before attaching elbows to the collars on the back of the fireplace, 1 1/2" will need to be trimmed off the 4" collar.

3. Holding the air terminal (lettering in an upright, readable position), insert into both vent pipes with a twisting motion to ensure that both the terminal sleeves engage into the vent pipes and the sealant. Secure the terminal to the exterior wall and make weather tight by sealing with caulking (not supplied).

The air terminal mounting plate may be recessed into the exterior wall or siding by  $1\frac{1}{2}$ , the depth of the return flange.



# EXTENDED HORIZONTAL AND CORNER AIR TERMINAL INSTALLATION

AIR TERMINAL

20"/=

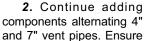
COUPLER

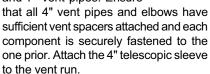
FIGURE 30

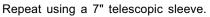
TELESCOPIC SLEEVE

VENTING

**1.** Follow the instructions for "Horizontal Air Terminal Installations", items 1 to 3.







Secure and seal as before. To facilitate completion, attach 4" and 7" couplers to the air terminal.

**3.** Install the air terminal. See item 3 of the Horizontal Air Terminal Installation. Extend the 4" telescopic sleeve; connect to the air terminal connector. Fasten with self tapping screws and seal. Repeat using the 7" telescopic sleeve.

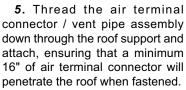
### **VERTICAL VENTING INSTALLATION**

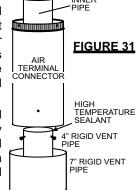
**REAR VENT APPLICATION:** Attach 4" and 7" elbows to the fireplace. Secure with 3 screws and seal the joints and screw heads using high temperature sealant. Proceed to step 1 below.

### **TOP VENT APPLICATION:**

- 1. Move the fireplace into position.
- **2.** Fasten the roof support to the roof using the screws provided. The roof support is optional. The venting is to be adequately supported using either an alternate method suitable to the authority having jurisdiction or the optional roof support.
- **3.** Apply high temperature sealant W573-0007 (not supplied) to the outer edge of the inner pipe of the air terminal connector. Slip the 4" rigid vent pipe pipe a minimum of 2" over the inner pipe of the air terminal connector and secure using 3 screws.
- 4. Apply high temperature sealant W573-0002 (not

supplied) to the outer edge of the of the outter pipe of the air terminal connector. Slip the 7" rigid vent pipe over the outer pipe of the air terminal connector and secure as before. Trim the 7" rigid vent pipe even with the end of the 4" rigid vent pipe.





If the attic space is tight, we recommend threading the Wolf Steel vent pipe collar or equivalent <u>loosely</u>

onto the air terminal connecter / vent pipe assembly as it is passed through the attic. The air terminal connector must be located vertically and plumb.



- **6.** Remove nails from the shingles, above and to the sides of the chimney. Place the flashing over the air terminal connector and slide it underneath the sides and upper edge of the shingles. Ensure that the air terminal connector is properly centered within the flashing, giving a <sup>3</sup>/<sub>4</sub>" margin all around. Fasten to the roof. Do NOT nail through the lower portion of the flashing. Make weather-tight by sealing with caulking. Where possible, cover the sides and top edges of the flashing with roofing material.
- 7. Aligning the seams of the terminal and air terminal connector, place the terminal over the air terminal connector making sure the vent pipe goes into the hole in the terminal. Secure with the three screws provided.
- 8. Apply a heavy bead of weatherproof caulking 2" above the flashing. Note: Maintain a minimum 2" space between the air inlet base and the storm collar. Install the storm collar around the air terminal and slide down to the caulking. Tighten to ensure that a weather-tight seal between the air terminal and the collar is achieved.
- **9.** Continue adding rigid vent pipe sections, sealing and securing as above. Attach a 4" collapsed telescopic sleeve to the last section of rigid piping. Secure with screws and seal. Repeat using a 7" telescopic sleeve.
- **10. REAR VENT APPLICATION:** Run a bead of high temperature sealant around the outside of the 4" elbow. Pull the adjustable pipe a minimum 2" onto the elbow. Secure with 3 screws. Repeat with the 7" telescopic pipe.

**TOP VENT APPLICATION:** Run a bead of high temperature sealant W573-0007 (not supplied) around the outside of the 4" collar on the fireplace. Pull the adjustable pipe a minimum of 2" onto the collar. Secure with 3 screws. Repeat with the 7" telescopic pipe.

11. In the attic, slide the vent pipe collar down to cover up the open end of the shield and tighten. This will prevent any materials, such as insulation, from filling up the 1" air space around the pipe.

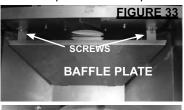
### **RESTRICTING VERTICAL VENTS**

Vertical termination installations exiting either from the rear or the top flue collar of the fireplace may display a very active flame. If this appearance is not desirable, the vent exit must be restricted to reduce the velocity of the exhaust gases, thus slowing down the flame pattern and creating a more traditional gentle appearance. Remove the baffle plate from the rear wall of the firebox, exposing the flue gas outlet opening. Superimpose this outlet hole with the smaller hole on the kit restrictor plate. Secure with the two screws provided and replace the baffle plate.

- **1.** Remove the front and the door from the fireplace.
- 2. Remove the screws securing the baffle plate. Figure 33.

**Note:** The baffle rests on two screws that are attached to the back of the firebox.

- 3. Using the screws supplied, attach the restrictor plate as shown in Figure 34.
- 4. Replace the baffle.





### **MOBILE HOME INSTALLATION**

This appliance is certified to be installed as an OEM (Original Equipment Manufacturer) installation in a manufactured home or mobile home and must be installed in accordance with the manufacturer's instructions and the Manufactured Home Construction and Safety Standard, Title 24 CFR, Part 3280, in the United States or the Mobile Home Standard, CAN/CSA Z240 MH Series, in Canada. This appliance is only for use with the type(s) of gas indicated on the rating plate. A conversion kit is supplied with the mobile home appliance.

