
Grillon - Buchère

Solid fuel boilers 921 series

Wood / Coal

Ref. 921 15 02, 921 22 02, 921 29 02

Wood

Réf. 921 29 03



Description

Assembly and installation

Operating instructions

Spare parts

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English p. 17-32

Technical manual

to be saved

by the user

for future reference



Subject to modifications

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1. Description

1.1. Optional equipment

- Summer wood grate.
- Summer coal grate.
- White color cover ("Grillon" only).

1.2. Technical details

Model . . .		9211502	9212202.	9212902	9212903
Total heat output BTU/hr (with dry seasoned wood)*		39,000	57,000...	77,000	77,000
Average heat radiated BTU/hr		3,000...	3,900	4,200	-
Dimensions :					
Width . . .	mm	330	450	500	500
Depth . . .	mm	630	750	810	810
Height	mm	800	800	800	800
Firebox Size					
Width . . .	mm	250	350	425	424
Depth . . .	mm	250	320	350	350
Height	mm	430	430	430	430
Flue outlet O/D **	mm	139	153	153	153
Distance from Floor to Centre of Rear Flue Outlet	mm	685	685	685	-
Capacity of Water Jacket		4,5 gals/21 l	5,5 gals/25 l	6,5 gals/30 l	6,5 gals/30 l
Weight Packed lbs	320	410	500	500
	Kgs	145	186	227	227

* When burning solid-fuel, the outputs quoted will be increased by approximately 25 % . - .

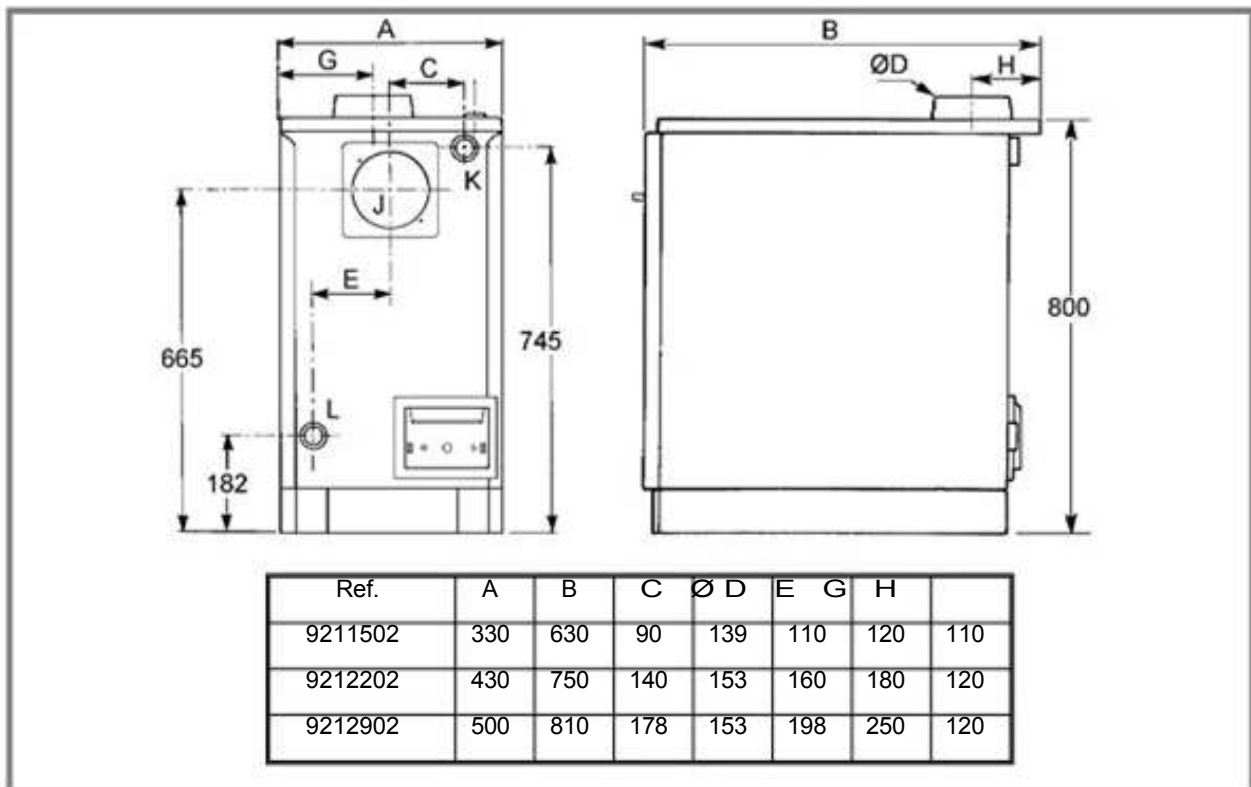


Figure 1 - Dimensions in mm

J - Rear flue outlet (except ref. 921.29.03)
K - Flow Ø 1 1/2" BSP (40x49)

L - Return Ø 1 1/2" BSP (40x49)

1.3. Description of the appliance.

The Franco Belge 921 series boilers are designed to burn solid fuel, wood and peat.

The heat exchanger is manufactured from high quality plate steel. Its specific design provides a large surface area for efficient use of the heat generated. The large top loading plates enable large pieces of fuel to be burnt whilst facilitating easy access for cleaning.

Regulation of the fire is by a water-sensing thermostat which controls the primary air flow rate. Primary air is introduced at the bottom of the heat exchanger. Fixed secondary air outlets at the top of the fire box introduce a constant supply of additional air to assist combustion of the flue gases.

The appliance is fitted with externally controlled riddling grate.

1.4. Sizing the boiler

All models are rated in BTU/hr output and should be sized to the heat loss of the building.

If appliance is undersized, it will not be capable of producing sufficient heat for the system. Oversizing will result in excessive hot water production and expansion and serious chimney congestion problems could occur especially when burning wood.

