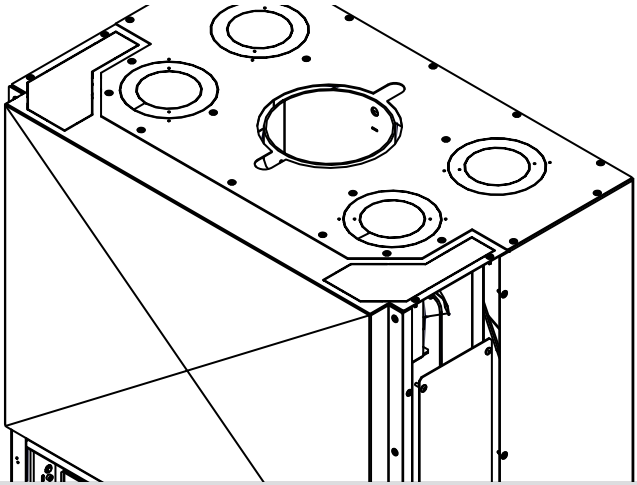
INSTALLATION GUIDE **GB**



CLOSED FIREPLACE

PLASMA 75/85/95/115 WOOD
PLASMA 115B WOOD
PLASMA B95 WOOD

Instructions in English

MCZ

8901958200

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INTRODUCTION

Dear Customer,
Our products are designed and manufactured in accordance with standards in force, with high quality materials and using our extensive experience in the transformation processes.
To get the best performance, we suggest you read the instructions in this manual carefully.
This installation and user guide is an integral part of the product: ensure that the manual is always supplied with the appliance, even if it changes owner. If the manual is lost, you can request another copy from the local Technical Department or download it directly from the company website.
All local regulations, including those referring to national and European standards, must be complied with when installing the appliance. In Italy, for the installation of systems with a biomass below 35KW, refer to the Ministerial Decree 37/08 and the qualified installation technician with the suitable requirements must issue a certificate of compliance for the system installed. (By system we mean Generator+Chimney+Air inlet).

REVISIONS TO THE PUBLICATION

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The company reserves the right to make changes to the product at any time without prior notice. The owner company protects its rights to the fullest extent of the law.

CARE OF THE MANUAL AND HOW TO CONSULT IT

- Take care of this manual and store it in an easily and quickly accessible place.
- Should this manual be lost or destroyed, request a copy from your retailer or directly from the authorised Technical assistance department. It can also be downloaded from the company website by going to www.mczgroup.com/support/mcz and following the simple instructions.
- The "**bold text**" requires special attention from the reader.
- "*The italic text*" draws attention to other sections in this manual or other additional clarifications.
- The "Note" provides the reader with additional information.

SYMBOLS USED IN THE MANUAL

	**ATTENTION:** Read the relative message with care because **failure to observe the information provided could result in serious damage to the product and danger to the persons who use it**.
	**INFORMATION:** failure to comply with these provisions will compromise use of the product.
	**OPERATING SEQUENCES:** sequence of buttons to be pressed to access the menus or perform adjustments.
	**MANUAL** carefully read this manual or the relative instructions.

⚠ SAFETY WARNINGS

- **Before starting any operation, the user and anyone preparing to work on the product must have read and understood the important warnings in this quick guide and the entire contents of the use and installation guide**. This will guarantee safe use of the product, as well as optimising the environmental benefits resulting from use of this heat generator.
- The heating system (generator + electrical connection + combustion air supply + combustion product extraction system + any hydraulic/aeraulic system) must be installed in compliance with the laws and regulations in force, and carried out by a qualified technician, who must issue a declaration of conformity of the system to the system manager and shall undertake full responsibility for final installation and consequent good operation of the product.
- Comply with the installation instructions, safety distances from combustible materials and disposal instructions for the product and its packaging that are specified in the manual.
- Only use the fuel recommended by the manufacturer. The product must not be used as an incinerator.
- It is strictly forbidden to use alcohol, petrol, liquid fuel for lanterns, diesel, bio-ethanol, fluids for lighting charcoal or similar liquids to light/rekindle the flame in these appliances. Keep these flammable liquids well away from the appliance when in use.
- Do not introduce fuel other than wood into the firebox.
- **This equipment can be used by children aged from 8 years and above and persons with reduced physical, sensory or mental capabilities or lack of experience and knowledge if they have been given supervision or instruction concerning use of the appliance in a safe way and understand the hazards involved. Children shall not play with the equipment. Cleaning and maintenance by the user must not be carried out by children without supervision.**

1-WARNINGS AND WARRANTY CONDITIONS

- Dispose of combustion ash in accordance with current law.
- Packaging items are NOT toys, as they can cause risk of asphyxia or strangling and other health hazards! People (including children) with reduced mental or motor capacities, or lacking experience and knowledge, must be kept away from the packaging.
- Do not climb on or lean on the product.
- Do not dry laundry on the product. Any drying racks or the like must be kept at a safe distance from the product.**Fire hazard.**
- The product maintenance operations must be exclusively carried out by a qualified operator on a yearly basis.Have the smoke expulsion system periodically checked and cleaned. Periodically check and empty the inspectionable parts of the smoke duct (e.g. Tee fitting caps).
- A non-compliant or improper/lack of maintenance of the product can cause hazardous situations and/or irregular operation.
- The manufacturer is relieved of any civil and criminal liability for damage caused by an installation nonconforming with standards and laws in force and by improper use and/or modification/tampering with the product and/or its accessory.
- We do not recommend waiting for the parts to get worn out before having them replaced.
- Only use original spare parts. The retailer, service centre or qualified personnel can provide all necessary information regarding spare parts.
- The product reaches high temperatures during operation (door, handle, glass, smoke outlet pipe...): keep children and animals away and use appropriate personal protective equipment, such as heat protection fireproof gloves or actuation systems such as 'cold handle' supplied with the product.
- In products with ducted hot air, the outlet air temperature can become very hot, even around 150°C: therefore any ducting must be insulated with adequate materials in crossings in contact with flammable surfaces or that are affected by the temperature (e.g. fading of colours, electric cable passage conduits, building insulation, etc.).

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1-WARNINGS AND WARRANTY CONDITIONS

- **It is forbidden to operate the product with the door open or the glass broken. In operation, all product panels must remain closed.**
- **All the combustion air registers and the doors/panels on the appliance must remain closed when it is not being used.**
- If supplied with electricity the product must be connected to an efficiently earthed system.
- Switch the product off in the event of a fault or malfunction.
- Do not allow the product to come into contact with water (or other liquids) in any way, especially if there are live electrical parts inside that may fail and create a danger of electrocution.
- Do not use detergents to wash the product, they could damage its aesthetic parts.
- Do not stand for a long time in front of the product in operation. Do not overheat the room you are in and where the product is installed. This may harm one's physical conditions and cause health problems.
- Install the product in a location that does not present a fire hazard and is equipped with all services such as supplies (air and electric - if envisaged), and smoke outlets.
- In the event of a chimney fire, close all combustion air registers, disconnect the product from the mains (if applicable) and never open the fire door. Then contact the competent authorities.
- With the exception of sealed installations (certified sealed product and outside ducting of combustion air + connection to chimney made hermetically with respect to the installation environment), it is also forbidden for liquid fuel appliances with continuous or intermittent operation that draw the combustion air from the room they are installed in or B-type gas heating appliances, with or without the production of domestic hot water, to coexist in the same room or in interconnecting rooms.
- The product and the cladding must be stored in a dry place and must not be exposed to weathering.

1-WARNINGS AND WARRANTY CONDITIONS

- It is recommended not to remove the feet that support the product in order to ensure adequate insulation, especially if the flooring is made of flammable materials.
- Assess the static conditions of the surface on which the weight of the product will rest and provide suitable insulation if it is made of flammable material (e.g. wood, fitted carpet or plastic).
- **Live electrical parts, if envisaged: only power the product once it has been fully assembled.**
- **Disconnect the product from the 230V power supply (if envisaged) before performing any maintenance operation. The plug must be removed in such a way that an operator can verify from any point to which he/she has access, that the plug remains unplugged.**
- When the product is switched on for the first time, it emits smoke due to the paint heating up for the first time. Keep the room where it is installed well-ventilated.
- The product is not a cooking appliance.

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1-WARNINGS AND WARRANTY CONDITIONS

INFORMATION:

- Please contact the retailer or qualified personnel for any information, problem or malfunction.
- Only use the fuel specified by the manufacturer.
- When the product is switched on for the first time, it is normal for it to emit smoke due to the paint heating up for the first time. Therefore make sure the room it is installed in is well-ventilated.
- Periodically check and empty the inspectionable parts of the smoke duct (e.g. Tee fitting caps)
- Have the smoke outlet system periodically checked and cleaned
- The product is not a cooking appliance.
- Always keep the cover of the fuel hopper closed.
- Store this installation guide with care as it must accompany the product for the duration of its service life. If the product is sold or transferred to another user, always ensure the manual is also handed over.

INTENDED USE

The product only works with wood pellets and must be installed inside a room.

WARRANTY CONDITIONS

For the duration, terms, conditions, limitations of the MCZ conventional warranty, please refer to the specific warranty card that is included with the product.

Information for management of waste electrical and electronic equipment containing batteries and accumulators



This symbol appears on the product, on the batteries, on the accumulators or on their packaging or on their documentation; it indicates that the product and the batteries or the accumulators included must not be collected, recycled or disposed of with household waste at the end of their service life.

Improper management of waste electrical and electronic equipment, batteries or accumulators can cause the hazardous substances contained within to leak out. In order to avoid harming the environment or health, the user is required to separate this equipment, and/or the batteries or accumulators included, from other types of waste and deliver them to the local collection centre. The distributor can be asked to collect the waste electrical and electronic equipment under the conditions and according to the procedures laid down by directive WEEE 2012/19/EU and by national reception laws.

The separate collection and correct treatment of waste electrical and electronic equipment, batteries and accumulators contribute to conserving natural resources, respect for the environment and safeguard health.

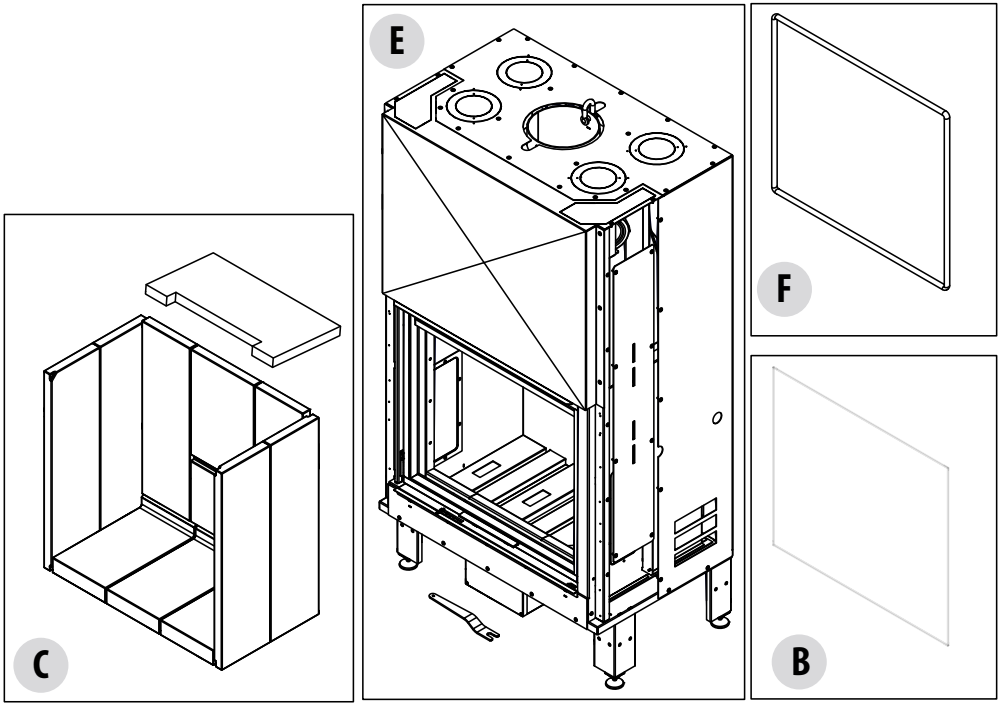
For more information on collection centres for waste electrical and electronic equipment, batteries and accumulators, contact the competent public Authorities for issue of the authorisations.