This Mobile/Manufactured Home Listed appliance comes factory equipped with a means to secure the unit. The fireplace is equipped with two 1/4" diameter holes located in the front left and right corners of the base. For mobile home installations, the fireplace must be fastened in place. Use #10 hex head screws, inserted through the holes in the base to secure. Always turn off the pilot and the fuel suuply at the source, prior to moving the mobile home. After moving the mobile home and prior to lighting the fireplace, ensure that the logs are positioned correctly.

This appliance is certified to be installed in an aftermarket permanently located, manufactured (mobile) home, where not prohibited by local codes.

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

### **Conversion Kits**

The mobile home appliance is field convertible between Natural Gas (NG) and Propane (LP).

To convert from one gas to another consult your Napoleon® dealer/distributor.

### **GAS INSTALLATION**

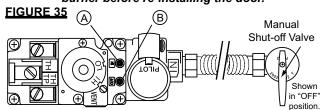
Proceed once the vent installation is complete.

# <u>NOTE:</u> All gas connections must be contained within the fireplace when complete.

- **1.** Move the fireplace into position and secure to the floor through the 1/4" holes located at either side of the base.
- **2.** The fireplace is designed to accept 3/8" gas supply line. The fireplace is equipped with a 3/8" manual shut-off valve.
- **3.** Connect the gas supply in accordance to local codes. In the absence thereof, install according to the National Installation Code.
- **4.** When flexing any gas line, support the gas valve so that the lines are not bent or kinked.
- 5. Check for gas leaks by brushing on a soap and water solution.

### DO NOT USE OPEN FLAME.

Purge all gas lines with the glass door of the stove removed. Assure that a continuous gas flow is at the burner before re-installing the door.



Supply pressure can be checked by turning screw (A) counter-clockwise until loosened and then placing pressure gauge tubing over the test point. Gauge should read 7" (minimum 4.5") water column for natural gas or 13" (11" minimum) water column for propane. Check that main burner is operating on "HI".

Manifold pressure can be checked the same as above using screw (B). Gauge should read 3.5" water column for natural gas or 10" water column for propane. Check that main burner is operating on "HI".

AFTER TAKING PRESSURE READINGS, TIGHTEN SCREWS FIRMLY TO SEAL. DO NOT OVERTORQUE. LEAK TEST

### **ELECTRICAL INSTALLATION**

# **AWARNING**

RISK OF ELECTRIC SHOCK!

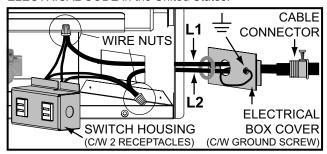
Control operates with 120 volt electricity.

Do NOT use the fireplace if any part has been under water. Call a qualified service technician IMMEDIATELY to have the fireplace inspected for damage to the electrical circuit.

### IT IS NECESSARY TO HARD WIRE THIS FIREPLACE.

Permanently framing the fireplace with an enclosure, requires the fireplace junction box to be hardwired.

This fireplace must be electrically connected and grounded in accordance with local codes. In the absence of local codes, use the current CSA C22.1 CANADIAN ELECTRICAL CODE in Canada or the ANSI/NFPA 70-1996 NATIONAL ELECTRICAL CODE in the United States.



# OPTIONAL WALL SWITCH INSTALLATION

For ease of accessibility, an optional remote wall switch may be installed in a convenient location. Connect a 20ft length of millivolt wire from the wall switch to the module. However, if a greater length is required route 2-strand (solid core) millivolt wire through the electrical hole located at the bottom left side of the unit. The recommended maximum lead length depends on wire size:

Do not connect either the wall switch, thermostat or gas valve directly to 120 volt electricity.

	******	
all	14 Gauge	100 Feet
ve	16 Gauge	60 Feet
/.	18 Gauge	40 Feet

### FRAMING

It is best to frame your fireplace after it is positioned and the vent system is installed. Frame to local building codes.

**NOTE:** In order to avoid the possibility of exposed insulation or vapour barrier coming in contact with the fireplace body, it is required that the walls of the fireplace enclosure be "finished" (ie: drywall/sheetrock), as you would finish any other outside wall of a home. This will ensure that clearance to combustibles is maintained within the cavity.

To install the fireplace face flush with the finished wall, position the framework to accommodate the thickness of the finished wall.

It is not necessary to install a hearth extension with this fireplace system.

When roughing in the fireplace, raise the fireplace to accommodate for the thickness of the finished floor materials, i.e. tile, carpeting, hard wood, which if not planned for will interfere with the opening of the lower access door and the installation of many decorative flashing accessories.

Minimum clearance to combustible construction from fireplace and vent surfaces:

### Combustible Framing:

- 0" to stand-offs
- 1" to bottom and sides of the vent pipe\*
- 2" to top of the vent pipe\*

### Combustible Finishing:

- 0" to rear
- 0" to front face top and sides
- 13" recessed depth

### Rear Vent

- 39 1/8" to enclosure top from base of the unit
- 45 1/8" to ceiling from base of the unit

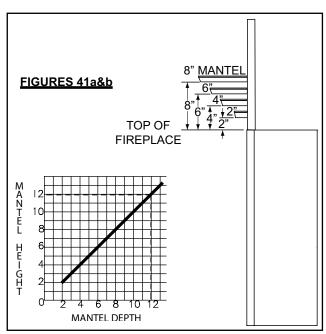
### Top Vent

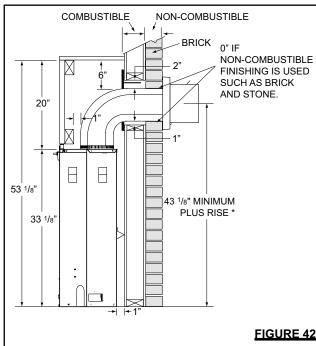
- 53 1/8" to enclosure top from base of the unit
- 53 1/8" to ceiling from base of the unit
- \* HORIZONTAL VENT SECTIONS A minimum clearance of 1" at the bottom and sides and 2" at the top of the vent pipe in all horizontal runs to combustibles is required. Use firestop spacer W010-1774 (supplied).
- \* VERTICAL VENT SECTIONS A minimum of 1" all around the vent pipe on all vertical runs to combustibles is required except for clearances in fireplace enclosures. See "Minimum Enclosure Clearances" section. Use firestop spacer W500-0096 (not supplied).