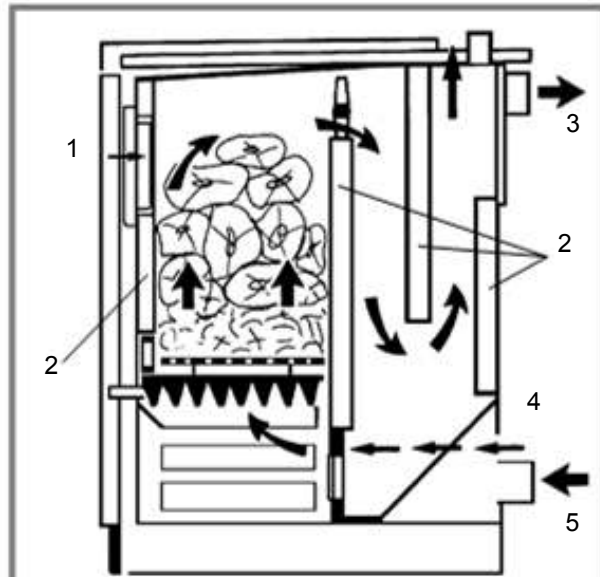


Figure 2 -Side cross section

- | | |
|-------------------------|-----------------------|
| 1- Secondary air inlet. | 4- Primary air inlet. |
| 2- Water circulation. | 5- Water flow. |
| 3- Water return. | |

2. Assembly and installation

Please read through completely before commencing installation.

The installation should be carried out by a qualified heating engineer who is experienced in solid fuel heating.

The installation must be in accordance with the current codes of practice relating to the installation of solid fuel appliances.

2.1. Positioning the appliance

The room in which the appliance is to be installed must satisfy Current Building Regulations.

These will stipulate an adequate fresh air inlet of at least 350 cm². This must be installed in such a way, that in adverse wind conditions the air flow cannot be reversed as this may suck air out of the room in which the unit is installed.

The position of the boiler will be determined by the best position for the chimney, whilst ensuring that a safe distance is left between the boiler and combustible surfaces.

2.2. The chimney

The chimney is the key to a successful installation and the following key areas should be checked.

Height

The minimum height should be 5 metres with the terminal at least 1 metre from the roof surface and in a clear area away from possible downdraft. If in doubt always increase the chimney height. This will help to ensure an adequate draft and clearance of the flue gases from the area of the building.

Insulation

The chimney needs to be warm from bottom to top and

should be adequately insulated. Cold chimney and cool flue gas temperature will result in tar formation and smoke emission into the room.

Resistance

If the chimney has a horizontal section at the appliance outlet, this should not exceed 30 cm. Any changes in direction should be gradual (15 degrees maximum) and the chimney system must not incorporate more than two bends. The straighter the chimney, the less resistance. Any resistance will slow down the flue gases and help to create a build up of tar deposits.

Draft

The appliance requires a draft of between 04" and 07" W.G. to burn effectively. This is the up draft of air through the appliance. It is the result of the height of the chimney and heating of the column of air within the chimney. An inadequate draft will cause soot and tar formation in the chimney.

The appliance requires a class 1 chimney. Existing unlined chimneys should be lined with a liner suitable for use with solid fuel burning appliances. If there is no existing chimney, there are a variety of prefabricated systems available and it is recommended to discuss your particular application with a chimney specialist.

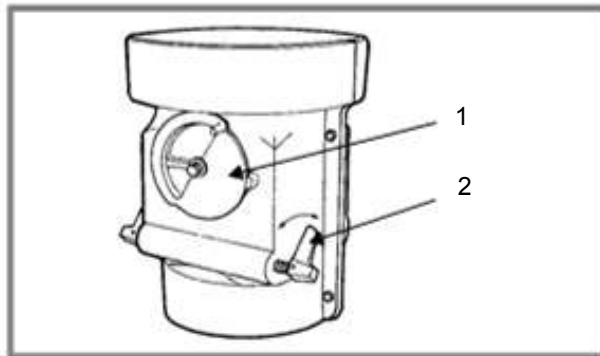


Figure 3

Optional Flue draught control box For top flue outlet.

- 1- Spinner air wheel.
- 2- Damper control.

2.3. Connection to chimney

TOP FLUE OUTLET

Use the optional draught control box (ill. 3).
The draught control box can be dismantled to give access for flue cleaning.

REAR FLUE OUTLET.

It is not possible to use the draught control box in this position. Provision should therefore be made to fit a draught regulator.

Important ! Don't forget to fit with an airtight seal the flue collar and the blanking plate which are supplied and packed in the firebox.

Caution : Sufficient access must always be left for chimney sweeping and appliance cleaning.

2.4. Connecting the central heating circuit

In any installation relevant building codes of practices must be observed.

- The appliance is not designed as a pressure vessel, so the circuit must be left open to the atmosphere and must not be constructed to allow any pressure build-up to occur.
- A gravity circuit MUST be provided, as a fail safe heat loss in the event of a circulating pump failure or a power cut. To achieve this, ensure that large diameter pipes leading to upstairs radiators have a direct flow from the boiler, or install a large indirect domestic hot water cylinder.

Fig. 4, 5 and 6

- 1- Expansion tank
- 2- Water cylinder
- 3- Franco Belge appliance
- 4- Flow control valve
- 5- Radiators circuit
- 6- Sweep tee
- 7- Circulating pump
- 8- Pipe thermostat
- 9- Oil or gas boiler
- 10- Four way mixing valve
- 11- Eventual minimal flow by-pass

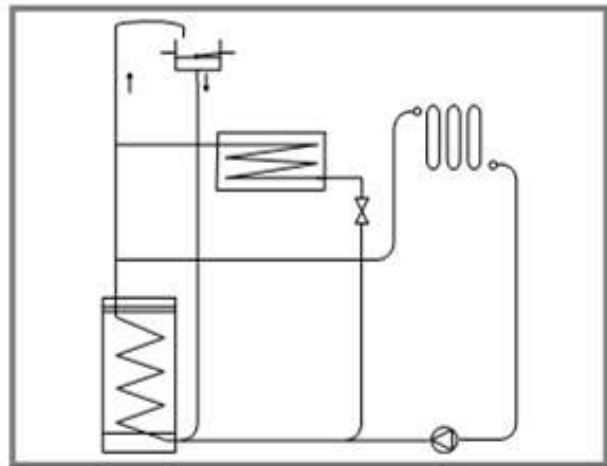


Fig. 4 - Example of installation 1

Gravity hot water tank, pumped central heating.

