# Installation Instructions Model Number FDV350 Free Standing Direct Vent Gas Stove (Field Convertible to Vented Stove)

Stock #'s: FDV350N, FDV350LP are Certified to: ANZI Z21.88-2009, CSA 2.33-2009 Listed Direct Vent Gas Fired Free Standing Room Heater

INSTALLER: Leave this manual with the appliance. CONSUMER: Retain this manual for future reference.



This appliance may be installed in an aftermarket permanently located, manufactured home (USA only) or mobile home, where not prohibited by local codes.

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.

## Read this complete manual before beginning installation. These instructions must be kept with the unit for future reference.

# FOR YOUR SAFETY

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

WARNING: Improper installation, adjustment, alteration, service or maintenance can cause property damage, personal injury or loss of life. Refer to this manual. Installation and service must be performed by a qualified installer, service agency or the gas supplier.

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. Extinguish any open flame. Do not touch any electrical switch. Do not use any phone in your building. Immediately call your gas supplier from a neighbour's phone. If you can not reach your gas supplier, call the fire department.

For Propane Horizontal installations the venting must be a minimum of one foot vertical off the flue before going horizontal.



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## **PRE-INSTALLATION QUESTIONS and ANSWERS**

#### Why does my fireplace or stove give off odour?

It is normal for your fireplace to give off some odour. This is due to the curing of the paint, adhesives, silicones and any undetected oil from the manufacturing process as well as the finishing materials used with the installations (e.g. marble, tile and the adhesives used to adhere this product to the walls can react with heat and cause odours).

It is recommended that you burn your gas fireplace or stove for a minimum of four hours at a time with the fan off after the curing of the paint has been completed. These odours can last upward to 40 hours of burn time, keep burning at a minimum of four hours per use until odours dissipate.

#### About curing of the paint

Your stove or fireplace has been painted with the highest quality silicone stove paint. This paint dries quickly in 15-20 minutes when first applied at the factory. However, due to the high temperature silicone components, the paint will cure when heat is applied to the appliance as it is first used.

The following information applies to the curing process to get the paint fully hard and durable.

Fire the appliance four successive times for 10 minutes each firing and a 5 minute cool down between each. Be aware during log and firebox paint curing that a white deposit may be developing on the inside of the glass doors. It is important to remove this white deposit from the glass doors with an appropriate cleaner to prevent build-up (such as Windex or a commercial fireplace glass cleaner).

- Babies, small children, pregnant women and pets should leave the area during the cure phase.
- Ventilate well, open doors and windows.
- Do not touch during curing.

#### Noise coming from the fireplace?

- Noise caused by metal expanding and contracting as it heats up and cools down, similar to the sound produced by a furnace or heating duct. This noise does not affect the operation or longevity of your fireplace.
- Different types and thicknesses of steel will expand and contract at different rates resulting in "cracking" and "ticking" sounds throughout the heating and cooling periods.
- You should also be aware that as temperatures change within the unit these sounds will likely re-occur. Again this is normal for steel fireboxes, and is not a defect.

#### **Cleaning the Glass**

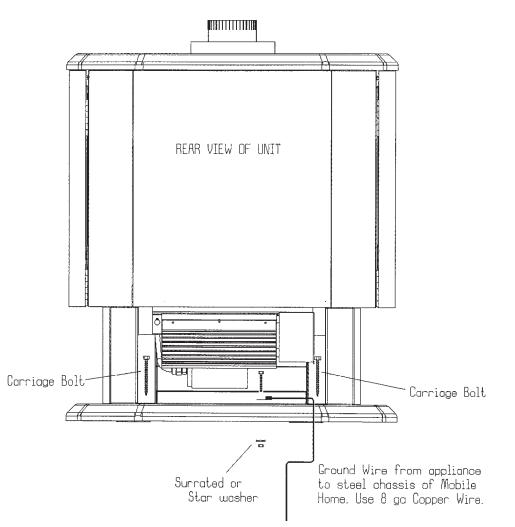
During the first few fires, a white film may develop on the glass front, as part of the curing process. The glass should be cleaned after the unit has cooled down or the film can bake on and become very difficult to remove. Use a non-abrasive cleaner and do not attempt to clean the glass while it is hot.

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## **MOBILE HOME/MANUFACTURED HOUSING INSTALLATION**

This Direct Vent System Appliance must be installed in accordance with the manufacturer's installation instructions and the Manufactured Home Construction and Safety Standard Title 24 CFR, Part 3280, or the current Standard for Fire Safety Criteria for Manufactured Home Installations, Sites, and Communities ANSI/NCBS A225.1, and with CSA Z240.4 Mobile Home Standard in Canada.



THE FDV350N AND FDV350LP MAY BE INSTALLED IN MANUFACTURED (MOBILE) HOMES AFTER FIRST SALE. THE MODELS CONVERTED USING THE B-VENT CONVERTER CANNOT BE INSTALLED IN A MANUFACTURED (MOBILE) HOME.

Please follow the current ANSI/NFPA 70 National Electrical Code in the USA and CAN/CSA C22.1 Canadian National Electrical Code in Canada.

Appliance must be grounded to the steel chassis of the home with 8 ga. copper wire using a serrated or star washer to penetrate paint or protective coating to insure grounding.

Use carriage bolt at the attachment point (see diagram above) to secure the appliance to the floor.

WARNING: Do not compromise the structural integrity of the manufactured home wall, floor or ceiling, during installation of appliance or venting.

For required venting components see venting installation in appropriate section of this manual.

## Warnings, Installations, and Operations

#### Installation Regulations

This gas appliance must be installed by a qualified installer in accordance with local building codes, or in the absence of local codes, with the current CAN/CGA-B149.1 Installation Code (in Canada) or the current National Fuel Gas Code Z223.1 when installed in the United States.

This appliance, when installed, must be electrically connected and grounded in accordance with local codes, or in the absence of local codes, with the current CSA C22.1 Canadian Electrical Code or with the national Electrical Code; ANSI/NFPA 70-1987 when installed in the United States.



#### FOR SAFE INSTALLATION AND OPERATION OF YOUR GAS FIREPLACE PLEASE NOTE THE FOLLOWING:

- 1. Do not clean when the glass is hot.
- 2. Do not use abrasive cleaners.
- 3. Using a substitute glass will void all product warranties.
- 4. For safe operation, glass doors must be closed.
- 5. When purging the gas line, the glass front must be removed.
- 6. Do not strike or abuse glass. Take care to avoid breakage.
- 7. Do not alter gas orifice.
- 8. No substitute materials may be used other than factory supplied components.
- 9. This appliance gives off high temperatures and should be located out of heavy traffic areas and away from furniture and draperies.
- 10. Children and adults should be alerted to the hazards of the high surface temperatures of this appliance and should stay away to avoid burns or ignition of clothing.
- 11. Young children should be carefully supervised when they are in the same room as the appliance. Toddlers, young children and others may be susceptible to accidental contact burns. A physical barrier is recommended if there are at risk individuals in the house. To restrict access to a fireplace or stove, install an adjustable safety gate to keep toddlers, young children and other at risk individuals out of the room and away from hot surfaces.
- 12. Under no circumstances should any solid fuels (wood, paper) be used in this appliance.
- 13. Under no circumstances should this appliance be modified. Any parts that have to be removed for servicing should be replaced prior to operating this appliance.
- 14. Installation and repair should be done by a qualified service person. The appliance should be inspected before use and at least annually by a professional service person. More frequent cleaning may be required due to excessive lint from carpeting, bedding material, et cetera. It is imperative that control compartments, burners and circulating air passageways of the appliance be kept clean. Make sure that the gas valve and pilot light are turned off before you attempt to clean this unit.
- 15. Clothing or other flammable material should not be placed on or near the appliance. This appliance should not be used as a drying rack for clothing nor should Christmas stockings or decorations be hung from it.
- 16. Do not use this heater if any part has been under water. Immediately call a qualified service technician to inspect the heater and to replace any part of the control system and any gas control which has been under water.
- 17. Do not operate appliance unless completely installed as per installation instructions.
- 18. Failure to position the parts in accordance with these diagrams or failure to use only parts specifically approved with this appliance may result in property damage or personal injury.
- 19. Do not operate appliance with the glass front removed, cracked or broken. Replacement of the glass should be done by a licensed or qualified service person.
- 20. The front of the fireplace gives off high temperatures that could ignite combustible material which is kept close to the front of the unit.
- 21. Ensure that power to the Fireplace is turned off before servicing.
- 22. Do not operate this Fireplace without the glass front or with a broken glass.
- 23. Improper installation, adjustment, alteration, service or maintenance can cause injury or property damage. Refer to the owner's information manual provided with this appliance. For assistance or additional information consult a qualified installer, service agency, or the gas supplier.
- 24. Operation of this appliance when not connected to a properly installed and maintained venting system or tampering with the blocked vent shutoff system can result in carbon monoxide (CO) poisoning and possible death.