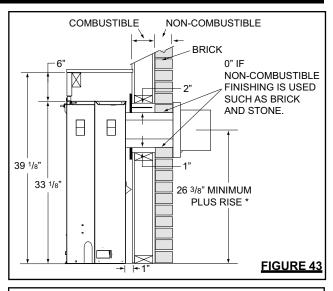
### **REAR VENT** TOP VENT FIGURE 37 FIGURE 39 MINIMUM 39 1/8" MINIMUM **ENCLOSURE** 53 <sup>1</sup>/8" HEIGHT ENCLOSURE **HEIGHT** FIGURES 38 a&b OUTSIDE CHASE 13 <sup>1</sup>/<sub>4</sub>" 23' FIGURES 40 a.b&c MINIMUM 22 1/4" INSIDE CHASE OUTSIDE 22 1/4" CHASE 13 1/4" SIDE PROTRUSION WALL 22 1/4" INSIDE CHASE SIDE PROTRUSION

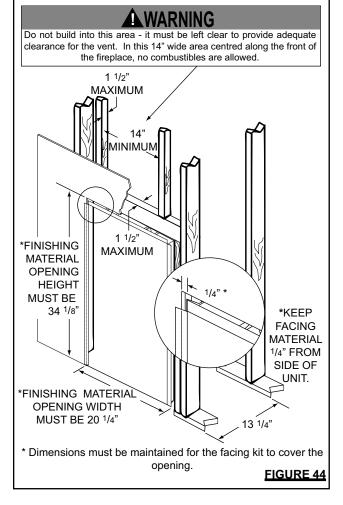
# MINIMUM MANTEL AND ENCLOSURE CLEARANCES

Mantel clearance can vary according to the mantel depth. Use the graph to help evaluate the clearance needed. Combustible materials must be installed flush with the front of the fireplace but must not cover any of the black face-area of the fireplace. Non-combustible material (brick, stone or ceramic tile) may protrude past the face of the fireplace.





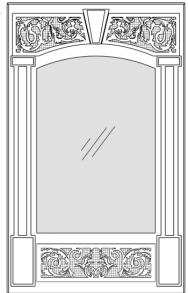




The fireplace requires a minimum enclosure height of 53 1/8" for a top vent, and 39 1/8" for a rear vent. For temperature requirements, the enclosure space around and above the fireplace must be left unobstructed. See figures 42 and 43.

# FRONT FACING AND INSET KIT INSTALLATION

FIGURE 45



**WARNING:** 

The components in this kit are heavy, use care when lifting and ensure they are firmly secured once installed.

This front facing does not replace the main glass door. Do not operate without the main glass door installed.

The front facing can sit flush with a counter, floor, or hearth.

1. Secure the insets ① ② and screens ③ to the front facing ⑤ with the locktooth washers and hex nuts supplied.

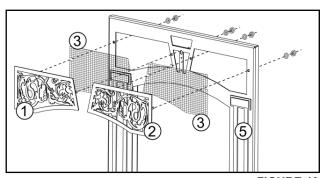
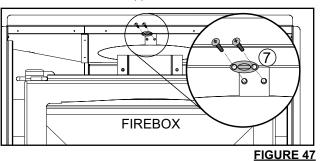
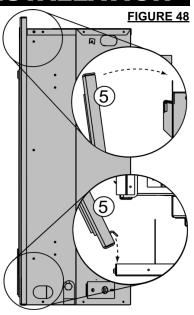


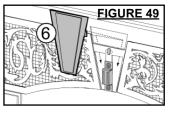
FIGURE 46

**2.** Install the turn button  $\bigcirc$  to the face of the firebox using the 2 flat head screws supplied.



3. Hook the bottom of the front facing ⑤ on the bottom lip of the firebox. Pivot the front facing against the firebox and insert the head of the turn button ⑦ through the slot in the front facing. (FIGURE 48) Secure by turning the head of the turn button 1/4 turn.





**4.** Clip the keystone <sup>6</sup> over the band of material and centre on the magnet.

**5.** While angling the bottom inset, insert the side tabs on the bottom inset ④ behind the side edges of the control panel opening.

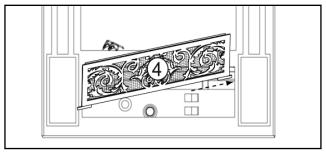


FIGURE 5

**6.** Close the bottom inset assembly 4 against the magnet to hold closed.

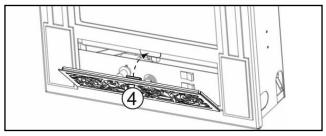


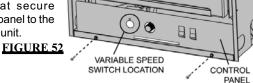
FIGURE 51

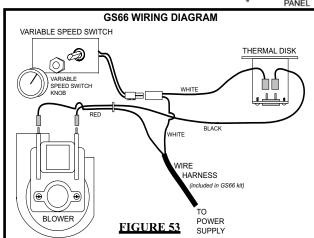
### BLOWER INSTALLATION

**ELECTRICAL INSTALLATION TO BE DONE BY A QUALIFIED INSTALLER** and must be connected and grounded in accordance with local codes. In the absence of local codes, use the current CSA C22.1 CANADIAN ELECTRICAL CODE in Canada or the current ANSI/NFPA 70 NATIONAL ELECTRICAL CODE in the United States.

If an optional blower is to be used, the blower must be connected to the main power supply. Route a grounded 14 gauge 2-wire power cable to the junction box and ground. At the point where the cable enters the junction box, a conduit connector must be provided.

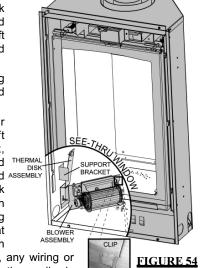
1. Remove the two screws that secure the control panel to the front of the unit.





- 2. Connect the black and red wires of the wire harness to the prongs on the blower.
- **3.** Connect the white and black wires of the wire harness to the prongs on the thermodisc.

- 4. Place the thermal disk assembly onto the stud located at the lower left of the firebox and behind the support bracket.
- **5.** Connect the wiring for the variable speed switch.
- 6. Insert the blower assembly into the left side under the firebox, slide into the clip and place onto the same stud ASSEMBLY used for the thermal disk assembly. Secure with the lock washer and wing nut supplied. Ensure that the blower does not touch



the base of the firebox, any wiring or controls. Ensure that the thermodisc is touching the wall of the firebox.

