

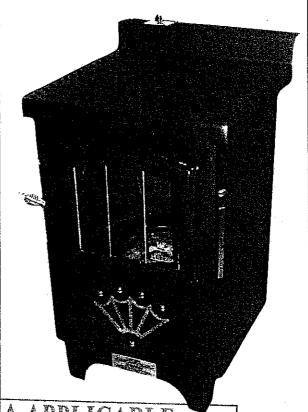
## INSTALLATION AND OPERATING INSTRUCTION MANUAL

# OIL BURNER STOVE MODEL PHENIX

CERTIFIED BY WARNOCK HERSEY IN ACCORDANCE WITH STANDARD CSA B 140.3 AND UL-896

## **WARNING**

OIL BURNING APPLIANCES MUST BE CONNECTED TO A CHIMNEY WHICH WILL PROVIDE ADEQUATE DRAUGHT TO ENSURE A PROPER AND SAFE OPERATION OF THE BURNER.



LA GARANTIE SERA APPLICABLE SEULEMENT SI INSTALLATION FAITE PAR UNE PERSONNE QUALIFIÉE.

## PSG DISTRIBUTION INC.

798, 8th street, La Guadeloupe Beauce (Québec) CANADA GOM 1GO

Tel.: (418) 459-6458 Fax.: (418) 459-6450

Warnock Hersey

KEEP THIS MANUAL FOR FUTURE REFERENCE

### PSG DISTRIBUTION INC. 5 YEARS LIMITED WARRANTY

**PSG Distribution** warrants to the original consumer purchaser that the oil appliances operating with gravity force, will be free from defects in materials and workmanship, under normal use and service, for a period of 5-years from the date of purchase.

These warranties shall be void and have no effect if the appliance is not properly installed in accordance with the installation instructions manual provided with the product.

#### **WARRANTY LIMITATIONS:**

During the first year of the limited warranty, **PSG Distribution** will provide replacement parts at no charge. All repairs must be approved by an authoryzed company official before any work is done.

During the second through the fifth year of the limited warranty, **PSG Distribution** will provide replacement parts at no charge, except for the parts listed below. The following parts are only guaranteed for the first year of the warranty: BURNER, RINGS, OIL VALVE, GLASS PANEL, AND THE BLOWER ASSEMBLY(optional).

This warranty may not be extended by our representatives in any manner whatsoever.

The remedy for damages as the result of any defects in the product which have been warranted herein is limited to replacement of parts and does not include any incidental or consequential damages or expenses sustained in connection with the product including damages to property.

The maker is not bound by this warranty if the purchaser does not return the part of the warranty attached at the bottom in 10 days from the date of purchase.

#### **WARNING:**

If the oil stove with another appliance capable of evacuating the air inside the house outside are working at the same time, it could provoque a negative pressure in the house. Smoke and a sent of oil will be released while the oil stove is functioning. To avoid this situation, you can install a permanent access of exterior air in the same room as the stove. Or you could temporarily open the nearest window next to the stove. This only has to be done when the stove and another appliance such as the dryer or/and a kitchen stove hood or/and an air exchanger is functioning at the same time.

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## **TECHNICAL CHARACTERISTICS**

#### CLEARANCE TO COMBUSTIBLES:

Back .....10" (254 mm) Side .....12" (305 mm) Corner (45º) .....10" (254 mm)

A MINIMUM CLEARANCE OF 9" FROM PIPE TO COMBUSTIBLES MUST BE ALLOWED.

#### SPECIFICATIONS:

Type of fuel:

Oil # 1

Oil #2

Heat output:

45, 694 BTUH 43, 120 BTUH

Recommended draught 0.05" w.c.