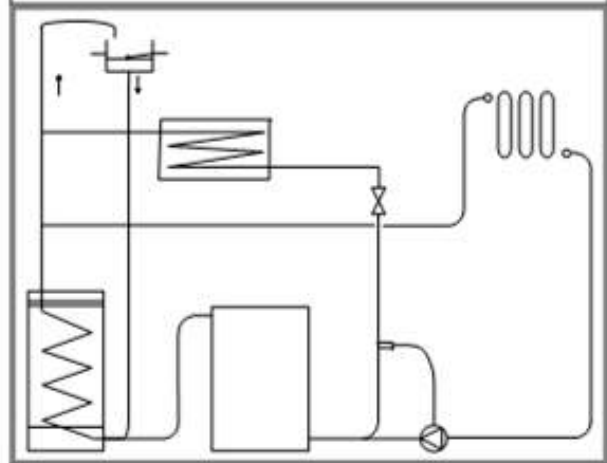


Fig. 5 - Example of installation 2

The illustration in fig 5 above is not allowed in the UK.

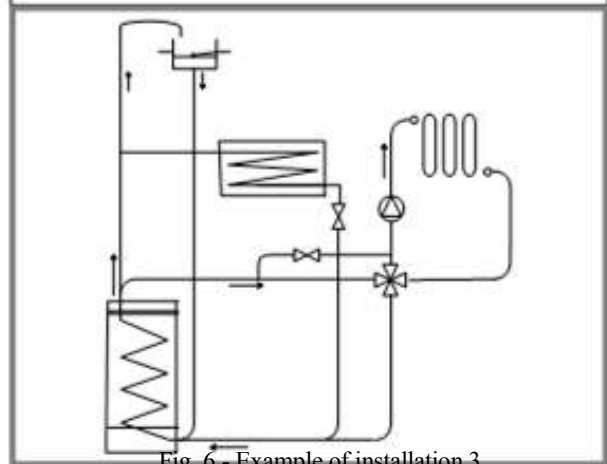


Fig. 6 - Example of installation 3

Pumped central heating gravity hot water tank four way mixing valve.

The layout of the heating circuit can be designed in any fashion that suits the house, as the pump will ensure circulation of hot water to all points, but the hot water cylinder or a small heating circuit must be engineered to work by gravity. Use 1 inch I.D pipe (28mm) to the cylinder, insure that the cylinder has a 3/4 inch min. I.D. coil wound from top to bottom, and that the inlet is above the boiler and the outlet is above the return tapping of the boiler. An expansion cylinder open to the atmosphere must be provided to ensure that no pressure build-up can occur, and this should be connected to the highest point of the circuit by 1". I.D. pipe (28mm). If the system is going to be left unattended during winter periods, anti freeze should be added.

In order to reduce the possibility of condensation forming on the outside of the heat exchanger and on the return water pipe, it will be necessary to ensure a continuously high temperature to the return water. **Damage due to low temperature corrosion will invalidate the guarantee. The return water should be maintained above a minimum of 50°C.**

This can be achieved by fitting a pipe thermostat onto the return pipe from the domestic hot water cylinder and by connecting this into the electric circuit controlling the operation of the circulation pump on the central heating circuit. The circulation pump can also be controlled by a room thermostat and a time clock. If this is not sufficient and the heat exchanger temperature remains low, a four way mixing valve should be fitted to the water outlet to bleed some water straight back into the return. This valve can either be operated manually or can be controlled electrically from a thermostat on the return water pipe. A pipe thermostat on the domestic hot water return has the additional advantage of giving priority to this circuit and ensures rapid reheating of the domestic hot water. This thermostat can be set at a fairly low temperature, say 50°C, to give the best effect.

2.5. Assembling and installing the thermostat

Figure 7

The thermostat is fitted to the threaded tapping at the left-hand corner of the appliance. Screw in the thermostat using a sealant to make the joint water-tight. Be careful not to damage the thread by over tightening.

The chain provided with the thermostat, should be attached to the thermostat arm and the arm fitted into the thermostat and held in place with the hexagonal screw. The other end of the chain can then be connected to the draught flap positioned at the bottom rear corner of the appliance. It will be necessary to adjust the length of the chain in order that the automatic draught operation functions correctly. However, this can only be done when the appliance is lit.

When the appliance is working satisfactorily and the circulating water is at a suitable temperature, say 60°C adjust the thermostat. Fix the pipe thermometer onto the outlet

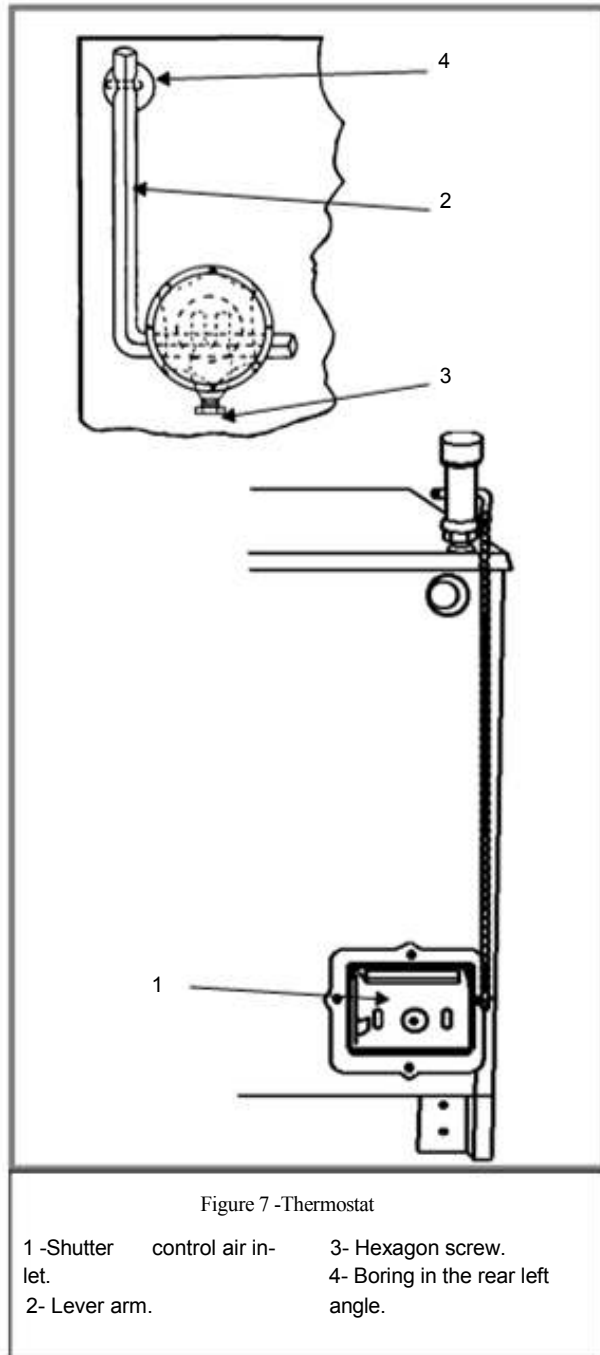


Figure 7 -Thermostat

- | | | |
|---------------|-----------------|----------------------------|
| 1 -Shutter | control air in- | 3- Hexagon screw. |
| let. | | 4- Boring in the rear left |
| 2- Lever arm. | | angle. |