<u>HINT:</u> Rest the thermal disk assembly forward against the support bracket.

7. Place the variable speed switch into position and secure with the pal nut supplied. (*FIGURE 25*) Reinstall the control panel and install the variable speed switch knob.

 $\underline{\textit{NOTE:}}$  Plug into the receptacle on the right side of the unit.

# NIGHT LIGHT™ REPLACEMENT

### **BULB REPLACEMENT**

The GD19 comes equipped with our "Night Light™". If in the event the lamp or lens needs to be replaced, follow these instructions.

- 1. Turn off all electrical supply.
- 2. Remove the front and door from the firebox.
- **3.** Unscrew the lens cover making sure the washer stays in place.

# Note: Do not handle the lamp (bulb) with bare fingers, protect with a clean dry cloth.

**4.** The lamp will pull straight out of the socket. Replace with Wolf Steel Ltd. parts only (W387-0006), as lamp and lens are special "high temperature" products. **5.** Replace lens with gasket, lense covers, attach wires to

quick connects and replace the door when finished.

### THE FIREBOX MUST BE SEALED.



When re-assembling the light assembly, care must be taken. "Light Leakage" from above the cast doors may be noticed. The holes in the lamp housing are necessary for ventilation and must not be covered.

### LENS ASSEMBLY INSTALLATION

- **1.** Remove the door from the firebox.
- **2.** Run the wires up through the lens hole.
- **3.** Align key hole with lens assembly.
- 4. Snap into place.
- 5. Replace light shields,

attach the wires and replace the door to the firebox.



### LENS ASSEMBLY REPLACEMENT

- **1.** Remove the front door and top shield from the firebox.
- 2. Compress the retainer fins in with a screw driver while pressing firmly on the top of the light assembly.
- **3.** Once all the retainer fins are pushed in the lens assembly will snap out of place.

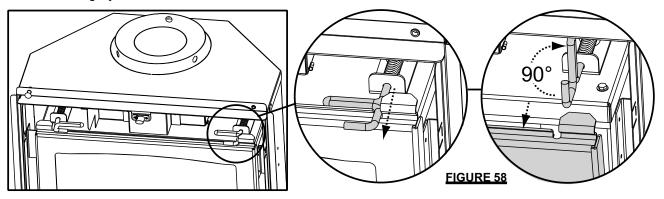


## **FINISHING**

### **GLASS DOOR INSTALLATION AND REMOVAL**

Before the glass door can be removed, the optional front must be removed. The glass door is secured to the top front edge of the firebox and retained by the bottom.

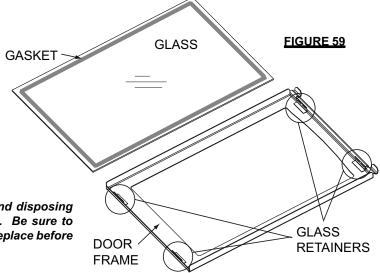
- 1. Unlatch door
- 2. Pull handle and rotate 90°.
- 3. Pivot door slightly and lift out of bottom retainer.



### **DOOR GLASS REPLACEMENT**

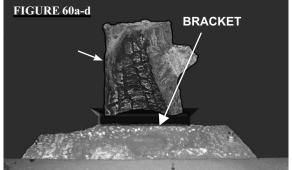
- **1.** Place the door frame face down careful not to scratch the paint.
- **2.** Center the gasketed glass inside the door frame with the thick side of the gasket facing up.
- **3.** Bend the glass retainers located along the edge of the door frame over the gasket holding the glass in place. Careful not to break the glass.

<u>NOTE:</u> Care must be taken when removing and disposing of any broken glass or damaged components. Be sure to vacuum up any broken glass from inside the fireplace before operation.

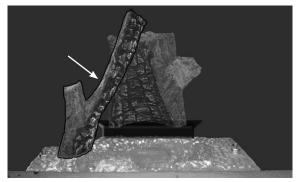


### LOG PLACEMENT

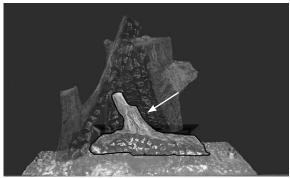
In order to assemble the log set, the glass door must be removed, see *Glass Door Installation and Removal*.



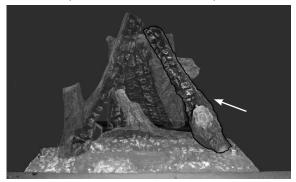
1. Place the rear log as shown, ensuring the holes on the underside are placed onto the 2 pins of the log support.



**2.** Place the left log as shown, ensuring the hole on the underside is placed onto the burner pin. This will rest on the left side of the rear log.



**3.** Place the center log as shown, ensuring the holes on the underside are placed onto the two center pins.



- **4.** Place the hole in the underside of the right log onto the locating pin, on the burner base and rests against the rear log as shown.
- 5. Re-install the glass door.

### **CHARCOAL EMBERS**

Randomly place the charcoal embers along the front and sides of the burner in a realistic manner. Fine dust found in the bottom of the bag should not be used.

### **VERMICULITE**

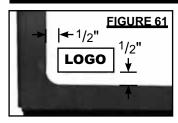
Sprinkle vermiculite around the charcoal embers. Note: Both charcoal embers and vermiculite are not to be placed on the burner ports.

### **GLOWING EMBERS**

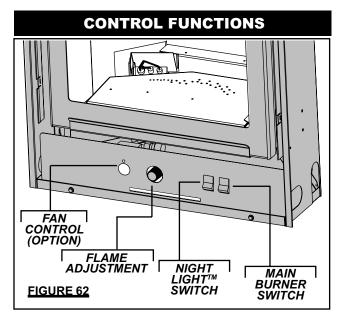
Tear the embers into pieces and place along the burner ports covering all of the burner. Care should be taken to shred the embers into thin, small irregular pieces as only the exposed edges of the fibre hairs will glow. The ember material will only glow when exposed to direct flame; however, care should be taken to not block the burner ports.