HOT GLASS WILL CAUSE BURNS.

DO NOT TOUCH GLASS UNTIL COOLED.

NEVER ALLOW CHILDREN TO TOUCH GLASS.

- Gas fired appliances may be used only for supplemental heat and/or decorative purposes and under no circumstances shall they provide a primary heat source.
- This appliance must not be connected to a chimney flue serving a separate solid-fuel burning appliance.

NOTE: It is recommended that a Carbon Monoxide (CO) Detector be installed in or near bedrooms and on all levels of your home. Place a detector about 15ft [4.5m] outside the room that houses your gas appliance.

Certified for installation in a bedroom or bed/sitting room. In Canada must be installed with listed millivolt thermostat. In USA see local codes.

## **Operations and Maintenance Instructions**

For safe installation and operation note the following:

- The Burner/Log Assembly has been engineered and permanently adjusted for proper flame control.
- Periodically remove the logs from the grate assembly and vacuum any loose particles from the grate and burner areas. See Log Placement page to remove logs. Vacuum burner parts and replace logs.
- Never use our gas fireplace as a cooking device.
- Label all wires prior to disconnection when servicing controls. Wiring errors can cause improper and dangerous operation. Verify proper operation after servicing.

## Installation Requirements for the Commonwealth of Massachusetts

In the Commonwealth of Massachusetts, the installer or service agent shall be a plumber or gas fitter licensed by the Commonwealth.

When installed in the Commonwealth of Massachusetts or where applicable codes; the unit shall be installed with a CO detector per the requirements listed below.

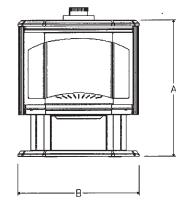
- 1. For direct-vent appliances, mechanical-vent heating appliances or domestic hot water equipment, where the bottom of the vent terminal and the air intake is installed below four feet above grade the following requirements must be satisfied:
  - A. If there is not one already present, on each floor level where there are bedroom(s), a carbon monoxide detector and alarm shall be placed in the living area outside the bedroom(s). The carbon monoxide detector shall comply with NFPA 720 (2005 Edition).
  - B. A carbon monoxide detector shall be located in the room that houses the appliance or equipment and shall:
    - Be powered by the same electrical circuit as the appliance or equipment such that only one service switch services both the appliance and the carbon monoxide detector;
    - Have battery back-up power;
    - Meet ANSI./UL 2034 Standards and comply with NFPA 720 (2005 Edition); and
    - Have been approved and listed by a Nationally Recognized Testing Laboratory as recognized under 527 CMR.
  - C. A Product-approved vent terminal must be used, and if applicable, a Product-approved air intake must be used. Installation shall be in strict compliance with the manufacturer's instructions. A copy of the installation instructions shall remain with the appliance or equipment at the completion of the installation.
  - D. A metal or plastic identification plate shall be mounted at the exterior of the building, four feet directly above the location of vent terminal. The plate shall be of sufficient size to be easily read from a distance of eight feet away, and read "Gas Vent Directly Below"
- 2. For direct-vent appliances, mechanical-vent heating appliances or domestic hot water equipment where the bottom of the vent terminal and the air intake is installed above four feet above grade the following requirements must be satisfied:
  - A. If there is not one already present, on each floor level where there are bedroom(s), a carbon monoxide detector and alarm shall be placed in the living area outside the bedroom(s). The carbon monoxide detector shall comply with NFPA 720 (2005 Edition).
  - B. A carbon monoxide detector shall:
    - Be located in the room that houses the appliance or equipment;
    - Be either hard-wired or battery powered or both; and
    - Shall comply with NFPA 720 (2005 Edition).

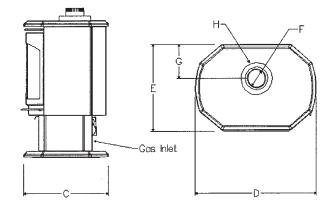
A Product-approved vent terminal must be used, and if applicable, a Product-approved air intake must be used. Installation shall be in strict compliance with the manufacturer instructions. A copy of the installation instructions shall remain with the appliance or equipment at the completion of the installation.

For the state of Massachusetts a <u>T-handle gas shut-off valve</u> must be used on a gas appliance. This T-handle gas shut-off valve must be listed and approved by the state of Massachusetts. This is in reference to the state of Massachusetts state code CMR238.

## DIMENSIONS

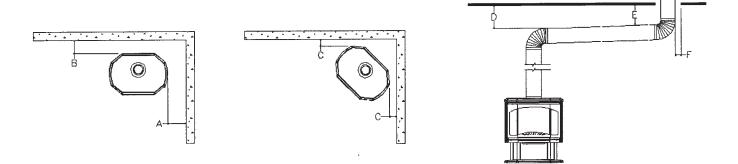
A	30 3/8"
В	27 5/16"
С	19"
D	27 5/16"
E	19 3/16"
F	4" Dia.
G	7 1/2"
Н	7" Dia.





Gas inlet is located on the back of the unit.

## LOCATING YOUR APPLIANCE



#### THE FOLLOWING MINIMUM DISTANCES TO COMBUSTIBLES MUST BE OBSERVED TO ENSURE SAFE OPERATION OF YOUR STOVE.

	Minimum distance to combustibles
A	12" from side of unit
В	3" from back of unit
С	3" from side of unit in corner (45°) installation
D	4" from top of 90° elbow
E	2-1/2" from top of horizontal pipes, all other existing pipes 1" clearances to combustibles.

1" clearance to combustibles on vertical venting

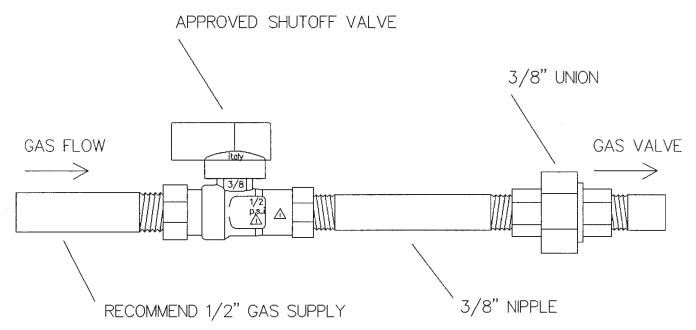
The unit should be placed on a hard, stable surface. The appliance may be installed directly on carpeting, tile or other combustible material with no additional floor protection being required.

This unit has been tested in a Alcove the minimum size of Alcove is Depth 30", Height 55.5", Width 52.5".

## GAS LINE INSTALLATION

This gas appliance should be installed by a qualified installer in accordance with local building codes and with current CAN\CGA-B149.1 or .2 installation codes for Gas Burning Appliances and Equipment in Canada and the National Fuel Gas Code Z223.1 in the United States.

# NOTE: IF THE OPTIONAL FAN KIT IS TO BE INSTALLED IT IS HIGHLY RECOMMENDED THAT IT BE ATTACHED TO THE STOVE BEFORE THE STOVE IS PUT IN ITS FINAL POSITION.



- 1. The gas pipeline is brought into the unit on the back left side of the unit.
- 2. The gas control inlet is 3/8". Typical installation layout for rigid pipe is shown below.
- 3. When using copper or flex connector, use only approved fittings. Always provide a union so that gas line can be easily disconnected for burner or fan servicing. See gas specification for pressure details and ratings.
- When a vertical section of gas pipe is required for installation, a condensation trap is needed. See CAN/CGA-B149.1 or .2 for code details.
- 5. For natural gas, a minimum of 3/8" iron pipe with gas minimum pressure of 4.5" w.c. must be used for supply from the gas meter. Consult with the local gas utility if any questions arise concerning pipe sizes.
- 6. A 1/8" NPT plugged tappings are accessible for test gauge connection both on the inlet and outlet of the gas valve.
- 7. Turn the gas supply ON and check for leaks. DO NOT USE OPEN FLAME FOR THIS PURPOSE. Use an approved leak testing solution.
- 8. The appliance 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 1/2 PSIG (3.5 KPa).
- The appliance must be isolated from the gas supply piping system by closing its individual shutoff valve during any pressure testing of the gas supply piping system at test pressures equal to or less than 1/2 PSIG (3.5 KPa).

NOTE: The gas line connection may be made of 1/2" rigid pipe or an approved flex connector. Since some municipalities have additional local codes, it is always best to consult your local authorities and the current CAN/CGA-B149.1 or .2 installation code in Canada or the National Fuel Gas code ANSI Z223.1 in the U.S.A.

