



# TERNA B

## HIGH OUTPUT DUAL FUEL BOILER + INTEGRAL, HIGH VOLUME DOMESTIC HOT WATER

## Two boilers in one with automatic change over from solid fuel to oil or gas (burner dependant) plus integral, high volume domestic hot water production. WHOEVER HEARD OF IT? AN OPEN VENTED SOLID FUEL COMBI!

Versions available B27 B38 B45

On one side of the appliance is a gas or oil boiler and the other side of the appliance is a multi fuel boiler and inserted into the boiler water jacket a hot water cylinder.

All in one construction with a three position master control switch allowing the user to select functions as follows:-

Oil / Gas Boiler	Running Independently
Multi Fuel Boiler	Running Independently
Multi Fuel Boiler	Running with automatic change over to Oil / Gas burner, if it goes out.

Hot water is provided from a hot water cylinder living inside the boiler water jacket with massive external heat transfer potential.

A cold feed from an F&E tank is connected to the integral hot water cylinder and the outlet from the cylinder goes directly to the hot taps, how simple is that? No motor valves, no electrical requirement.

Tried, tested, reliable and long lasting, having been sold in the UK for 30 years plus.

High performance all round heat exchanger with horizontal cross tubes to maximize efficiency.

Substantial external riddling handle, operating locomotive type riddling grates.

Blown combustion air via an integrated fan plus secondary air slide on fuel loading door.

Enameled steel casing with fiberglass insulation.

Side mounted control panel.

Large refueling door and large convenient ash pan.

Rear Flue 200mm diameter.

1 ¼" Boiler connections.





### **Dimensions**

		Sizes in mm													Combustion				
MODEL	A	В	C	D	E	F	G	Н	L	М	N	0	Р	0	R	s	Weight kg	Loading Door size	Chamber Length
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TERNA B 27	740	1790	1830	720	920	195	655	1050	865	440	315	200	200	115	1620	250	400	260 380	540
TERNA B 38	740	1790	1830	910	1160	195	655	1050	865	440	315	200	200	115	1620	300	500	260 380	780
TERNA B 45	790	1790	1830	910	1160	220	655	1050	865	450	315	220	220	115	1620	330	510	260 380	790

#### Performance

MODEL	TOTAL OUTPUT kW	COAL OUTPUT kW	WOOD OUTPUT kW	GAS / OIL OUTPUT
TERNA B 27	35	29	28	28
TERNA B 38	49	42	39	39
TERNA B 45	58	49	46	46
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#### Technical

MODEL	BOILER WATER CONTENT Its	WORKING PRESSURE bar	FLUE VAC Mbar	BOILER CONECTIONS	WATER TANK CAPACITY	WAT TNK CON	FLUE DIA mm
TERNA B 27	137	3	28	1 1/4"	115	1"	200
TERNA B 38	177	3	39	1 1/4"	115	1"	200
TERNA B 45	147	3	46	1 1/4"	160	1"	200

BOILER WORKING PRESSURE 3 bar BOILER TEST PRESSURE 4.5 bar

Data and sizes quoted in the tables above are not binding. Thermorossi reserve the right to change them without notice

On - Off switch with neon illumination.

Used to set the boiler operating temperature.

#### Controls

The boiler has a control panel on which are mounted the following controls:-

- 1. Appliance
- 2. Fan
- 3. Circulating pump
- 4. Fuel exhausted warning light
- 5. Boiler safety stat
- 6. Boiler temperature thermostat
- 8. Water temperature gauge
- 9. Three position master control

Used to select the function required either:- wood only, oil/gas only or automatic switch over.

#### **OPERATING THE BOILER**

Turn the boiler switch on, turn the pump and fan switches to on, set the boiler stat to the required temperature, set the master control switch to the required function, when on automatic or wood only, proceed as follows :-

Illuminates when the fuel exhausted thermostat is triggered at 45 deg C

Trips out if boiler temperature exceeds 100 deg C, manual re set.

Light the fire and open the ash pit door slightly to increase the draw.

When the boiler water temperature reaches 45 deg C the fan will start, at this stage close the ash pit door.

On - Off switch.

On - Off switch

Set the boiler stat to the desired running temperature and the fan will run until the temperature is reached.

At target temperature the fan stops and when the boiler temperature drops to 60 deg C the fan starts again and the cycle continues with the fan running up to the target temperature, stopping and starting again at 60 deg C.

If the boiler starts to overheat because the circulating pump has stopped the safety stat automatically starts the circulating pump to dissipate excess heat. If the boiler temperature exceeds 96 deg C the safety stat operates and needs to be reset manually.