1-WARNINGS AND WARRANTY CONDITIONS

WARNINGS FOR CORRECT DISPOSAL OF THE PRODUCT

The owner is the sole party responsible for demolishing and disposing of the product, which must be performed in compliance with laws related to safety and environmental protection in force in his/her country.
At the end of its working life, the product must not be disposed of as urban waste.
It must be taken to a differentiated waste collection centre set up by the local authorities or to a retailer that provides this service. Sorted disposal of the product prevents potential negative effects on the environment and health (due to inappropriately disposing of product parts). It also allows materials to be recovered in order to obtain significant savings of energy and resources.

The table below and the exploded view to which it refers show the main components that can be found in the appliance and the instructions for their correct separation and end of life disposal.
In particular, electrical and electronic components must be separated and disposed of at centres authorised for this activity, in accordance with the WEEE Directive 2012/19/EU and its national transpositions.



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1-WARNINGS AND WARRANTY CONDITIONS

KEY	HOW/WHERE FOR DISPOSAL	MATERIALS
A OUTER CLADDING	If present, dispose of separately according to the material:	Metal
		Glass
		Tiles or ceramics
		Stone
B DOOR GLASS	If present, dispose of separately according to the material:	Glass ceramic (fire door): dispose of inert or mixed waste
		Tempered glass (oven door): dispose as glass
C INNER CLADDING	If present, dispose of separately according to the material:	Metal
		Refractory materials
		Insulating panels
		Vermiculite
		Insulators, vermiculite and refractory materials that have come into contact with flame or exhaust gases (dispose of with mixed waste)
D ELECTRICAL AND ELECTRONIC COMPONENTS	Dispose of separately at authorised facilities, as per WEEE Directive 2012/19/EU and its national transposition.	Wiring, motors, fans, circulators, displays, sensors, spark plugs, electronic boards, batteries.
E METAL STRUCTURE	Dispose of separately with metal	
F NON-RECYCLABLE COMPONENTS	Dispose of with mixed waste	E.g.: Gaskets, rubber, silicone or fibre hoses, plastics.
G HYDRAULIC COMPONENTS	Pipes, fittings, expansion tank, valves. If present, dispose of separately according to the material:	Copper
		Brass
		Stainless steel
		Other materials

1-WARNINGS AND WARRANTY CONDITIONS

Our solid bio-combustible products, (hereinafter called 'Products') are designed and manufactured in compliance with one of the following European standard harmonised to Regulation (UE) no. 305/2011 for construction products:

EN 16510-1:2022 + EN 16510-2-6:2022: "Domestic space heaters fired with wood pellets"(ex-EN 14785)
EN 16510-1:2022 + EN 16510-2-1:2022: "Domestic space heaters fired with wood logs" (ex-EN 13240)
EN 16510-1:2022 + EN 16510-2-2:2022: "Wood log inserts and fireplaces" (ex-EN 13229)

The products also comply with the essential requirements of Directive **2009/125/EC (Eco Design)** and, where applicable, Directives:

2014/35/EU (LVD - Low Voltage directive)
2014/30/EU (EMC - Electromagnetic Compatibility directive)
2014/53/EU (RED – Radio Equipment directive)
2011/65/EU (ROhS)

The EC Declaration of Conformity, the Declaration of Performance required by EU Regulation 305/2011 and all other product certification documents can be downloaded by scanning the QR code on this page (also found on the product label) or by accessing the website page www.mczgroup.com/support/mcz.

Having specified the above, we report that:

- **This manual and technical data sheet, also available on our website,** bear all of the specific indications and necessary and essential information to choose the product, to install it correctly and to properly size the smoke expulsion system;
- the Products must be **installed, controlled and serviced** by a qualified operator, according to the instructions in this manual and in compliance with the laws and installation and maintenance standards in force in individual countries, so as to provide an efficient heating system, properly sized according to the needs of the home;
- **if the products are thermally stressed**, with overloads that do not comply with the indications in this manual, the machine will wear out prematurely, and in particular the parts exposed to the direct heat of the flame (e.g. combustion chamber), may undergo modifications and deterioration which, among other things, may generate noise during operation of the product due to mechanical expansion.

The manufacturer will not be held liable if the above information is ignored.

2-CHOICE OF FUEL

FUEL



Caution!
Use only natural wood. It is strictly forbidden to use fossil fuels, impregnated, painted or glued wood, sheets of particle board, plastic or colour magazines as fuel. They pollute the environment and severely damage the combustion chamber and chimney.

In order to obtain maximum yield from your product, the use of quality wood is of prime importance.
Below are some useful instructions for the correct use of the product:

- Only burn natural, untreated wood with maximum moisture content of 20%, which corresponds to cut wood with 2 years of correct drying (see details below).
- We recommend using heating wood such as beech–oak-ash-robinia-common oak. Fuels such as poplar-pine-lime-chestnut-eucalyptus-myrtle have a low calorific value as they are soft wood, i.e. tender.
- Split wood is better than round logs and use even sizes logs, preferably medium-small (5-15 cm in diameter)
- Use wood logs with a length in accordance with the specifications in the technical data: the length (25 or 30 cm) depends on the size of the fire bed in the combustion chamber.
- Always burn the wood placing it down and not standing up.
- For each load, always use the quantity of wood and the loading interval specified by the manufacturer in the technical data. Always wait for the flame to go out before reloading. Do not wait more than 10 min after the flame goes out to reignite, as the embers cool down making it difficult to restart the flame, and it may be necessary to repeat the reignition procedure.
- Do not insert loads higher than those indicated in the technical data, to avoid overheating of the product/chimney and unbalanced, inefficient combustion.

THE FUEL - moisture and storage

For the efficient combustion of wood, the moisture it contains is crucial:
By lighting a fire with very damp wood, much of the energy will be lost due to the evaporation of the water contained in the wood itself. Damp wood produces poor combustion, greatly increasing pollutant emissions and soot and creosote deposits in the chimney which, in the worst case scenario, can cause chimney fires. Other non-negligible drawbacks are the increased soiling of the product glass and the disturbance of neighbours due to excessive chimney smoke.

The table below shows the reduction in moisture as the months of proper drying increase, and the corresponding calorific value of 1 kg of fuel burned.
In order to achieve an optimal condition for use, a drying time of 24 months is recommended, which corresponds to a moisture content of 16% and a calorific value of 15350 kJ/kg. The same wood with only 6 months of drying would still have 29% moisture with 25% less energy (12200 kJ/kg).

IN A NUTSHELL 25% less calorific value is equivalent to losing 1 out of 4 loaded logs!

2-CHOICE OF FUEL

Average moisture (%) of the wood in percentage		
	Wood placed in storage 3 months after cutting	
Drying time	Moisture	Calorific value (kJ/kg)
0 (green wood)	75%	
3 months	44%	
6 months	29%	12200
9 months	26%	
12 months	25%	13250
18 months	17%	
24 months	16% OPTIMAL	15350
30 months	15%	

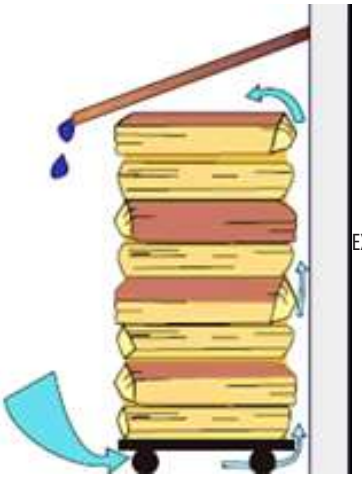
+25%

Below are some useful indications for the correct storage of the wood:

- stored wood must already be sized for use.
- optimum drying is achieved with 2 years of proper storage (longer times would not entail increased drying).
- the wood must be cut during the winter and stored outdoors in the summer

Storage must be:

- well ventilated and aired
- covered to protect from rain and protected from sunlight, because the wood would lose quality (DO NOT cover the wood with tarps that touch the ground as this creates a sealed cover making the wood even damper.)
- Possibly outside, otherwise in rooms or cellars that are well ventilated, preventing the formation of mould (always leave the window open!).
- not resting the wood directly on the floor but at a distance of about 20-30 cm to prevent rotting.
- Wood must always be stored at a sufficient safe distance from the combustion unit - always comply with the fire and safety regulations.



EXAMPLE OF WOOD STORAGE

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3-INSTALLATION

FOREWORD

The heating system (generator + electrical connection + combustion air supply + combustion product extraction system + any hydraulic/aeraulic system) must be installed in compliance with the laws and regulations in force[1], and carried out by a qualified technician, who must issue a declaration of conformity of the system to the system manager and shall undertake full responsibility for final installation and consequent good operation of the product.

The manufacturer declines all responsibility in the event of installations that do not comply with the laws and regulations in force and inappropriate use of the appliance.

In particular one must ensure that:

- the environment is suitable for installing the appliance (floor load-bearing capacity, presence or possibility of creating an adequate electrical/hydraulic/aeraulic system when required, volume compatible with the appliance characteristics, etc.);
- the appliance is connected to a smoke expulsion system correctly sized according to EN 13384-1, which is resistant to soot fire and which complies with the distances prescribed by the combustible materials indicated on the plate data;
- there is a suitable combustion air flow to the appliance;
- other installed combustion appliances or intake devices do not cause a depression in the room where the product is installed compared to outside.

[1] The national reference standard for the installation of domestic appliances is UNI 10683 (IT) - DTU NF 24.1 (FR) - DIN 18896 (DE) - NBN B 61-002 (BE) - Real Decreto 1027/2007 (ES)

In particular, it is recommended to strictly observe the safety distances from combustible materials to avoid serious harm to people and to the integrity of the home.

Installation of the appliance must ensure easy access to service the appliance itself, the smoke ducts and the flue.
Always maintain adequate distance and protection in order to prevent the product from coming into contact with water.

It is forbidden to install the product in rooms that pose a fire hazard.
With the exception of sealed installations, it is also forbidden for liquid fuel appliances with continuous or intermittent operation that draw the combustion air from the room they are installed in or B-type gas heating appliances, with or without the production of domestic hot water, to coexist in the same room or in interconnecting rooms.



Sealed installation means that the product is certified as sealed and its installation (ducting of the combustion air and connection to the chimney) is airtight with respect to the installation environment.

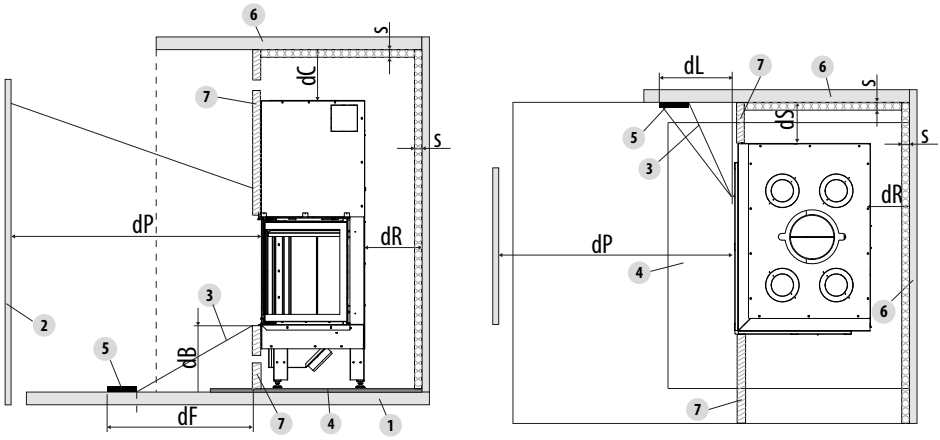
A sealed installation does not consume the room's oxygen but draws all the air from the outside environment (if suitably ducted) and makes it possible to install the product in all houses that require a high degree of insulation such as "passive" or "high energy efficiency" houses. Thanks to this technology, the product does not increase dispersion in the environment, making it more comfortable and increasing the overall efficiency of the system.

3-INSTALLATION

MINIMUM DISTANCES

Observe the distances to flammable walls/objects (sofas, furniture, wood panelling, matchboarding, etc.) as specified in the technical data table with reference to the diagram below.

If objects considered to be particularly sensitive to heat are present, such as furniture, curtains, sofas, as a precaution, increase the stove clearances to avoid possible deterioration due to the effect of heat.