For the state of Massachusetts a <u>T-handle gas shut-off valve</u> must be used on a gas appliance. This T-handle gas shut-off valve must be listed and approved by the state of Massachusetts. This is in reference to the state of Massachusetts state code CMR238.

IMPORTANT: Always check for gas leaks with a soap and water solution. Do not use open flame for leak testing.

## GAS SPECIFICATIONS

FUEL	GAS CONTROL		IM INPUT FU)	MAXIMUM OUTPUT (BTU)
		HIGH	LOW	HIGH
NATURAL GAS	MILLIVOLT	37,000	29,000	28,860
PROPANE GAS	MILLIVOLT	35,000	27,000	27,650

GAS INLET SIZE 3/8"(SIT)

GAS SUPPLY	MINIMUM	NORMAL	MAXIMUM
PRESSURE		(INCHES WATER COLUMN)	
NATURAL GAS	5.5	7	9
PROPANE GAS	11	11	12

	MANIFOLD PRESSURE (INCHES WATER COLUMN)	
NATURAL GAS	3.5	
PROPANE GAS	10	

(0-4500 FT)	ORIFICE SIZE	AIR SHUTTER
NATURAL GAS	# 32	5/16"
PROPANE	# 50	FULL OPEN

## **OPERATING AND MAINTENANCE INSTRUCTIONS**

This gas appliance should be installed by a qualified installer in accordance with local building codes and with current CAN/CGA-B149.1 or .2 installation codes for Gas Burning Appliances and Equipment.

ightarrow warning: when purging the gas line, the glass front must be removed.

#### FOR SAFE INSTALLATION AND OPERATION NOTE THE FOLLOWING:

This appliance gives off high temperatures and should be located out of heavy traffic areas and away from furniture and draperies.

Children and adults should be alerted to the hazards of high surface temperatures of this appliance and should stay away to avoid burns or ignition of clothing.

Control compartments, burners and air passages in this appliance should be kept clean and free of dust and lint. Make sure that the gas valve and pilot light are turned off before you attempt to clean this unit.

## **OPERATING AND MAINTENANCE INSTRUCTIONS**

This gas appliance should be installed by a qualified installer in accordance with local building codes and with current CAN/CGA-B149.1 or .2 installation codes for Gas Burning Appliances and Equipment.

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#### FOR SAFE INSTALLATION AND OPERATION NOTE THE FOLLOWING:

This appliance gives off high temperatures and should be located out of heavy traffic areas and away from furniture and draperies.

Children and adults should be alerted to the hazards of high surface temperatures of this appliance and should stay away to avoid burns or ignition of clothing.

Control compartments, burners and air passages in this appliance should be kept clean and free of dust and lint. Make sure that the gas valve and pilot light are turned off before you attempt to clean this unit.

The venting system (chimney) of this appliance should be inspected at least once a year and if needed, your venting system should be cleaned.

Keep the area around your appliance clear of combustible materials, gasoline and other flammable vapours and liquids.

Under no circumstances should this appliance be modified. Parts that have to be removed for servicing should be replaced prior to operating this appliance again.

Installation and any repairs to this appliance should be done by a qualified service person. A professional service person should be called to inspect this appliance annually. Make it a practice to have all of your gas appliances checked annually.

Never use your gas stove as a cooking device.

The Burner/Log Assembly has been engineered and permanently adjusted for proper flame control.

#### DO NOT ALTER GAS ORIFICE.

Periodically remove the logs from the grate assembly and vacuum any loose particles from the grate and burner areas.

This appliance should not be used as drying rack for clothing, nor should Christmas stockings or decorations be hung near it.

Under no circumstances should any solid fuels (wood, paper, cardboard, coal) be used in this appliance.

NOTE: it is normal for your gas stove to give off some odour the first time it is burned. This is due to the curing of the paint and any undetected oil from the manufacturing process.

Please ensure that your room is well ventilated - open all windows.

It is recommended that you burn your gas stove for at least four (4) hours the first time you use it without the fan on.

## **GENERAL GLASS INFORMATION**

#### **GLASS CLEANING**

It will be necessary to clean the glass periodically. During start-up, condensation, which is normal, forms on the inside of the glass and causes dust, lint etc. to cling to the glass surface. Also, initial paint curing can deposit a slight film on the glass. It is therefore recommended that initially the glass be cleaned two or three times with <u>non-abrasive</u> common household cleansers and warm water. After that, the glass should be cleaned two or three times a season depending on the circumstances.

## /**!** ,

 $\checkmark$  Warning and Cautions.

- Do not clean when the glass is hot.
- Do not use abrasive cleaners.
- Using a substitute glass will void all product warranties.
- Do not strike or abuse glass. Care must be taken to avoid breakage of the glass.
- Do not operate this fireplace without the glass front or with a broken glass.

#### **GLASS REPLACEMENT**

Only Robax ceramic or coated Neoceram glass may be used for replacement. It must be a minimum of 5mm thick.

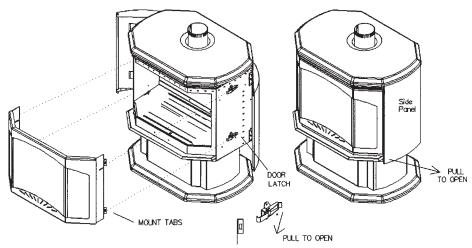
WARNIING: Do not operate appliance with the glass front removed, cracked or broken. Replacement of the glass should be done by a licensed or qualified service person.

#### REMOVAL OF FRONT DOOR

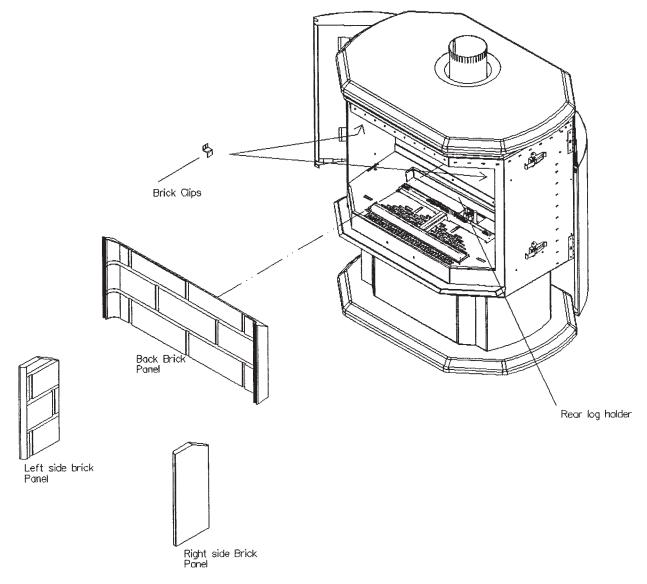
- 1. Open both left and right side panels by pulling outwards from the side of the unit.
- 2. Pull the latch handle towards the front of the unit. Disengage latch from mounting tabs.
- 3. Hold the Door Frame in both hands and pull towards yourself.
- 4. To replace the Door Frame to the unit reverse the above steps.

#### REPLACING OF CERAMIC GLASS

Follow Removal of Front Door then clean all materials from door frame. Using a high temperature sealant (temperature-resistant to 500°F (260°C)) apply а bead of approximately 1/8" to all four sides of frame and insert glass with new gasket. Frame should be placed on a flat surface with a small amount of weight pressing glass into sealant. Let dry approximately 15 to 20 The door can be minutes. reinstalled by reversing Steps 1,2.



## **INSTALLATION OF BRICK PANEL KIT**



#### PART: F35RL

- 1. Open side panels and remove front door and log set. (Skip this step if components are not installed at this time.)
- 2. The rear log holder has to be removed to install rear brick panel, using a 1/4" nut driver remove the three hex screws.
- 3. Hold the rear brick panel with both hands on the left-right of panel, tilt the top panel towards you slightly and pull your right hand towards you slightly and place panel onto the rear of the firebox. NOTE: TAKE CARE NOT TO DAMAGE PILOT ASSEMBLY WHEN PLACING REAR PANEL.
- 4. Loosen both brick clips using 1/4" nut driver. Swing brick clip out of the way and position side brick panel up to rear brick panel and against side of firebox and tighten brick clip down onto panel, repeat this step with the other side panel.
- 5. Reinstall rear log holder with the 3 screws.
- 6. Install log set and front door.

