



webinar 6



Italkero

Training : **INSTALLATION and MAINTENANCE** **LOCAL GAS SPACE HEATERS**

Rev.0

09/2024



The instructions in this document are a guide to the operations necessary for installing an ITALKERO radiator.



These do not replace the detailed information contained in the installation manual which must always be read and followed carefully



- **Part one**

Classification of appliances and common elements

- **Part two**

Detailed description of balanced flue local space heaters

Detailed description of forced flue local space heaters

- **Part three**

Proper installation checklist

- **Part four**

Error list and troubleshooting



BALANCED FLUE



Eco SC



Eco SV

FORCED FLUE



Stratos MB



Poster SP



BALANCED FLUE

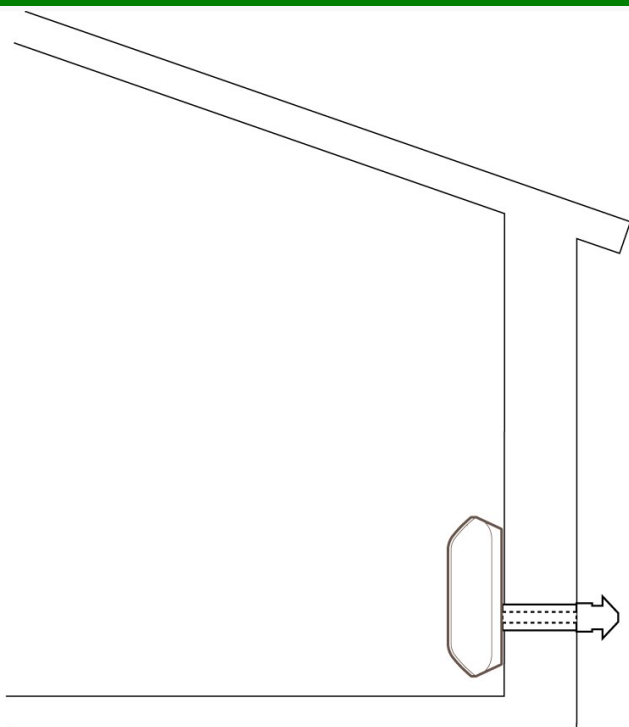


FORCED FLUE



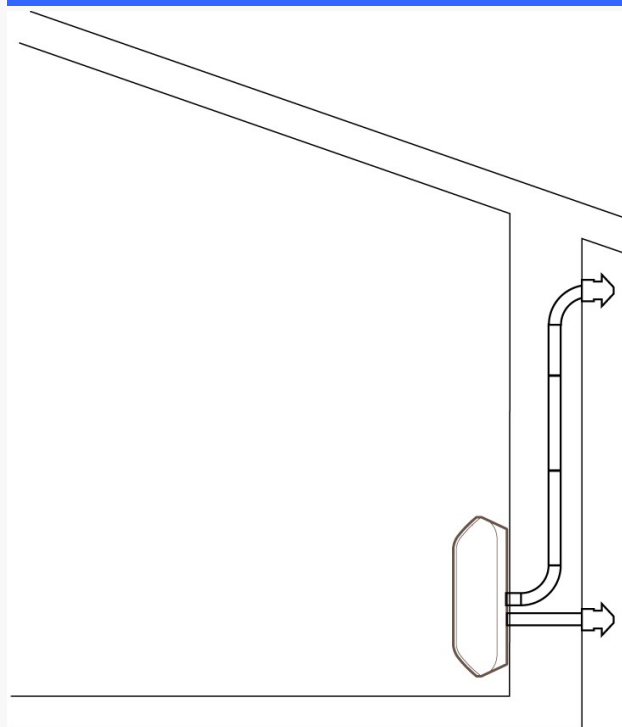


BALANCED FLUE



maximum pipe length COAXIAL **90 cm**

FORCED FLUE



maximum pipe length SINGLE **14 m**
(without bends)
(air inlet + exhaust flue gas)



BALANCED FLUE

Coaxial

Ø 90

Ø 110

Ø 130

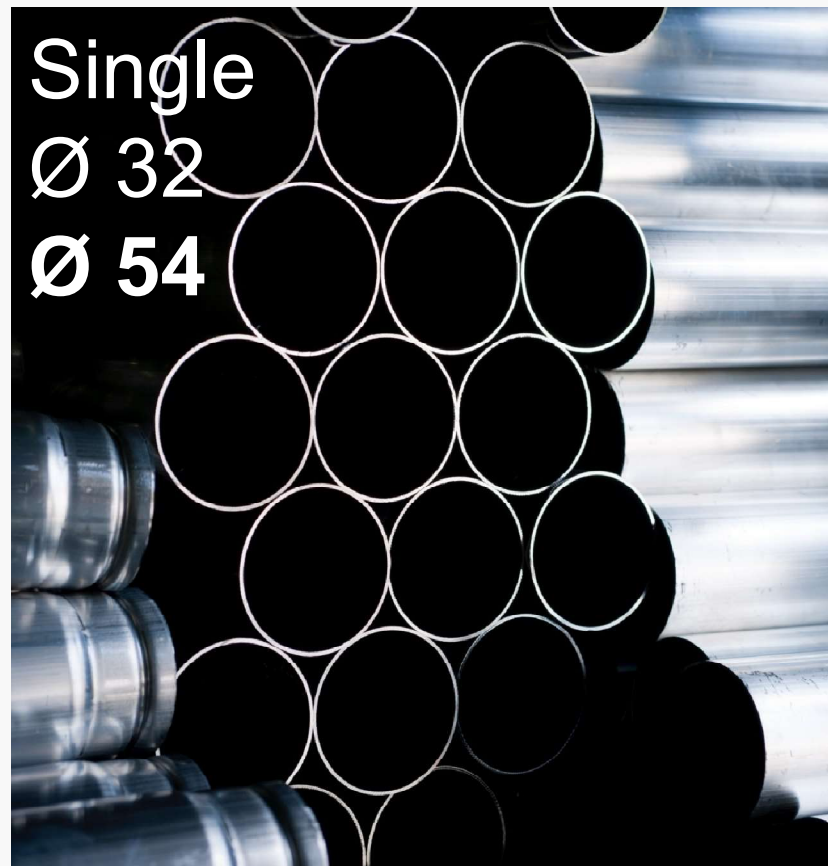


FORCED FLUE

Single

Ø 32

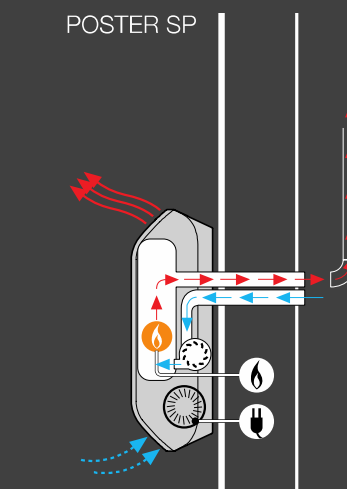
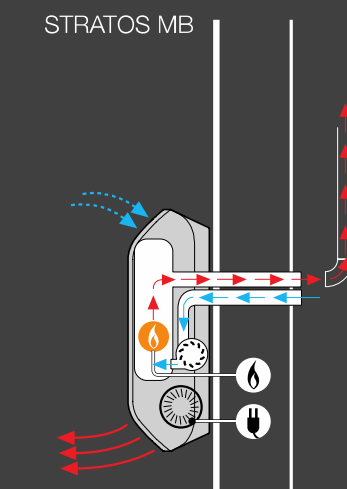
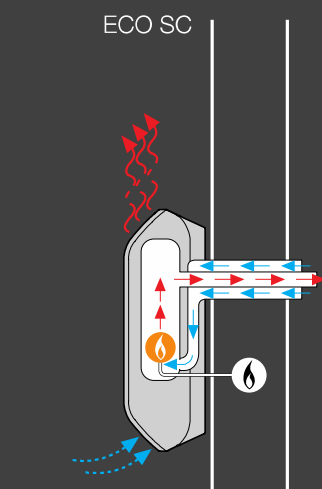
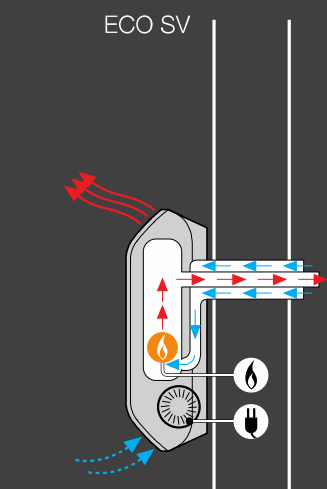
Ø 54