0.05" w.c

Efficiency

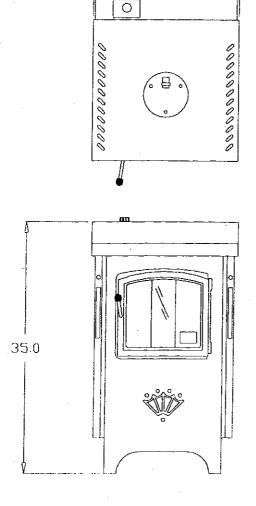
without fan:

72.0%

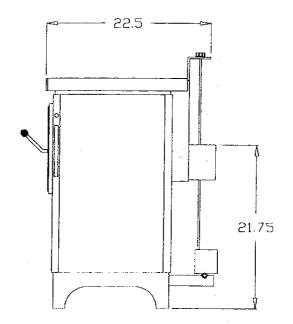
70.5%

To install the optional blower, you have to keep a clearance of 15" (381 mm) between the wall and the rear stove's feet.

## **MEASUREMENTS**



20.0



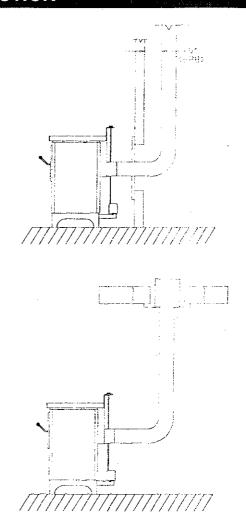
## **CHIMNEY AND CONNECTION**

This stove is made to be installed on a 5" diameter chimney. It is possible that the stove will not properly work if installed on a chimney with a larger diameter than 5". In that case, a 5" liner can be inserted in the chimney and connected to the stove. This type of installation must be verified by a professionnal chimney contractor. This verification is to obtain the maximum satisfaction from the stove while it is being used.

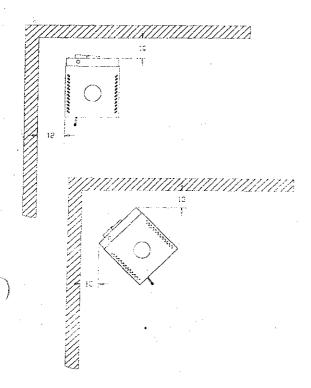
- Before the installation is carried out, ensure that the chimney is in good condition and will provide adequate draught, i.e. .05" W.C.
- The chimney should be well insulated.
- · It must be airtight and its diameter must be constant.
- The minimum diameter must be no less than 5".
- The height of the flue should be no less than 5 meters (16 1/2 feet) and the top should be above the ridge of the roof and terminate without any form of restriction in the open air.
- Never use a smaller diameter than that intended for the appliance or restrict it in any way (minimum 5").
- The connection between the stove's pipe and the chimney must be perfectly airtight.

NOTE: It is essential to check that the room in which the appliance is installed is sufficiently well ventilated to provide an adequate air supply.

THE INSTALLATION SHALL BE IN ACCORDANCE WITH THE REGULATIONS OF AUTHORITIES HAVING URISDICTION. AND THE INSTALLATION CODE FOR OIL BURNING EQUIPMENT CSA-B-139.



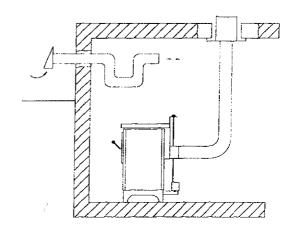
### LOCATING THE APPLIANCE



- The flue outlet is fitted on the back of the appliance.
- It is possible to connect the stove directly to the chimney using a short horizontal length of pipe or make a vertical connection to the back of the stove using the 90° elbow (see drawings above).
- Make sure that the burner always stand perfectly level with the floor. To do so, put a level on the burner flange and verify both axises. Repeat the operation with the level on top of the valve. The appliance must be correctly fixed to the floor using the two fixing screws to be fitted at the rear of the frame (see drawing p.8).
- A minimum clearance of 229 mm (9") from pipe to combustibles must be allowed. NOTE: DO NOT INSTALL THE APPLIANCE DIRECTLY ON CARPETING.