## F35 LOG ASSEMBLY

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

- Fig. 1. Remove can of touchup paint from firebox. Remove logs and bag of glowing embers chunks from carton and inspect. There are three logs and they are lettered A, B, and C.
- Fig. 2. Shows rear log positioning bracket and 4 pin locating positions.
- Fig. 3. Log A has 2 locating holes, position the 2 holes on the log over the 2 pins on the left side of the log mounting pan as shown in the picture.
- Fig. 4. Log B has 2 Locating holes, position the 2 holes on the log over the 2 pins on the right side of the log mounting pan as shown in the picture.
- Fig. 5. Log C has to be lowered into position just behind logs A and B. Log C has an area notched out of the rear of it to fit over rear positioning bracket as shown in the picture.
- Fig. 6. A bag of Ember chunks is supplied with the unit, it is very important that these chunks are placed onto the front burner and log mounting pan as shown in the picture, spread the ember chucks out no more than one Layer deep. NOTE: IF YOU DO NOT FOLLOW THIS INSTRUCTION CORRECTLY SOOTING PROBLEMS CAN OCCUR.

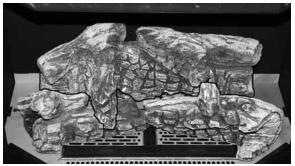
Fig. 1















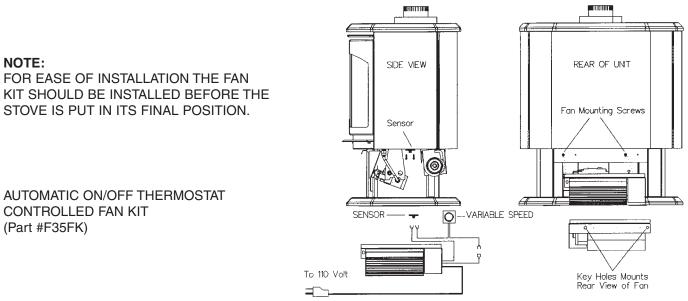








## **OPTIONAL FAN KIT INSTALLATION**



- 1. Open the front access door where the piezo-igniter is located. Remove the two screws that hold the control panel in place, pull the control panel out towards you and install the variable speed control in the hole provided opposite the piezo-igniter.
- 2. Locate the two fan mounting screws in the rear of the unit as shown in the above diagram and place the key holes on the rear of the fan over the mounting screws and drop into position.
- 3. Connect the wires to the variable speed sensor and variable speed control as shown in the wiring diagram. Plug fan cord into 110 wall outlet.
- 4. Turn the switch on (clockwise). NOTE: The stove must now be installed and gas line attached before proceeding.
- 5. Turn the stove on. Once the sensor unit reaches operating temperature (in approximately 10 to 15 minutes) the fan will turn on. The fan can be switched off, if desired by turning the switch fully counter-clockwise.
- 6. Once the fan has started to turn it may be desirable to adjust the minimum fan speed. Tilt the control panel forward to access the rear of the variable speed switch, turn the variable speed switch to its minimum setting (fully clockwise). Use the set screw on the side of the variable speed control to increase or decrease the minimum fan speed. (It may be desirable to lower minimum fan speed to decrease the sound level created by the fan.) Reinstall the control panel.

#### **Electrical Services**

All optional fan kits are equipped with a 120V, 60Hz blower.

Note: All electric connections are to be made in accordance with CSA Standard C22.1 - Canadian Electrical Code part I or with the National Electrical Code, ANSI/NFPA 70 (latest addition) and/or in accordance with local codes.





WARNIING: Electrical Grounding Instructions - This appliance is equipped with a three - pronged (grounding) plug for your protection against shock hazard and should be plugged directly into a properly grounded three-prong receptacle.



WARNIING: Label all wires prior to disconnection when servicing controls. Wiring errors can cause improper and dangerous operation. Verify proper operation and servicing.

Caution: Should this fan require servicing, the power supply must be disconnected.

## MILLIVOLT SYSTEM, LIGHTING, & BURNING CONTROL

#### FOR YOUR SAFETY READ BEFORE LIGHTING

WARNING: If you do not follow these instructions exactly, a fire or explosion may result causing property damage, personal injury or loss of life.

- **BEFORE LIGHTING** This appliance has a pilot which must be lighted by hand. When lighting · If you cannot reach your gas supplier, call the fire department. А the pilot, follow these instructions exactly. Use only your hand to push or turn the gas control knob. Never use tools. C Smell all around the appliance area for gas. Be sure to smell next to the If the knob will not push in or turn by hand, don't try to repair it, call a floor because some gas is heavier than air and will settle on the floor. qualified technician. Force or attempted repair may result in a fire or explosion. WHAT TO DO IF YOU SMELL GAS Do not use this appliance if any part has been under water. Immediately Do not try to light an appliance. D call a qualified service technician to inspect the appliance and to replace Do not touch any electrical switch; do not use any phone in your building. any part of the control system which has been under water. Immediately call your gas supplier from a neighbour's phone. Follow the gas supplier's instructions. LIGHTING INSTRUCTIONS 1. Stop! Read the safety information above on this label. 8. Push in the control knob all the way and hold it. With the other hand push in the red ignitor button until you hear a click. Now observe closely the Set the thermostat to lowest setting. 2. pilot burner located on the rear center-left hand side of the main burner. If a Turn off all electrical power to the appliance. 3. flame has appeared then continue to depress the control knob for 20 Locate valve under the burner assembly.
- 4. If the control knob is not already in the off position, ie. the word "OFF" in 5 the 9 o'clock position, then push in the gas control knob slightly and turn C clockwise to "OFF".

NOTE: Knob cannot be turned from "PILOT" to "OFF" unless knob is pushed in slightly. Do not use force.

- Wait five (5) minutes to clear out any gas. If you then smell gas. STOP! 6. Follow "B" in the safety information above on this label. If you don't smell gas then go to the next step.
- Now push in the control knob slightly and turn counter-clockwise 🤊 to 7. the "PILOT" position.
- seconds. If the flame did not appear then continue to depress the red ignitor button every 5 seconds until a flame is established. NOTE: If after 30 seconds a flame has not yet been established then turn the control knob back to the off position and repeat steps 5, 6 & 7.
- Once the pilot has been established hold the control knob in the depressed 9. position for approximately 25 seconds before releasing. If the flame goes out then repeat steps 7 and 8.
- 10. Now turn the control knob to the "ON" position. The burner will not light unless the wall switch thermostat or remote control is turned "ON" or in the case of the thermostat there is a call for heat.
- 11. Close the access door and turn all electric power back to the appliance.

## TO TURN OFF THE APPLIANCE

- Set the thermostat to lowest setting.
- Turn off all electric power to the appliance 2. if service is to be performed.
- 3. Open the control access door.

R

- 4. Push in the gas control knob slightly and turn clockwise 🔿 to the "OFF" position. Do not force.
- **Replace** control 5.
- access panel.

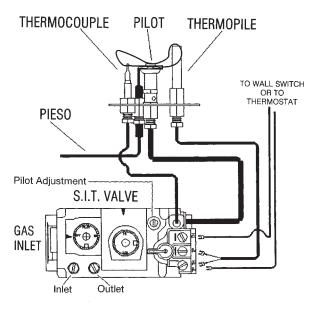
#### **Recommended Maximum Lead Length (Double Wire)** When Using Wall Switch or Thermostat

Wire Size	Max. Length
14 GA.	100 FT.
16 GA.	64 FT.
18 GA.	40 FT.
20 GA.	25 FT.
22 GA.	16 FT.

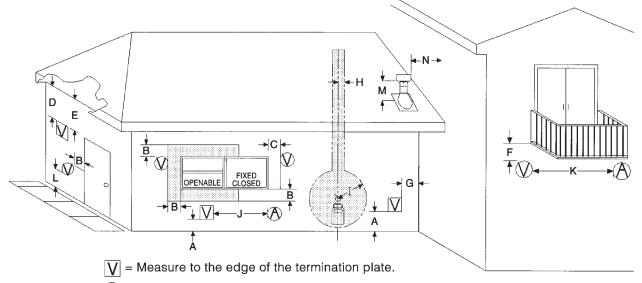
#### Pilot Burner Adjustment

1. Adjust pilot screw to provide proper sized flame.

**CAUTION: DO NOT** WIRE 120 VOLT **POWER TO** MILLIVOLT SWITCHES OR THERMOSTAT.



## **Vent Termination**



 $\langle V \rangle$  = Measure to the edge of the round termination.