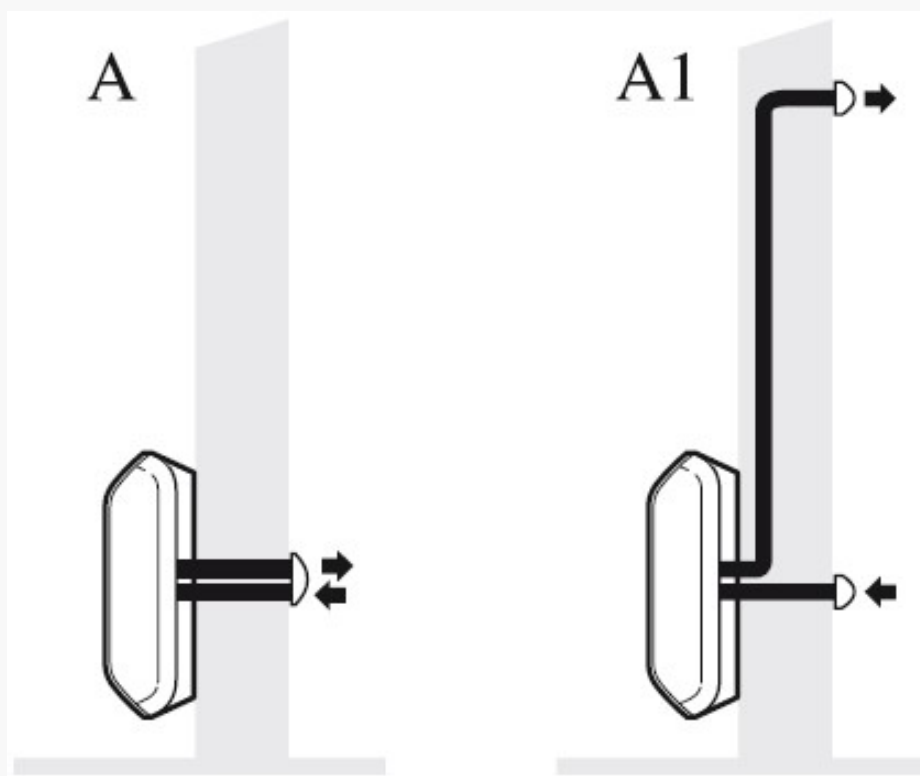
BALANCED FLUE

FORCED FLUE



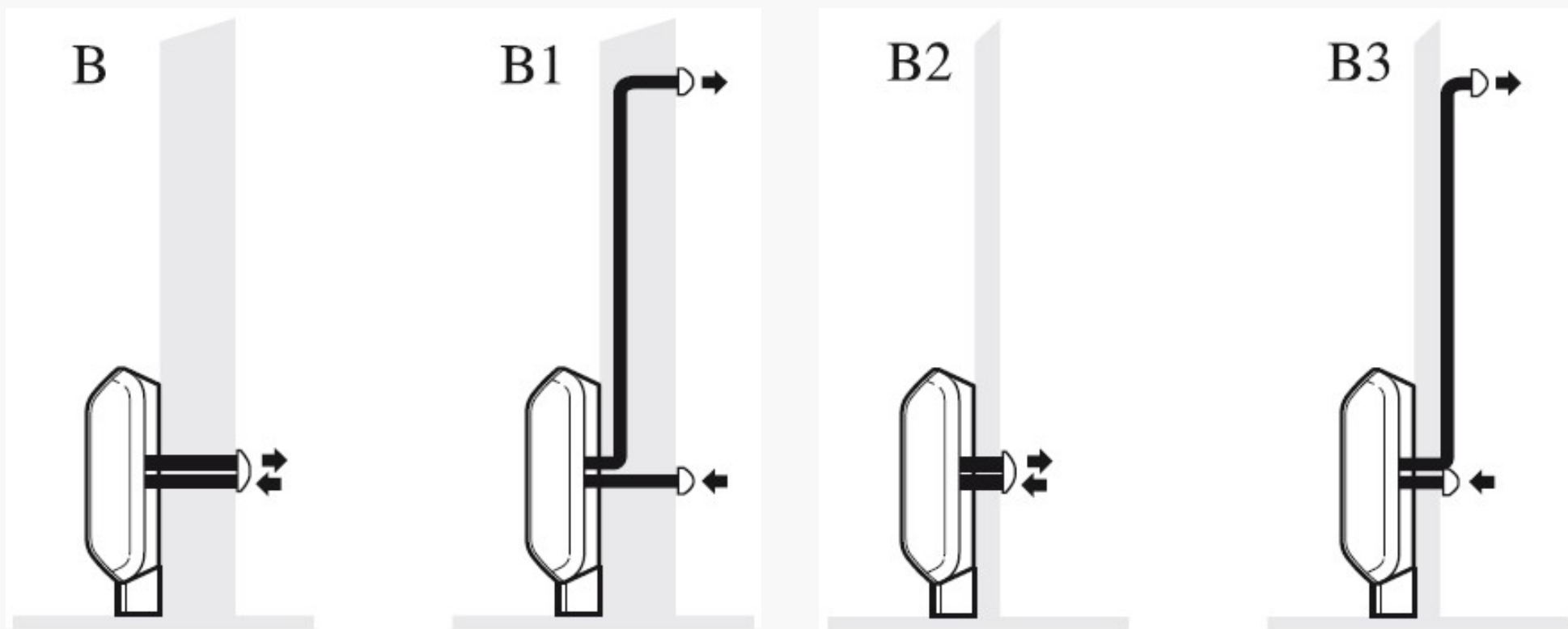


A – on the wall, suspended from the ground and fixed to the template



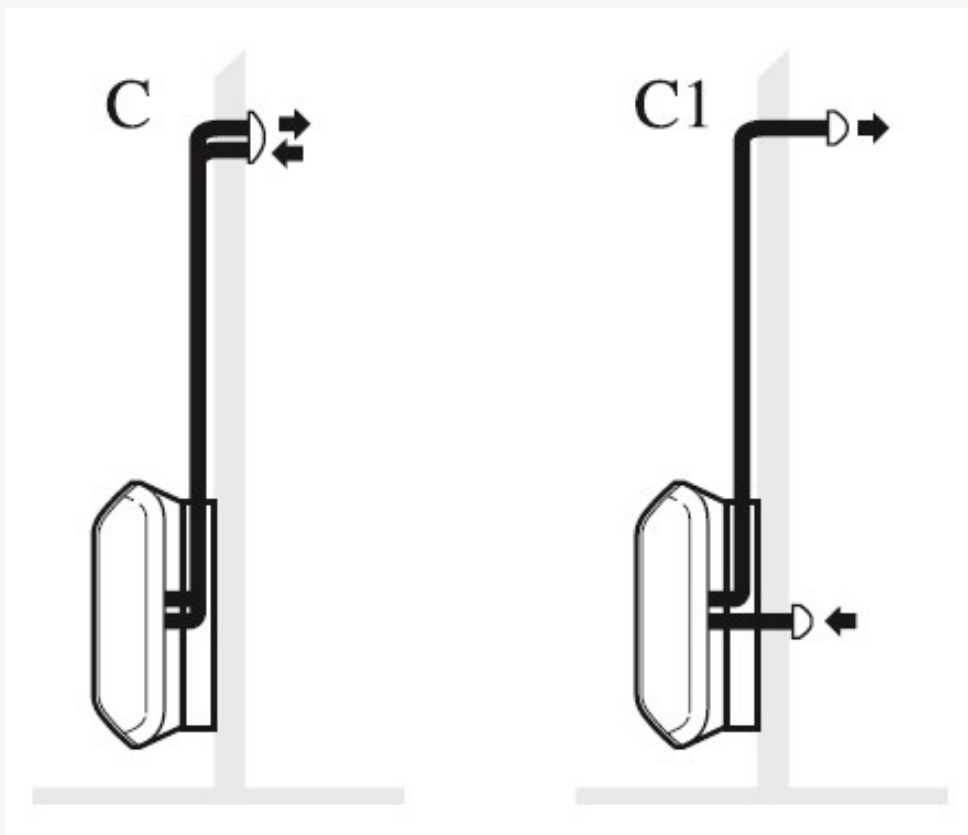


B – wall sided, floor standing





C – on the wall, with wall supporting spacer





BALANCED FLUE



FORCED FLUE





BALANCED FLUE



Eco SC

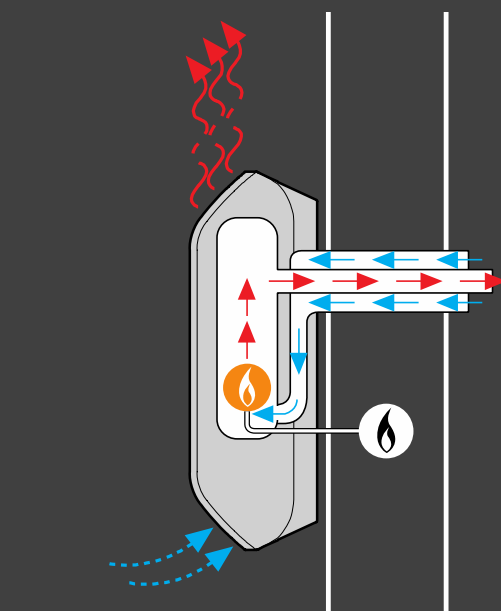


Eco SV



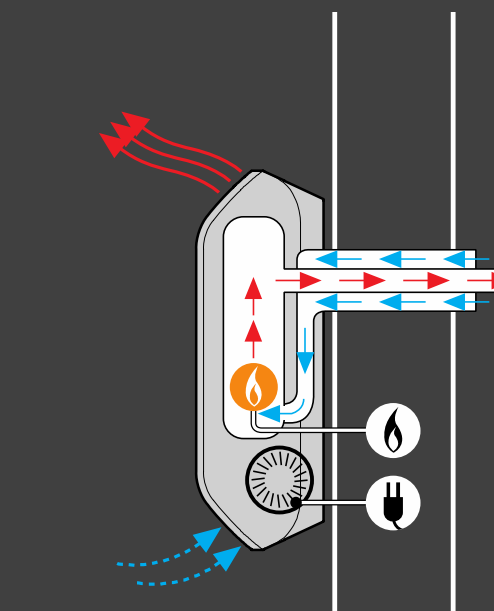
BALANCED FLUE

Natural convection



Eco SC

Natural / forced convection



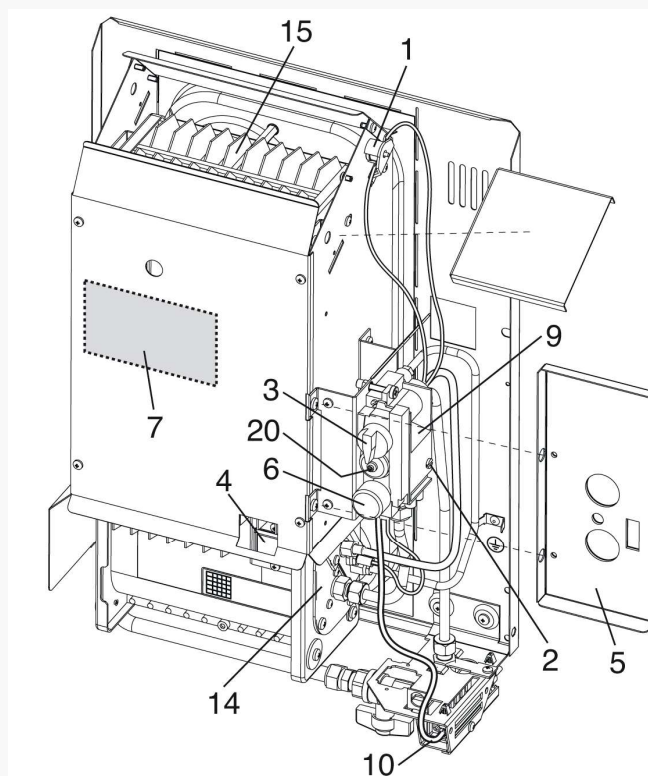
Eco SV



BALANCED FLUE

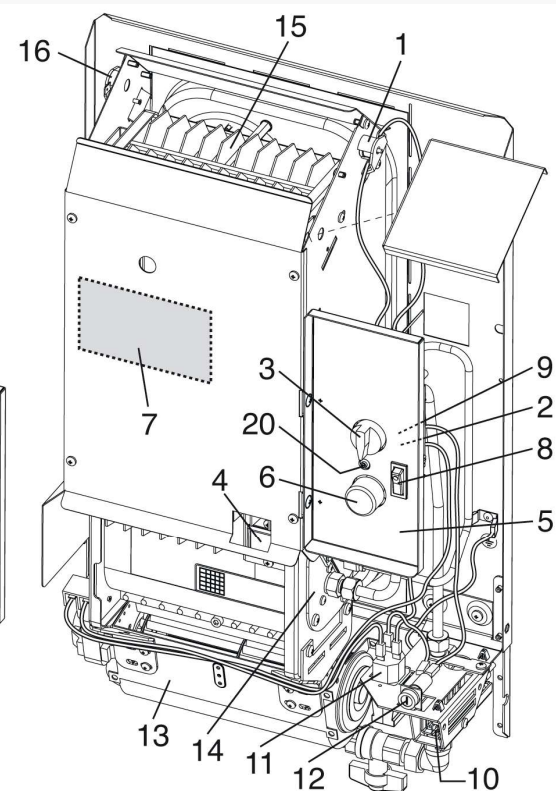
SC

NO electrical power



SV

electrical power only for the fan





BALANCED FLUE

- BALANCED FLUE GAS CONVECTOR (COAXIAL PIPES)
- TYPE C COMBUSTION ACCORDING TO EN613
- ALUMINUM HEAT EXCHANGER
- FLUE PIPES ENCLOSED
- MANUAL PIEZOELECTRIC IGNITION
- CONVECTIVE WARM AIR FLOW
- NO NEED FOR ELECTRICAL POWER SUPPLY
- NO VENTILATION FAN
- PILOT FLAME WITH SAFETY DEVICE WITH A THERMOCOUPLE
- MODULATING GAS VALVE FOR AUTOMATIC REGULATION OF HEAT OUTPUT
- SAFETY THERMOSTAT AGAINST OVERHEATING



MADE IN ITALY



MADE IN ITALY



Eco SC



ECO	SC18	SC30	SC45	
Heat output	1,79	3,02	4,33	kW
Width	462	642	822	mm
Depth		225		mm
Height		585		mm



BALANCED FLUE

- BALANCED FLUE GAS CONVECTOR (COAXIAL PIPES)
- TYPE C COMBUSTION AS EN613
- ALUMINUM HEAT EXCHANGER
- FLUE PIPES ENCLOSED
- MANUAL PIEZOELECTRIC IGNITION
- FLAME CONTROL WITH THERMOCOUPLE AND PILOTE BURNER
- DAILY OR WEEKLY TIMER (ACCESSORIES)
- WITH OR WITHOUT CONVECTION FAN.
- MODULATING GAS VALVE FOR AUTOMATIC REGULATION OF HEAT OUTPUT
- IT CAN WORK WITHOUT ELECTRICAL POWER SUPPLY
- SAFETY THERMOSTAT AGAINST OVERHEATING
- TANGENTIAL FAN THAT CAN BE EXCLUDED MANUALLY WITH THE ON/OFF SWITCH



Eco SV



MADE IN ITALY



ECO	SV18	SV30	SV45	
Heat output	1,88	3,18	4,60	kW
Width	462	642	822	mm
Depth		225		mm
Height		630		mm



BALANCED FLUE

dati tecnici
technical data

	Eco SC			Eco SV			u.m.
	18	30	45	18	30	45	
Tipo di scarico <i>Exhaust type</i>	C11						-
Portata termica MAX (Hi) <i>Heat input MAX (Hi)</i>	2,10	3,49	5,11	2,10	3,49	5,11	kW
Portata termica MIN (Hi) <i>Heat input MIN (Hi)</i>	0,84	1,42	2,04	0,84	1,42	2,04	kW
Potenza termica MAX <i>Heat output MAX (Hi)</i>	1,79	3,02	4,33	1,88	3,18	4,60	kW
Potenza termica MIN <i>Heat output MIN (Hi)</i>	0,71	1,2	1,75	0,74	1,24	1,81	kW
Rendimento <i>Efficiency level</i>	90	91	90,1	90	91	90,1	%
Consumo G20 Nom. <i>Consumption G20 Nom.</i>	0,22	0,37	0,54	0,22	0,37	0,54	m³/h
Consumo G20 Rid. <i>Consumption G20 Red.</i>	0,08	0,15	0,22	0,08	0,15	0,22	m³/h
Consumo G30 Nom. <i>Consumption G30 Nom.</i>	0,16	0,27	0,40	0,16	0,27	0,40	Kg/h
Consumo G30 Rid. <i>Consumption G30 Red.</i>	0,07	0,11	0,16	0,07	0,11	0,16	Kg/h
Consumo G31 Nom. <i>Consumption G31 Nom.</i>	0,16	0,27	0,40	0,16	0,27	0,40	Kg/h
Consumo G31 Rid. <i>Consumption G31 Red.</i>	0,06	0,11	0,16	0,06	0,11	0,16	Kg/h
Alimentazione <i>Power supply</i>	no			230/50			V/Hz
Classe efficienza <i>Efficiency class</i>	D	D	D	D	C	C	