Safety distances to combustible material (for values refer to technical data table)*	
dR (rear distance)	dP (front radiation)
dS (side distance)	dF (floor radiation)
dB (lower distance)	dL (side radiation)
dC (upper distance)	s (additional insulation thickness)

*Provide additional insulation thickness to protect flammable surfaces if specified in the technical data table. It is preferable to achieve the specified thickness with 2 layers fitted with staggered joints.
EXAMPLE OF RIGID ROCK WOOL PANEL (LINED ON ONE SIDE WITH AN ALUMINIUM FILM): FIRE REACTION EUROCLASS A1- DENSITY 90 kg/m3 - THERMAL CONDUCTIVITY < 0.35 W/mK

KEY

1	FLOOR	5	RADIATED SURFACE TO BE PROTECTED
2	FRONT FLAMMABLE MATERIAL	6	REAR/SIDE/UPPER FLAMMABLE SURFACE
3	AREA SUBJECT TO RADIATION	7	CLADDING
4	FLOOR GUARD		

If the floor is made of combustible material, use a protection made of non-combustible material (steel, glass...) that also protects the front from any falling combusted material during cleaning operations.

Always fit a floor guard if the floor is made of flammable material.

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3-INSTALLATION

Install the product also detached from any non-combustible walls/surfaces, respecting the minimum distance specified in the technical data table (dnon) to allow effective ventilation of the appliance and good heat distribution in the room. If the non-combustible wall is a partition wall bordering another home and/or room, apply the insulation as if it were a wall with combustible material in order to prevent heat transfer to the other room. In any case, ensure adequate distance to facilitate access during cleaning and extraordinary maintenance. If this is not possible, it must still be possible to distance the product from adjacent walls/elements. This operation must be performed by a technician qualified to disconnect the combustion product expulsion ducts and then put them back in place.

Air inlet

It is mandatory to provide an adequate external air inlet that supplies the combustion air required for the product to work properly. The flow of air between the outside and the installation room can take place with a free air inlet or by ducting the air directly to the outside[3].
The free air inlet must:

- be made at floor level
- always be protected with an outer grille and in such a way that it cannot be obstructed by any object
- have a minimum total free area (without grid) as indicated on the technical data

The presence of other suction devices (e.g.: vmc, electric fan for stale air extraction, kitchen hood, other stoves, etc.), in the same room could cause negative pressure in the room. In this case, one must verify that, with all the equipment on, no more negative pressure is created inside the installation room with respect to the outside. If necessary, increase the air inlet section.
It is possible to duct the air required for combustion to the outside by connecting the external air inlet directly with the combustion air inlet which is usually found on the back of the appliance.
The ducting, if any, must have a diameter of not less than the coupling for the product, without bottlenecks, if possible horizontal and with a smooth inner surface and not longer than 3 m (a 90° bend is equivalent to one linear metre):
Possible worst-case configurations can be approved by the qualified installer, always by correct dimensioning of the system (according to EN 13384-1).

[3] In the event the combustion air is ducted on unsealed products, still verify that no negative pressure is created inside the installation room with respect to the outside, otherwise provide for an additional air intake in the room.

3-INSTALLATION

Preparing the smoke expulsion system
The combustion product expulsion system is a particularly important element for the proper operation of the appliance and must be correctly sized according to EN 13384-1.
Its creation/adaptation/verification must always be carried out by a legally qualified operator and must comply with the regulations in force in the country where the appliance is installed.
The Manufacturer declines all liability for malfunctions caused by a badly sized and non-compliant smoke expulsion system.

Smoke duct (smoke fitting)
The smoke duct is the pipe that connects the appliance to the flue.
This smoke fitting must comply in particular with the following requirements:
- comply with product standard EN 1856-2;
- its gauge must be of constant and equial diameter and no less than that of the appliance outlet, from the firebox outlet up to the connection in the flue;
- the horizontal section must be as short as possible and extend no more than 2 metres;
- the horizontal sections must have a minimum upward slope of 3%;
- changes of direction must have an angle no greater than 90° and be easy to inspect
- the number of changes of direction, including that for intake into the flue must not exceed 3;
- it must be insulated if it passes outside the installation room
- it must not in any case cross rooms in which it is forbidden to install combustion appliances.
- the use of flexible metal and fibre cement or aluminium pipes is forbidden;

In any case, the smoke ducts must comply with the temperature class specified in the product's technical data, be soot fire resistant and meet the sealing requirements for natural draught (N1).

Flue (chimney or piped duct)
When creating the flue, in particular comply with the following requirements:
- comply with the applicable product standard (EN 1856-1, EN 1443, EN 1457, EN 13063, EN 1806);
- be made with suitable materials to ensure resistance to normal mechanical, chemical, thermal stresses and have adequate thermal insulation in order to limit the formation of condensate;
- have a predominantly vertical configuration and be free of choke points along its entire length;
- be correctly spaced by air gaps and isolated from combustible materials;
- the flue inside the house must still be insulated and can be inserted in an air shaft provided it complies with the regulations for piping;
- the smoke duct must be connected to the flue by means of a Tee fitting with an inspectable collection chamber for the collection of soot and any condensate.
- where the sizing provides for wet operation, a suitable condensate collection and siphon discharge system must be set up.



We recommend checking the data plates of the flue for the safety distances that must be observed in the presence of combustible materials and, if necessary, the type of insulating material to be used.
It is forbidden to connect the product to a collective or shared flue (*) with other combustion appliances or with hood outlets.
It is forbidden to use the direct exhaust on the wall or towards indoor spaces and any other form of exhaust not provided for by the regulation in force in the country of installation.

(*) unless there are specific national derogations (clearly specified in the corresponding instruction manual in English) which under appropriate conditions allow it; in this case, strictly follow the product/installation requirements of the relative regulations/technical specifications/legislation in force in that country.

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3-INSTALLATION

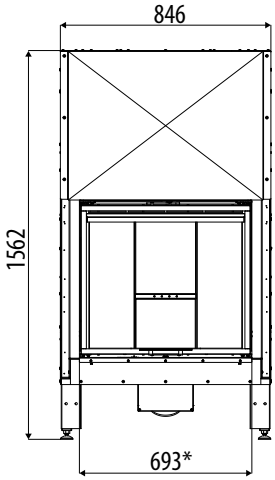
Chimneypot

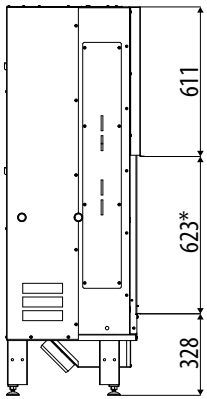
The chimneypot, meaning the end part of the flue, must meet the following characteristics:

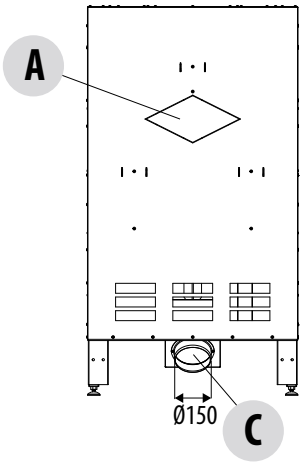
- the smoke outlet section must be at least double the internal section of the chimney;
- prevent the penetration of rain or snow;
- ensure the outlet of smoke even in the event of wind (wind proof chimneypot);
- the height of outflow must be beyond the reflux area (*) (refer to national regulations to identify the reflux area);
- always be built at a distance from antennas or dishes, and never be used as a support.

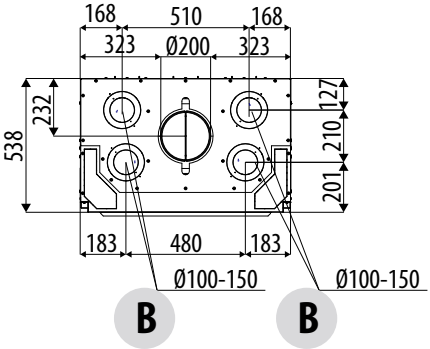
4-DIMENSIONS AND TECHNICAL FEATURES

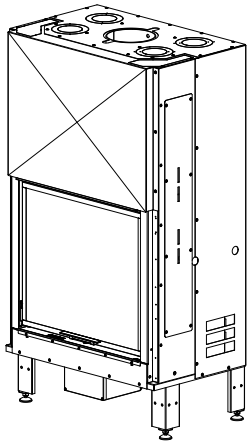
PLASMA 75 WOOD DIMENSIONS











*APERTURA FOCOLARE PER RIVESTIMENTO

A SEMITRANCIO VENTILAZIONE NATURALE

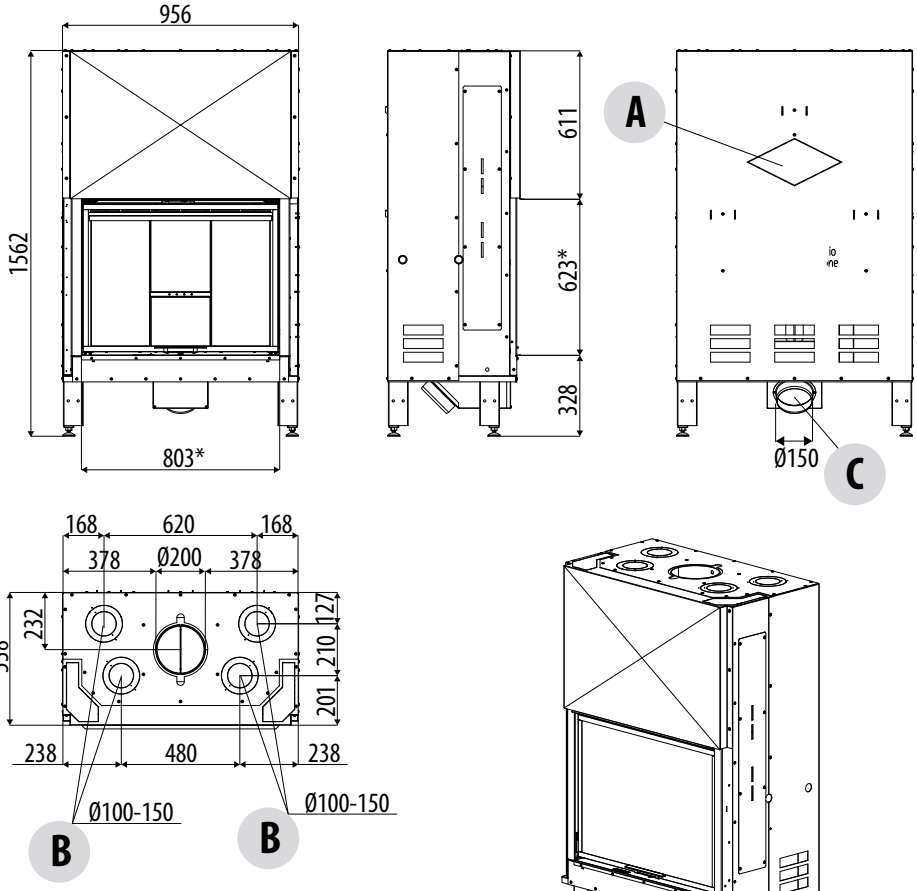
B SEMITRANCI Ø100-150

C INGRESSO ARIA COMBURENTE Ø 150

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4-DIMENSIONS AND TECHNICAL FEATURES