#### V Vent Terminal

- ◯ Air Supply
- Area Where Terminal Not Permitted.
- A Clearance above grade, veranda, porch, deck, or balcony 12 inches (30cm) minimum.<sub>1-2</sub>
- B Clearance to window or door that may be opened. 12 inches (30cm) minimum for appliances 100 000 Btuh (30 kW) and lower, in Canada. 9 inches<sub>2</sub> (23cm) for appliances 50 000 Btuh and lower, in USA.
- C Clearance to permanently closed window minimum 12 inches (30cm) recommended to prevent condensation on window, in Canada. 9 inches<sub>2</sub> (23cm) for appliances 50 000 Btuh and lower, in USA.
- D Vertical clearance to ventilated soffit located above the termination within a horizontal distance of 2 feet (60cm) from the center line of the termination. 18 inches (46cm) minimum. $_{5}$
- E Clearance to unventilated soffit 12 inches (30cm) minimum.
- $\mathsf{F}$  Clearance under veranda, porch, deck or balcony 12 inches\_1 (30cm) minimum.<sub>4</sub>  $\mathsf{US}_5$
- G Clearance from a perpendicular inside wall or outer corner to the edge of the vent terminal plate is 3" (minimum).
- H Clearance to each side of center line extended above meter/regulator assembly 3 feet (91cm) within a height 15 feet (4.5m) above the meter/regulator assembly.
- I Clearance to service regulator vent outlet 3 feet (91cm) minimum. $_1$  US $_5$
- J Clearance to non-mechanical air supply inlet to building or the combustion air inlet to any other appliance: In Canada, 6 inches (15cm) for appliances ≤10,000 Btuh (3kW), 12 inches, (30cm) minimum for appliances >10,000 Btuh (3kW) and ≤100,000 Btuh (30kW), 36 inches (91cm) for appliances >100,000 Btuh (30kW). In the USA, 6 inches<sub>2</sub> (15cm) for appliances ≤10,000 Btuh (3kW), 9 inches (23cm) for appliances >10,000 Btuh (3kW) and ≤50,000 Btuh (15kW), 12 inches (30cm) for appliances >50,000 Btuh (15kW).
- K Clearance to a mechanical air supply inlet 6 feet (1.8m) minimum.<sub>1</sub>,in Canada. In USA, 3 feet (91cm) above if within 10 feet<sub>2</sub> (3m) horizontally.
- L Clearance above paved sidewalk or a paved driveway located on public property 7 feet (2.1m) minimum.<sub>3</sub>
- M Clearance above highest point of exit on roof 18 inches (45cm).
- N Clearance to perpendicular wall 24 inches (60 cm). (Recommended to prevent re-circulation of exhaust products. For additional requirements check local codes.)

#### NOTE: Clearances are to the edge of terminal plate, add 6-3/4" to clearances to arrive at center line.

## NOTE: Local Codes or Regulations may require different clearances.

#### Termination

It is imperative that the vent termination be located observing the minimum clearances as shown. There must not be any obstruction such as bushes, garden sheds, fences, decks or utility buildings within 24" from the front of the termination plate.

Do not locate termination where excessive snow or ice build-up may occur. Be sure to check vent termination area after snow falls and clear to prevent accidental blockage of venting system. When using snow blowers, make sure snow is not directed towards vent termination area.

#### **General Venting Information**

The gas fireplace is approved to be vented either through the side wall or vertically through the roof.

This appliance is approved with Kingsman flex vent system and also approved for use with Simpson Duravent Direct Vent System, AmeriVent Direct Vent Pipe System and Selkirk Direct Temp.

Kingsman flex vent system can be used with Simpson Duravent Direct Vent termination.

When using Simpson Duravent Direct Vent pipe, AmeriVent Direct Vent Pipe or Selkirk Direct Temp, a Kingsman/Duravent adapter must be used.

ONLY VENTING COMPONENTS SPECIFICALLY APPROVED

Minimum clearance to combustibles on venting is 1" with the following exceptions as follows: top of horizontal pipe  $2^{1/2}$ ", top of 90 degree pipe 4".

#### AND LABELED FOR THIS FIREPLACE MAY BE USED.

Venting terminal shall not be recessed into a wall or siding. If finishing the outside wall with vinyl or wood siding it is recommended that a Siding Shield be installed, Part Number ZDVSSLR.

- 1 As specified in CGA B149 installation codes (1991).
- 2 Only permitted if veranda, porch, deck, or balcony is fully open on a minimum of two sides beneath the floor.,
- 3 A vent shall not terminate directly above a sidewalk or paved driveway which is located between two single family dwellings and serves both dwellings.

## **GENERAL VENTING INFORMATION**

#### **TERMINATION**

It is imperative that the vent termination be located observing the minimum clearances as shown. There must not be any obstruction such as bushes, garden sheds, fences, decks or utility buildings within 24" from the front of the termination. Do not locate termination where excessive snow or ice build-up may occur. Be sure to check vent termination area after snow falls and clear to prevent accidental blockage of venting system. When using snow blowers, make sure snow is not directed towards vent termination area.

This gas appliance is approved to be vented either through the side wall or vertically through the roof. Only Kingsman Flex(Z-Flex)Venting Kits and components specifically approved and LABELED for this stove may be used. This appliance is also approved for use with Simpson-Duravent Direct Vent system, Ameri-Vent Direct Vent Pipe System, ICC Excel Direct, Metal Fab Sure-Seal DV and Selkirk Direct Temp.

#### **RIGID OR HARD PIPE**

When using Simpson Duravent, AmeriVent pipe, ICC Excel Direct, Metal Fab Sure-Seal DV and or Selkirk Direct Temp a Duravent hardpipe adapter must be used (part # ZDVDFA for fireplaces and part # ZDVDKA for Stoves, Serenity and ZDV3624B). Follow installation instructions provided by Simpson Duravent/AmeriVent/Selkirk Direct Temp, ICC Excel Direct, Metal Fab Sure-Seal DV for installation of pipe and adhere to the clearance to combustibles provided in this manual. Apply a bead of Mill Pac high temp sealant to all joints of pipes, adapters and termination, when using Kingsman Flex(Z-Flex)Venting venting and Simpson Duravent venting.

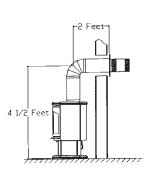
Minimum clearances on venting (4" to top of elbow), (2-1/2" from top of horizontal pipes), (1" on all other existing pipes). REMEMBER THAT A 1/4" VERTICAL RISE IS REQUIRED FOR EVERY 12" OF HORIZONTAL RUN.

Venting terminal shall not be recessed into a wall or siding. If finishing the outside wall with vinyl or wood siding it is recommended that a Siding Shield be installed, Part Number ZDVSSLR.

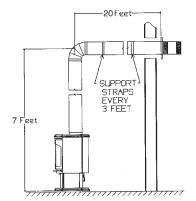
#### VENTING ROUTES AND COMPONENTS

Since it is very important that the vent system maintain its balance between the combustion air intake and the flue gas exhaust, certain limitations as to vent configurations apply and must be adhered to.

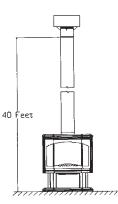




The minimum allowable configuration is  $4^{1}/2$  feet vertical with unit 4" from wall.



The maximum horizontal vent run with one 90° elbow attached is 20 feet with 8 feet vertical.



The maximum vertical rise is 40 feet.

The maximum number of 90° elbows per installation is three (3). For each additional 90° elbow, the horizontal runs must be reduced by 36" per 90° elbow. See venting chart on page 14 for total horizontal and vertical runs.

For each 45° elbow installed in the horizontal run, the length of the horizontal run must be reduced by 18" (45 cm). This does not apply if the 45° elbows are installed on the vertical part of the vent system. 45° elbows can be installed in either the horizontal or vertical runs.

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

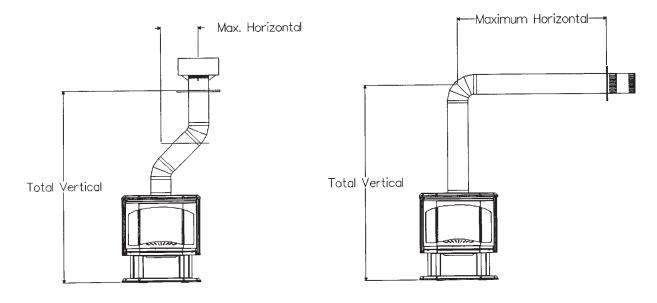
Only trim kit(s) supplied by the manufacturer shall be used in the installation of this appliance. Draft Relief Openings must not be covered or blocked.

# IMPORTANT: ALWAYS LOCATE THE STOVE IN SUCH A WAY AS TO MINIMIZE THE NUMBER OF OFFSETS AND/OR HORIZONTAL RUNS. A 1/4" VERTICAL RISE IS REQUIRED FOR EVERY 12" OF HORIZONTAL RUN.