THE BURNING OF ONE LITRE FUEL OIL REQUIRES APPROXIMATELY 30M³ OF AIR AND WILL PRODUCE APPROXIMATELY 0,8 KG OF WATER VAPOUR AND 9M³ OF CARBON DIOXYDE +ATMOSPHERIC NITROGEN. A SOURCE OF AIR FROM THE OUTSIDE IS NEEDED TO REPLACE THE COMBUSTION AIR.

DO NOT USE GASOLINE, CRANKCASE OIL OR ANY OIL DERIVATIVE.



### LIGHTING / ADJUSTMENT

- 1. Open tap on the pipe between the stove and your main oil tank.
- 2. Arm valve's lever at the back of the stove by pushing it downward. (see figure next page)
- 3. Open the door of the stove.
- 4. Make sure that the 2 burner's rings are in the right position. (see figure p. 8)
- 5. Pour in the pot 1oz of wood alcohol (methyl hydrate). The quantity of wood alcohol can be replace by 1/2oz of gel. IT IS VERY IMPORTANT THAT THE QUANTITY BE RESPECTED.
- 6. Provoke the alcohol or the gel with the help of a lit up match by throwing it in the pot.
- 7. Close the door of the stove.
- 8. Set the flow regulating handle to position #1.
- 9. Wait 15 minutes before increasing the flow regulating handle on position #2.

You must at least wait 15 minutes before increasing the flow regulating handle to a higher degree. Although, it is not necessary to wait 15 minutes before reducing the degrees.

#### IMPORTANT NOTE:

If you miss the stove's lighting, always wait for the burner to cool down to room temperature before using burning alcohol again or else, use commercial lighting material (solid) or a piece of cotton damped in oil.

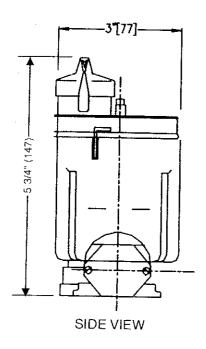
If, further to some misoperation, the burner finds itself filled with important quantities of oil, all of the oil must first be removed (e.g. by using a sponge) before lighting the stove again.

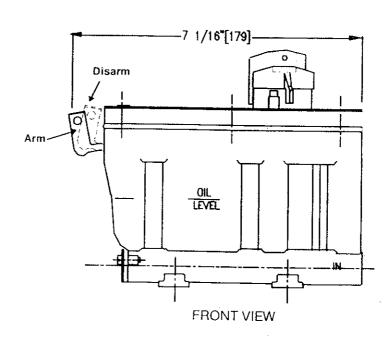
DO NOT ATTEMPT TO START THE BURNER WHEN EXCESS OIL HAS ACCUMULATED, OR WHEN THE BURNER IS HOT. DUE TO HIGH SURFACE TEMPERATURES KEEP CHILDREN, CLOTHING AND FURNITURE AWAY.

#### **CLEANING**

Whille cleaning the glasses on your oil stove with detergent, make sure to rinse off your glasses thoroughly; because residues might de left on the glasses. If it is not properly rinsed off the remaining chemicals from the detergent will stain your glasses when the stove will be heated. The stains will be very difficult to remove. In order to avoid this situation; we recommend that you only use a damp cloth to clean your glasses and do it once a week.

As long as the chimney's draught is correct and the valve is correctly set, the burner should not get dirty. The cleaning tee should be turned, pushed forward and pulled back into place once a week. The burner and its rings should be cleaned with a metallic brush at two months intervals. When lighting the stove at the beginning of the heating season, clean the valve's filter, check cleanliness of the stove's internal flue parts and of the stove's rear smoke manifold. Both sweep and inspect your chimney at least once a year. Clean the stove and check the door seals. Inspect the internal flue paths. (remove the cleaning trap door) at least once per heating season.