PLASMA 85 WOOD DIMENSIONS



*APERTURA FOCOLARE PER RIVESTIMENTO

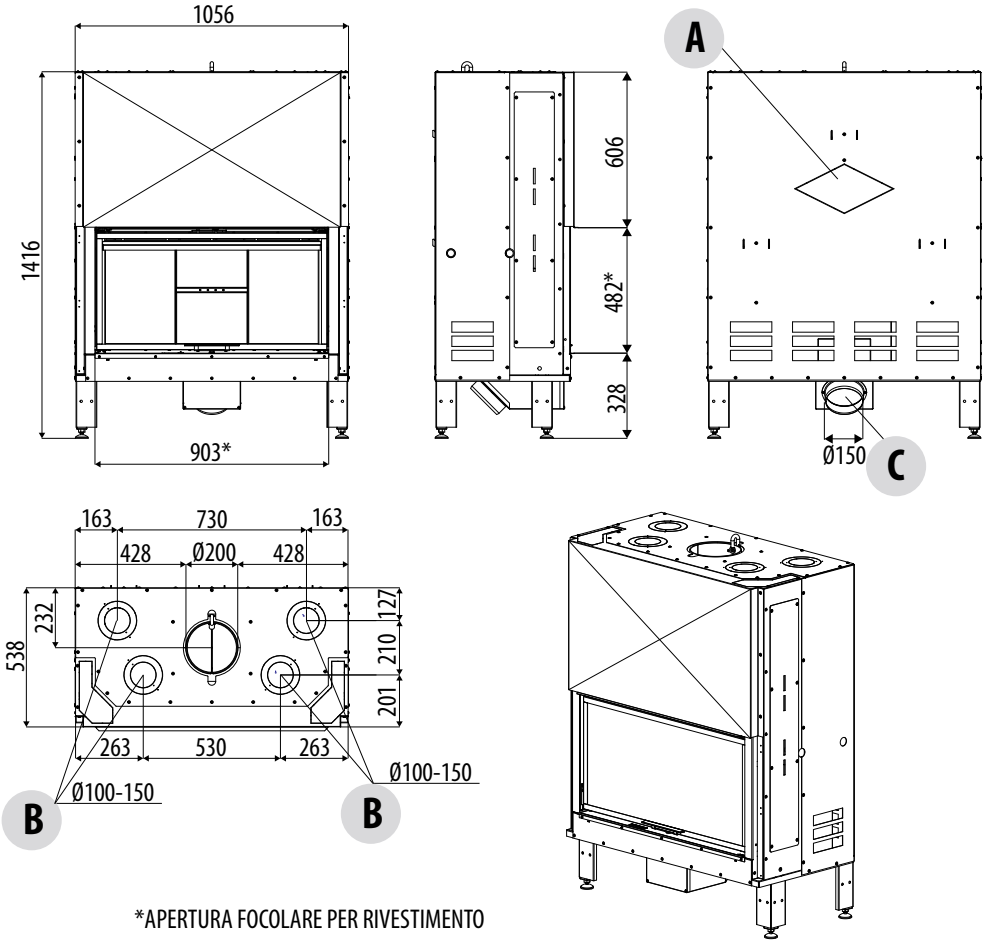
A SEMITRANCIO VENTILAZIONE NATURALE

B SEMITRANCI Ø100-150

C INGRESSO ARIA COMBURENTE Ø 150

4-DIMENSIONS AND TECHNICAL FEATURES

PLASMA 95 WOOD DIMENSIONS



*APERTURA FOCOLARE PER RIVESTIMENTO

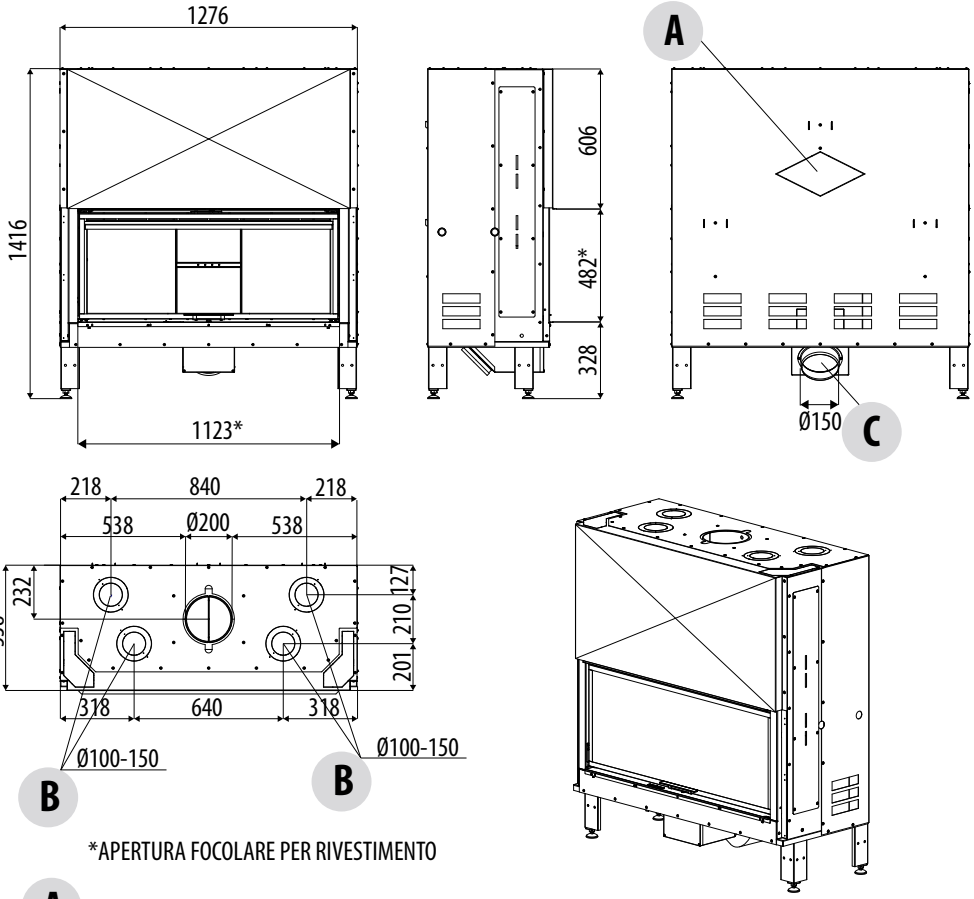
A SEMITRANCIO VENTILAZIONE NATURALE (VN)

B SEMITRANCI Ø100-150

C INGRESSO ARIA COMBURENTE Ø 150

4-DIMENSIONS AND TECHNICAL FEATURES

PLASMA 115 WOOD DIMENSION



*APERTURA FOCOLARE PER RIVESTIMENTO

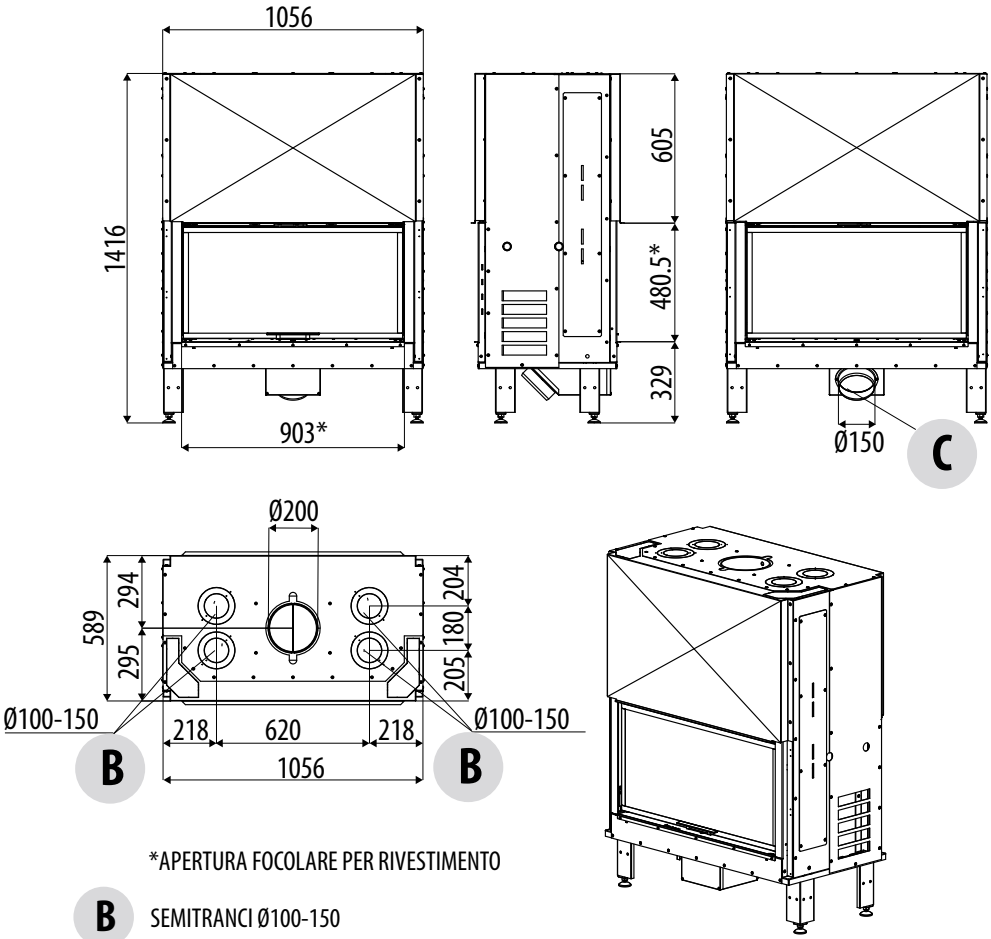
A SEMITRANCIO VENTILAZIONE NATURALE

B SEMITRANCI Ø100-150

C INGRESSO ARIA COMBURENTE Ø 150

4-DIMENSIONS AND TECHNICAL FEATURES

PLASMA B95 WOOD DIMENSION



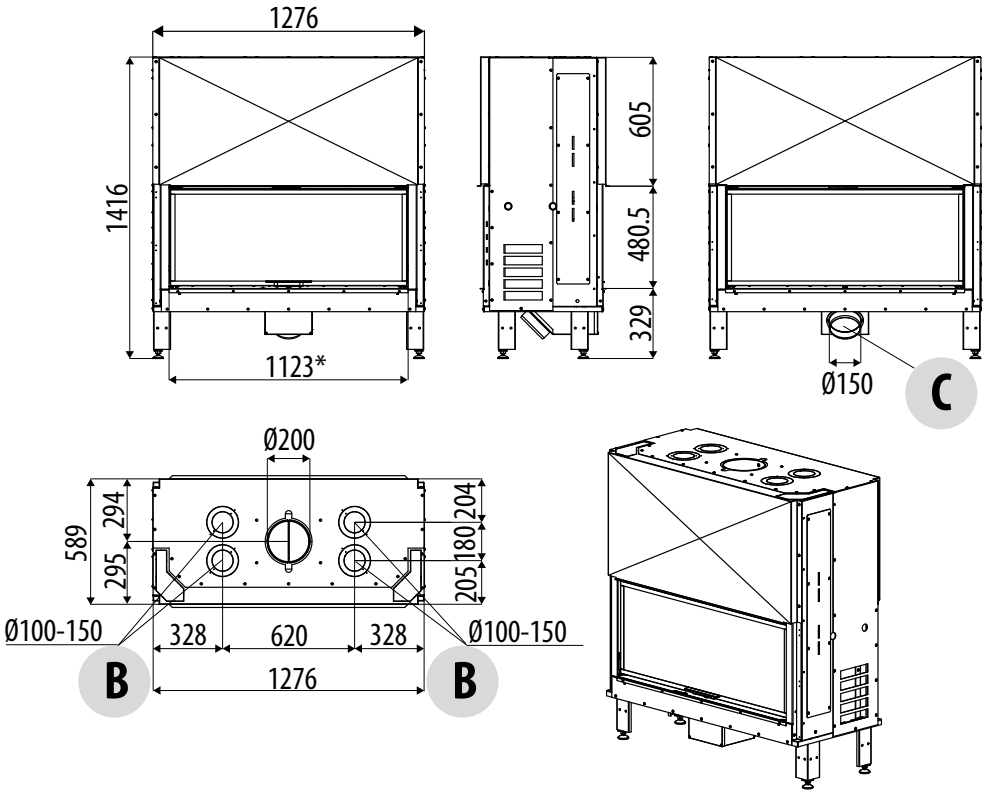
*APERTURA FOCOLARE PER RIVESTIMENTO

B SEMITRANCI Ø100-150

C INGRESSO ARIA COMBURENTE Ø 150

4-DIMENSIONS AND TECHNICAL FEATURES

PLASMA 115B WOOD DIMENSION



*APERTURA FOCOLARE PER RIVESTIMENTO

B SEMITRANCI Ø100-150

C INGRESSO ARIA COMBURENTE Ø 150

4-DIMENSIONS AND TECHNICAL FEATURES

	PLASMA 75 WOOD			
General data	Brand		MCZ	
	Model		PLASMA 75 WOOD	
	EU Standard		EN 16510-1:2022 / EN 16510-2-2:2022 (ex-EN 13229)	
	Appliance Type (tightness)	Type	BE	
	Continuous (CON) or intermittent (INT) operation	CON / INT	INT	
	Fuel type		Wood logs (l)	
	Fuel dimensions		L 250 ÷ 330mm	
	Energy class (scale A++/G)		A	
	Energy efficiency index	EEI	106	
	Seasonal space heating efficiency	ηS	70	
Nominal performances	Nominal heat input	$Pinput_{nom}$	15,6	kW
	Nominal heat output	P_{nom}	12,5	kW
	Fuel consumption at nominal heat output	kg/h_{nom}	3,7	kg/h
	Cycle load at nominal heat output	Aut_{nom}	2,5	kg
	Cycle duration at nominal heat output	η_{nom}	40	min
	Efficiency at nominal heat output	η_{nom}	80,3	%
	CO2 at nominal heat output	$CO2_{nom}$	9,5	%
	CO (%) at 13% O2 at nominal heat output	$CO\%_{nom}$ (13% O_2)	0,1	% (13% O_2)
	CO at 13% O2 at nominal heat output	CO_{nom} (13% O_2)	1250	mg/m3 (13% O_2)
	NOx at 13% O2 at nominal heat output	NOx_{nom} (13% O_2)	130	mg/m3 (13% O_2)
	OGC at 13% O2 at nominal heat output	OGC_{nom} (13% O_2)	69	mg/m3 (13% O_2)
	PM at 13% O2 at nominal heat output	PM_{nom} (13% O_2)	29	mg/m3 (13% O_2)
	Flue gas outlet temperature at nominal heat output**	Ts_{nom}	325	°C
	Minimum flue draught at nominal heat output***	p_{nom}	12	Pa
	Flue gas mass flow at nominal heat output	$\Phi_{f,g\ nom}$	11	g/s