The following table shows the relationship between vertical and horizontal vent lengths and will help you to determine the correct vent lengths for optimum stove performance.

#### HOW TO USE THE VENT TABLE

- 1. Determine the height of the system and the number of elbows required.
- 2. Use the Venting Chart to determine the maximum horizontal distance allowed.



Total \	/ertical	Max. Total	Horizontal
Feet	Meters	Feet	Meters
4½	1.4	3	0.9
5	1.5	4	1.2
6	1.8	8	2.4
7	2.1	20	6.1
8	2.4	20	6.1
9	2.7	20	6.1
10	3.0	20	6.1
11	3.4	20	6.1
12	3.7	20	6.1
13	4.0	20	6.1
14	4.3	20	6.1
15	4.6	20	6.1
16	4.9	20	6.1
17	5.2	20	6.1
18	5.5	20	6.1
19	5.8	20	6.1
20	6.1	20	6.1
25	7.5	15	4.6
30	9.0	10	3.0
40	12	0	0

Note: For each 45° elbow installed in the horizontal run, the length of the horizontal run must be reduced by 18" (45 cm). This does not apply if the 45° elbows are installed on the vertical part of the vent system.

Note: For each additional 90° elbow installed in the horizontal run, the length must be reduced by 36" (90 cm). Maximum number of 90° elbows are three per installation.

## **VENT PIPE ASSEMBLY**

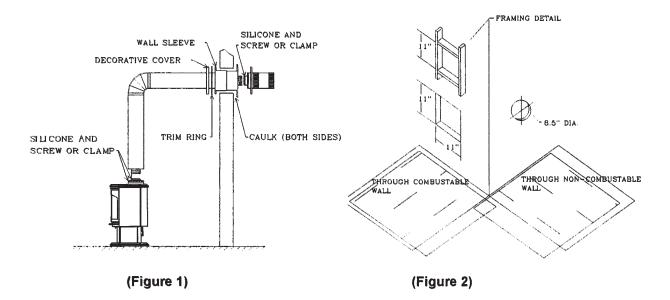
Before joining the four inch flex pipe to stove or vent termination apply a bead of **high temperature sealant (MIL PAC SEALANT IS RECOMMENDED)** to the pipe and secure it with the (4) screws. If two pieces of 4" flex pipe are to be joined, the joint must be siliconed and secured with four screws.

Before joining 7" pipe to elbows, stove and vent termination apply a bead of high temperature silicone to crimped end of elbow or pipe. Join pipes and secure with four (4) sheet metal screws.

The maximum number of 4" flexible pipe connections permitted is two (2) excluding the stove and air terminal connections although a maximum of one is the most which is recommended.

It is critical to the proper and safe operation of this stove that all connections are both caulked with liberal amounts of sealant and secured with clamps or screws. Do not use any kind of tape or silicone other than that recommended in this manual.

## HORIZONTAL VENT INSTALLATION



- 1. Determine the location of vent termination on wall assuring clearances are maintained as listed in the Vent Termination Location Chart.
- 2. Once location has been determined, cut or frame a hole in the exterior wall with a minimum 8 1/2" diameter in non-combustible wall or frame 11" x 11" ID in combustible wall. (See Figure 2)
- 3. Install zero clearance wall sleeve to inner and outer wall being sure to use caulking around the wall thimble to weatherproof.

# Note: The Zero Clearance Wall Sleeve and vent termination must not be recessed into the exterior wall or siding.

- 4. If optional fan kit has been purchased it should now be installed before stove is placed in its final position.
- 5. Place stove into position. Determine the lengths of the vertical and horizontal 7" pipes. Cut the 7" pipes to the correct length assuring that the following conditions have been met:
  - (i) The horizontal 7" pipe should not extend past the outer portion of zero clearance wall sleeve.
  - (ii) There must be a 1/4" rise per foot on horizontal pipe.
  - (iii) A clearance to combustibles of 2-1/2" must be maintained on the top of horizontal pipes.
  - (iv) The clearance to combustibles above the elbow must be 4 inches.
  - (v) Clearance of one inch on all other pipes.

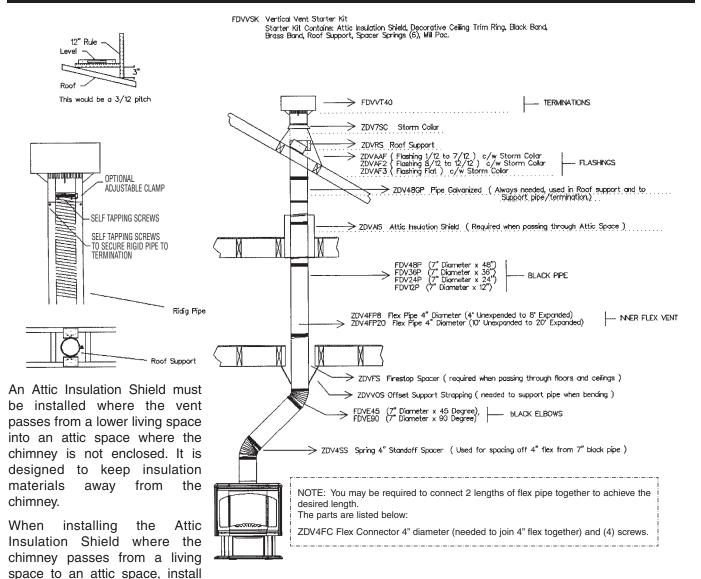
Before joining 90° elbow and pipes, apply a bead of high temperature sealant (**Mil Pac**) to crimped end of elbow or pipe. Join pipes to 90° elbow and secure joints with three (3) sheet metal screws, **pipe should overlap on connection of each pipe by 1-1/2**".

6. Feed the 4" flex pipe through the 7" pipes. If the 4" flex pipe has been expanded do not try to depress it as this can obstruct air flow and affect the performance of the unit. The only time this may be unavoidable is when installing the vent terminal.

Note: Do not remove or move spacer springs attached to 4" inner flex pipe, these must be used to assure an 1-1/4 " air gap between 4" and 7" pipes. Minimum distance between spacer springs should be 2 FT, a 90 degree elbow requires a spring at the start of the elbow and the end of the elbow.

- Position 7" pipes with 4" flex pipes installed into final position being sure to install decorative trim plate and trim ring. Attach 4" flexible pipe to stove with 1/4" bead of sealant and secure with (4) screws. Attach 7" pipe to stove with sealant and screws.
- 8. Expand the 4" flex pipe three inches past the 7" rigid pipe at the vent terminal, just enough to allow for the sealant and securing with (4) screws to the 4" pipe to the terminal. Attach the vent terminal to 4" flex pipe with (4) screws. Apply sealant to 7" pipe on terminal and gently push the vent terminal into the horizontal section as straight as possible. Attach the terminal to the exterior wall with screws provided. Apply caulking between the terminal and the wall to prevent rain and moisture from entering around the terminal.
- 9. Support horizontal pipes every three (3) feet (91 cm) with metal pipe straps.
- 10. Install decorative trim bands at the 7" pipe joints.

## VERTICAL VENT INSTALLATION



the shield from below and nail it in place using 1" spiral nails.

A firestop must be installed on the bottom side of the joists when passing through a ceiling or floor. If an attic insulation shield is to be used, a firestop is not required.

One pair (two) 45° elbows may be used to provide an offset in order to avoid cutting of joists and to clear other obstructions.

When using 45° elbows, an elbow support is required directly above the highest elbow.

When installing a bend in a joist area a minimum of 4" clearance to combustible to the top of bend must be maintained, sides and bottom of pipe, a 1" clearance to combustibles must be maintained. If running horizontally through an area, a 2 1/2" clearance to the top of the horizontal pipe must be maintained.

Maximum vertical height of system should not exceed 40 feet.

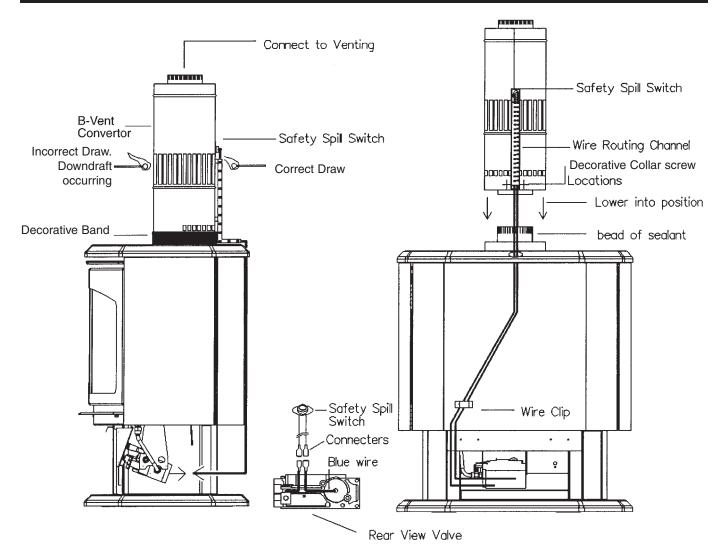
Spacer springs to be installed on 4" flex pipe every 3 ft. on vertical runs. On 45° elbows or 90° elbows a spacer spring is needed on the start of the bend and on the end of bend.