### **TURNING THE STOVE OFF**

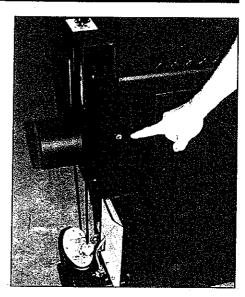
Set the flow regulating handle to position "0". If you plan to keep the stove off for a long while, it is recommended to disarm the valve's lever and close the tap on the pipe between the stove and your oil tank. (See front view above) **ALWAYS KEEP THE VALVE SHUT OFF WHEN THE BURNER IS NOT OPERATING.** 

## **DRAUGHT**

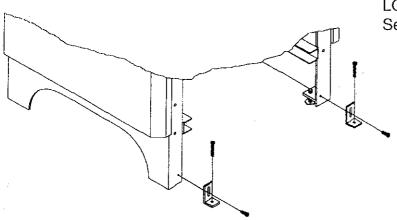
The chimney's draught is of capital importance to ensure a good combustion. When the stove is set to maximum output (position "6"), the draught must reach 0.05" W.C. at least, after having burned for an hour. If such was not the case, the stove's efficiency would be reduced.

NOTE: In case the chimney's draught is higher than 0.05" W.C., the stove's draught limiter must be used. The draught can be properly measured only by using a draught-meter. Any other method or instrument (candle flame, etc.) shall be totally unable to give any accurate measurement. Providing the chimney's draught is correct, you should be perfectly satisfied of your stove.

IMPORTANT: It is important to check that the draught limiter is in the right position.



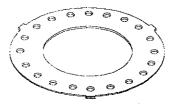
NOTE: Remove the strap to take the content of the burner. Replace the two screws.

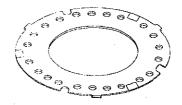


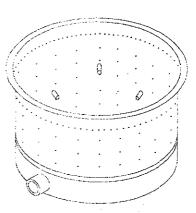
LOCATING THE APPLIANCE. See page 5 for details.

## **BURNER RINGS INSTALLATION**

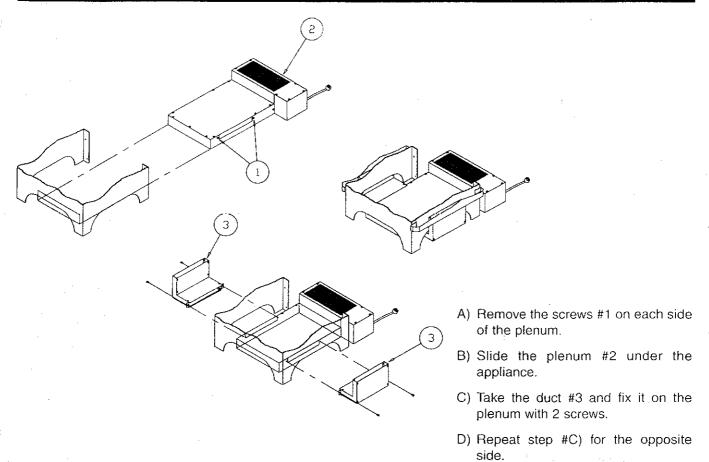
- Install the lower ring first, making sure the cavities are aligned to allow the ring to fit on the lower retaining rods.
- Install the upper ring on the upper retaining rods.