**BALANCED FLUE**

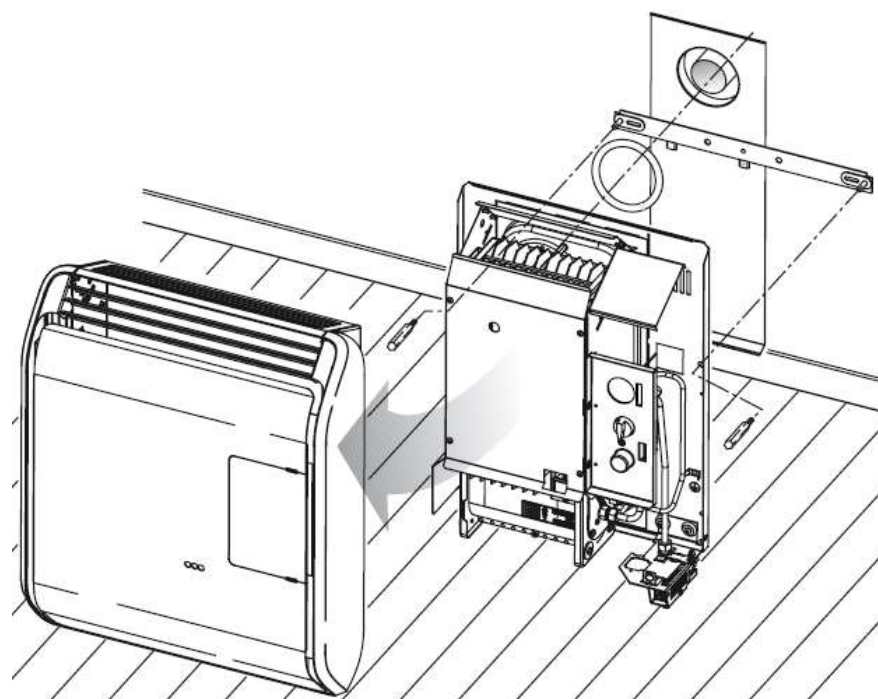
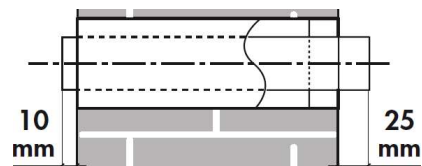
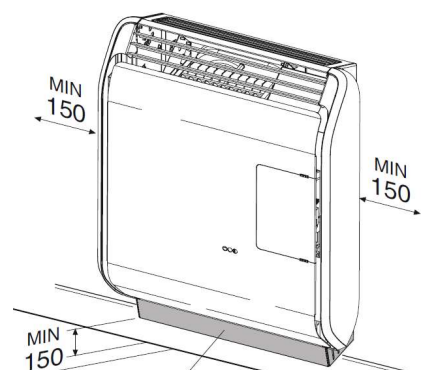
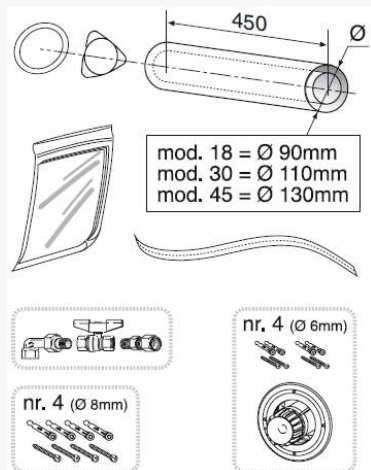
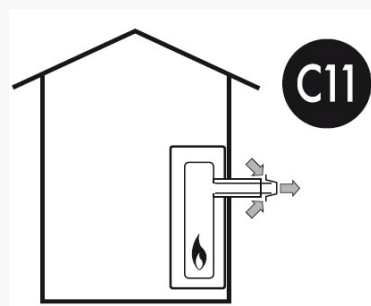
PROTECTION KIT FOR WOOD WALLS

	18	TS180L 45000	130
	30	TS300L 45000	180
	45	TS450L 45000	180
	18	TS180L 90000	130
	30	TS300L 90000	180
	45	TS450L 90000	180

	18	TX180T 90000	90
	30	TX300T 90000	110
	45	TX450T 90000	130
	18	7000146 00	90
	30	7000147 00	110
	45	7000148 00	130
	18	70000055 00	150
	30	70000065 00	170
	45	70000075 00	190

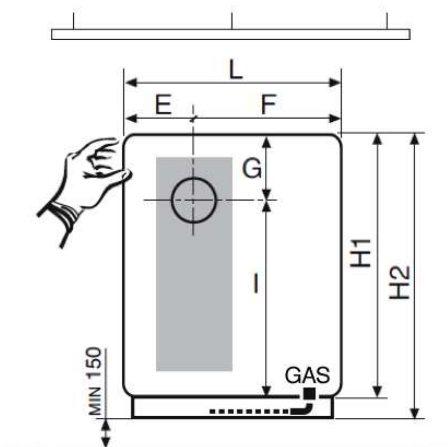


BALANCED FLUE

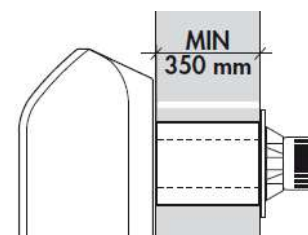
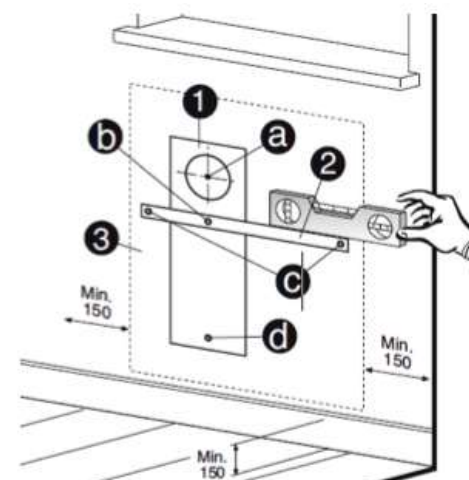




BALANCED FLUE



		18	30	45	
SC SV	E	180	360	360	mm
	F	282	282	462	mm
	G	146	146	146	mm
	L	462	642	822	mm
SC	H1	585	585	585	mm
	I1	439	439	439	mm
SV	H2	630	630	630	mm
	I2	484	484	484	mm

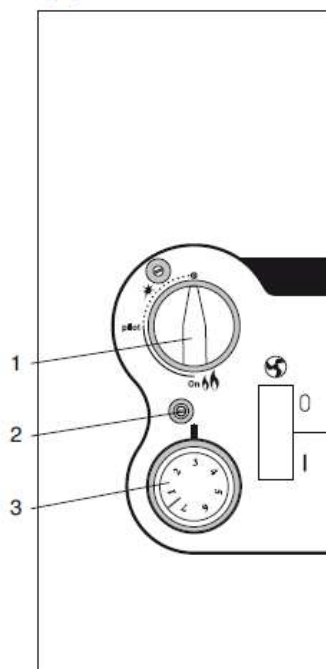




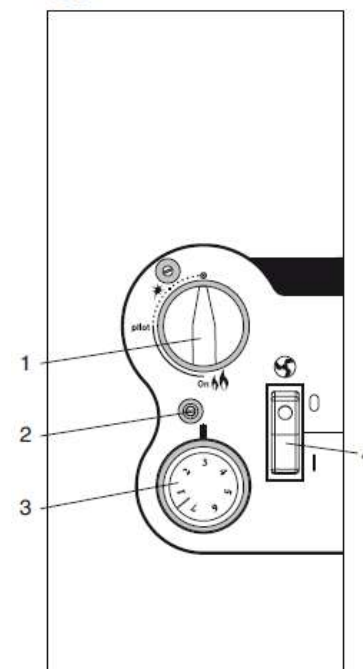
BALANCED FLUE

- 1 - IGNITION / CONTROL KNOB
- 2 - PRESSURE REGULATOR SCREW
- 3 - ROOM THERMOSTAT
- 4 - TANGENTIAL FAN SWITCH (ON/OFF)

SC



SV

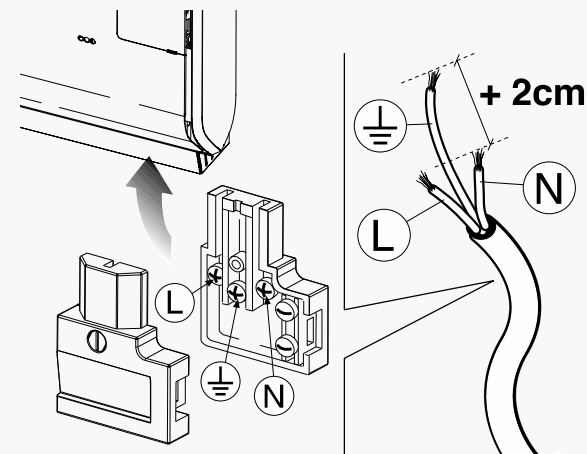




BALANCED FLUE

ELECTRICITY

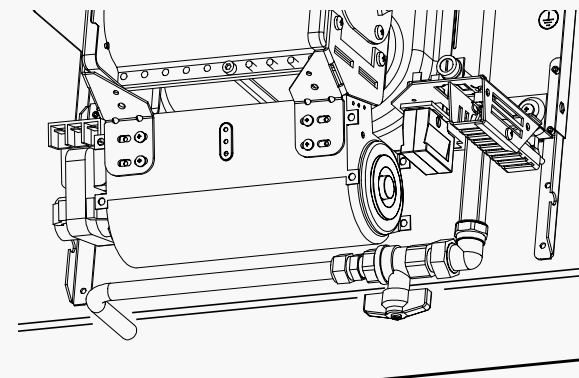
The local gas space heater is designed to be connected to the electricity mains via a VDE IEC C13 type socket with plug included



GAS

The local gas space heater is designed to be connected to the gas network via a 3/8" male thread.

Place a manual ON/OFF valve (gas tap KIT) supplied with the appliance between the gas pipe and the radiator.

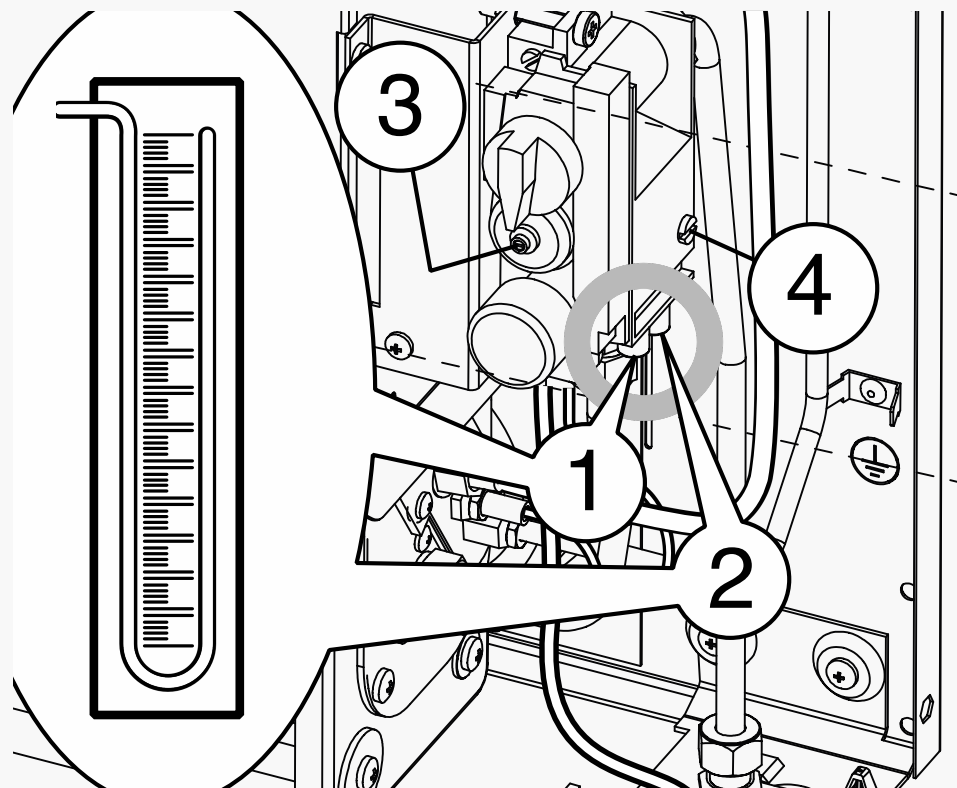




BALANCED FLUE

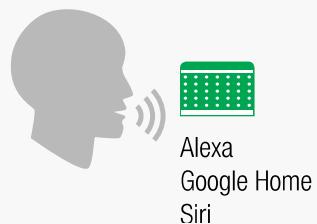
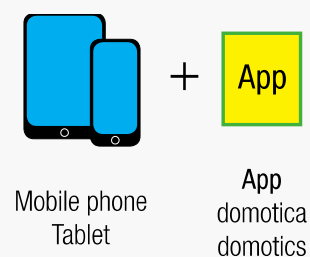
- 1) INLET PRESSURE POINT
- 2) OUTLET PRESSURE POINT
- 3) MAX ADJUSTMENT SCREW
- 4) MIN ADJUSTMENT SCREW