#### Vertical Venting in Cold Climates

In cold climate conditions where temperatures go below -10 degrees Celsius or 14 degrees Fahrenheit, we recommend that the chase be insulated and where the vent pipe enters into the attic space that the pipe be wrapped with an insulated mylar sleeve. This will increase the temperature of the vent and help the appliance to vent properly in cold weather conditions.

It is also important in vertical vented direct vent appliances that the appliance be operated daily during the winter months as this will help stop the Termination from freezing up. We recommend using a thermostat set at room temperature to allow the unit to cycle.

## CONVERTING THE FDV350 DIRECT VENT TO A VENTED FIREPLACE

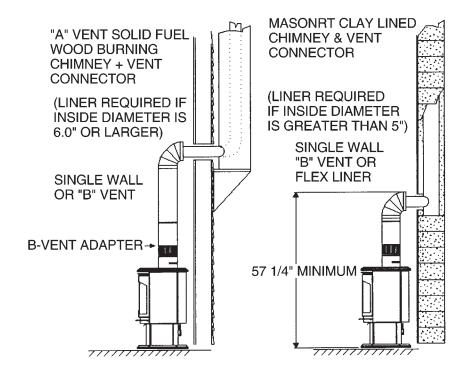


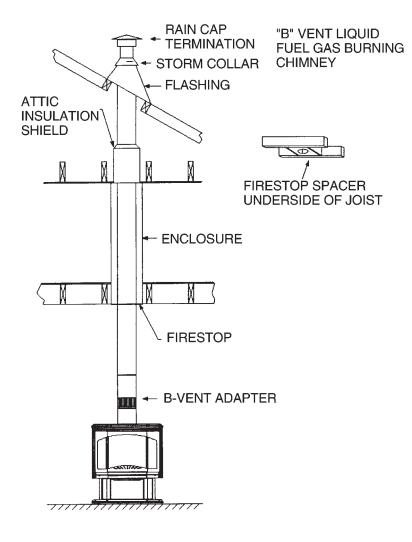
## Part # F35BVC B-VENT CONVERTER INSTRUCTIONS

- 1. Place a bead of Black Mil Pac sealant around 4 inch flue collar on the stove.
- 2. Position Safety Spill Switch wires to rear of stove and Lower B-Vent Converter onto the 4 and 7 inch collars until fully seated. Screw the Converter to the stove with 2 of the 4 screws supplied.
- 3. Place the decorative collar around the adapter and screw in place.
- 4. Route the Safety Spill Switch wires down the rear of the stove as shown in the above diagram
- 5. On the rear of the valve there is a blue wire with male female connecter which must be disconnect by pulling apart very carefully, connect the spill switch wires to the blue wires on the rear of the valve.
- 6. The stove has now been converted to a vented appliance. (FV350)
- 7. Place approval label on label plate, over top of FDV350 Rating Plate. Be sure to line up so serial number of old unit is legible.

WARNING: Operation of this appliance when not connected to a properly installed and maintained venting system or tampering with the blocked vent shutoff system can result in carbon monoxide (CO) poisoning and possible death.

## VENT INSTALLATION FOR VENTED APPLIANCE





#### VENTING INSTRUCTIONS

NOTE: A chimney venting this stove shall not vent any other appliance.

This appliance may be vented in various types of applications, 'A' Vent of solid fuel wood burning chimney. Masonry Clay lining and 'B' Vent liquid fuel gas chimney. A 90 degree elbow can be installed directly off the "B" vent Convertor. (See Above Diagram)

NOTE: Four (4) inch is required if existing chimney is six (6) inches or larger. Four (4) inch single wall or 'B' Vent liquid fuel gas chimney or Flex Gas Liner may be used to adapt existing chimney or liner to stove.

When installing with 'B' Vent liquid fuel gas chimney install as per 'B' Vent Manufacturer installation specifications. Horizontal and vertical, offset vertical or vertical installations maybe installed.

#### NOTE: Installation of 'B' Vent must follow 'B' Vent Manufacturers installation instructions when being used.

Seal all connections in venting system.

Follow the 'B' Vent chart for horizontal vertical venting or offset vertical venting. Minimum venting 12 ft. maximum 60 ft.

Product Numb	per Description
FDV350N FDV350LP	Free Standing Direct Vent Stove - Natural Gas - Black Free Standing Direct Vent Stove - Liquid Propane - Black
F35DG F35DB	DOOR FRAME: (REQUIRED FOR EACH UNIT) Door Frame and Ceramic Glass - Gold Door Frame and Ceramic Glass - Black
LOGF35	LOG SET: (REQUIRED FOR EACH UNIT) Log Set - Fibre Split Oak with Embers (F350 Series)
F35FK F35RL F35LG	ACCESSORIES: Fan Kit w/Variable Speed Control (Temperature Sensing) Refractory Liner Louvre - Gold
Z1MT Z80PT Z1RC ZART RMCBN RMCBP F35BVC FV7FBT F7DBC	Thermostat Millivolt Wall Mount Thermostat Programmable Digital Millivolt Wall Mount (1 F80-40) Remote Control Millivolt (On/Off with LED) (Model I) Remote Control Thermostat Millivolt (Model K) Remote Control - Basic - Natural Gas (On/Off, Hi/Lo Flame Adjustment) Remote Control - Basic - Liquid Propane (On/Off, Hi/Lo Flame Adjustment) B-Vent Converter - 7" (Converts DV to B-Vent Appliance) Decorative Brass Collar 7" Decorative Black Collar 7"
F7DTP	Decorative Black Wall Trim Plate

## VENTING KITS AND COMPONENTS

FDVHSK	VENTING ACCESSORIES - (For Direct Vent Stoves) Horizontal Vent Starter Kit - (Direct Vent Stoves)
	Starter Kit Contains: Horizontal Vent Termination, Zero Clearance Wall Sleave, Black Wall Trim Ring, 7" Dia. Black Pipe 24" Length, 7" Dia. Black Pipe 48"Length 7" - 90 Degree Black Elbow, 4" Flex 48" Unexpanded (96" Expanded) 7" Brass Bands, (2) 7" Black Bands, Mill Pac.
FDVVSK	Vertical Vent Starter Kit - (Direct Vent Stoves) Starter Kit Contains: Attic Insulation Shield, Fire Stop, Ceiling Trim Plate, Trim Ring, Black Trim Ring, Roof Support, Spacer Springs(6), Mill Pac
	VENTING ACCESSORIES:
FDVVT40	Vertical Vent Termination Converts from 15' -40' to 15' and under
FDVHT	Horizontal Vent Termination
FDVHSQ	Horizontal Square Termination
ZDVST	Horizontal Snorkel Termination (34" Tall, 24" Center to Center)
FDVHSC	Safety Cage for Horizontal Termination
FDV48P	Black Pipe (7" Diameter x 48")
FDV36P	Black Pipe (7" Diameter x 36")
FDV24P	Black Pipe (7" Diameter x 24")
FDV12P	Black Pipe (7" Diameter x 12")
FDVE90	Black Elbow (7" Diameter x 90 Degree)
FDVE45	Black Elbow (7" Diameter x 45 Degree)
ZDVAIS	Attic Insulation Shield
ZDVVOS	Offset Support
ZDVFS	Firestop Spacer
ZDVRS	Roof Support
ZDVSS	Siding Shield
ZDVWT	Wall Thimble (Horizontal Venting)
ZDV48GP	Galvanized Pipe 7" Dia. x 48" (Vertical Installations)
ZDV4FP8	Flex Pipe 4" Diameter (4' Unexpanded to 8' Expanded)
ZDV4FP20	Flex Pipe 4" Diameter (10' Unexpanded to 20' Expanded)
ZDV4FC	Flex Connector 4" Diameter
ZDV4SS	Spring 4" Standoff Spacer
ZDVAAF	Flashing 7" c/w Storm Collar (1/12 to7/12)
ZDVAF2	Flashing 7" c/w Storm Collar (8/12 to 12/12)
ZDVAF3	Flashing 7" c/w Storm Collar Flat
ZDV7SC	Storm Collar 7 Inch
ZDVDKA	Dura-Vent Stove Adapter (for Direct Vent Stoves)