4-DIMENSIONS AND TECHNICAL FEATURES

Partial load performances	Partial load heat input	$Pinput_{part}$	7,4	kW
	Partial load heat output	P_{part}	6	kW
	Fuel consumption at partial load heat output	kg/h_{part}	1,7	kg/h
	Efficiency at part load heat output	η_{part}	81,3	%
	CO2 at partial load heat output	$CO2_{part}$	8,4	%
	CO (%) at 13% O2 at partial load heat output	$CO\%_{part}$ (13% O_2)	0,116	% (13% O_2)
	CO at 13% O2 at partial load heat output	CO_{part} (13% O_2)	1444	mg/m3 (13% O_2)
	NOx at 13% O2 at part load heat output	NOx_{part} (13% O_2)	103	mg/m3 (13% O_2)
	OGC at 13% O2 at part load heat output	OGC_{part} (13% O_2)	56	mg/m3 (13% O_2)
	PM at 13 % O2 at part load heat output	PM_{part} (13% O_2)	NPD	mg/m3 (13% O_2)
	Flue gas outlet temperature at part load heat output**	T_{spart}	277	°C
	Minimum flue draught at partial load heat output***	p_{part}	10	Pa
	Flue gas mass flow at part load heat output	$\Phi_{f,g\ nom}$	5,7	g/s
Installation	Ventilation air intake section (cm2)		180	cm^2
	Combustion air inlet diameter (mm)		150	mm
	Diameter of the flue gas outlet	d_{out}	200	mm
	Chimney designation	T_{class}	T400G	
	Air heating outlet diameter		100/150	mm
	Heatable volume (with respective requirement of 20/35/55 W/m3)		625 / 357 / 227	m^3
	Minimum distance to combustible materials (rear)	d_R	160	mm
	Minimum distance to combustible materials (side)	d_S	260	mm
	Minimum distance to combustible materials (bottom)	d_B	220	mm
	Minimum distance to combustible materials (ceiling)	d_C	800	mm
	Minimum distance to non-combustible walls	d_{non}	100	mm
	Added protective insulation	s	60 mm (dR-dS)	mm
	Thermal conductivity additional insulation	λ_d	< 0,05	W/mK
	Minimum distance to combustible materials (radiant front)	d_P	1800	mm
	Minimum distance to combustible materials (radiant bottom)	d_F	1200	mm
	Minimum distance to combustible materials (radiant side)	d_L	500	mm

4-DIMENSIONS AND TECHNICAL FEATURES

Dimensions	Height/Width/Depth of the appliance	H/W/L	1562 / 846 / 538	mm
	Mass of the appliance	m	312	kg
	Maximum load of a chimney over the appliance	m_{chim}	-	kg
	Standing air loss	V_h	N.A.	m^3/h
	* Values that can vary due to the used combustible			
	** Flue gas temperature at the appliance outlet, to be used in the chimney sizing calculation (according to EN 13384-1)			

4-DIMENSIONS AND TECHNICAL FEATURES

	PLASMA 85 WOOD			
General data	Brand		MCZ	
	Model		PLASMA 85 WOOD	
	EU Standard		EN 16510-1:2022 / EN 16510-2-2:2022 (ex-EN 13229)	
	Appliance Type (tightness)	Type	BE	
	Continuous (CON) or intermittent (INT) operation	CON / INT	INT	
	Fuel type		Wood logs (l)	
	Fuel dimensions		L 250 ÷ 330mm	
	Energy class (scale A++/G)		A	
	Energy efficiency index	EEI	106	
	Seasonal space heating efficiency	ηS	70	
Nominal performances	Nominal heat input	$Pinput_{nom}$	16,6	kW
	Nominal heat output	P_{nom}	13,3	kW
	Fuel consumption at nominal heat output	kg/h_{nom}	3,9	kg/h
	Cycle load at nominal heat output	Aut_{nom}	2,7	kg
	Cycle duration at nominal heat output	η_{nom}	41	min
	Efficiency at nominal heat output	η_{nom}	80,1	%
	CO2 at nominal heat output	$CO2_{nom}$	9,5	%
	CO (%) at 13% O2 at nominal heat output	$CO\%_{nom}$ (13% O_2)	0,1	% (13% O_2)
	CO at 13% O2 at nominal heat output	CO_{nom} (13% O_2)	1250	mg/m3 (13% O_2)
	NOx at 13% O2 at nominal heat output	NOx_{nom} (13% O_2)	130	mg/m3 (13% O_2)
	OGC at 13% O2 at nominal heat output	OGC_{nom} (13% O_2)	69	mg/m3 (13% O_2)
	PM at 13% O2 at nominal heat output	PM_{nom} (13% O_2)	29	mg/m3 (13% O_2)
	Flue gas outlet temperature at nominal heat output**	Ts_{nom}	325	°C
	Minimum flue draught at nominal heat output***	p_{nom}	12	Pa
	Flue gas mass flow at nominal heat output	$\Phi_{f.g\ nom}$	11,9	g/s

4-DIMENSIONS AND TECHNICAL FEATURES

Partial load performances	Partial load heat input	$Pinput_{part}$	8	kW
	Partial load heat output	P_{part}	6,4	kW
	Fuel consumption at partial load heat output	kg/h_{part}	1,9	kg/h
	Efficiency at part load heat output	η_{part}	80	%
	CO2 at partial load heat output	$CO2_{part}$	7,9	%
	CO (%) at 13% O2 at partial load heat output	$CO\%_{part}$ (13% O_2)	0,121	% (13% O_2)
	CO at 13% O2 at partial load heat output	CO_{part} (13% O_2)	1513	mg/m3 (13% O_2)
	NOx at 13% O2 at part load heat output	NOx_{part} (13% O_2)	103	mg/m3 (13% O_2)
	OGC at 13% O2 at part load heat output	OGC_{part} (13% O_2)	56	mg/m3 (13% O_2)
	PM at 13 % O2 at part load heat output	PM_{part} (13% O_2)	NPD	mg/m3 (13% O_2)
	Flue gas outlet temperature at part load heat output**	T_{spart}	277	°C
	Minimum flue draught at partial load heat output***	p_{part}	10	Pa
	Flue gas mass flow at part load heat output	$\Phi_{f,g\ nom}$	5,7	g/s
Installation	Ventilation air intake section (cm2)		180	cm^2
	Combustion air inlet diameter (mm)		150	mm
	Diameter of the flue gas outlet	d_{out}	200	mm
	Chimney designation	T_{class}	T400G	
	Air heating outlet diameter		100/150	mm
	Heatable volume (with respective requirement of 20/35/55 W/m3)		665 / 380 / 242	m^3
	Minimum distance to combustible materials (rear)	d_R	160	mm
	Minimum distance to combustible materials (side)	d_S	260	mm
	Minimum distance to combustible materials (bottom)	d_B	220	mm
	Minimum distance to combustible materials (ceiling)	d_C	800	mm
	Minimum distance to non-combustible walls	d_{non}	100	mm
	Added protective insulation	s	60 mm (dR-dS)	mm
	Thermal conductivity additional insulation	λ_d	< 0,05	W/mK
	Minimum distance to combustible materials (radiant front)	d_P	2000	mm
	Minimum distance to combustible materials (radiant bottom)	d_F	1400	mm
	Minimum distance to combustible materials (radiant side)	d_L	500	mm

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4-DIMENSIONS AND TECHNICAL FEATURES

Dimensions	Height/Width/Depth of the appliance	H/W/L	1562 / 956 / 538	mm
	Mass of the appliance	m	328	kg
	Maximum load of a chimney over the appliance	m_{chim}	-	kg
	Standing air loss	V_h	N.A.	m^3/h
	* Values that can vary due to the used combustible			
	** Flue gas temperature at the appliance outlet, to be used in the chimney sizing calculation (according to EN 13384-1)			

4-DIMENSIONS AND TECHNICAL FEATURES

	PLASMA 95 WOOD			
General data	Brand		MCZ	
	Model		PLASMA 95 WOOD	
	EU Standard		EN 16510-1:2022 / EN 16510-2-2:2022 (ex-EN 13229)	
	Appliance Type (tightness)	Type	BE	
	Continuous (CON) or intermittent (INT) operation	CON / INT	INT	
	Fuel type		Wood logs (l)	
	Fuel dimensions		L 250 ÷ 330mm	
	Energy class (scale A++/G)		A	
	Energy efficiency index	EEI	106	
	Seasonal space heating efficiency	ηS	70	
Nominal performances	Nominal heat input	$Pinput_{nom}$	16,6	kW
	Nominal heat output	P_{nom}	13,3	kW
	Fuel consumption at nominal heat output	kg/h_{nom}	3,9	kg/h
	Cycle load at nominal heat output	Aut_{nom}	2,7	kg
	Cycle duration at nominal heat output	η_{nom}	41	min
	Efficiency at nominal heat output	η_{nom}	80,1	%
	CO2 at nominal heat output	$CO2_{nom}$	9,5	%
	CO (%) at 13% O2 at nominal heat output	$CO\%_{nom}$ (13% O_2)	0,1	% (13% O_2)
	CO at 13% O2 at nominal heat output	CO_{nom} (13% O_2)	1250	mg/m3 (13% O_2)
	NOx at 13% O2 at nominal heat output	NOx_{nom} (13% O_2)	130	mg/m3 (13% O_2)
	OGC at 13% O2 at nominal heat output	OGC_{nom} (13% O_2)	69	mg/m3 (13% O_2)
	PM at 13% O2 at nominal heat output	PM_{nom} (13% O_2)	29	mg/m3 (13% O_2)
	Flue gas outlet temperature at nominal heat output**	Ts_{nom}	325	°C
	Minimum flue draught at nominal heat output***	p_{nom}	12	Pa
	Flue gas mass flow at nominal heat output	$\Phi_{f,g\ nom}$	11,9	g/s

4-DIMENSIONS AND TECHNICAL FEATURES

Partial load performances	Partial load heat input	$Pinput_{part}$	8	kW
	Partial load heat output	P_{part}	6,4	kW
	Fuel consumption at partial load heat output	kg/h_{part}	1,9	kg/h
	Efficiency at part load heat output	η_{part}	80	%
	CO2 at partial load heat output	$CO2_{part}$	7,9	%
	CO (%) at 13% O2 at partial load heat output	$CO\%_{part}$ (13% O_2)	0,121	% (13% O_2)
	CO at 13% O2 at partial load heat output	CO_{part} (13% O_2)	1513	mg/m3 (13% O_2)
	NOx at 13% O2 at part load heat output	NOx_{part} (13% O_2)	103	mg/m3 (13% O_2)
	OGC at 13% O2 at part load heat output	OGC_{part} (13% O_2)	56	mg/m3 (13% O_2)
	PM at 13 % O2 at part load heat output	PM_{part} (13% O_2)	NPD	mg/m3 (13% O_2)
	Flue gas outlet temperature at part load heat output**	T_{spart}	212	°C
	Minimum flue draught at partial load heat output***	p_{part}	10	Pa
	Flue gas mass flow at part load heat output	$\Phi_{f,g\ nom}$	5,7	g/s
Installation	Ventilation air intake section (cm2)		180	cm^2
	Combustion air inlet diameter (mm)		150	mm
	Diameter of the flue gas outlet	d_{out}	200	mm
	Chimney designation	T_{class}	T400G	
	Air heating outlet diameter		100/150	mm
	Heatable volume (with respective requirement of 20/35/55 W/m3)		665 / 380 / 242	m^3
	Minimum distance to combustible materials (rear)	d_R	160	mm
	Minimum distance to combustible materials (side)	d_S	260	mm
	Minimum distance to combustible materials (bottom)	d_B	220	mm
	Minimum distance to combustible materials (ceiling)	d_C	800	mm
	Minimum distance to non-combustible walls	d_{non}	100	mm
	Added protective insulation	s	60 mm (dR-dS)	mm
	Thermal conductivity additional insulation	λ_d	< 0,05	W/mK
	Minimum distance to combustible materials (radiant front)	d_P	2000	mm
	Minimum distance to combustible materials (radiant bottom)	d_F	1400	mm
	Minimum distance to combustible materials (radiant side)	d_L	500	mm