	18	30	45	
G20 nom./rid.	12,0/2,0	12,0/2,0	12,0/2,0	mbar
G30 nom./rid.	28,8/6,0	28,7/6,0	28,6/6,0	mbar
G31 nom./rid.	36,8/6,8	36,7/6,8	36,5/6,8	mbar

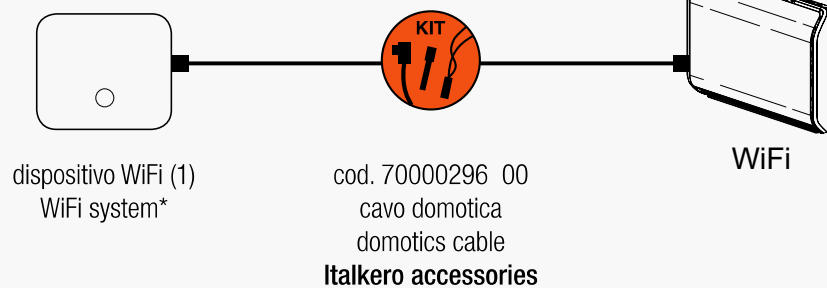




BALANCED FLUE



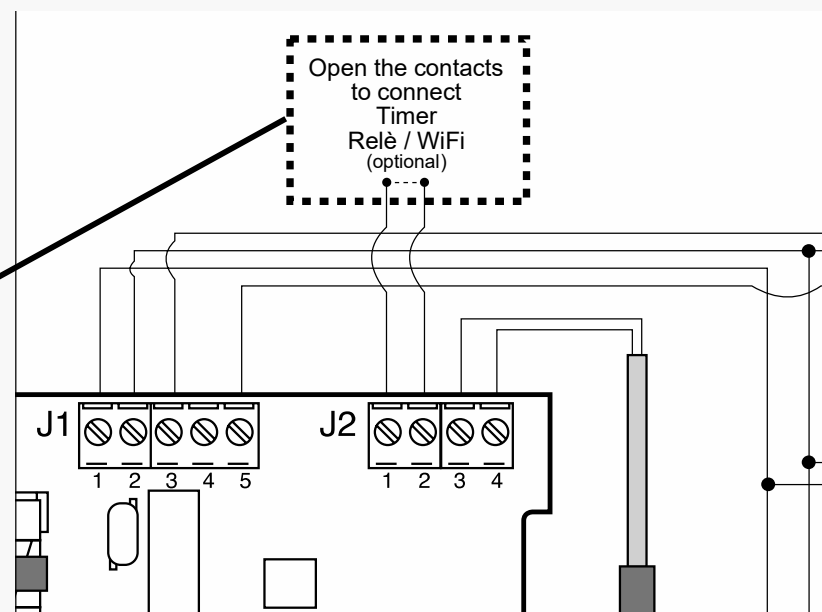
normalmente chiuso
normally closed
N.C.



- 1) attuatore smart Wi-Fi / Smart Wi-Fi Actuator
presa temporizzata WiFi / Timed WiFi Socket
termostato WiFi / WiFi Thermostat
relè WiFi / WiFi Relay



BALANCED FLUE



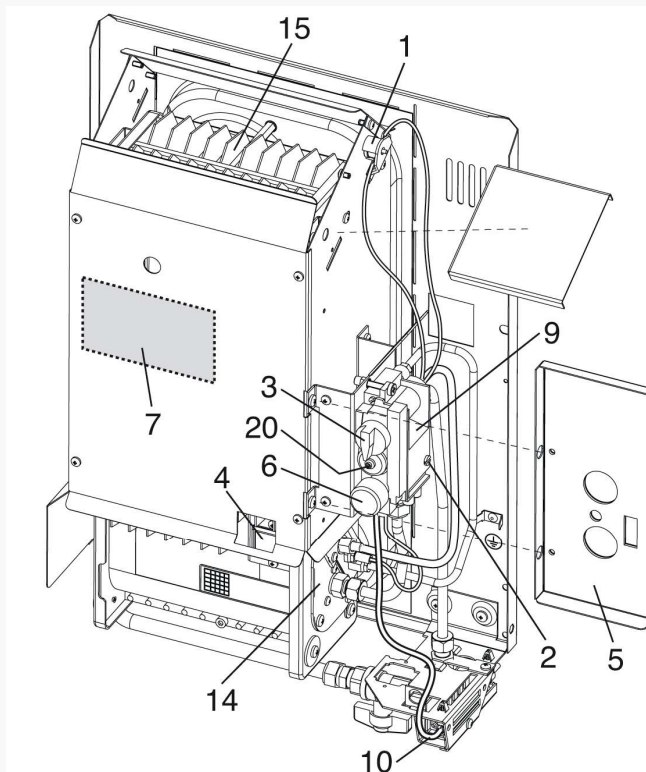


BALANCED FLUE

- USING NOT ITALKERO EXHAUST
- NO GROUND CONNECTION
- WRONG INLET PRESSURE
- DIRT IN THE APPLIANCE
- DIRT ON THE FAN

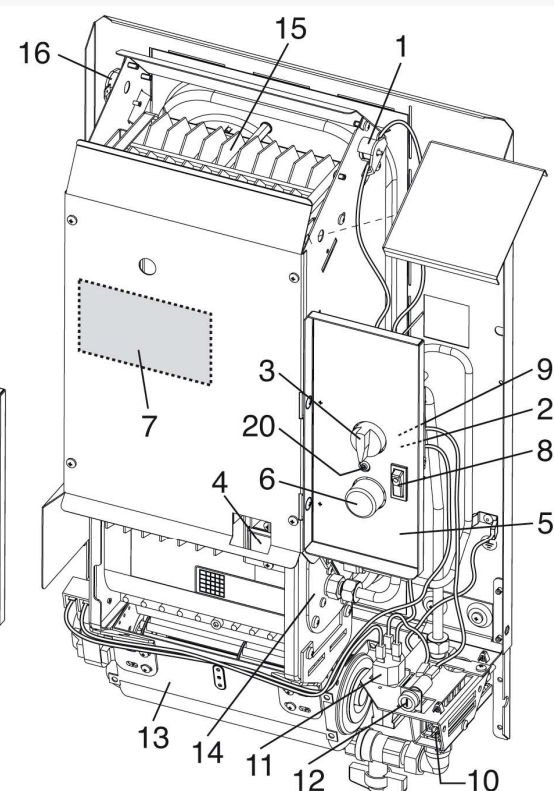
SC

NO electrical power supply



SV

Electrical supply only for the fan





FORCED FLUE



Stratos MB

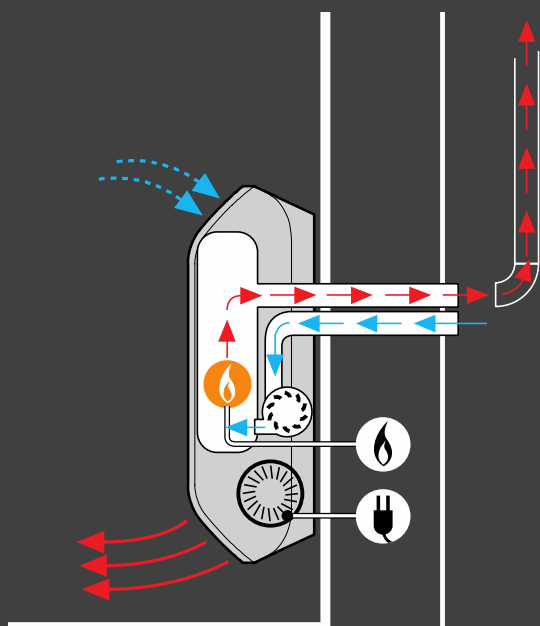


Poster SP



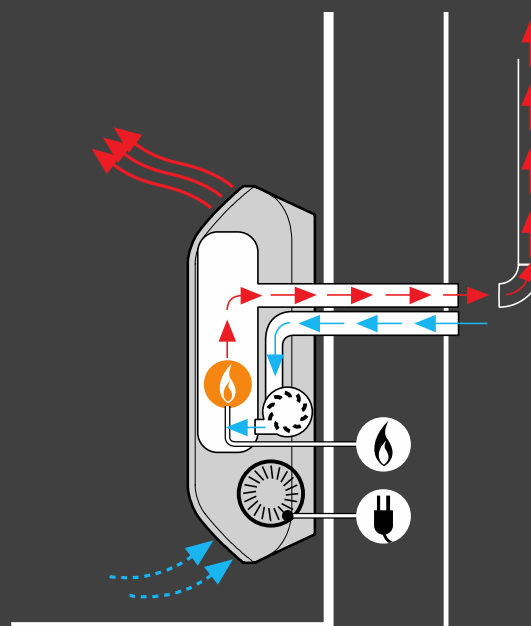
FORCED FLUE

Forced convection



Stratos MB

Forced convection



Poster SP



FORCED FLUE

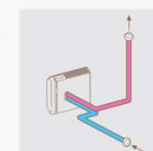
- POWER FLUE GAS CONVECTOR
- TYPE C COMBUSTION ACCORDING TO EN1266
- FUTURISTIC DESIGN AND HUMIDIFIER WATER TANK BUILT IN
- WIRELESS DIGITAL DEVICE WITH THERMOSTAT AND TIMER (ACCESSORY) ALLOWS A PRECISE CONTROL OF ROOM TEMPERATURE
- MODULATING POWER ALLOWS A GAS CONSUMPTION SAVING
- FLUE LINE KIT INCLUDED INSIDE EACH PACKAGE
- MOBILE PHONE SWITCHING ON OPTION KIT
- FLOOR STANDING OPTION FOR INSTALLING EVERYWHERE
- JUST 32 OR 54MM OF AIR INLET / EXHAUST FLUE LINE DIAMETERS
- FLUE LINE UP TO 15M
- SEPARATE AIR INLET AND OUTLET EXHAUST
- IONIZATION CONTROL OF FLAME
- TANGENTIAL AND EXHAUST FANS ASSISTED



MADE IN ITALY



Stratos MB



POSTER	3.0	5.0	7.0	9.0	
Heat output	2,32	4,34	6,25	7,74	kW
Width	535	685	865	985	mm
Depth	200				mm
Height	585				mm



FORCED FLUE

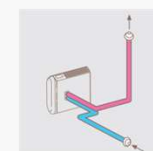
- POWER FLUE GAS CONVECTOR
- TYPE C COMBUSTION ACCORDING TO EN71266
- ALUMINUM HEAT EXCHANGER
- SAME STRATOS FEATURES, FLOW WARM AIR FROM THE TOP
- ENERGY CONSUMPTION REDUCTED
- NEW EASY DIGITAL MANUAL CONTROL ON BOARD (accessorio)
- FLUE PIPES ENCLOSED
- PERFECT TEMPERATURE CONTROL FOR A BEST COMFORT THANKS TO WIRELESS PROGRAMMABLE THERMOSTAT (WEEKLY); SIMPLY
- SETTING WITH APPLIANCE EVERYTIME.
- EASY TO SWITCH ON WITH A PHONE CALL - OPTIONAL KIT
- MODULATION OF HEAT OUTPUT AND FAN VENTILATION TO OBTAIN COMFORT AND ENERGY SAVING



MADE IN ITALY



Poster SP



POSTER	SP30	SP50	SP70	SP90	
Heat output	2,30	4,30	6,28	7,87	kW
Width	535	685	865	985	mm
Depth	200				mm
Height	585				mm



FORCED FLUE

dati tecnici
technical data

	Poster SP				Stratos MB				u.m.
	30	50	70	90	3.0	5.0	7.0	9.0	
Tipo di scarico Exhaust type	C13-C33-C53-C63								-
Portata termica MAX (Hi) Heat input MAX (Hi)	2,50	4,70	6,80	8,60	2,50	4,70	6,80	8,60	kW
Portata termica MIN (Hi) Heat input MIN (Hi)	1,70	3,30	4,80	5,70	1,70	3,30	4,80	5,70	kW
Potenza termica MAX Heat output MAX (Hi)	2,30	4,30	6,28	7,87	2,32	4,34	6,25	7,74	kW
Potenza termica MIN Heat output MIN (Hi)	1,53	2,98	4,37	5,22	1,58	3,05	4,41	5,13	kW
Rendimento Efficiency level	92,6	91,7	92,4	91,5	93	92,4	91,9	90	%
Consumo G20 Nom. Consumption G20 Nom.	0,246	0,497	0,719	0,909	0,246	0,497	0,719	0,909	m³/h
Consumo G20 Rid. Consumption G20 Red.	0,179	0,348	0,507	0,602	0,180	0,349	0,507	0,603	m³/h
Consumo G30 Nom. Consumption G30 Nom.	0,195	0,370	0,530	0,677	0,195	0,368	0,532	0,626	Kg/h
Consumo G30 Rid. Consumption G30 Red.	0,134	0,260	0,378	0,449	0,133	0,258	0,375	0,446	Kg/h
Consumo G31 Nom. Consumption G31 Nom.	0,194	0,364	0,528	0,667	0,194	0,364	0,528	0,667	Kg/h
Consumo G31 Rid. Consumption G31 Red.	0,132	0,256	0,372	0,442	0,132	0,256	0,372	0,442	Kg/h
Alimentazione Power supply	230/50								V/Hz
Classe efficienza Efficiency class	B	B	A	A	A	A	A	A	