Blocked burner ports can cause an incorrect flame pattern, carbon deposits and delayed ignition. Phazer<sup>™</sup> logs glow when exposed to direct flame. Use only certified "glowing embers" and Phazer<sup>™</sup> logs available from your Napoleon® dealer.

### **LOGO PLACEMENT**



Remove the backing of the logo supplied and place on the glass viewing door, as indicated.



### **MAIN BURNER SWITCH**

This switch turns the Main Burner on and off.

### **FLAME ADJUSTMENT**

Turn this knob clockwise or counter-clockwise to adjust the main burner flame height.

### NIGHT LIGHT™ SWITCH

This switch turns the Night Light™ on and off.

### FAN CONTROL OPTION

If installed this switch will turn on and off the power to the blower and control the fan speed. There is also a thermally activated switch that will only let the blower come on once the unit has reached a comfortable temperature.

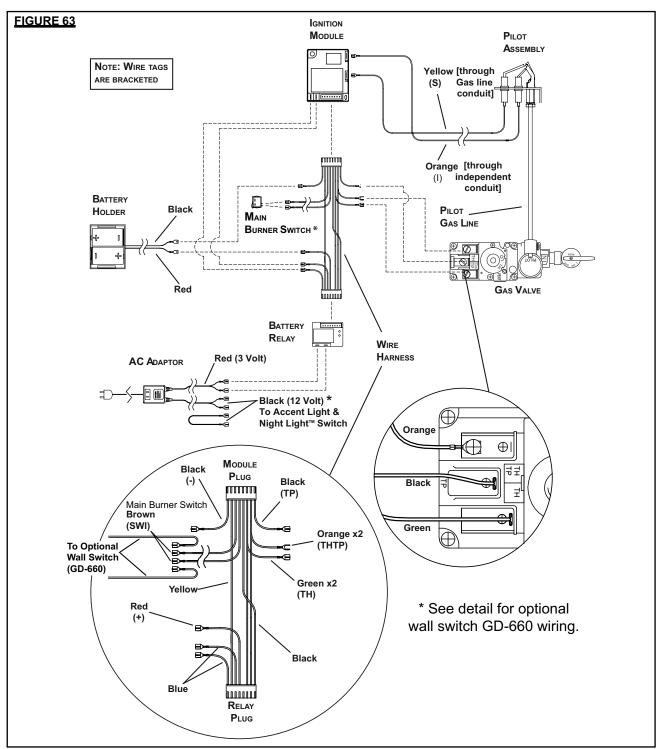
### WIRING DIAGRAM

The main burner and Night Light™ switch is located behind lower access panel. For ease of accessibility, optional remote wall switches may be installed in a convenient location for both burner and light operation.

The recommended maximum lead length depends on wire size:

WIRE SIZE MAX. LENGTH
14 gauge 100 feet
16 gauge 60 feet
18 gauge 40 feet

Route 2-strand (solid core) wire through the electrical hole located at the bottom left side of the unit. Connect the wires from the main burner wall switch to the two corresponding spade connectors on the back of the on/off switch for the burner located behind the lower access panel. Repeat connecting the wires to the Night Light<sup>TM</sup> on/off switch for remote operation.



### OPERATION / MAINTENANCE

Purge all gas lines with the glass door of the fireplace removed or opened. Assure that a continuous gas flow is at the burner before installing the door.

When lit for the first time, the fireplace will emit a slight odour by the "burn-in" of internal paints and lubricants used in the manufacturing process and will not occur again.

After extended periods of non-operation such as following a vacation or a warm weather season, the fireplace may omit a slight odour for a few hours. This is caused by dust particles in the heat exchanger burning off. In both cases, open a window to sufficiently ventilate the room.

### FOR YOUR SAFETY READ BEFORE OPERATING

### **▲ WARNING**

IF YOU DO NOT FOLLOW THESE INSTRUCTIONS EXACTLY, A FIRE OR EXPLOSION MAY RESULT CAUSING PROPERTY DAMAGE, PERSONAL INJURY OR LOSS OF LIFE.

**A.** THIS FIREPLACE IS EQUIPPED WITH AN IGNITION DEVICE WHICH AUTOMATICALLY LIGHTS THE PILOT. DO NOT TRY TO LIGHT BY HAND.

**B.** BEFORE OPERATING SMELL ALL AROUND THE FIREPLACE AREA FOR GAS AND NEXT TO THE FLOOR BECAUSE SOME GAS IS HEAVIER THAN AIR AND WILL SETTLE ON THE FLOOR.

**C.** USE ONLY YOUR HAND TO TURN THE GAS CONTROL KNOB. NEVER USE TOOLS. IF THE KNOB WILL NOT TURN BY HAND, DO NOT TRY TO REPAIR IT. CALLA QUALIFIED SERVICE TECHNICIAN. FORCE OR ATTEMPTED REPAIR MAY RESULT IN A FIRE OR EXPLOSION.

D. DO NOT USE THIS FIREPLACE IF ANY PART HAS BEEN UNDER WATER. IMMEDIATELY CALL A QUALIFIED SERVICE TECHNICIAN TO INSPECT THE FIREPLACE AND REPLACE ANY PART OF THE CONTROL SYSTEM AND ANY GAS CONTROL WHICH HAS BEEN UNDER WATER.

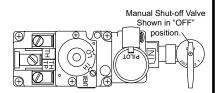
### WHAT TO DO IF YOU SMELL GAS:

- TURN OFF ALL GAS TO THE FIREPLACE.
- OPEN WINDOWS.
- DO NOT TRY TO LIGHT ANY APPLIANCE.
- DO NOT TOUCH ANY ELECTRIC SWITCH; DO NOT USE ANY PHONE IN YOUR BUILDING.
- IMMEDIATELY CALL YOUR GAS SUPPLIER FROM A NEIGHBOUR'S PHONE FOLLOW THE GAS SUPPLIER'S INSTRUCTIONS.
- IF YOU CANNOT REACH YOUR GAS SUPPLIER, CALL THE FIRE DEPARTMENT.