4-DIMENSIONS AND TECHNICAL FEATURES

Dimensions	Height/Width/Depth of the appliance	H/W/L	1416 / 1056 / 538	mm
	Mass of the appliance	m	344	kg
	Maximum load of a chimney over the appliance	m_{chim}	-	kg
	Standing air loss	V_h	N.A.	m^3/h
	* Values that can vary due to the used combustible			
	** Flue gas temperature at the appliance outlet, to be used in the chimney sizing calculation (according to EN 13384-1)			

4-DIMENSIONS AND TECHNICAL FEATURES

	PLASMA 115 WOOD			
General data	Brand		MCZ	
	Model		PLASMA 115 WOOD	
	EU Standard		EN 16510-1:2022 / EN 16510-2-2:2022 (ex-EN 13229)	
	Appliance Type (tightness)	Type	BE	
	Continuous (CON) or intermittent (INT) operation	CON / INT	INT	
	Fuel type		Wood logs (l)	
	Fuel dimensions		L 250 ÷ 330mm	
	Energy class (scale A++/G)		A	
	Energy efficiency index	EEI	106	
	Seasonal space heating efficiency	ηS	70	
Nominal performances	Nominal heat input	$Pinput_{nom}$	17,6	kW
	Nominal heat output	P_{nom}	14,1	kW
	Fuel consumption at nominal heat output	kg/h_{nom}	4,1	kg/h
	Cycle load at nominal heat output	Aut_{nom}	2,8	kg
	Cycle duration at nominal heat output	η_{nom}	41	min
	Efficiency at nominal heat output	η_{nom}	80,1	%
	CO2 at nominal heat output	$CO2_{nom}$	9,5	%
	CO (%) at 13% O2 at nominal heat output	$CO\%_{nom}$ (13% O_2)	0,1	% (13% O_2)
	CO at 13% O2 at nominal heat output	CO_{nom} (13% O_2)	1250	mg/m3 (13% O_2)
	NOx at 13% O2 at nominal heat output	NOx_{nom} (13% O_2)	130	mg/m3 (13% O_2)
	OGC at 13% O2 at nominal heat output	OGC_{nom} (13% O_2)	69	mg/m3 (13% O_2)
	PM at 13% O2 at nominal heat output	PM_{nom} (13% O_2)	29	mg/m3 (13% O_2)
	Flue gas outlet temperature at nominal heat output**	Ts_{nom}	324	°C
	Minimum flue draught at nominal heat output***	p_{nom}	12	Pa
	Flue gas mass flow at nominal heat output	$\Phi_{f,g\ nom}$	11,9	g/s

4-DIMENSIONS AND TECHNICAL FEATURES

Partial load performances	Partial load heat input	$Pinput_{part}$	8,5	kW
	Partial load heat output	P_{part}	6,8	kW
	Fuel consumption at partial load heat output	kg/h_{part}	2	kg/h
	Efficiency at part load heat output	η_{part}	80	%
	CO2 at partial load heat output	$CO2_{part}$	7,4	%
	CO (%) at 13% O2 at partial load heat output	$CO\%_{part}$ (13% O_2)	0,121	% (13% O_2)
	CO at 13% O2 at partial load heat output	CO_{part} (13% O_2)	1513	mg/m3 (13% O_2)
	NOx at 13% O2 at part load heat output	NOx_{part} (13% O_2)	88	mg/m3 (13% O_2)
	OGC at 13% O2 at part load heat output	OGC_{part} (13% O_2)	46	mg/m3 (13% O_2)
	PM at 13 % O2 at part load heat output	PM_{part} (13% O_2)	NPD	mg/m3 (13% O_2)
	Flue gas outlet temperature at part load heat output**	T_{spart}	268	°C
	Minimum flue draught at partial load heat output***	p_{part}	10	Pa
	Flue gas mass flow at part load heat output	$\Phi_{f,g\ nom}$	7,5	g/s
Installation	Ventilation air intake section (cm2)		180	cm^2
	Combustion air inlet diameter (mm)		150	mm
	Diameter of the flue gas outlet	d_{out}	200	mm
	Chimney designation	T_{class}	T400G	
	Air heating outlet diameter		100/150	mm
	Heatable volume (with respective requirement of 20/35/55 W/m3)		705 / 403 / 256	m^3
	Minimum distance to combustible materials (rear)	d_R	160	mm
	Minimum distance to combustible materials (side)	d_S	160	mm
	Minimum distance to combustible materials (bottom)	d_B	220	mm
	Minimum distance to combustible materials (ceiling)	d_C	800	mm
	Minimum distance to non-combustible walls	d_{non}	100	mm
	Added protective insulation	s	60 mm (dR-dS)	mm
	Thermal conductivity additional insulation	λ_d	< 0,05	W/mK
	Minimum distance to combustible materials (radiant front)	d_P	2000	mm
	Minimum distance to combustible materials (radiant bottom)	d_F	1400	mm
	Minimum distance to combustible materials (radiant side)	d_L	500	mm

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4-DIMENSIONS AND TECHNICAL FEATURES

Dimensions	Height/Width/Depth of the appliance	H/W/L	1416 / 1276 / 538	mm
	Mass of the appliance	m	384	kg
	Maximum load of a chimney over the appliance	m_{chim}	-	kg
	Standing air loss	V_h	N.A.	m^3/h
	* Values that can vary due to the used combustible			
	** Flue gas temperature at the appliance outlet, to be used in the chimney sizing calculation (according to EN 13384-1)			

4-DIMENSIONS AND TECHNICAL FEATURES

	PLASMA 115B WOOD			
General data	Brand		MCZ	
	Model		PLASMA 115B WOOD	
	EU Standard		EN 16510-1:2022 / EN 16510-2-2:2022 (ex-EN 13229)	
	Appliance Type (tightness)	Type	BE	
	Continuous (CON) or intermittent (INT) operation	CON / INT	INT	
	Fuel type		Wood logs (l)	
	Fuel dimensions		L 250 ÷ 330mm	
	Energy class (scale A++/G)		A	
	Energy efficiency index	EEI	103	
	Seasonal space heating efficiency	ηS	68	
Nominal performances	Nominal heat input	$Pinput_{nom}$	16,2	kW
	Nominal heat output	P_{nom}	12,6	kW
	Fuel consumption at nominal heat output	kg/h_{nom}	3,8	kg/h
	Cycle load at nominal heat output	Aut_{nom}	2,5	kg
	Cycle duration at nominal heat output	η_{nom}	40	min
	Efficiency at nominal heat output	η_{nom}	77,6	%
	CO2 at nominal heat output	$CO2_{nom}$	8,6	%
	CO (%) at 13% O2 at nominal heat output	$CO\%_{nom}$ (13% O_2)	0,1	% (13% O_2)
	CO at 13% O2 at nominal heat output	CO_{nom} (13% O_2)	1228	mg/m3 (13% O_2)
	NOx at 13% O2 at nominal heat output	NOx_{nom} (13% O_2)	132	mg/m3 (13% O_2)
	OGC at 13% O2 at nominal heat output	OGC_{nom} (13% O_2)	46	mg/m3 (13% O_2)
	PM at 13% O2 at nominal heat output	PM_{nom} (13% O_2)	30	mg/m3 (13% O_2)
	Flue gas outlet temperature at nominal heat output**	Ts_{nom}	326	°C
	Minimum flue draught at nominal heat output***	p_{nom}	-	Pa
	Flue gas mass flow at nominal heat output	$\Phi_{f.g\ nom}$	12,1	g/s

4-DIMENSIONS AND TECHNICAL FEATURES

Installation	Ventilation air intake section (cm2)		180	cm^2
	Combustion air inlet diameter (mm)		150	mm
	Diameter of the flue gas outlet	d_{out}	200	mm
	Chimney designation	T_{class}	T400G	
	Air heating outlet diameter		100/150	mm
	Heatable volume (with respective requirement of 20/35/55 W/m3)		630 / 360 / 229	m^3
	Minimum distance to combustible materials (rear)	d_R	1900	mm
	Minimum distance to combustible materials (side)	d_S	160	mm
	Minimum distance to combustible materials (bottom)	d_B	220	mm
	Minimum distance to combustible materials (ceiling)	d_C	800	mm
	Minimum distance to non-combustible walls	d_{non}	100	mm
	Added protective insulation	s	60 mm (dS)	mm
	Thermal conductivity additional insulation	λ_d	< 0,05	W/mK
	Minimum distance to combustible materials (radiant front)	d_P	1900	mm
	Minimum distance to combustible materials (radiant bottom)	d_F	1500	mm
	Minimum distance to combustible materials (radiant side)	d_L	1300	mm
Dimensions	Height/Width/Depth of the appliance	H/W/L	1416 / 1276 / 589	mm
	Mass of the appliance	m	334	kg
	Maximum load of a chimney over the appliance	m_{chim}	-	kg
	Standing air loss	V_h	N.A.	m^3/h
	* Values that can vary due to the used combustible			
	** Flue gas temperature at the appliance outlet, to be used in the chimney sizing calculation (according to EN 13384-1)			

4-DIMENSIONS AND TECHNICAL FEATURES

	PLASMA B95 WOOD			
General data	Brand		MCZ	
	Model		PLASMA B95 WOOD	
	EU Standard		EN 16510-1:2022 / EN 16510-2-2:2022 (ex-EN 13229)	
	Appliance Type (tightness)	Type	BE	
	Continuous (CON) or intermittent (INT) operation	CON / INT	INT	
	Fuel type		Wood logs (l)	
	Fuel dimensions		L 250 ÷ 330mm	
	Energy class (scale A++/G)		A	
	Energy efficiency index	EEI	102	
	Seasonal space heating efficiency	ηS	67	
Nominal performances	Nominal heat input	$Pinput_{nom}$	24,1	kW
	Nominal heat output	P_{nom}	18,6	kW
	Fuel consumption at nominal heat output	kg/h_{nom}	5,3	kg/h
	Cycle load at nominal heat output	Aut_{nom}	3,7	kg
	Cycle duration at nominal heat output	η_{nom}	42	min
	Efficiency at nominal heat output	η_{nom}	77,2	%
	CO2 at nominal heat output	$CO2_{nom}$	9,9	%
	CO (%) at 13% O2 at nominal heat output	$CO\%_{nom}$ (13% O_2)	0,095	% (13% O_2)
	CO at 13% O2 at nominal heat output	CO_{nom} (13% O_2)	1185	mg/m3 (13% O_2)
	NOx at 13% O2 at nominal heat output	NOx_{nom} (13% O_2)	109	mg/m3 (13% O_2)
	OGC at 13% O2 at nominal heat output	OGC_{nom} (13% O_2)	35	mg/m3 (13% O_2)
	PM at 13% O2 at nominal heat output	PM_{nom} (13% O_2)	12	mg/m3 (13% O_2)
	Flue gas outlet temperature at nominal heat output**	Ts_{nom}	364	°C
	Minimum flue draught at nominal heat output***	p_{nom}	-	Pa
	Flue gas mass flow at nominal heat output	$\Phi_{f.g\ nom}$	16	g/s

4-DIMENSIONS AND TECHNICAL FEATURES

Installation	Ventilation air intake section (cm2)		180	cm^2
	Combustion air inlet diameter (mm)		150	mm
	Diameter of the flue gas outlet	d_{out}	200	mm
	Chimney designation	T_{class}	T400G	
	Air heating outlet diameter		100/150	mm
	Heatable volume (with respective requirement of 20/35/55 W/m3)		930 / 531 / 338	m^3
	Minimum distance to combustible materials (rear)	d_R	1200	mm
	Minimum distance to combustible materials (side)	d_S	160	mm
	Minimum distance to combustible materials (bottom)	d_B	220	mm
	Minimum distance to combustible materials (ceiling)	d_C	800	mm
	Minimum distance to non-combustible walls	d_{non}	100	mm
	Added protective insulation	s	60 mm (dS)	mm
	Thermal conductivity additional insulation	λ_d	< 0,05	W/mK
	Minimum distance to combustible materials (radiant front)	d_P	1200	mm
	Minimum distance to combustible materials (radiant bottom)	d_F	700	mm
	Minimum distance to combustible materials (radiant side)	d_L	800	mm
Dimensions	Height/Width/Depth of the appliance	H/W/L	1416 / 1056 / 589	mm
	Mass of the appliance	m	298	kg
	Maximum load of a chimney over the appliance	m_{chim}	-	kg
	Standing air loss	V_h	N.A.	m^3/h
	* Values that can vary due to the used combustible			
	** Flue gas temperature at the appliance outlet, to be used in the chimney sizing calculation (according to EN 13384-1)			