water pipe and observe the temperature. Adjust the thermostat so that the white figure which corresponds to the temperature is directly above the white line. Cut the chain connecting the thermostat arm to the air inlet flap and connect it up so that the air inlet flap is just closed. When the temperature falls, the thermostat arm will rise and open the air inlet flap to increase the air flow. When the required temperature is reached, the thermostat will close the air inlet and damp down the fire. A finer adjustment is provided using the threaded rod and lock nuts to open or close the draught flap by small amounts.

When the thermostat has been adjusted and the desired water temperature reached, the manual draught can be closed. Set the thermostat to the desired temperature and allow it to control the fire.

It is important that the thermostat be positioned, as shown in the diagram, with the small hexagonal screw facing the front of the appliance.

3. Operating instructions

3.1. Check before lighting

Be sure that your installer has tested the water circuit. ▣
Check that the cleaning access door is closed. It is located behind the ash pan.

Check that all the grates are in their correct positions (fig. 8, page 23).

Check the working of the air inlet flap at the back of the boiler (# 2 and # 3, fig. 8, page 23).

3.2. Lighting

The boiler is lit exactly like an ordinary fire, with paper, and kindling. Open the ash pan door air control to get a good draught.

Once the fire is burning well, the boiler can be stocked up with the fuel.

When the fire is well established and the flue is warm, close the draught control wheel and allow the thermostat to regulate the burning rate.

Do not allow the fire to get too hot during the first week. All the cast iron parts need seasoning and should not be heated too suddenly in the first few days.

If, when the appliance is first lit, black water leaks from the firebox, this is a sign of the presence of condensation on the water jacket. If condensation persists after a 48 hours period, consult your installer.

Caution : Ash pan door to be closed during operation to prevent excessive temperature.

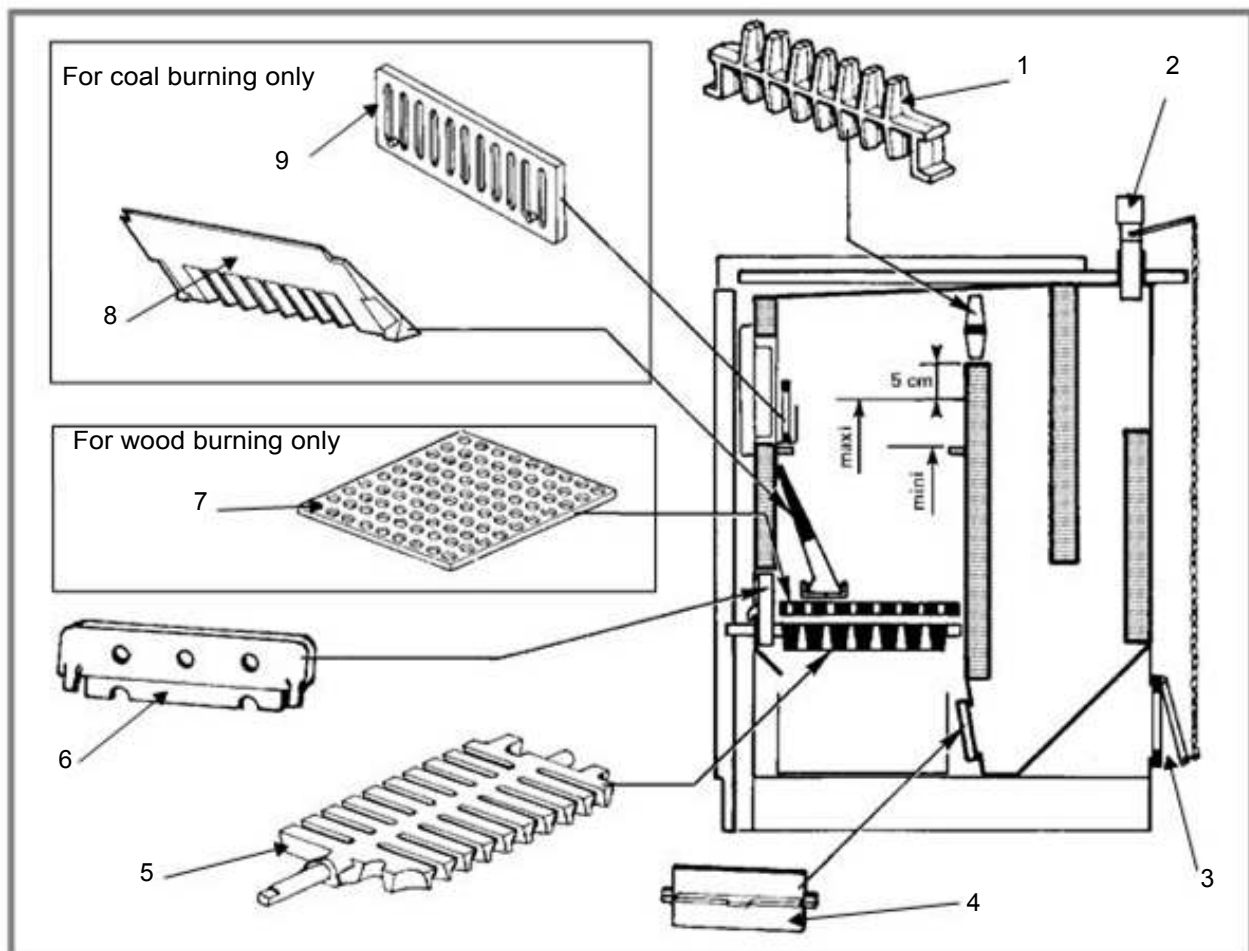


Figure 8 - Description of the appliance

Positioning of the grates

- | | |
|--------------------------------|-------------------|
| 1- Flue guard grate | 6- Face plate |
| 2- Thermostat | 7- Wood grate |
| 3- Controlled air inlet | 8- Inclined grate |
| 4- Cleaning flap behind ashpan | 9- Coal retainer |
| 5- Oscillating grate(s) | |

3.3. Heating

The automatic thermostat control should be set to the water temperature required i.e. if 60°C is required the white figure 60 should be set opposite the white line on the thermostat body. Provided that the fire is stocked up and the ash pan door draught flap is closed the thermostat will automatically control the burning rate of the fire and produce the required temperature.