### OPERATING INSTRUCTIONS

- STOP! READ THE ABOVE SAFETY INFORMATION ON THIS LABEL.
- 2. TURN REMOTE WALL SWITCH TO OFF POSITION.
- 3. TURN OFF ALL ELECTRIC POWER TO THE FIREPLACE AND REMOVE BATTERIES.
- THIS FIREPLACE IS EQUIPPED WITH AN IGNITION DEVICE WHICH AUTOMATICALLY LIGHTS THE PILOT. DO NOT TRY TO LIGHT THE PILOT BY HAND.
- 5. TURN MANUAL SHUTOFF VALVE CLOCKWISE TO OFF
- 6. OPEN THE GLASS DOOR.
- WAIT FIVE (5) MINUTES TO CLEAR OUT ANY GAS. IF YOU SMELL GAS INCLUDING NEAR THE FLOOR, STOP! FOLLOW "B" IN THE ABOVE SAFETY INFORMATION ON THIS LABEL. IF YOU DON'T SMELL GAS GO TO THE NEXT STEP.

- 8. CLOSE THE GLASS DOOR.
- 9. TURN MANUAL SHUTOFF VALVE COUNTER-CLOCKWISE TO ON.
- 10. TURN ON ALL ELECTRIC POWER TO THE FIREPLACE AND RE-INSTALL BATTERIES.
- 11. TURN ON REMOTE WALL SWITCH TO ON POSITION.
- 12. IF FIREPLACE WILL NOT OPERATE, FOLLOW INSTRUCTIONS "TO TURN OFF GAS" AND CALL YOUR SERVICE TECHNICIAN OR GAS SUPPLIER.



### **TO TURN OFF GAS**

- 1. TURN OFF REMOTE WALL SWITCH TO THE FIREPLACE.
- 2. TURN OFF ALL ELECTRICAL POWER TO THE FIREPLACE IF SERVICE IS TO BE PERFORMED.
- TURN MANUAL SHUTOFF VALVE CLOCKWISE TO OFF. DO NOT FORCE.

### **MAINTENANCE**

# TURN OFF THE GAS AND UNPLUG ELECTRICAL POWER BEFORE SERVICING THE STOVE:

**Caution:** Label all wires prior to disconnection when servicing controls. Wiring errors can cause improper and dangerous operation. Verify proper operation after servicing. This stove and its venting system should be inspected before use and at least annually by a qualified service person. The fireplace area must be kept clear and free of combustible materials, gasoline or other flammable vapours and liquids. The flow of combustion and ventilation air must not be obstructed.

- 1. In order to properly clean the burner and pilot assembly, remove the logs exposing both assemblies.
- 2. Keep the control compartment, logs, burner, air shutter opening and the area surrounding the logs clean by vacuuming or brushing, at least once a year.

- 3. Check to see that all burner ports are burning. Clean out any of the ports which may not be burning or are not burning properly.
- **4.** Check to see that the pilot flames are large enough to engulf the sensor on one leg and reaches toward the burner on the other leg.
- 5. Replace the cleaned logs.
- **6.** Check to see that the main burner ignites completely on all openings when the gas knob for the burner is turned on.

A 5-10 second total light-up period is satisfactory. If ignition takes longer, consult your Napoleon® dealer/distributor.

- 7. Check that the door gasketing is not broken or missing.
- **8.** If for any reason the vent air intake system is disassembled, re-install and re-seal per the instructions provided for the initial installation.

### **ADJUSTMENTS**

### PILOT INJECTOR AND ORIFICE REPLACEMENT

- 1. Turn off the electrical and gas supply to the fireplace.
- 2. Remove the front, glass viewing door and log set.
- 3. Remove the 2 securing screws. Slide the burner assembly to the right and lift out.
- **4.** Using a deep <sup>9</sup>/<sub>16</sub>" socket wrench, remove the main burner orifice. A <sup>7</sup>/<sub>8</sub>" back-up wrench must be used on the manifold, located below the housing to ensure that the aluminum tubing does not twist or kink. Replace the correct burner orifice using pipe thread compound.
- **5.** Loosen nut and replace with appropriate pilot injector
- **6.** Reinstall the burner ensuring that the Venturi tube fits over the orifice.



FIGURE 65

NOTE: Check and adjust, if necessary, the primary air to  $^{1}/_{16}$ " for propane and  $^{1}/_{32}$ " for natural gas. Replace the screws.

7. Turn on the gas supply and check for gas leaks by brushing on a soap and water solution.

### Do not use open flame.

- 8. Replace the log set. Then light the pilot and main burner to ensure that the gas lines have been purged.
- **9.** Replace the glass viewing door and cast front. Turn on the electrical supply to the fireplace.

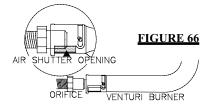
Purge all gas lines with the glass door removed.
Assure that a continuous flow is at the burner before
re-installing the door.

This must be carried out by an AUTHORIZED REPRESENTATIVE OF WOLF STEEL LTD. or a QUALIFIED GAS INSTALLER in accordance with local codes or in the absence of local codes with the requirements of the provincial / state authorities having jurisdiction and in accordance with the requirements of the CAN1-B149 Installation Code in Canada and the ANSI Z223.1 National Fuel Gas Code in the United States.

### **VENTURI ADJUSTMENT**

Remove the 2 screws securing the burner. Natural gas models have air shutters set to 0.031" open (1/32"). Propane models have air shutters set to 0.063" open (1/16").

After making adjustments replace the burner ensuring that the venturi tube fits over the orifice and replace the screws.



Closing the air shutter will cause a more yellow flame, but can lead to carboning. The flame may not appear yellow immediately; allow 15 to 30 minutes for the final flame colour to be established.

Air shutter adjustment must only be done by a qualified gas installer!

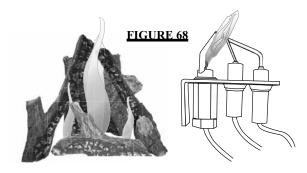
For fuel conversion refer to the instructions included with your conversion kit.

### **FLAME ADJUSTMENT**

# Turn counterclockwise to to decrease flame height FIGURE 67 FLAME ADJUSTMENT KNOB Shown in "OFF" position.

### **FLAME CHARACTERISTICS**

It is important to periodically perform a visual check of the pilot and burner flames. Compare them to the illustrations provided.