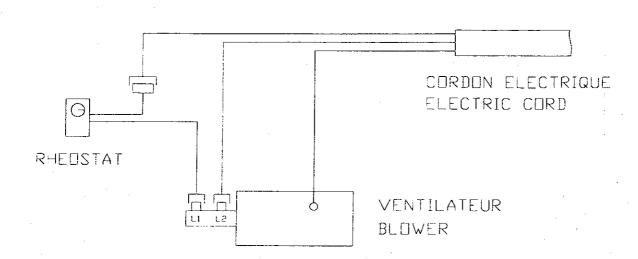




## **BLOWER INSTALLATION (OPTIONAL)**

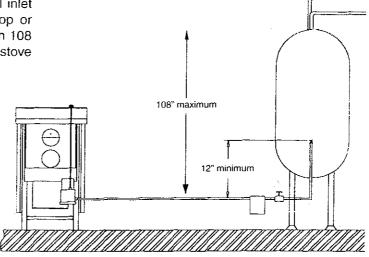


## **BLOWER WIRING DIAGRAM**



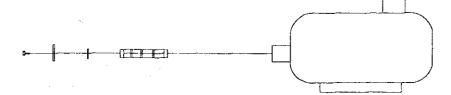
## **OIL TANK INSTALLATION**

The oil outlet on the oil tank must be at least 12 inches higher than the oil inlet on the stove regulator. And the top or the oil tank must not be higher than 108 inches than the oil in let on the stove regulator.



## **OIL FILTER CLEANING**

- 1. Remove the plate;
- 2. Remove the gasket;
- 3. Remove the oil filter;
- 4. To clean the oil filter, rinse in petroleum or kerosene;
- 5. Dry the oil filter and put it back in place.



## **TROUBLE SHOOTING**

ON POSITION 6, THE FLAME GETS LONGER, PRODUCES SMOKE AND BLACK DEPOSITS ON THE WINDOW.

#### 1st explanation:

- Position "6" was reached too guickly.
- Set flow regulating handle to position 0 and wait for combustion to get back to normal. Then progressively get back to desired position.

#### 2nd explanation:

- Maximum flow is too high. Set flow regulating handle to an intermediate position and ask your dealer to regulate your stove's valve.

#### ON POSITION 1 OR 2, THE FLAME PRODUCES SMOKE:

EXPLANATION: Minimum flow is too low.

- Set flow regulating handle to a higher position and call your dealer.

#### THE FLAME PRODUCES SMOKE IN ANY POSITION:

#### 1st explanation:

- The door is not completely close.

#### 2nd explanation:

- The burner's holes are blocked, clean the burner.

#### 3rd explanation:

- Chimney's draught is too low. Call your dealer.

#### THE FLAME GOES OUT:

#### 1st explanation:

- Oil tank is empty. Refill tank.

#### 2nd explanation:

- Impurities coming from oil, tank or pipes block the flow:
  - a) inside the tank
  - b) in the valve's filter
  - c) in the slot of the valve's flow regulating rod
  - d) at cleaning tee tip

Call your dealer to have your stove inspected and cleaned.

#### **IMPORTANT REMINDER:**

The chimney's draught ensures the supply of air for combustion to take place in the burner. Dirty windows are caused by bad combustion, itself being due to lack of air. Most of the time, this is due to insufficient chimney draught.

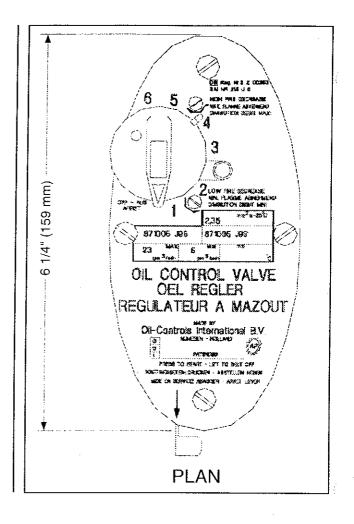
#### REGULATION OF THE VALVE

#### TO BE CONDUCTED BY A PROFESSIONAL

**NOTE:** No regulation should be needed on the valve unless the fuel's viscosity varies. On top of the valve, two regulation screws can be found: "Maximum flow decrease" and "Minimum flow decrease". Oil flows cannot be increased.

- a) If the minimum flow is too high, turn the relevant screw in the direction the arrow points to.
- b) If the maximum flow is too high, turn the relevant screw in the direction the arrow points to. Regulating a valve's flow requires lots of precision and sensitivity. It is advisable to act upon the regulation screws with upmost care. Always start by setting minimum flow.