3.4. Fuel

Coal : Use of household coal, and coals which disintegrate in heat are not recommended nor are those producing a large amount of ash. Smokeless fuel, Large Anthracite or similar Smokeless fuels give the most efficient performance

Wood : Use only well seasoned dry wood (at least two year old and dried under cover for at least six months before using). Serious damage to the boiler can occur by using unseasoned wood.

Peat : This fuel, like wood, must be properly dried. If the fuel is wet, the output will be considerably decreased and appliance could suffer from corrosion.

Remarks about the use of fuels :

The amount of ash in the fire is a very important factor in the performance of the Franco Belge.

When burning wood, a good base of ashes is advantageous for slow controlled burning, but should be reduced by riddling before cooking, or whenever ash accumulates too much and reduce the fire box capacity.

When burning coal or smokeless fuels, the ash must be riddled more frequently to allow a good airflow to the fire. Solid fuel requires much more air to burn than wood.

3.5. Flue draught control box

For Great Britain only (ill.3, page 21) :

The draught control box is designed to slow down the flow of gases leaving the appliance and entering the flue.

This is accomplished by restricting the square area of the chimney. It causes the gases created in the appliance to move slower and in so doing reduces the amount of combustion air entering the unit. The result is that the appliance will burn for longer periods.

The flue box has two controls : the spinner air wheel 1 and the damper control 2.

If it is found that the appliance is burning too fast, close the flue damper 2 to one of the four positions. Trial and error will determine which setting is best for your situation. When experimenting, start by putting the lever in the top position and close it notch by notch, as necessary. Always remember to open the damper to a vertical position before attempting to reload with fuel.

The air wheel 1 situated at the front of the flue box should only be used if the damper gives insufficient control. If in this case, the air wheel may be opened little by little until the desired result is obtained. The air wheel must not be used for long periods and should be closed before refueling.

3.6. Summer grates (optional)

During the summer when the domestic hot water supply but not the central heating, is required, the appliance should be used with the "Summer Grate". This grate rests

on four lugs situated in the fire box and reduces the size of fire by approximately half.

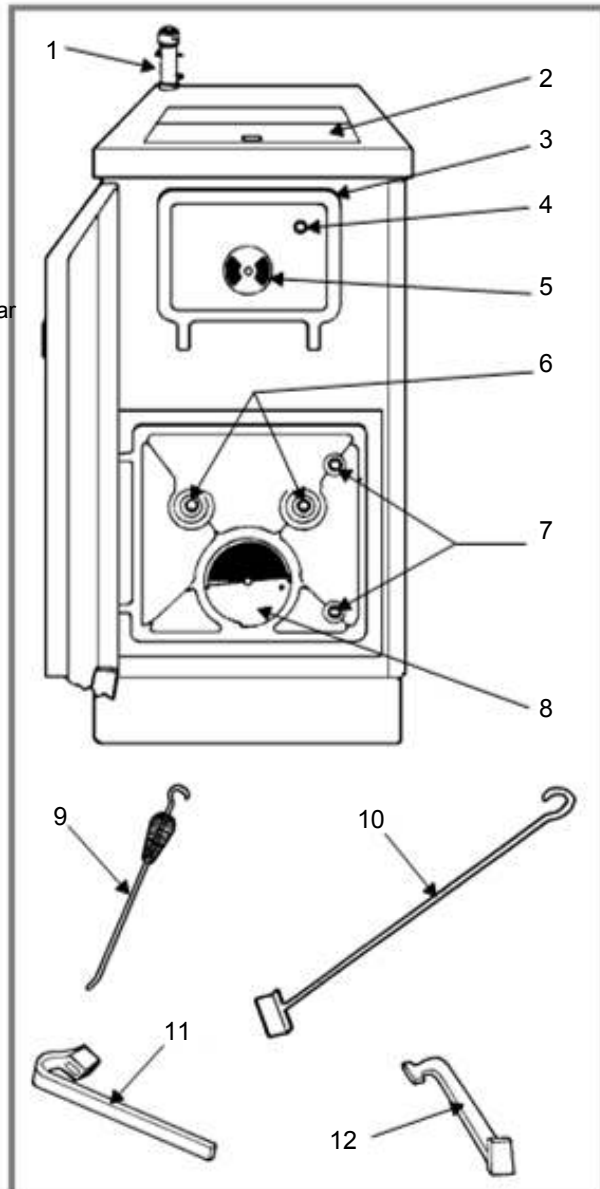


Figure 9 -Operating devices

- 1-Thermostat.
- 2-Loading door : "Coal".
- 3-Loading door : "Wood".
- 4-To open the loading door.
- 5-Secondary air control.
- 6-To riddle the grates
- 7-To open the ash pan door.
- 8-Manual draught control
- 9-Poker
- 10- Scraper for cleaning and scraping fire box and flue passages.
- 11- Riddling handle for deashing and for opening ash pan door.
- 12- Opening tool, for handling ash pan, lifting plate above fire box to load.

3.7. Maintenance

The appliance is most efficient when all the surfaces of the heat exchanger and the ash compartment are clean. If soot and ashes are allowed to build up, the life of the grates will be shortened, therefore it is essential to empty the ashpan,

if necessary, daily! Tar and soot build up on the surfaces of the water jacket and flue passages should be removed at frequent intervals. This is best achieved by running the appliance very hot for a short period each day. It is important to do this in order to preserve the life of the water jacket.