**FORCED FLUE**

	all	70000720 00	32
	all	70000390 00	54
	all	70000710 00	32
	all	70000380 00	54
	all	70000700 00	32
	all	70000370 00	54
	all	70000705 00	32
	all	70000375 00	54
	all	70000755 00	54
	all	70000466	32
	all	70000465 00	54
	Stratos 3.0 Stratos 5.0 SP 30 SP 50	70000995 00	54

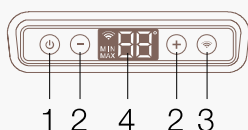
	all	70000730 00	32
	all	70000740 00	54
	all	TP3206A5 00	32
	all	TP5410A5 00	54
	Stratos MB/SP 30 Stratos MB/SP 50	TP32SP 00000	32
	Stratos SP	TP54SP 00000	54

PROTECTION KIT FOR WOOD WALLS

	Stratos MB Poster SP	70006078 00	32
	Stratos MB Poster SP	70006077 00	54



FORCED FLUE

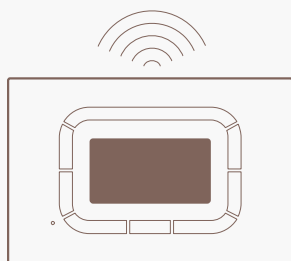


Comando base:

- 1 - On/Off apparecchio e reset.
- 2 - Aumento/Diminuzione fiamma.
- 3 - Attivazione/disattivazione cronotermostato senza fili.
- 4 - Display: temperatura, potenza, spia comando Wireless.

Basic control:

- 1 - On / Off set and reset.
- 2 - Increase / Decrease the flame.
- 3 - Wireless chronothermostat activation / deactivation.
- 4 - Display: temperature, power, wireless light control.



Cronotermostato digitale senza fili:

- Aumento/Diminuzione della fiamma.
- Funzione potenza ridotta.
- Menu comfort: temperatura desiderata.
- Programma giornaliero e settimanale.
- Funzionamento manuale/timer/auto.
- Funzionamento notturno con antigelo.
- Velocità ventilatore: min/max/auto
- Blocco tastiera.
- Veloce integrazione con comando base.

Wireless digital chronothermostat

- Thermostat knob regulation.
- Reduced output function.
- Comfort menu: desired temperature.
- Daily and weekly timer.
- Manual/timer/auto functions.
- Night operation with antifreeze.
- Fan speed: min/max/auto.
- Keyguard.
- Fast integration with basic control.

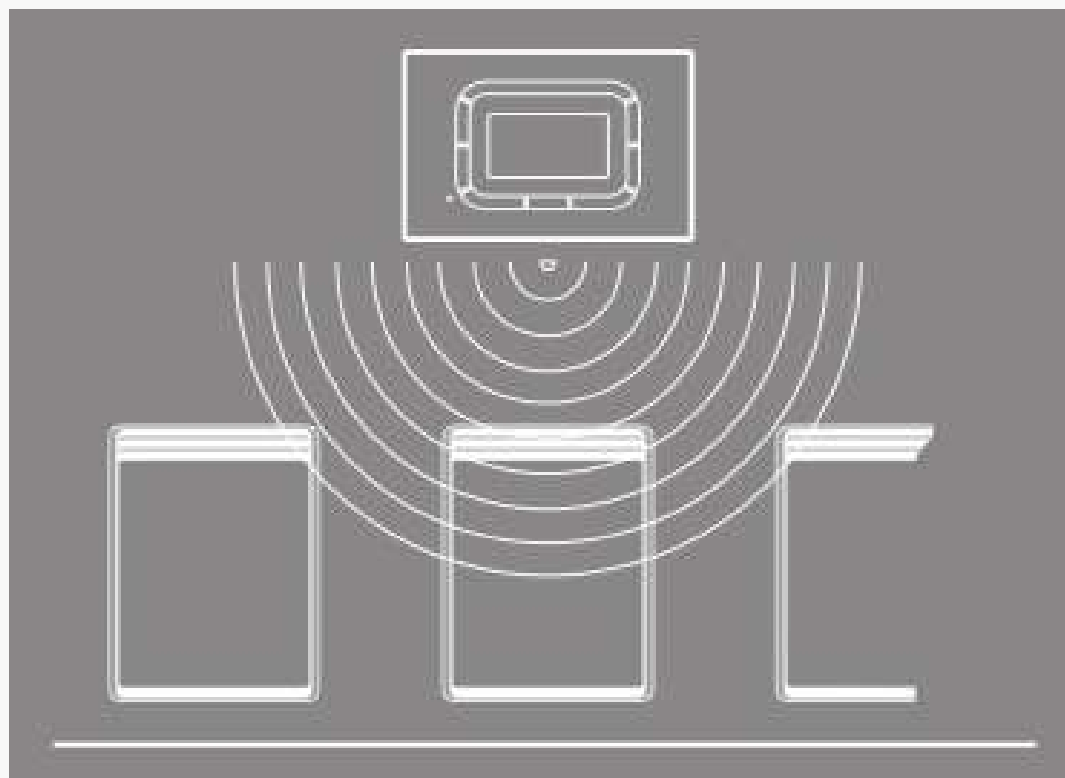


FORCED FLUE

Stratos MB
Poster SP



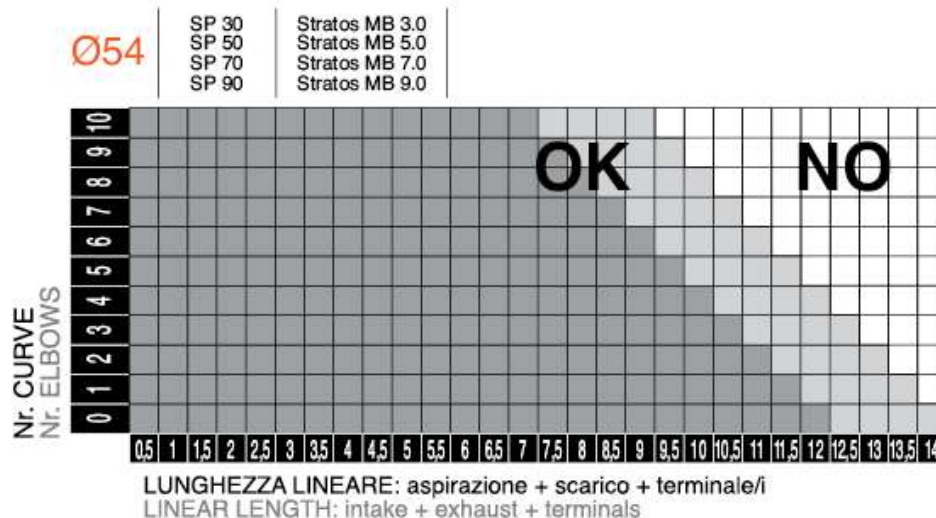
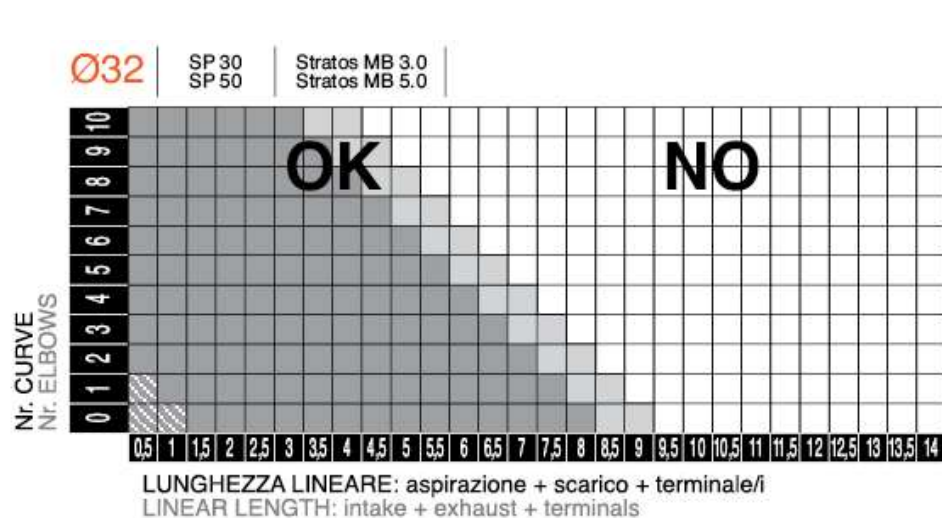
WIRELESS CONTROL



ONE CONTROL FOR MULTIPLE GAS HEATERS
(up to 99 gas heaters within 10 mt. radius.)



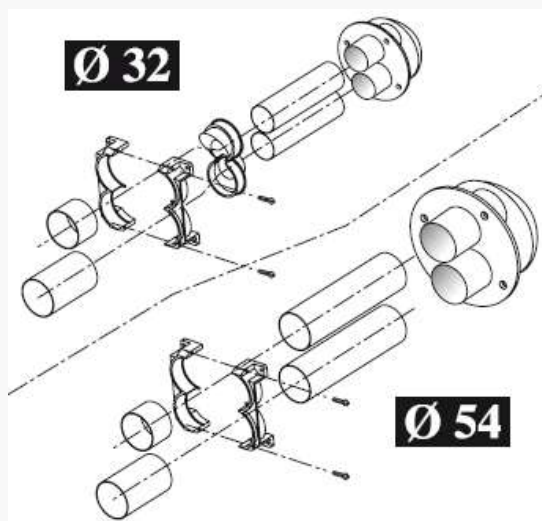
FORCED FLUE



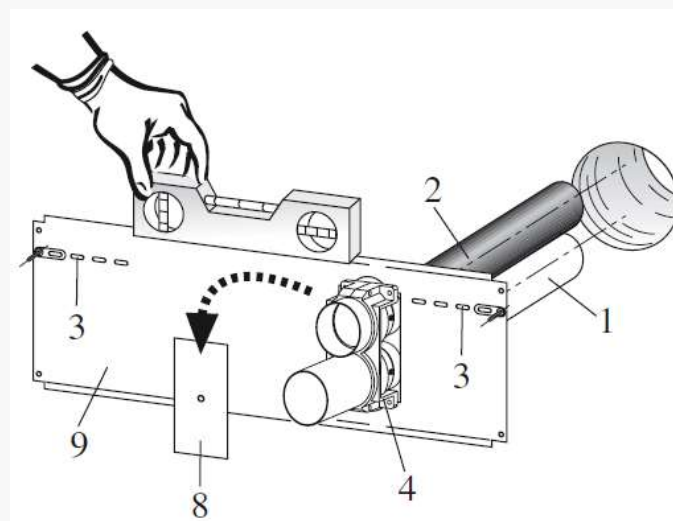
Terminale UNICO
UNIQUE terminal
 Terminali SEPARATI
SINGLE terminal
 SP 50, PSwb 60, Stratos MB 5.0



FORCED FLUE



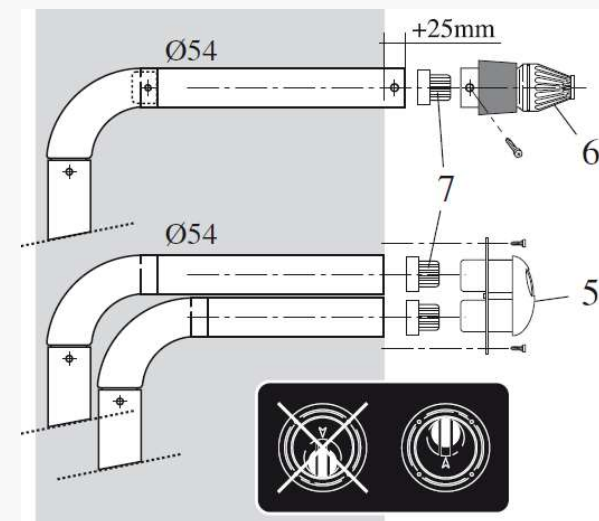
CHOOSE THE PIPE DIAMETER BASED ON THE LENGTH OF THE PIPING ROUTE



FIT THE BRIDGE ASSEMBLY (4) ON THE TEMPLATE (9) WHICH IS USED TO FIX THE GAS HEATER ON THE WALL.