### REPLACEMENTS

Contact your dealer for questions concerning prices and availability of replacement parts. Normally all parts can be ordered through your Napoleon® dealer or distributor. When ordering replacement parts always give the following

- 1. Model & Serial Number of Fireplace
- 2. Installation date of fireplace
- 3. PART NUMBER

information:

- 4. DESCRIPTION OF PART
- 5. FINISH

# **AWARNING**

Failure to position the parts in accordance with these diagrams or failure to use only parts specified approved with this appliance may result in property damage or personal injury.

\* IDENTIFIES ITEMS WHICH ARE NOT ILLUSTRATED. FOR FURTHER INFORMATION, CONTACT YOUR

Napoleon® dealer.

FOR WARRANTY REPLACEMENT PARTS, A PHOTOCOPY OF THE ORIGINAL INVOICE WILL BE REQUIRED TO HONOUR THE CLAIM.

### **REPLACEMENT PARTS**

#	PART #	DESCRIPTION
1	W135-0322	LOG #1- REAR
2	W135-0323	LOG #2 - LEFT
3	W135-0324	LOG #3 - RIGHT
4	W135-0325	LOG #4 - CENTRE
5	GL-662	LOG SET
6	W725-0032	DEXEN VALVE - NG
6	W725-0049	DEXEN VALVE - LP
7	W010-1653	PAN BURNER
8	W455-0087	#52 BURNER ORIFICE - NG
8	W455-0088	#60 BURNER ORIFICE - LP
9	W455-0049	PILOT INJECTOR - LP
10	W455-0071	PILOT INJECTOR - NG
11	W720-0092	PILOT TUBE
12	W100-0069	PILOT ASSEMBLY - NG
12	W100-0093	PILOT ASSEMBLY - LP
13*	W385-0334	NAPOLEON® LOGO
14*	W660-0009	ON/OFF SWITCH
15*	W387-0009	HALOGEN BULB 5W
16*	W387-0004	HIGH TEMPERATURE LIGHT ASSEMBLY
17	W010-1749	GLASS w/ GASKET
18	W010-1774	FIRESTOP SPACER

### **ACCESSORIES**

25	GS66	BLOWER KIT
26*	W175-0266	CONVERSION KIT - NG-LP 0-4,500
26*	W175-0267	CONVERSION KIT - LP-NG 0-4,500
27	GD-301	HEAT GUARD
28*	W175-0001	4" COUPLER
29	GD201	PERISCOPE
30	FK19	FACING KIT, METALIC BLACK FINISH
31	FK19PW	FACING KIT, PEWTER FINISH
32	VOIK	VICTORIAN ORNAMENTAL INSETS
32	VOISS	VICTORIAN ORNAMENTAL INSETS
33*	W500-0033	MOUNTING VARIABLE SPEED SWITCH PLATE
34*	W660-0010B	REMOTE CONTROL ADVANTAGE
35*	W660-0026	BATTERY OPERATED TIMER
36*	PRP19	PORCELAIN REFLECTOR RADIANT PANEL KIT
37*	GD839KT	DECO BRICK KIT - SANDSTONE
38*	VS47KT	VENT SLEEVE
39*	GD-660	SWITCH & WIRE
40*	GD222	WALL TERMINAL
41*	W573-0002	HIGH TEMPERATURE SEALANT
42*	W573-0007	HIGH TEMPERATURE SEALANT
43*	W500-0096	FIRESTOP SPACER
44*	W585-0072	VENT PIPE SHIELD
45*	W170-0063	VENT PIPE COLLAR

### **ROOF TERMINAL KITS**

# GD110 - 1/12 TO 7/12 PITCH

20	VV67U-UUU6	AIR LERMINAL
21	W490-0073	4/7 INNER / OUTER SLEEVE
22	W010-0567	ROOF SUPPORT
23	W170-0063	STORM COLLAR
24	W263-0054	ROOF FLASHING

### GD111 - 8/12 TO 12/12 PITCH

20	W670-0006	AIR LERMINAL
21	W490-0073	4/7 INNER / OUTER SLEEVE
22	W010-0567	ROOF SUPPORT

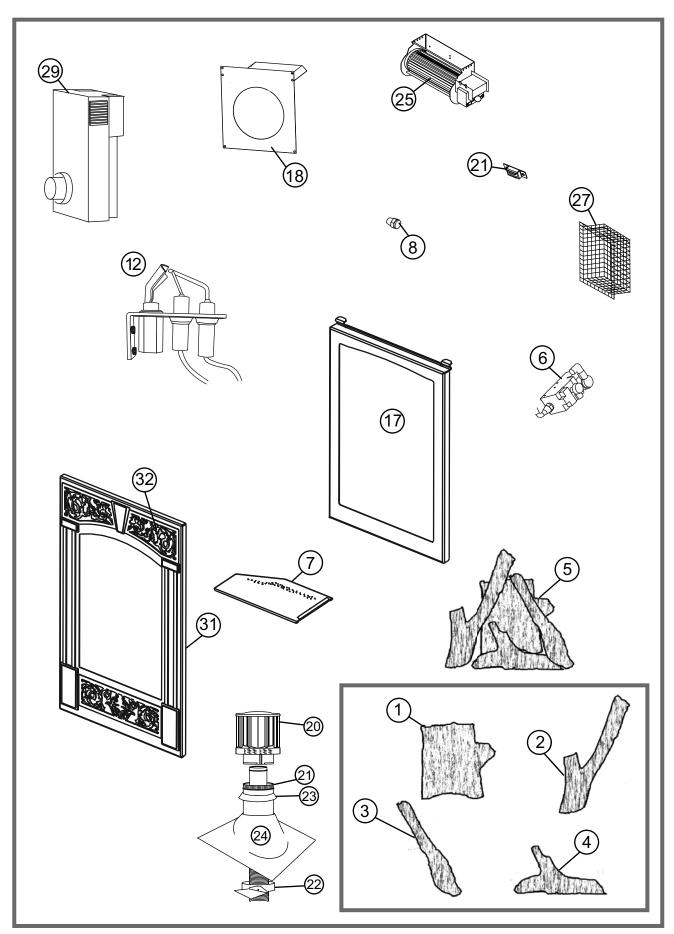
22 W010-0567 ROOF SUPPORT
 23 W170-0063 STORM COLLAR
 24 W263-0055 ROOF FLASHING

### **GD112 - FLAT ROOF**

W670 0006

20	VV07 0-0000	AIIX I LIXIVIIINAL
21	W490-0073	4/7 INNER / OUTER SLEEVE
22	W010-0567	ROOF SUPPORT
23	W170-0063	STORM COLLAR
24	W263-0056	ROOF FLASHING

AID TEDMINIAL



# TROUBLE SHOOTING GUIDE

Before attempting to troubleshoot, purge your unit and initially light the pilot and the main burner with the glass door removed.