3.8. Fault diagnosis.

Situation	Cause reference										
Unresponsive fire	A						G				
Difficulty in maintaining fire	A				E		G	H			K
Fire goes out overnight	A						G		I		
Smoke and smell in kitchen	A				E	F					
Smoke emitted when loading	A					F					
Smoke emitted when door is slammed					E						
Rapid sooting-up of chimney and flue ways	A						G		I	J	
Fire burns out overnight		B									K
Uncontrollable burning rate			C						I		K
Difficulty in obtaining water temperature	A						G			J	K
Overnight burning performance dependent on weather conditions			C								
Moisture in ashpan and under boiler				D							
Large amounts of clinker forming		B					G			J	



This sign means that you should asked for a qualified engineer to do the work.

Cause reference	Cause	Action
A	▫ Inadequate draught	<ul style="list-style-type: none"> - The chimney should be checked with a draught meter and if below the recommended level, look for air leak or a constantly cold chimney. - If the connecting flue pipe terminates in a large chimney and no evidence of air leaks can be discovered, a chimney liner should be considered. - If the inadequate draught is due to a poor geographic position, consult your dealer to consider an electric draft inducing fan.
B	▫ Excessive draught	<ul style="list-style-type: none"> - If top flue the appliance should have been supplied with a draught control box to help regulate the chimney draught. If the control box gives inadequate control, fit a draught stabiliser.
C	▫ Draught too variable	<ul style="list-style-type: none"> - This could be caused by a cold chimney with excessive heat loss but it is more likely that the cause is turbulence at the chimney terminal. Raise the height of the chimney or fit a suitable cowl.
D	▫ Condensation	<ul style="list-style-type: none"> - Condensation is often mistaken for a leaking water jacket and can be very persistent. Each water jacket is tested thoroughly in the factory and it is highly unlikely that a leak could be the cause. Condensation is caused by : <ul style="list-style-type: none"> - A poor chimney which allows the flue gases to cool rapidly, thereby condensing steam in the flue. Consider

lining chimney.

- Wet wood fuel being used. Dry and season wood well before burning it. See section on fuels.
- The return water temperature being too low. To minimise the possibility of condensation, always allow your FRANCO BELGE to warm up slowly and never operate the circulating pump until the system is heating with the return temperature no more than 15 °C below the flow temperature and in any case, no less than 50°C.

If condensation still persists, allow the fire to burn slowly for a full 24 hour period heating the domestic hot water only.

Then try the pump again.

If the return temperature is always 20°C below the flow temperature with the pump on, it is likely that the 4 way mixing valve is not being used correctly. This indicates that insufficient hot water is being directed into the return.

Condensation normally appears only when the system is first used and sometimes at the beginning of the winter season when the heating is first put on. In both cases, allow the heat to build up very slowly and condensation will be kept to a minimum or not experienced at all.

Continual condensation will reduce the life of the water jacket and invalidate your guarantee. It should therefore be avoided at all costs.

If condensation occurs after the pump has been turned on, this will be due to the heating circuit cooling the system too quickly. The solution is to switch off the pump, allow the system to reheat fully and turn on only half the radiators when the pump is switched on. Gradually, turn on the remainder of the radiators, one by one, allowing plenty of time for the return water to keep up temperature.

E	▣ Insufficient air entering kitchen	- See section "Positioning the appliance".
F	▣ Restriction in flue	<ul style="list-style-type: none"> - Apparent if the appliance has normal flue draught and reaches temperature quickly but smokes when being loaded or when a large volume of air is admitted to the fire (e.g. when ash pan door is opened). The restriction may be a fall of soot or masonry in which case, chimney sweeping should cure the problem. Alternatively, the problem may be caused by too many bends which are too acute in the chimney construction. -
G	▣ Fuels	See section "Fuels".
H	▣ Operator error	<ul style="list-style-type: none"> - By this, we mean that it may be that you need a little more time to get used to your appliance. - However, if you still have problems after persisting for some time, please contact your dealer.
I	▣ Chimney construction	<ul style="list-style-type: none"> - The chimney's construction must comply with Current Building Regulations. - An inadequately insulated chimney will allow rapid cooling of the flue gases, causing excessive deposits in the chimney which will lead to condensation and eventually smoke emission from the appliance.
J	▣ Rate of burning	<ul style="list-style-type: none"> - All Franco Belge appliances are designed to be efficient when burning slowly but they must be burned hot for 30 minutes after each slow burning period to prevent a residual build up of tar/soot in the flue ways (normally this would be achieved during cooking). However, you must not operate your Franco Belge at maximum output for excessively long periods.
K	▣ Thermostat failure	<ul style="list-style-type: none"> - Whilst it is highly unlikely that the thermostat would fail, it is a possibility that should be investigated once the other likely causes have been looked into. - Contact your dealer.