Hole diameter to be made on the wall:

- 70 mm for Ø32 mm tubes
- 110 mm for Ø54 mm tubes



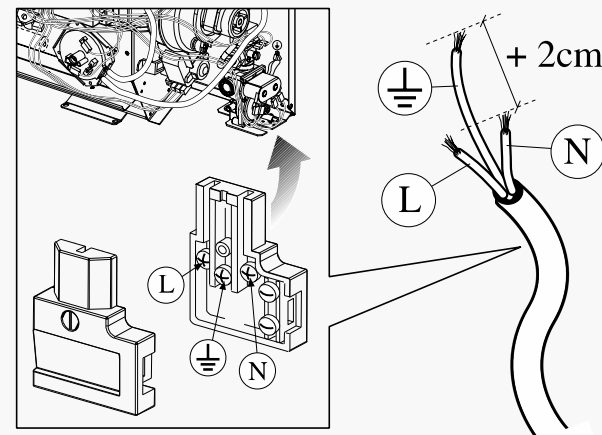
FOR Ø54mm PIPES IT IS NECESSARY TO INSERT THE BAFFLE (7) BETWEEN THE TERMINAL AND THE END OF THE PIPING.



FORCED FLUE

ELETTRICITA'

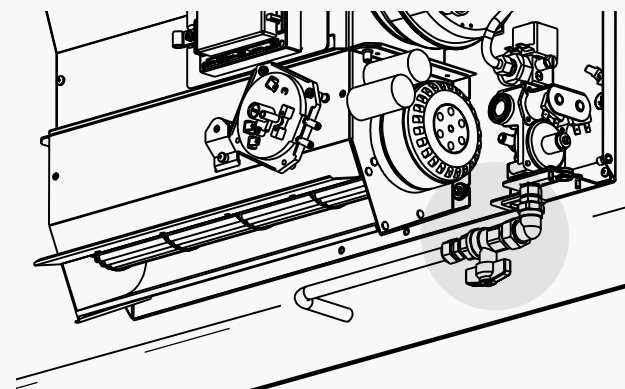
Il radiatore è predisposto per essere connesso alla rete elettrica attraverso una presa di corrente tipo VDE IEC C13 con spina volante inclusa.



GAS

The local gas space heater is designed to be connected to the gas network via a 3/8" male thread.

The manual ON/OFF valve (gas tap KIT) to be installed between the gas pipe and the radiator is an available accessoire.





FORCED FLUE

- PROGRAMMING
- INTERVAL: 15 MINUTES
- HEATING FROM 5°C to 35°C.
- SUMMER VENTILATION
- SLEEP TIMER
- KEYPAD LOCK
 - ALWAYS MIN
- NO FREEZE



Comando manuale
Manual control panel



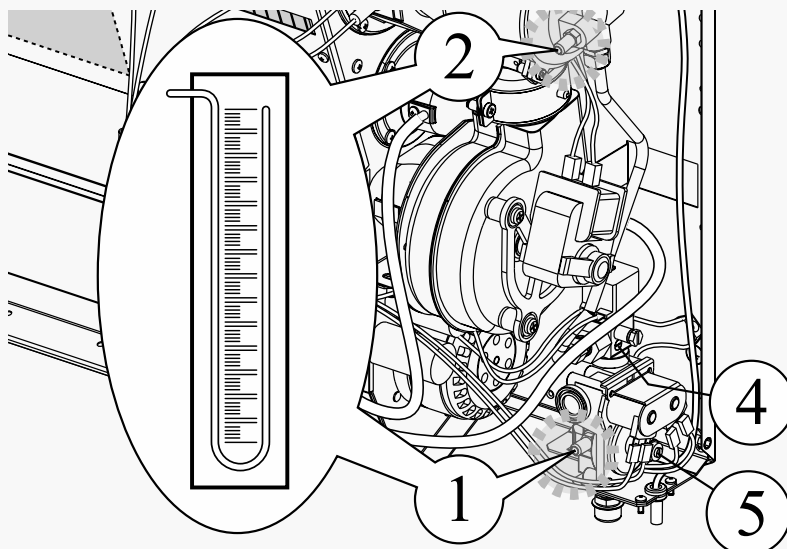
Comando wireless
Wireless control panel



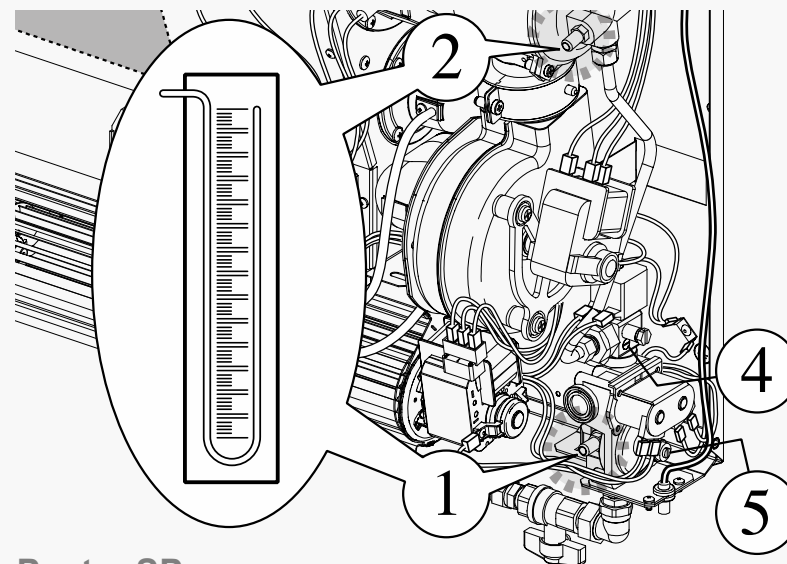
FORCED FLUE

Poster SP Stratos MB	G20 nom. / rid.	G30 nom. / rid.	G31 nom. / rid.	
3.0	12 / 7	29 / 15	37 / 18	mbar
5.0	12 / 7	29 / 15	37 / 18	mbar
7.0	12 / 7	29 / 15	37 / 18	mbar
9.0	11 / 6	29 / 15	37 / 18	mbar

- 1 – INLET PRESSURE POINT
- 2 – OUTLET PRESSURE POINT
- 4 – MIN ADJUSTMENT SCREW
- 5 – MAX ADJUSTMENT SCREW



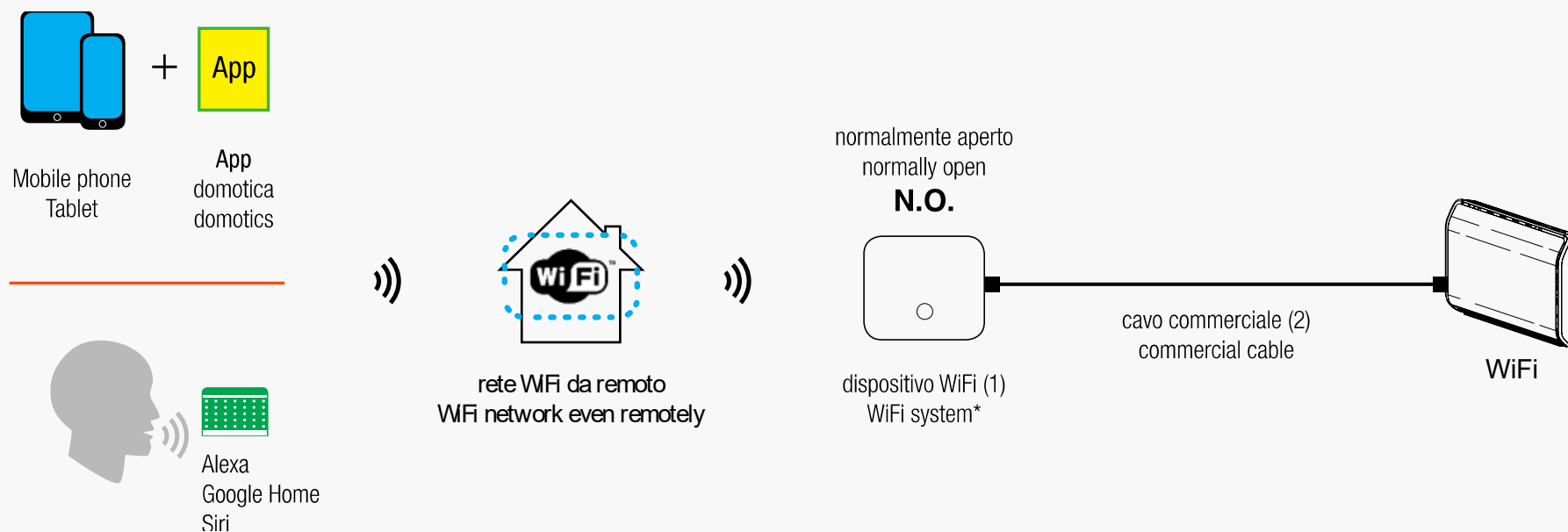
Stratos MB



Poster SP



FORCED FLUE



1) attuatore smart Wi-Fi / Smart Wi-Fi Actuator
presa temporizzata WiFi / Timed WiFi Socket
termostato WiFi / WiFi Thermostat
relè WiFi / WiFi Relay

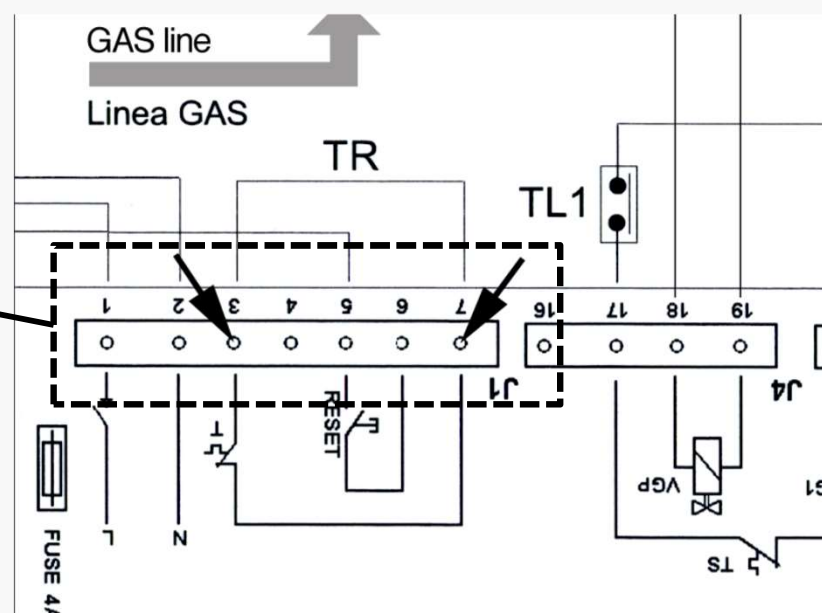
2) cavo bipolare Ø 0,75mm con faston maschio 6,3 x 0,75
bipolar cable Ø 0,75mm with male faston 6.3 x 0.75



FORCED FLUE



Cavo bipolare Ø 0,75mm con faston maschio 6,3 x 0,75
Bipolar cable Ø 0,75mm with male faston 6.3 x 0.75

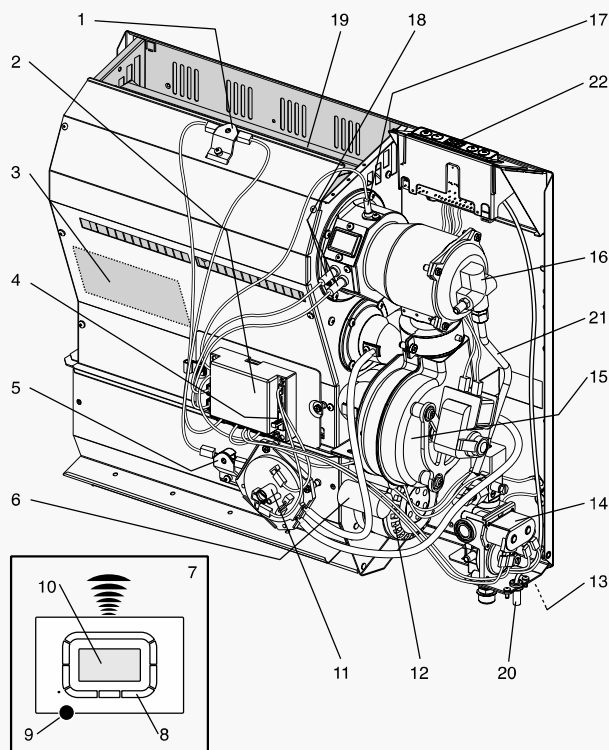




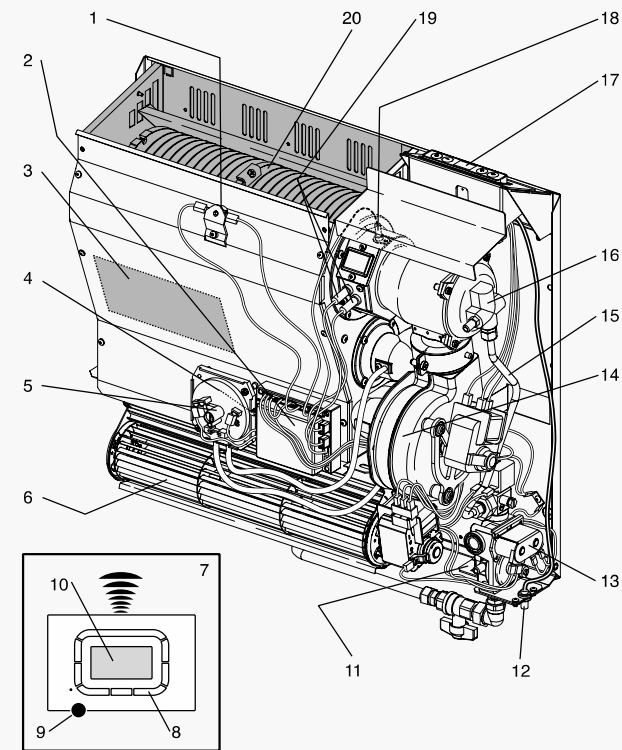
FORCED FLUE

- USING EXHAUST NOT COMPATIBLE WITH ITALKERO
- NO GROUND CONNECTION
- WRONG INLET PRESSURE
- DIRT IN THE APPLIANCE
- DIRT ON THE FAN
- WRONG FLUE GAS PATH CALCULATION
- E2 ERROR (wrong phase-neutral position)
- HOT AIR FLOW OBSTRUCTED