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INFORMATION REQUIREMENTS FOR SOLID FUEL LOCAL SPACE HEATERS
ACCORDING TO COMMISSION REGULATIONS (EU) 2015/1185 - (EU) 2015/1186 (PRODUCT FICHE)

Manufacturer:	**MCZ GROUP SpA**
Trademak:	**MCZ**
Model Identifier:	**PLASMA 75 WOOD**

Indirect heating functionality:	**NO**
Direct heat output (space heat output):	**12,5 kW**
Indirect heat output (water heat output):	**kW**
CPR harmonised standard:	**EN 16510-1:2022 / EN 16510-2-2:2022 (ex-EN 13229)**
Product description:	**Manually fed closed inset appliance burning wood logs**
Notified Body:	**ACTECO SRL (N.B. 1880)** **Via Amman 41, 33084 Cordenons (PN), IT**

Fuel	**Preferred fuel:**	**Other suitable fuel(s):**	**ηs [%]**	**EEI [%]**
Log wood, moisture content ≤ 25 %	**YES**	**NO**	**70,0**	**106**
Compressed wood with moisture content < 12 %	**NO**	**NO**		
Other woody biomass	**NO**	**NO**		

Observe the specific precautions for installation, assembly and maintenance indicated in the manual accompanying the product, and the national and local rules in force

Energy Efficiency Class **A** (A++ / G scale)

Characteristics when operating with the preferred fuel:

Space heating emissions (mg/Nm3 at 13% O2)	**CO**	**NO_x**	**OGC**	**PM**
at Nominal heat output	**1250**	**130**	**69**	**29**
at Minimum heat output	**1444**	**103**	**56**	**NPD**

Heat output			
Item	Symbol	Value	Unit
Nominal heat output	P_{nom}	**12,5**	kW
Minimum heat output (indicative)	P_{min}	**6,0**	kW
Useful efficiency (NCV as received)			
Useful efficiency at nominal heat output	$\eta_{th,nom}$	**80,3**	%
Useful efficiency at minimum heat output (indicative)	$\eta_{th,min}$	**81,3**	%
Auxiliary electricity consumption			
At nominal heat output	el_{max}		kW
At minimum heat output	el_{min}		kW
In standby mode	el_{sb}		kW

Type of heat output/room temperature control (select one)	
single stage heat output, no room temperature control	NO
two or more manual stages, no room temperature control	YES
with mechanic thermostat room temperature control	NO
with electronic room temperature control	NO
with electronic room temperature control plus day timer	NO
with electronic room temperature control plus week timer	NO
Other control options (multiple selections possible)	
room temperature control, with presence detection	NO
room temperature control, with open window detection	NO
with distance control option	NO

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INFORMATION REQUIREMENTS FOR SOLID FUEL LOCAL SPACE HEATERS
ACCORDING TO COMMISSION REGULATIONS (EU) 2015/1185 - (EU) 2015/1186 (PRODUCT FICHE)

Manufacturer:	**MCZ GROUP SpA**
Trademak:	**MCZ**
Model Identifier:	**PLASMA 85 WOOD**

Indirect heating functionality:	**NO**	
Direct heat output (space heat output):	**13,3**	**kW**
Indirect heat output (water heat output):		**kW**
CPR harmonised standard:	**EN 16510-1:2022 / EN 16510-2-2:2022 (ex-EN 13229)**	
Product description:	**Manually fed closed inset appliance burning wood logs**	

Notified Body: **ACTECO SRL (N.B. 1880)**
Via Amman 41, 33084 Cordenons (PN), IT

Fuel	Preferred fuel:	Other suitable fuel(s):	ηs [%]	EEI [%]
Log wood, moisture content ≤ 25 %	**YES**	**NO**	**70,0**	**106**
Compressed wood with moisture content < 12 %	**NO**	**NO**		
Other woody biomass	**NO**	**NO**		

Observe the specific precautions for installation, assembly and maintenance indicated in the manual accompanying the product, and the national and local rules in force

Energy Efficiency Class **A** (A++ / G scale)

Characteristics when operating with the preferred fuel:

Space heating emissions (mg/Nm3 at 13% O2)	CO	NO_x	OGC	PM
at Nominal heat output	**1250**	**130**	**69**	**29**
at Minimum heat output	**1513**	**103**	**56**	**NPD**

Heat output			
Item	Symbol	Value	Unit
Nominal heat output	P_{nom}	**13,3**	kW
Minimum heat output (indicative)	P_{min}	**6,4**	kW
Useful efficiency (NCV as received)			
Useful efficiency at nominal heat output	$\eta_{th,nom}$	**80,1**	%
Useful efficiency at minimum heat output (indicative)	$\eta_{th,min}$	**80,0**	%
Auxiliary electricity consumption			
At nominal heat output	el_{max}		kW
At minimum heat output	el_{min}		kW
In standby mode	el_{sb}		kW

Type of heat output/room temperature control (select one)	
single stage heat output, no room temperature control	NO
two or more manual stages, no room temperature control	YES
with mechanic thermostat room temperature control	NO
with electronic room temperature control	NO
with electronic room temperature control plus day timer	NO
with electronic room temperature control plus week timer	NO
Other control options (multiple selections possible)	
room temperature control, with presence detection	NO
room temperature control, with open window detection	NO
with distance control option	NO

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INFORMATION REQUIREMENTS FOR SOLID FUEL LOCAL SPACE HEATERS
ACCORDING TO COMMISSION REGULATIONS (EU) 2015/1185 - (EU) 2015/1186 (PRODUCT FICHE)

Manufacturer:	**MCZ GROUP SpA**
Trademak:	**MCZ**
Model Identifier:	**PLASMA 95 WOOD**
Indirect heating functionality:	**NO**
Direct heat output (space heat output):	**13,3 kW**
Indirect heat output (water heat output):	**kW**
CPR harmonised standard:	**EN 16510-1:2022 / EN 16510-2-2:2022 (ex-EN 13229)**
Product description:	**Manually fed closed inset appliance burning wood logs**
Notified Body:	**ACTECO SRL (N.B. 1880)** **Via Amman 41, 33084 Cordenons (PN), IT**

Fuel	Preferred fuel:	Other suitable fuel(s):	ηs [%]	EEI [%]
Log wood, moisture content ≤ 25 %	YES	NO	70,0	106
Compressed wood with moisture content < 12 %	NO	NO		
Other woody biomass	NO	NO		

Observe the specific precautions for installation, assembly and maintenance indicated in the manual accompanying the product, and the national and local rules in force

Energy Efficiency Class **A** (A++ / G scale)

Characteristics when operating with the preferred fuel:

Space heating emissions (mg/Nm3 at 13% O2)	CO	NO_x	OGC	PM
at Nominal heat output	1250	130	69	29
at Minimum heat output	1513	103	56	NPD

Heat output			
Item	Symbol	Value	Unit
Nominal heat output	P_{nom}	**13,3**	kW
Minimum heat output (indicative)	P_{min}	**6,4**	kW
Useful efficiency (NCV as received)			
Useful efficiency at nominal heat output	$\eta_{th,nom}$	**80,1**	%
Useful efficiency at minimum heat output (indicative)	$\eta_{th,min}$	**80,0**	%
Auxiliary electricity consumption			
At nominal heat output	el_{max}		kW
At minimum heat output	el_{min}		kW
In standby mode	el_{sb}		kW

Type of heat output/room temperature control (select one)	
single stage heat output, no room temperature control	NO
two or more manual stages, no room temperature control	YES
with mechanic thermostat room temperature control	NO
with electronic room temperature control	NO
with electronic room temperature control plus day timer	NO
with electronic room temperature control plus week timer	NO
Other control options (multiple selections possible)	
room temperature control, with presence detection	NO
room temperature control, with open window detection	NO
with distance control option	NO

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INFORMATION REQUIREMENTS FOR SOLID FUEL LOCAL SPACE HEATERS
ACCORDING TO COMMISSION REGULATIONS (EU) 2015/1185 - (EU) 2015/1186 (PRODUCT FICHE)

Manufacturer:	**MCZ GROUP SpA**
Trademak:	**MCZ**
Model Identifier:	**PLASMA 115 WOOD**
Indirect heating functionality:	**NO**
Direct heat output (space heat output):	**14,1 kW**
Indirect heat output (water heat output):	**kW**
CPR harmonised standard:	**EN 16510-1:2022 / EN 16510-2-2:2022 (ex-EN 13229)**
Product description:	**Manually fed closed inset appliance burning wood logs**
Notified Body:	**ACTECO SRL (N.B. 1880)** **Via Amman 41, 33084 Cordenons (PN), IT**

Fuel	**Preferred fuel:**	**Other suitable fuel(s):**	**ηs [%]**	**EEI [%]**
Log wood, moisture content ≤ 25 %	**YES**	**NO**	**70,0**	**106**
Compressed wood with moisture content < 12 %	**NO**	**NO**		
Other woody biomass	**NO**	**NO**		

Observe the specific precautions for installation, assembly and maintenance indicated in the manual accompanying the product, and the national and local rules in force

Energy Efficiency Class **A** (A++ / G scale)

Characteristics when operating with the preferred fuel:

Space heating emissions (mg/Nm3 at 13% O2)	**CO**	**NO_x**	**OGC**	**PM**
at Nominal heat output	**1250**	**130**	**69**	**29**
at Minimum heat output	**1513**	**88**	**46**	**NPD**

Heat output			
Item	Symbol	Value	Unit
Nominal heat output	P_{nom}	**14,1**	kW
Minimum heat output (indicative)	P_{min}	**6,8**	kW
Useful efficiency (NCV as received)			
Useful efficiency at nominal heat output	$\eta_{th,nom}$	**80,1**	%
Useful efficiency at minimum heat output (indicative)	$\eta_{th,min}$	**80,0**	%
Auxiliary electricity consumption			
At nominal heat output	el_{max}		kW
At minimum heat output	el_{min}		kW
In standby mode	el_{sb}		kW

Type of heat output/room temperature control (select one)	
single stage heat output, no room temperature control	NO
two or more manual stages, no room temperature control	YES
with mechanic thermostat room temperature control	NO
with electronic room temperature control	NO
with electronic room temperature control plus day timer	NO
with electronic room temperature control plus week timer	NO
Other control options (multiple selections possible)	
room temperature control, with presence detection	NO
room temperature control, with open window detection	NO
with distance control option	NO

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INFORMATION REQUIREMENTS FOR SOLID FUEL LOCAL SPACE HEATERS
ACCORDING TO COMMISSION REGULATIONS (EU) 2015/1185 - (EU) 2015/1186 (PRODUCT FICHE)

Manufacturer:	**MCZ GROUP SpA**
Trademak:	**MCZ**
Model Identifier:	**PLASMA 115B WOOD**

Indirect heating functionality:	**NO**	
Direct heat output (space heat output):	**12,6**	**kW**
Indirect heat output (water heat output):		**kW**
CPR harmonised standard:	**EN 16510-1:2022 / EN 16510-2-2:2022 (ex-EN 13229)**	
Product description:	**Manually fed closed inset appliance burning wood logs**	

Notified Body: **ACTECO SRL (N.B. 1880)**
Via Amman 41, 33084 Cordenons (PN), IT

Fuel	**Preferred fuel:**	**Other suitable fuel(s):**	**ηs [%]**	**EEI [%]**
Log wood, moisture content ≤ 25 %	**YES**	**NO**	**68,0**	**103**
Compressed wood with moisture content < 12 %	**NO**	**NO**		
Other woody biomass	**NO**	**NO**		

Observe the specific precautions for installation, assembly and maintenance indicated in the manual accompanying the product, and the national and local rules in force

Energy Efficiency Class **A** (A++ / G scale)

Characteristics when operating with the preferred fuel:

Space heating emissions (mg/Nm3 at 13% O2)	**CO**	**NO_x**	**OGC**	**PM**
at Nominal heat output	**1228**	**132**	**46**	**30**
at Minimum heat output				

Heat output			
Item	Symbol	Value	Unit
Nominal heat output	P_{nom}	**12,6**	kW
Minimum heat output (indicative)	P_{min}		kW
Useful efficiency (NCV as received)			
Useful efficiency at nominal heat output	$\eta_{th,nom}$	**77,6**	%
Useful efficiency at minimum heat output (indicative)	$\eta_{th,min}$		%
Auxiliary electricity consumption			
At nominal heat output	el_{max}		kW
At minimum heat output	el_{min}		kW
In standby mode	el_{sb}		kW