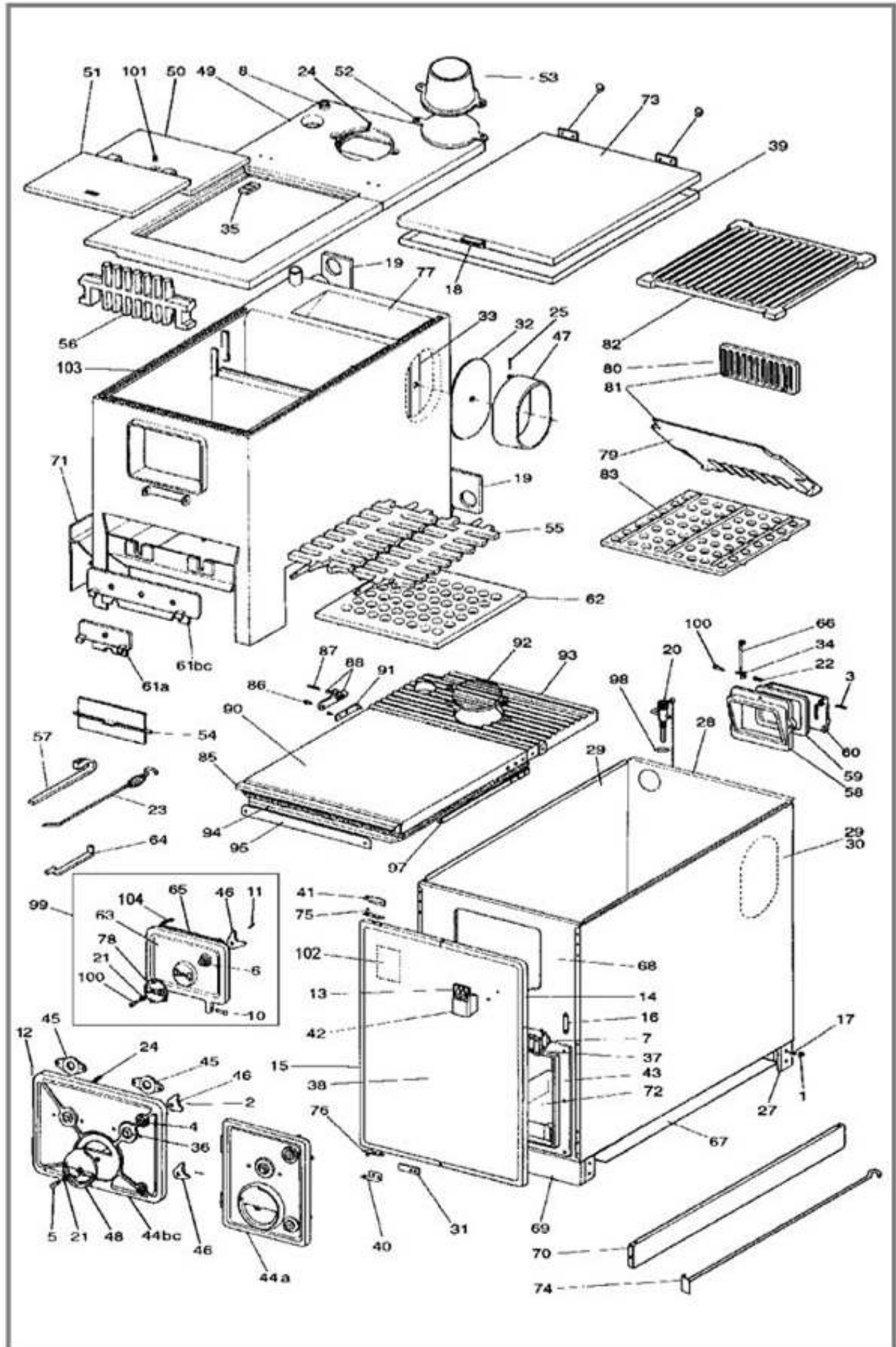
4. Spare parts

When ordering spare parts, specify the appliance type and serial number, including the colour index (on the guarantee or identification plate), the name of the part and the part number.

Example : Grillon, Ref . : 921.15.02 Z, side panel 20770630

A = 921.15.02 Z B = 921.15.02 U C = 921.22.02 Z
D = 921.22.02 U E = 921.29.02 Z F = 921.29.02 U
G = 921.29.03 C

N°	Code	Description	Type	A	B	C	D	E	F	G	Qty
1	100602	Snap clip		A	B	C	D	E	F	G	24
2	134701	Pin .	5x24	A	B	C	D	E	F	G	02
3	100931	Axle		A	B	C	D	E	F	G	02
4	100949	Axle		A	B	C	D	E	F	G	02
5	100955	Axle		A	B	C	D	E	F	G	01
6	100965	Axle		A	B	C	D	E	F	G	01
7	101013	Magnetic catch		A	B	C	D	E	F	G	01
8	101820	Ring		A	B	C	D	E	F	G	01
9	109806	Hinge								G	02
10	110402	Hinge pin	6x30	A	B	C	D			G	02
10	110403	Hinge pin	6x35					E	F		02
11	134703	Pin .	5x24							G	02
12	134704	Pin .	5x38	A	B	C	D	E	F	G	03
13	122809	Name plate		A	B	C	D	E	F	G	01
14	123474	Trim		A	B						01
14	123476	Trim						E	F	G	01
14	123478	Trim				C	D				01
15	123475	Trim		A	B						01
15	123477	Trim						E	F	G	01
15	123479	Trim				C	D				01
16	134301	Striking plate		A	B	C	D	E	F	G	01
17	134501	Push clip		A	B	C	D	E	F	G	12
18	158540	Handle . . .								G	01
19	159925	Protection plate		A	B	C	D	E	F		04
19	159925	Protection plate								G	05
20	164902	Regulator		A	B	C	D	E	F	G	01
21	166003	Spring	11x15	A	B	C	D	E	F	G	03
22	166008	Spring								G	01
23	180002	Poker		A	B	C	D	E	F	G	01
24	181607	Ceramic rope	.Ø 9,5	A	B						1 m
24	181607	Ceramic rope	.Ø 9,5			C	D				1,10 m
24	181607	Ceramic rope	.Ø 9,5					E	F	G	1,30 m
25	134751	Pin .	3,5x18							G	01
27	201000 60	Leg		A	B	C	D	E	F	G	04
28	204107	Back panel				C	D				01
28	204112	Back panel						E	F		01
28	204114	Back panel		A	B						01
28	204116	Back panel								G	01
29	207706 25	Side panel . . .			B						02
29	207706 30	Side panel . . .		A							02
29	207707 25	Side panel . . .					D				02
29	207707 30	Side panel . . .				C					02
29	207708 25	Side panel . . .							F		02
29	207708 30	Side panel . . .						E			02
29	207708 AB	Side panel . . .								G	01
30	207808 AB	R. side panel								G	01
31	209901	Protector		A	B	C	D	E	F	G	01
32	210401 64	Blanking plate .								G	01