THE OIL TANK SHALL BE LOCATED SO THAT THE TANK WILL NOT BE EXPOSED TO THE DIRECT RAYS OF THE SUN, OR BE ADJACENT TO ANY SOURCE OF INTENSE HEAT.

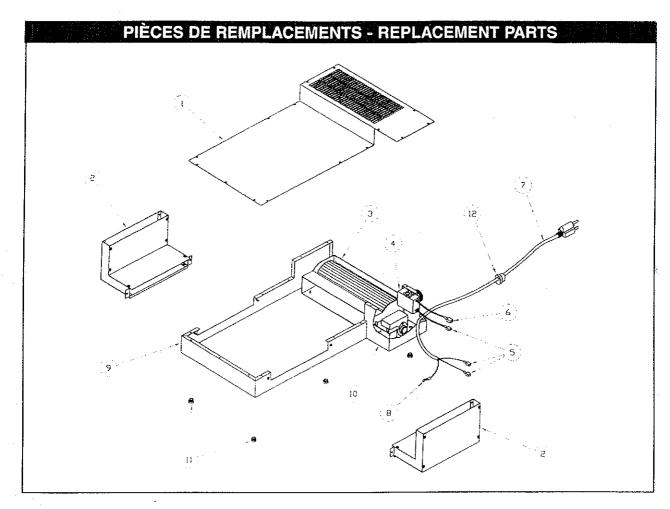


### REPLACEMENT PARTS

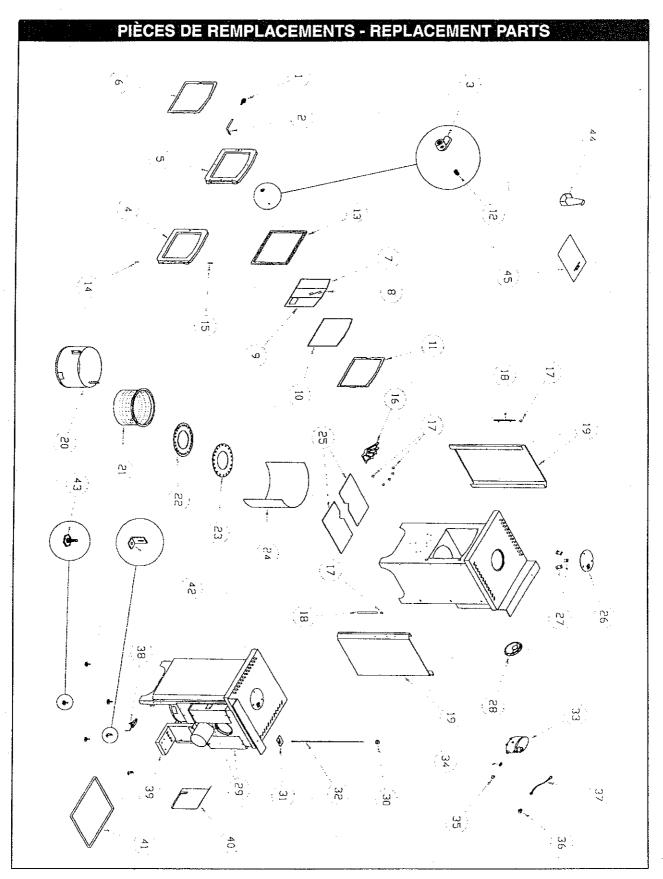
After years of use, if you need to replace some parts, please contact your supplier. Give him product data as displayed in your warranty voucher, or on your appliance's name plate at the rear. Keep the warranty voucher even after its validity date.

Our dealers are in possession of all spare parts nomenclatures and technical data about our products, and will provide you with the spare parts you need and any maintenance intervention within the scope of their professional competence.