1000-306	Thermalcord for Door Frame
1000-216	On/Off Switch
6000-130	Explosion Felt
2000-080	Thermodisc Fan Sensor
2000-085	Variable Speed Switch (Fan)
1000-134	Explosion Damper (Round)
350-EMBER	Embers
36ZV-P300TD	Spill Switch

#### TOP CONVERTIBLE PARTS LIST

1001 -P713SI	PILOT TOP CONVERTIBLE - LP - ASSEMBLED 199.713
1001-P714SI	PILOT TOP CONVERTIBLE - NG - ASSEMBLED 199.714
1001-P633SI	#VALVE NOVA LP HI-LO 0820633
1001-P634SI	#VALVE NOVA-NG HI/LO 0820634
1001-P216SI	THEMOCOUPLE - 290.216 (FOR 713 & 714 TOP CON. PILOT)
1001-P069SI	ELECTRODE & CABLE - 915.069 (FOR 713 & 714 TOP CON. PILOT)
1001-P167SI	ORIFICE #30 LP - 977.167 (FOR 713 TOP CON. PILOT)
1001-P165SI	ORIFICE #51 NG - 977.165 (FOR 714 TOP CON. PILOT)
1001-P280SI	ALM. TUBING 24" W/FITTINGS 2.182.280
1001-P144SI	NUT- ELECTRODE UNIVERSAL BUSHING 974 144
1000-214	#PIEZO-IGNITER 1244-17 MARK21
1000-P136WR	#GENERATOR GOA1-524

#### **REPLACEMENT PARTS:**

350- P217SI	KNOB EXTENSION 1 1/2 - ON/OFF
350-P218SI	KNOB EXTENSION 1 1/2- HI/LO
350-310	CERAMIC GLASS FRONT - C/W THERMALCORD (FDV350)
350-309	CERAMIC GLASS SIDE - C/W THERMALCORD (FDV350)

#### **CONVERSION KITS:**

350DV-CKNG	CONVERSION KIT - NATURAL GAS - FDV350N
350DV-CKLP	CONVERSION KIT - LIQUID PROPANE - FDV350LP

## VALVE SYSTEM PARTS

	S.I.T. Valve System
350-BNGSI	NG BURNER ASSEMBLY (complete with valve)
350-BLPSI	LP BURNER ASSEMBLY (complete with valve)



Problem	Possible Causes	Corrective Action	
Spark igniter will not light.	Defective or misaligned electrode at pilot.	Check for spark at electrode and pilot: if no spark and electrode wire is properly connected, replace igniter.	
	Defective igniter (push-button)	Using a match, light pilot. If pilot lights, turn off pilot and push the red button again. If pilot will not light - check gap at electrode and pilot should be 1/8" to 1/4" to have a strong spark.	
Pilot will not stay lit after carefully following lighting instructions.	Defective thermocouple (flame switch where applicable)	Check pilot flame. Must impinge on generator and thermocouple. Clean and/or adjust pilot for maximum flame impingement on generator and thermocouple. Replace thermocouple if pilot will not hold. (Hand tight 1/8 turn on replacement)	
	Defective valve magnet.	Replace valve, if pilot won't hold after the thermocouple is replaced.	
Pilot burning, no gas to burner, Valve knob "ON", Wall Switch "ON"	Wall switch or wires defective.	Check wall switch and wires for proper connections. Jumper wire across terminals at wall switch. If burner comes on, replace defective wall switch. If okay, jumper wires, across wall switch wires at valve. If burner comes on, wires are faulty or connections are bad.	
	Generator may not be generating sufficient voltage.	Check generator with millivolt meter. Take reading at generator terminals of gas valve. Should read 325 millivolts minimum while holding valve knob depressed in pilot position and wall switch "off" Replace faulty generator if reading is below specified minimum.	
	Plugged burner orifice.	Check burner orifice for stoppage and remove.	
	Defective automatic valve operator.	Remove wall switch wires from gas valve. Install jumper wires from top bottom terminals of gas valve. Turn valve on "ON". If main burner does not light, replace valve.	
Frequent Pilot outage problem.	Pilot flame may be too low or blowing (high) causing the pilot safety to drop out.	Clean and/or adjust pilot flame for maximum flame impingement on generator and thermocouple.	
Flame lifts off burner and goes out in less than 30 seconds	Inner 4" liner has come off flue or termination, flame is starving for oxygen	Attach 4" liner to flue or termination using screws, silicone and clamps as stated in manual	
Flame lifts off burner on one side while the rest of the flame remains lit.	Improper installation of firebrick. Firebrick is likely leaning.	Be sure to position firebrick against firebox walls and be sure to use brick clips attached to the inner side of firebox.	

#### NOTE: Before troubleshooting the gas control system, be sure external gas shut off is in the "On" position.





## LIMITED LIFETIME WARRANTY

This Limited Lifetime Warranty applies only while the unit remains at the site of the original installation and only if the unit is installed inside the continental United States, Alaska, Hawaii, and Canada. The warranty applies only if the unit is installed and operated in accordance with the printed instructions and in compliance with applicable installation and building codes and good trade practices.

#### **BASIC ONE YEAR WARRANTY**

During the first year after installation, we will provide a replacement for any component part of your unit found to be defective in materials or workmanship, including labour costs. Repair work requires prior approval by Kingsman, labour costs are based on a predetermined rate schedule and any repair work must be done through an authorized Kingsman dealer.

#### LIMITED LIFETIME WARRANTY

The heat exchanger, combustion chamber and burner of every Kingsman product excluding the Outdoor Firepit are warranted against materials or workmanship during the period the product is owned by the original owner. The part to be replaced must be returned to our distributor in exchange for the replacement part. Any labor, material, freight and/or handling charges associated with any repair or replacement pursuant to this Limited Lifetime Warranty will not be covered by this warranty.

#### **GENERAL TERMS**

In lieu of providing a replacement part, we may, at our option, provide the distributor's component purchase price from us or a credit equal to the distributors component purchase price from us toward the purchase of any new unit which we distribute. If a credit is given in lieu of a replacement part, the rating plate from the unit being replaced must be submitted on a warranty claim, and the unit being replaced must be made available to our distributor for disposition.

In establishing the date of installation for any purpose, including determination of the starting date for the term of this Limited Lifetime Warranty, reasonable proof of the original installation date must be presented<sup>\*</sup>, otherwise the effective date will be based upon the date of manufacture plus thirty (30) days.

We will not be responsible for and you, the user, will pay for: (a) damages caused by accident, abuse, negligence, misuse, riot, fire, flood, or Acts of God (b) damages caused by operating the unit where there is a corrosive atmosphere containing chlorine, fluorine, or any other damaging chemicals (other than in a normal residential environment) (c) damages caused by any unauthorized alteration or repair of the unit affecting its stability or performance (d) damages caused by improper matching or application of the unit or the unit's components (e) damages caused by failing to provide proper maintenance and service to the unit (f) any expenses incurred for erecting, disconnecting or dismantling the unit (g) parts or supplies used in connection with service or maintenance (h) damage repairs, inoperation or inefficiency resulting from faulty installation or application (i) electricity or fuel costs or any increase in electricity or fuel cost whatsoever including additional or unusual use of supplemental electric heat.

We shall not be liable for any incidental, consequential, or special damages or expenses in connection with any use or failure of this unit. We have not made and do not make any representation or warranty of fitness for a particular use or purpose, and there is no implied condition of fitness for a particular use or purpose. We make no express warranties except as stated in this Limited Lifetime Warranty. No one is authorized to change this Limited Lifetime Warranty or to create for us any other obligation or liability in connections with this unit. Any implied warranties shall last for one year after the original installation. Some states and provinces do not allow the exclusion or limitations or exclusions or consequential damages or do not allow limitations on how long an implied warranty or condition lasts, so the above limitations or exclusions may not apply to you. The provisions of this limited warranty are in additions to and not a modification of or subtraction from any statutory warranties and other rights and remedies provided by law.

Save this certificate. It gives you specific legal rights, and you may also have other rights which may vary from state to state and province to province.

In the event your unit needs servicing, contact your dealer or contractor who installed or serviced your unit. When requesting service, please have the model and serial number from each unit readily available. If your dealer needs assistance, the distributor is available for support and we, in turn support the distributor's efforts.

Fill in the installation date and model and serial numbers of the unit in the space provided below and retain this limited warranty for your files.

Model No.	Serial No	Date installed			
Dealer or Contractor Name:					

\*To receive advantage of your warranty, you must retain the original records that can establish the installation date of your unit.

## The Ultimate in Design, Engineering & Quality