SYMPTOM	PROBLEM	TEST SOLUTION
Pilot will not light. Makes noise with no spark at pilot burner	- Wiring	Verify the "S" wire for the sensor and the "I" wire for the ignitor are connected to the correct terminals (not reverse) on the module and pilot assembly.
	- Loose connection	Verify no loose connections, electrical shorts in the wiring or ground out to any metal object.
	- Module	Turn the ON/OFF switch to the "OFF" position. Remove the igniter wire "I" from the module. Place the ON/OFF switch to the "ON" position. Hold a grounded wire about 3/16" away from the "I" terminal on the module. If no spark the "I" terminal module must be replaced. If there is a spark the "I" terminal is fine. Inspect pilot assembly for a shorted wire or cracked insulator around the electrode.
_	- Igniter Spark gap is incorrect	- spark gap of the ignitor to the pilot should be .125" (1/8").
Pilot will not light. Makes no noise with no spark at pilot burner	- Transformer	Verify the transformer is installed and plugged into the module. Check voltage of the transformer under load at the spade connections on the module with the ON/OFF switch in the "ON" position. Acceptable readings of a good transformer are between 3.2 and 2.8 volts A.C.
-	- A shorted or loose Connection	Remove and reinstall the wiring harness that plugs into the module.  Remove and verify continuity of each wire in wiring harness.
-	- Improper switch wiring - Module is not grounded	Troubleshoot the system with a simple ON/OFF switch  Verify the valve and pilot assemblies are properly grounded to the metal chassis of the fireplace or log set.
-	- Faulty module	Turn the ON/OFF switch to the "OFF" position. Remove the igniter wire "I" from the module. Place the ON/OFF switch to the "ON" position. Hold a grounded wire about 3/16" away from the "I" terminal on the module. If no spark the "I" terminal module must be replaced. If there is a spark the "I" terminal is fine. Inspect pilot assembly for a shorted wire or cracked insulator around the electrode.
Pilot sparks but will not li	ght - Gas supply	Verify that the incoming gas line ball valve is "Open". Verify that the inlet pressure reading is within acceptable limits, inlet pressures must not exceed 14" W.C.
_	- Module is not grounded	Verify the value and pilot assemblies are properly grounded to the metal chassis of the fireplace or log set.
_	- Out of propane gas.	- fill the tank.
Continues to sparks and pilot lights, but main burner will not	- Short or loose connection in sensor rod	Verify all connections. Verify the connections from the pilot assembly are tight; also verify these connections are not grounding out to any metal.
light	- Poor flame rectification or contaminated sensor rod	Verify the flame is engulfing the sensor rod. This will increase the flame rectification. Verify correct pilot orifice is installed and inlet gas specifications to manual. (Remember, the flame carries the rectification current, not the gas. If the flame lifts from pilot hood, the circuit is broken. A wrong orifice or too high of an inlet pressure can cause the pilot flame to lift.) The sensor rod may need cleaning.
_	<ul> <li>Poor grounding between pilot assembly and gas valve</li> </ul>	Verify that the wire harness is firmly connected to module
_	- Damaged pilot or dirty sensor rod	Verify that the ceramic insulator around the sensor rod is not cracked, damaged, or loose. Verify the connection from the sensor rod to the sensor wire. Clean sensor rod with an emory cloth to remove any contamination that may have accumulated on the sensor rod. Verify continuity with multimeter with ohms set at the lowest range.

SYMPTOM	PROBLEM	TEST SOLUTION
Pilot lights Stops sparking	- Wiring / Connection	Inspect all wires, ensure good tight connections. Verify that all wiring is installed exactly as specified.
/ pilot remains lit but burner will not turn on	- Wiring harness	Inspect the wiring harness, and verify the harness is tightly connected to the module. Verify that you have 7 wires and they are connected in the right order.
	- Module or Valve	Conduct the following test to verify if the problem is the module or valve. To measure voltages, turn multimeter to "DC" place the red lead from multimeter on the screw on the terminal block for the wire you are checking, touch black lead to ground (valve body). Importantly, a "Zero" volts reading does not automatically indicate a bad module, there may be too little resistance in the valve solenoid. Check if the Green wire is disconnected from the valve. The voltage output from the module should be between 2 and 3 volts.
Exhaust fumes smelled in room, headaches.	- Fireplace is spilling.	Check all seals.
Carbon is being deposited on glass, logs or	- Air shutter has become blocked	Ensure air shutter opening is free of lint or other obstructions.
combustion chamber surfaces.	- Flame is impinging on the logs or combustion chamber.	Check that the logs are correctly positioned.  Open air shutter to increase the primary air.  Check the input rate: check the manifold pressure and orifice size as specified by the rating plate values.  Check that the door gasketing is not broken or missing and that the seal is tight.  Check that both vent liners are free of holes and well sealed at all joints.  Check that minimum rise per foot has been adhered to for any horizontal venting.
Flames are very ag-	- Door is ajar	Realign door and secure.
gressive.	- Venting action is too great.	Restrict vent exit with restrictor plate. See Restricting Vents.
Main burner flame is a blue, lazy, transparent	- Blockage in vent.	Remove blockage. In really cold conditions, ice buildup may occur on the terminal and should be removed as required.
flame.	- Incorrect installation.	Confirm installation with venting parameters.
White / grey film forms.	<ul> <li>Sulphur from fuel is being de posited on glass, logs or combustion chamber surfaces.</li> </ul>	Clean the glass with a recommended gas fireplace glass cleaner. DO NOT CLEAN GLASS WHEN HOT. If deposits are not cleaned off regularly, the glass may become permanently marked.

NOTES