33	210500	Clamp . . .							G	01
34	230000	Square	A	B	C	D	E	F	G	01
35	235502	Strength plate	A	B	C	D				02
36	236105	Sealing plate	A	B	C	D	E	F	G	02
37	241804	Magnet support . . .	A	B	C	D	E	F	G	01
38	252579 48	Front panel						F		01
38	252579 AB	Front panel							G	01
38	252579 AL	Front panel					E			01
38	252580 48	Front panel				D				01
38	252580 AL	Front panel			C					01
38	252581 48	Front panel		B						01
38	252581 AL	Front panel	A							01
39	254513 20	Supplementary cover							G	01
40	273306 64	Hinge	A	B	C	D	E	F	G	01
41	273408 64	Hinge	A	B	C	D	E	F	G	01
42	300983 64	Handle . . .	A	B	C	D	E	F	G	01
43	301010 60	Frame . . .	A	B						01
43	301011 60	Frame . . .			C	D				01
43	301012 60	Frame . . .					E	F	G	01
44	301113 60	Ash pan door					E	F	G	01
44	301135 60	Ash pan door	A	B						01
44	301136 60	Ash pan door			C	D				01
45	301304 60	Clamp . . .	A	B	C	D	E	F	G	02
46	301521	Door lock	A	B	C	D	E	F	G	03
47	301606 60	Flue collar .							G	01
48	301711 60	Air damper	A	B	C	D	E	F	G	01
49	302134 80	Top plate	A	B						01
49	302135 80	Top plate			C	D				01
49	302140 80	Top plate					E	F		01
49	352102 64	Top plate							G	01
49	702115 80	Top plate	A	B						01
49	702116 80	Top plate			C	D				01
49	702117 80	Top plate					E	F		01
49	702124 64	Top plate							G	01
50	302311 80	Top plate	A	B						01
50	302312 80	Top plate			C	D				01
50	302322 64	Top plate					E	F	G	01
51	302407 80	Top plate	A	B						01
51	302408 80	Top plate			C	D				01
51	302413 64	Top plate							G	01
52	303713 80	Blanking plate .	A	B						01
52	303714 64	Blanking plate .							G	01
52	303714 80	Blanking plate .			C	D	E	F		01
53	303818 60	Flue collar .	A	B						01
53	303819 60	Flue collar .			C	D	E	F	G	01
54	305911	Access cover	A	B						01
54	305912	Access cover			C	D	E	F	G	01
55	306704	Oscillating grate	A	B						01
55	306705	Oscillating grate			C	D				02
55	306706	Oscillating grate					E	F	G	02
56	307102	Flue guard	A	B						01
56	307103	Flue guard			C	D				01
56	307104	Flue guard					E	F	G	01
57	307105 60	Riddling handle .	A	B	C	D	E	F	G	01
58	307202 60	Frame . . .	A	B	C	D	E	F	G	01
59	307301 60	Door . . .	A	B	C	D	E	F	G	01
60	308201 60	Supplementary door	A	B	C	D	E	F	G	01
61	309101	Face plate . . .	A	B						01
61	309102	Face plate . . .			C	D				01
61	309103	Face plate . . .					E	F	G	01

62	309202	Wood grate		A	B								01
62	309204	Wood grate						E	F	G			01
62	309206	Wood grate				C	D						01
63	309945	60 Main door		A	B	C	D	E	F	G			01
64	312803	60 Hand tool		A	B	C	D	E	F	G			01
65	314606	60 Inner panel . .		A	B	C	D	E	F	G			01
66	459200	Control rod . .		A	B	C	D	E	F	G			01
67	600100	20 Base . . .				C	D						01
67	600103	20 Base . . .						E	F	G			01
67	600105	20 Base . . .		A	B								01
68	600349	20 Front plate .		A	B								01
68	600350	20 Front plate .				C	D						01
68	600351	20 Front plate .						E	F	G			01
69	600400	09 Plinth .		A	B								01
69	600422	09 Plinth .				C	D						01
69	600425	09 Plinth .						E	F	G			01
70	600501	09 Plinth .		A	B								02
70	600502	09 Plinth .				C	D						02
70	600503	09 Plinth .						E	F	G			02
71	633401	Boiler support				C	D	E	F	G			01
71	633402	Boiler support		A	B								01
72	624008	Ash-pan		A	B								01
72	624009	Ash-pan				C	D						01
72	624010	Ash-pan						E	F	G			01
73	652739	AB Cover									G		01
74	858003	60 Scraper		A	B	C	D	E	F	G			01
75	900912	64 Hinge . . .		A	B	C	D	E	F	G			01
76	900913	64 Hinge . . .		A	B	C	D	E	F	G			01
77	910903	Water jacket .	AV	A	B								01
77	910904	Water jacket .	AV			C	D						01
77	910905	Water jacket .	AV					E	F				01
77	910906	Water jacket .	AV								G		01
78	301713	60 Air damper . .		A	B	C	D	E	F	G			01
79	307404	Inclined grate		A	B								01
79	307405	Inclined grate				C	D						01
79	307406	Inclined grate						E	F				01
80	307423	Fuel retainer .		A	B	C	D	E	F				01
81	974313	Coal kit .									G		01
82	309406	Summer coal grate		A	B								01
82	309407	Summer coal grate				C	D						01
82	309408	Summer coal grate						E	F	G			01
83	309203	Summer wood grate .		A	B								01
83	309204	Summer wood grate .				C	D						01
83	309205	Summer wood grate .						E	F	G			01
87	100929	Axle									G		01
88	148003	Latch set . . .		A	B	C	D	E	F				01
91	900912	64 Hinge . . .		A	B	C	D	E	F				02
93	302732	Top plate shield		A	B								01
93	302733	Top plate shield				C	D						01
93	302734	Top plate shield						E	F				01
94	260540	Heat shield . . .		A	B								01
94	260541	Heat shield . . .				C	D						01
94	260542	Heat shield . . .						E	F				01
95	254500	Supplementary cover				C	D						01
95	254501	Supplementary cover						E	F				01
95	254521	Supplementary cover		A	B								01
97	229706	Square . . .						E	F				02
97	229707	Square . . .				C	D						02
97	229708	Square . . .		A	B								02
98	167510	Air damper . . .		A	B	C	D	E	F				01

99	988791	Complete door		A . . . B . . . C . . . D	. E	. F	. G	01
100	189103	Screw	27x8x6 . . .	A . . . B . . . C . . . D	. E	. F	. G	01
101	189118	Screw	. Ø 10 .	A . . . B . . . C . . . D	. E	. F	. G	01
102	162000	Descriptive plate		A . . . B . . .				01
102	162001	Descriptive plate		. C . . . D				01
102	162002	Descriptive plate			. E	. F		01
102	162003	Descriptive plate					. G	01
103	181611	Ceramic rope	. Ø 20 .	A . . . B . . . C . . . D	. E	. F		1,50 m
103	181611	Ceramic rope	. Ø 20 .				. G	1,42 m
104	181619	Ceramic rope	. Ø 12 .	A . . . B . . . C . . . D	. E	. F		0,75 m
104	181619	Ceramic rope	. Ø 12 .				. G	1 m