NOTE: SEE ANNEXE



RÉF.	NO PIÈCES	DESCRIPTION DE LA PIÈCE	PART DESCRIPTION
1	P10132-K	Dessus du plénum	Plenum top plate
2	E1016-K	Conduit d'air	Side duct
3	MH1001	Ventilateur 127 clm	127 cfm blower
4	MI1008	Rhéostat	Speed control
5	ML1001	Cosse rouge femelle	Red female terminal
6	ML1002	Cosse rouge mâle	Red male terminal
7	MK1001	Cordon électrique	Electric cord
8	ML1003	Cosse rouge oeillet	Red ring terminal
9	P10125-K	Fond du pléum	Plenum bottom plate
10	P10131-K	Contour du moteur	Motor cover
11	MD1011	Patte en caoutchouc	Rubber grommet
12	ML1005	Manchon du cordon électrique	Strain relief bushing



RÉF.	NO PIÈCES	DESCRIPTION DE LA PIÈCE	PART DESCRIPTION
1	MM1011	Poignée ressort plaquée or 24K	Gold plated handle
2	P10111-A	Tige de la poigné de porte	Rod handle
3	A1015-A	Loquet de la porte	Door latch
4	P10109-A	Cadre de la porte	Door frame
5	P10147-A	Cadre de la porte pour moulure	Door frame for the door trim
6	P10130-D	Moulure de porte plaqué or 24K	Gold plated door trim
7	P10200	Vitre gauche	Left glass panel
8	P10199	Vitre centrale	Center glass panel
9	P10108	Vitre droite avec logo	Right glass panel with logo
10	MN1004	Ruban autour des vitres	Glass gasket
11	A1016-A	Cadre des vitres	Glass frame
12	MC1005	Goupille ressort	Spring pin
13	MN1005	Cordon de la porte	Door gasket
14	P10117	Tige (bas de la porte)	Rod (bottom of the door)
15	MC1006	Rivet (haut de la porte)	Rivet (top of the door)
16	P10127-D	Empreinte plaquée or 24K	Gold plated footprint
17	P10128-D	Boulon plaqué or 24K	Gold plated bolt
18	P10129-D	Moulure latérale plaquée or 24K	Gold plated side trim
19	P10112-A .	Panneau latéral	Side panel
20	A1006	Gaine du pot à combustion 10"	Sheath (for 10" combustion pot)
21	P10038	Pot à combustion 10"	10" combustion pot
22	P10039	Anneau inférieur	Lower ring
23	P10040	Anneau supérieur	Upper ring
24	P10114	Plaque protectrice	Protection plate
25	P10113-A	Déflecteur intérieur	Inside deflector
26	P10086-A	Rond de poêle avec trous	Top plate with holes
27	P10087	Fixation du rond de poèle	Top plate fixation
28	MQ 1001	Volet barométrique 5"	5" draft control
29	P10125-A	Déflecteur sur l'échangeur	Rear deflector
30	MM1010	Bouton pour contrôle de vanne	Knob control
31	MW1006	Étiquette pour contrôle	Sticker for control
32	P10116-A	Tige de la vanne	Oil valve rod
33	MP1004	Vanne à l'huile	Oil valve

RÉF.	NO PIÈCES	DESCRIPTION DE LA PIÈCE	PART DESCRIPTION
34	MF1011	Connecteur 1/4npt - 3/8 évasé	Male connector 1/4 npt - 3/8 flare
35	MF1009	Écrou court 3/8 évasé	Short nut 3/8 flare
36	MF1018	Coude mâle 90º 1/4 npt - 5/16 évasé	90° elbow 1/4 npt - 5/16 flare
37	E1010	Tuyau de cuivre avec écrous	Oil valve pipe with nuts
38	E1004	Té décrasseur	Cleaning tee
39	C1014-A	Support de la vanne	Oil valve support
40	P10123	Déflecteur de la vanne	Oil valve deflector
41	V10115	Tiroir à l'huile	Oil pan
42	P10118-A	Ancrage	Anchor
43	MA1003	Patin de meuble	Leveling glide
44	P10254	Grattoir du pot à combustion	Combustion pot scraper
45	MW1014	Manuel d'installation	Installation manuel