Stratos MB



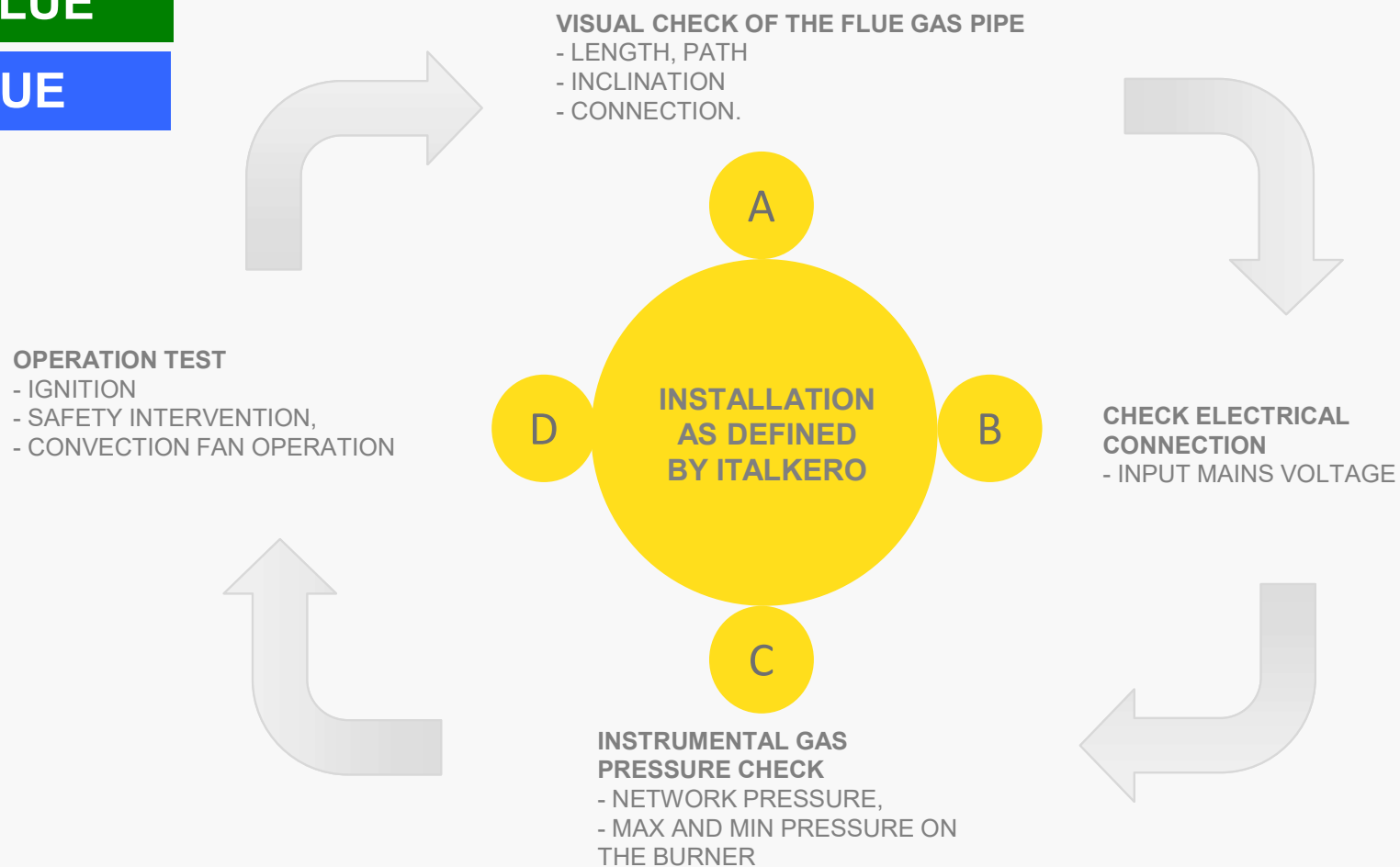
Poster SP





BALANCED FLUE

FORCED FLUE





A

VISUAL CHECK OF THE FLUE GAS PIPES
TYPE, LENGTH, PATH, INCLINATION, CONNECTION

BALANCED FLUE

- use coaxial pipe only
- use only pipe diameters defined for each appliance
- minimum length 350 mm (std wall = ok)
- maximum length 900mm (optional)
- straight sections only
- provide slightly upwards inclination facing output

FORCED FLUE

- use separate pipes only
- diameters 32mm or 54mm
 - 32mm for 30/50 models with short flue path
 - 54mm for 50 models with long path
 - 54mm for 70/90 models always
- check the pipe path in compliance with the table in the booklet
- provide slightly downward inclination for short path

LEAKS ARE NOT ALLOWED IN THE FLUE GAS PIPE CIRCUIT !



B

CHECK ELECTRICAL CONNECTION
INPUT MAINS VOLTAGE

BALANCED FLUE

FORCED FLUE

ALL OUR APPLIANCES
(except Eco SC because it has no electrical components)
ARE SET UP TO WORK WITH MAINS VOLTAGE
230 VAC 50/60 HZ



D

INSTRUMENTAL GAS PRESSURE CHECK

NETWORK PRESSURE, MAX AND MIN PRESSURE ON THE BURNER

BALANCED FLUE

FORCED FLUE

CHECK THAT THE GAS USED IS THE ONE
INDICATED IN THE TECHNICAL DATA PLATE
ATTACHED TO THE APPLIANCE (category reference)

The devices are produced, calibrated and tested for operating with natural gas.

It is possible to purchase devices tested and calibrated for operating with LPG gas.

If you wish to switch from natural gas to LPG (or vice versa), the specific nozzles (supplied) must be fitted.

Once the new nozzles have been fitted, the gas valve must be calibrated for the new gas used.



D

OPERATION TEST

IGNITION, SAFETY INTERVENTION, CONVECTION FAN OPERATION

BALANCED FLUE

- Turn the upper knob 90° anti-clockwise, keeping it turned inwards until reaching the PILOT position (at which point you will hear the sparking noise on the pilot burner). Keep holding down for 5" till ignition of the pilot flame.
- If the pilot does not ignite, repeat the operation.
- Once pilot flame present for at least 15": stop pressing the knob and rotate anti-clockwise until reaching the ON position. If the room temperature is lower than the set set-point temperature, the main burner will ignite.
- Complete the ignition phase by choosing a room temperature value (from 1 to 7 levels) using the knob.
- The burner will operate at "maximum" for room temperatures that are 2° lower the set-point temperature, it will operate at minimum when only 1° is missing from the set-point temperature.
- The main burner turns off when the set-point temperature is reached - only the pilot remains lit.
- The convection fan (with switch ON) will begin to spin moving air around the exchanger after the exchanger's fixed setting thermostat reaches 45°C.



D

OPERATION TEST

IGNITION, SAFETY INTERVENTION, CONVECTION FAN OPERATION

FORCED FLUE

- Press the ON button on the control panel.
- Select the desired temperature with the + or – keys (the appliance will start switching on only if the desired temperature is 1°C higher than that shown on the control panel display)
- The combustion fan will start.
- The pressure switch will read the pressure value and give consent to the electronic safety board to strike the sparks and open the passage of gas from the valve.
- The burner will operate at "maximum" for room temperatures that are 2° lower than the set-point temperature, it will operate at minimum when 1° is missing from the set-point temperature
- After 2' 30" the tangential fan will start and move air around the exchanger.



FORCED FLUE

E1

anomaly on SAS probe

E2

block due to burner ignition failure

E6

block for opening the PS air pressure switch during operation

E8

failure of the PS air pressure switch to switch at start-up

EA

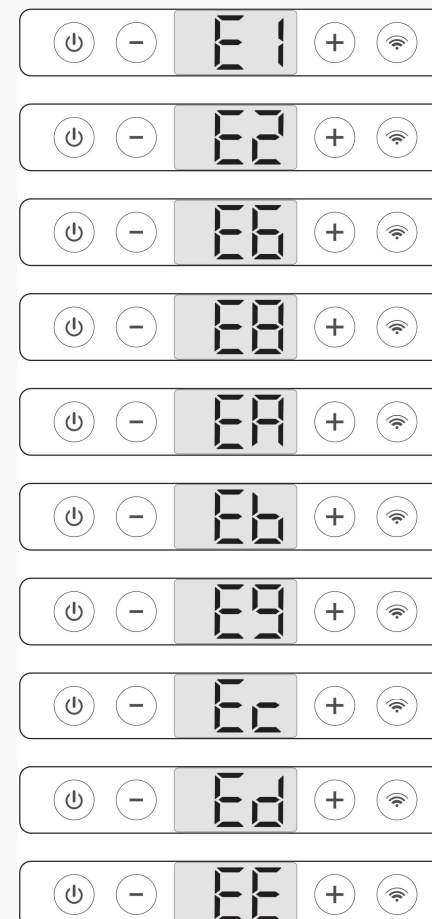
sticking of the PS air pressure switch on starting

EB

communication error with the safety device

E9 - EC - ED - EE

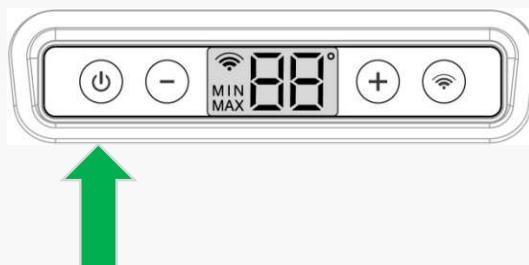
internal faults in the safety device





FORCED FLUE

Press and hold the POWER button on the display for max 3 seconds *



This action resets the machine and removes the error message

*ATTENTION: Holding for more than 3" does not perform the Reset



FORCED FLUE

With the “E0” error the appliance signals a fault on the control board

The appliance is blocked and despite repeated attempts to remove the block nothing happens.

- a) replace the control board



With the “E1” error the appliance signals an anomaly in the room probe

- a) check the correct connection
- b) replace probe
- c) replace control board



FORCED FLUE

With the “E2” error the appliance reports a failure to turn on, due to various factors:

- No gas supply
- Safety thermostat intervention
- Failure of the flame detection electrode which detects ignition
- Coil failure
- Ignition electrode failure
- Electronic board failure



FORCED FLUE

You try to turn on the appliance and you hear/see the ignition spark that makes 5 attempts without turning on - the appliance goes into E2 error again	Check the correct availability of gas to the machine Are there any taps closed? • If yes, open them.
	Check that the pressure at the valve is as per the appliance label / plate
	Check that the machine is powered with the correct gas (natural gas or LPG)
	Check the status of the safety thermostat(s). The thermostat trips if the heat outlet routes have been blocked, creating overheating, for example a cloth hanging on the radiator, or if the tangential air diffusion fan is not working • If it has tripped, reset the thermostat
	Check the supply voltage and coil resistance - If the supply voltage and coil resistance are within the correct values (see measurements on the following pages): possible breakage of the coils. • Replace the coils
	If the supply voltage and coil resistance are NOT within the correct values (see operating instruction on following pages): proper power is not arriving from the electronic board. • Check the electrical wiring. • Replace the electronic board



FORCED FLUE

You try to turn on the appliance and you hear/see the ignition spark, the appliance turns on, then E2 error appears again	• Flame detection electrode does not detect the presence of the flame (the thermocouple signal is sensitive to the phase-neutral orientation) • Reverse the plug orientation
	• Check the state of the flame detection electrode and/or replace it
You try to start the appliance and you DO NOT hear/see the ignition spark	Check ignition electrode • check whether the cable discharges onto metal • if the electrode is broken: replace it
	There is a problem with the electronic board: • replace the electronic board



FORCED FLUE

The flame disappears during operation	The safety thermostat trips • Check the gas pressure • Check the operation of the tangential fan
	There is flame lift off • Check whether the installation of a restrictor is necessary to reduce the draft
	Check the stability of the power supply voltage

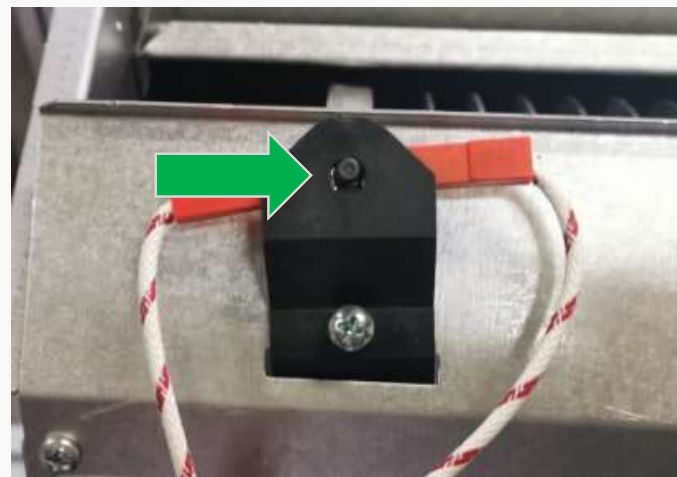


FORCED FLUE

To reset the safety thermostat (if it has tripped)

- 1) Remove the mantle
- 2) Press the safety thermostat button

Note: Stratos MB appliances have 2 safety thermostats with manual reset



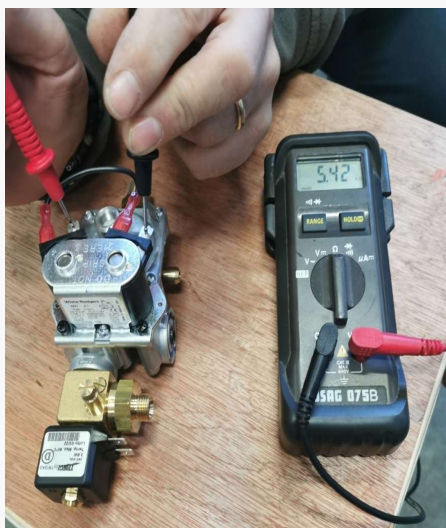


FORCED FLUE

1) Small coil resistance: the value should be approximately 9.2 ohm



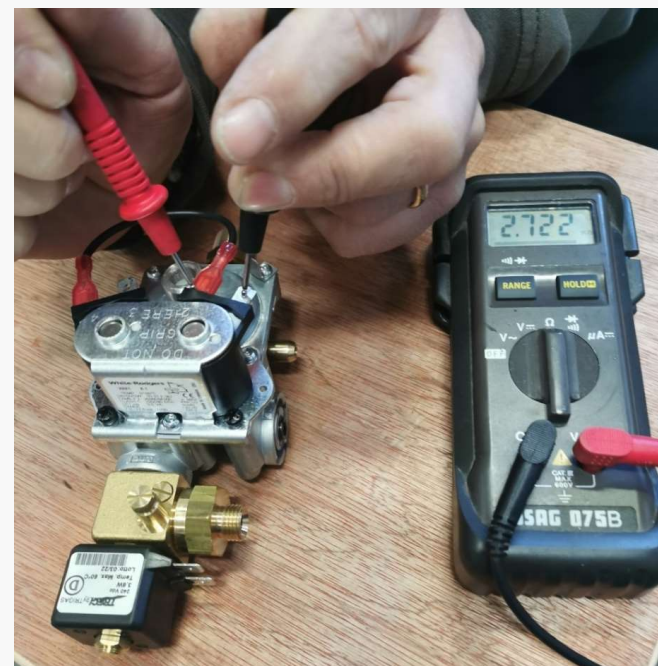
2) Large coil resistance: the value should be approximately 5.4 ohm





FORCED FLUE

3) Resistance of the large coil on the right: the value must be approximately 2.7 ohm

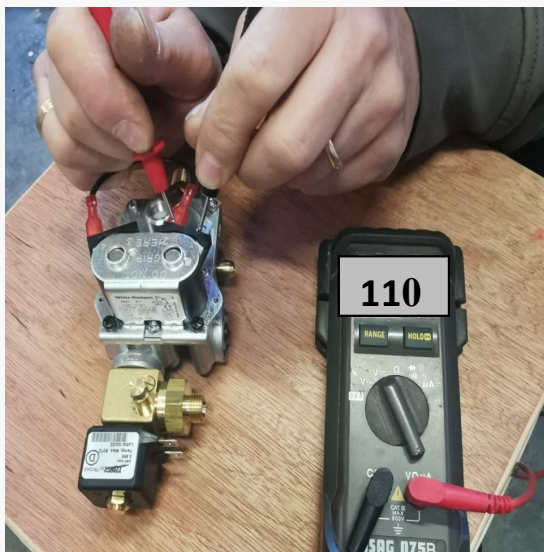
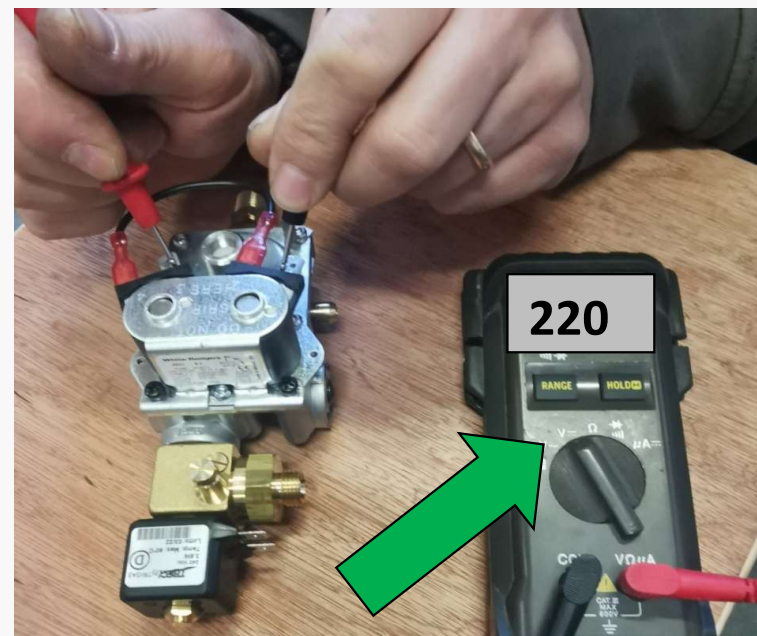


4) Resistance of the large coil on the left: the value must be approximately 2.7 ohm



FORCED FLUE

5) Large coil DC direct current voltage: the value must be approximately 220 V



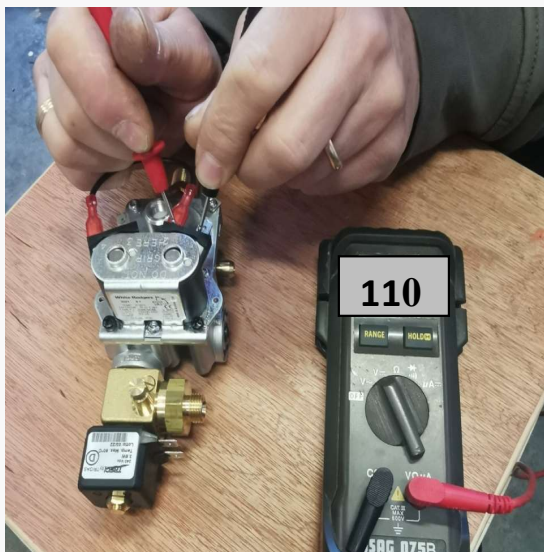
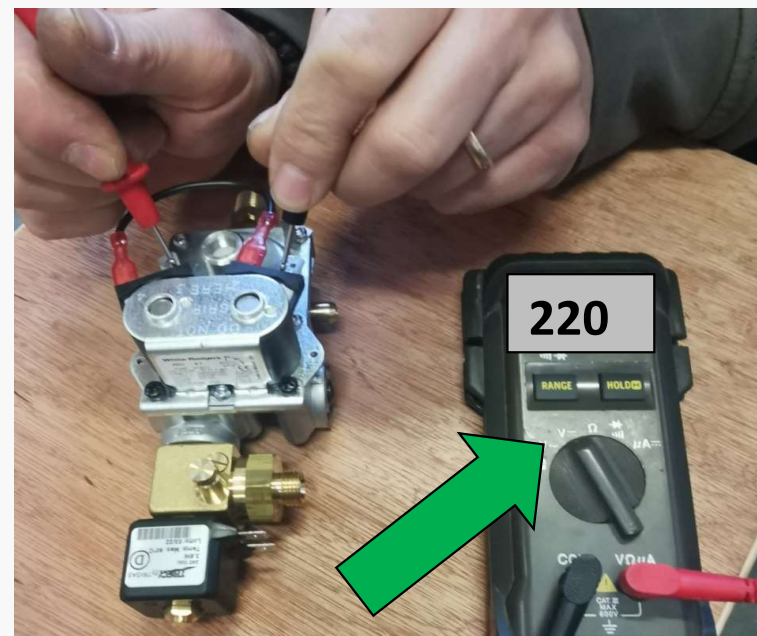
6) DC voltage on the large right coil: the value must be approximately 110 V

7) repeat also on the large coil on the left: the value must be approximately 110 V



FORCED FLUE

5) Tensione in corrente continua DC bobina grande: il valore deve essere circa 220 V



6) Tensione in corrente continua DC bobina grande dx: il valore deve essere circa 110 V

7) ripetere anche nella bobina grande capi a sx : il valore deve essere circa 110 V



FORCED FLUE

8) Small coil DC direct current voltage:
the value must be approximately 220 V





FORCED FLUE

With the “E6” error the appliance signals a block due to the opening of the air pressure switch contact during operation

With the “E8” error the appliance signals failure to switch the air pressure switch upon start-up

In both cases:

- a) Check the conformity of the smoke path (if it is incorrect, you can try to recover a minimum deviation by inserting JP2 on the control board)
- b) Check the correct functioning of the combustion engine
- c) Check the cleanliness of the pressure switch, the connection pipes, the relative connections to the appliance, the pipes, the exchanger and the terminal
- d) Replace pressure switch or flame control board



FORCED FLUE

With the “EA” error the device signals that the air pressure switch contact remains closed

Disconnect the pressure switch.

Check the cleanliness of the pressure switch by blowing inside the tube

If the error repeats, replace the pressure switch.

If the error repeats, replace the flame control board

With the “EB” error the appliance reports a communication error with the safety device

Check the wiring.

With the “E9 - EC - ED - EE” errors the device signals internal faults in the safety device

Replace flame control board



FORCED FLUE

Tangential fan immediately powered

The device was disconnected from the power supply before the end of its cooling cycle during the operation and calibration test on the manufacturing site. Wait 5-10 minutes and then the radiator will be available for operation

Excessive combustion engine noise

It can be caused by incorrect positioning of the pipes during installation. Check the piping

Excessive noise from the tangential fan

It can be caused by dirt accumulated on the fins. Perform cleaning

Melting of the cover sides

The radiator has experienced an overtemperature, look for the problem in an installation or use defect (e.g. covering of the air inlets/outlets, irregular switching off via the power switch, etc.)

Display off

- 1- Check the presence of power
- 2- Check the fuse on the control box on the flame control board
- 3- Replace control box

Control board melting (defect found on old SP Posters)

Replace the control box and control guide support, plus fit the new shield for board



BALANCED FLUE

Eco SC

Pilot does not turn on

- 1- Check the presence and compliance of the gas network
- 2- Check pilot nozzle
- 3- Check the ignition electrode and related wiring
- 4- Replace valve

Pilot does not stay on

- 1- Check thermocouple
- 2- Check the safety thermostat and related wiring
- 3- Replace valve

Burner does not light

- 1- Check the burner nozzle and pressure adjustment
- 2- Check the positioning of the terminal and flue pipe
- 3- Check bulb
- 4- If the programmer/clock is present, check the programming and the correct operating interval
- 5- Replace valve

Expansion noises

Check the tightness of the exchanger and burner flanges, loosen slightly if possible. Also check that there are no internal parts of the exchanger that are incorrectly positioned.



BALANCED FLUE

Eco SE

Fixed red LED

Flame error

- 1- Check electrical power supply (phase, neutral, earth)
- 2- Check supply pressure
- 3- Check the positioning of the terminal and flue pipe.
- 4- Check the safety thermostat
- 5- Check the correct functioning of the ignition electrodes (distance and humidity) and the relative wiring
- 6- Check detection electrode
- 7- Replace the flame control board
- 8- Replace the gas valve or coils

Flashing red LED

Control board error

- 1- Replace the control box/flame control board wiring
- 2- Replace the room probe
- 3- Replace flame board or control box



BALANCED FLUE

Eco SE

Explosions during ignition

Caused by an excess of gas during the ignition phase, check the adjustment of the "slow delivery" on the gas valve

Expansion noises

Check the tightness of the exchanger and burner flanges, loosen if possible slightly. Also check that there are no internal parts of the exchanger correctly positioned.

Tangential fan not working

Check its power supply from the control board



webinar 6



Italkero

thanks for your attention