Type of heat output/room temperature control (select one)	
single stage heat output, no room temperature control	YES
two or more manual stages, no room temperature control	NO
with mechanic thermostat room temperature control	NO
with electronic room temperature control	NO
with electronic room temperature control plus day timer	NO
with electronic room temperature control plus week timer	NO
Other control options (multiple selections possible)	
room temperature control, with presence detection	NO
room temperature control, with open window detection	NO
with distance control option	NO

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INFORMATION REQUIREMENTS FOR SOLID FUEL LOCAL SPACE HEATERS
ACCORDING TO COMMISSION REGULATIONS (EU) 2015/1185 - (EU) 2015/1186 (PRODUCT FICHE)

Manufacturer:	**MCZ GROUP SpA**
Trademak:	**MCZ**
Model Identifier:	**PLASMA B95 WOOD**

Indirect heating functionality:	**NO**	
Direct heat output (space heat output):	**18,6**	**kW**
Indirect heat output (water heat output):		**kW**
CPR harmonised standard:	**EN 16510-1:2022 / EN 16510-2-2:2022 (ex-EN 13229)**	
Product description:	**Manually fed closed inset appliance burning wood logs**	

Notified Body:	**ACTECO SRL (N.B. 1880)** **Via Amman 41, 33084 Cordenons (PN), IT**

Fuel	**Preferred fuel:**	**Other suitable fuel(s):**	**ηs [%]**	**EEI [%]**
Log wood, moisture content ≤ 25 %	**YES**	**NO**	**67,0**	**102**
Compressed wood with moisture content < 12 %	**NO**	**NO**		
Other woody biomass	**NO**	**NO**		

Observe the specific precautions for installation, assembly and maintenance indicated in the manual accompanying the product, and the national and local rules in force

Energy Efficiency Class **A** (A++ / G scale)

Characteristics when operating with the preferred fuel:

Space heating emissions (mg/Nm3 at 13% O2)	**CO**	**NO_x**	**OGC**	**PM**
at Nominal heat output	**1185**	**109**	**35**	**12**
at Minimum heat output				

Heat output			
Item	Symbol	Value	Unit
Nominal heat output	P_{nom}	**18,6**	kW
Minimum heat output (indicative)	P_{min}		kW
Useful efficiency (NCV as received)			
Useful efficiency at nominal heat output	$\eta_{th,nom}$	**77,2**	%
Useful efficiency at minimum heat output (indicative)	$\eta_{th,min}$		%
Auxiliary electricity consumption			
At nominal heat output	el_{max}		kW
At minimum heat output	el_{min}		kW
In standby mode	el_{sb}		kW

Type of heat output/room temperature control (select one)	
single stage heat output, no room temperature control	YES
two or more manual stages, no room temperature control	NO
with mechanic thermostat room temperature control	NO
with electronic room temperature control	NO
with electronic room temperature control plus day timer	NO
with electronic room temperature control plus week timer	NO
Other control options (multiple selections possible)	
room temperature control, with presence detection	NO
room temperature control, with open window detection	NO
with distance control option	NO

5-UNPACKING

INSTRUCTIONS FOR PACKAGING DISPOSAL

The material that the appliance's packaging is made of must be managed correctly, in order to make collection, reuse, recovery and recycling easier, where possible.

The table below illustrates the possible components that the packaging is made of, and the relative instructions for correct disposal.

DESCRIPTION	CODE MATERIAL	SYMBOL	DIRECTIONS FOR COLLECTION
WOOD BED	WOOD FOR 50		SORTED waste collection
WOOD CAGE			WOOD
WOOD PALLET			Check with the competent body on how to dispose of this packaging at the recycling depot
CARDBOARD BOX	CORRUGATED CARDBOARD PAP 20		SORTED waste collection
CARDBOARD CORNER			PAPER
CARDBOARD SHEET			Check the instructions of the competent body
APPLIANCE BAG	POLYETHYLENE LD-PE 04		SORTED waste collection
BAG OF ACCESSORIES			PLASTIC
BUBBLE WRAP			Check the instructions of the competent body
PROTECTIVE SHEET			
LABELS			
POLYSTYRENE	POLYSTYRENE PS 06		SORTED waste collection
FOAM PEANUTS			PLASTIC
			Check the instructions of the competent body
STRAP	POLYPROPYLENE PP 05 POLYESTER PET 01	 	SORTED waste collection
TAPE			PLASTIC
			Check the instructions of the competent body.
SCREWS	IRON FE 40		SORTED waste collection
STAPLES FOR STRAP			METAL
FASTENING BRACKET			Check with the competent body on how to dispose of this packaging at the recycling depot

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5-UNPACKING

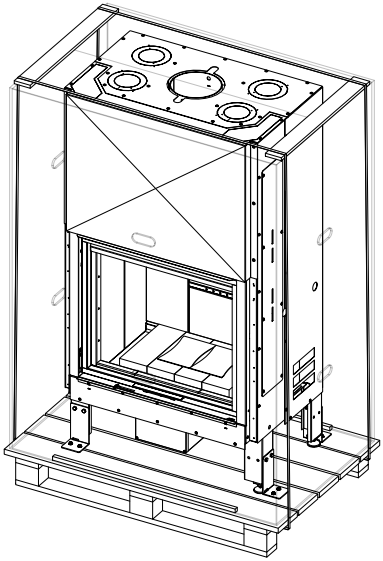
IMPORTANT!
The closed fireplace must be installed and connected to the smoke duct exclusively by a specialised technician, so that every local or national regulation is observed. Installation must nevertheless be carried out in accordance with regulation UNI 10683.

When you unwrap the closed fireplace, make sure that every part is in perfect working order or check for any damage due to transport. Any damage must be immediately reported to the carrier or dealer.
If the closed fireplace is installed in an area of difficult access, its weight can be lightened by removing the internal elements of the firebox, however it is necessary to put every element correctly back in place and have this operation carried out exclusively by specialised personnel.
The producer will not be held liable if the above warning is not observed.

PREPARATION AND UNPACKING

Open the packing, remove the closed fireplace from the pallet and place it in the selected position, ensuring it complies with the specifications.

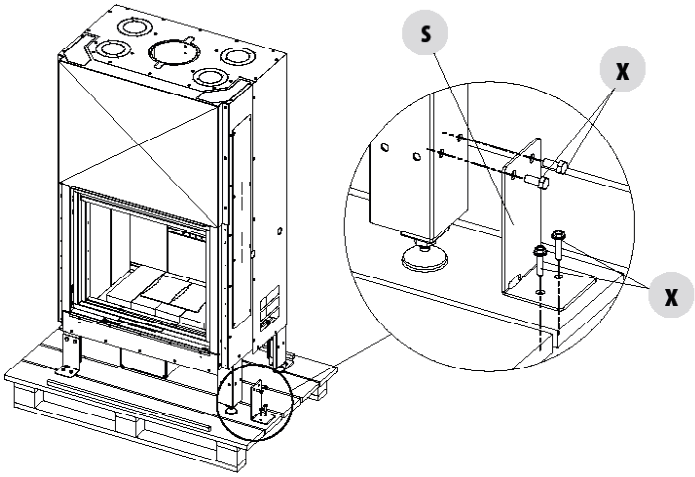
The closed fireplace must always be carried UPRIGHT and exclusively with a cart. Do not drag the unit as this could damage the supporting feet.



PACKAGING

To remove the closed fireplace from the pallet, do the following:
- Remove plate **"s"** by taking out the two screws "**x**"
- Pull plate "**s**" out from the product's foot.

There are four "s" plates that need to be removed. Pay particular attention to the door and its glass, protecting them from mechanical knocks that would compromise their integrity.
Products must always be handled with care. If possible unpack the closed fireplace near the place of installation.
The packaging materials are neither toxic nor harmful, therefore no particular disposal measures are required.
The end user is responsible for product storage, disposal or possible recycling in compliance with the relative applicable laws in force.



REMOVING THE PACKAGE BRACKETS

RELEASING THE COUNTERWEIGHTS

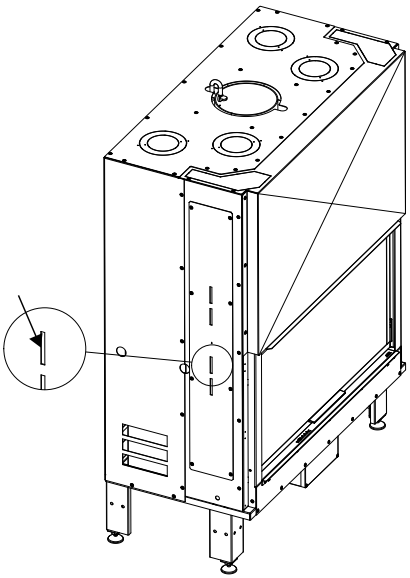
The closed fireplace is delivered with the sliding counterweights locked to avoid dangerous counterblows during transport and positioning, which could damage the parts involved in sliding as well as the door and the glass-ceramic.

To release the counterweights and therefore the door, remove the screws as shown in the figure below from both sides of the closed fireplace where the arrows stickers are positioned on both sides.

Take out the screws that clamp the counterweights only after having positioned the closed fireplace, and to make sure that the glass is intact.

DO NOT MOVE NOR SHIFT THE CLOSED FIREPLACE WITHOUT THE COUNTERWEIGHT CLAMPING SCREWS.

The customer, or whoever appointed by him/her, is liable for damage caused by the failure to observe this rule.



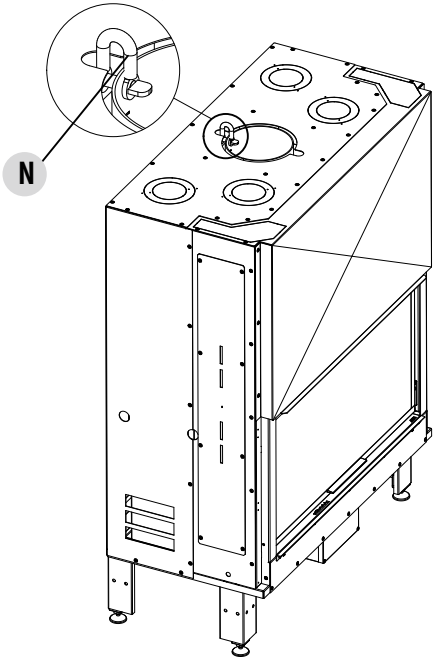
COUNTERWEIGHT LOCKING SCREWS

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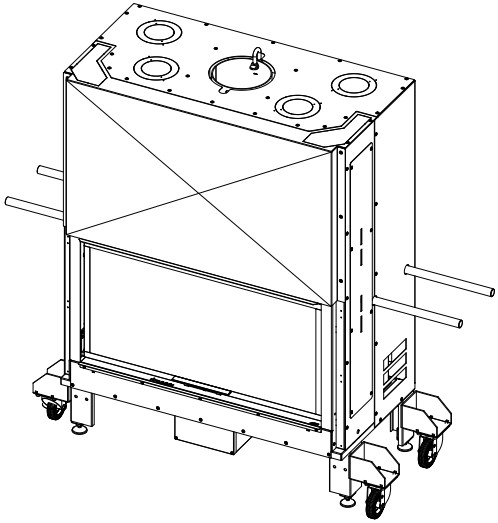
6-POSITIONING

POSITIONING

The **PLASMA** closed fireplace can be positioned in a corner or against the wall. It can be customised with the cladding of the manufacturing company or built at the time of installation with heat-resistant materials.
Closed fireplaces are freestanding monoblocks that simplify installation and do not require any integrative support. Closed fireplaces are fitted with particular anchoring points to facilitate handling (handling kit - not provided - see chapter on accessories) and a lifting hook (weight approximately 300/400 kg depending on the model).



LIFTING HOOK



HANDLING KIT (ACCESSORY)

Always assess the static conditions of the surface that the weight will travel over and always observe the minimum safety distance stated in the technical data.
Dry-assemble the hearth of the **cladding leaving a 1 cm** gap for insulation.

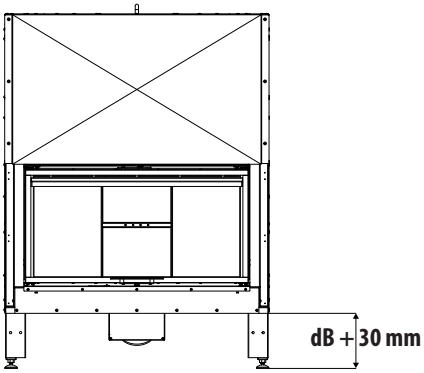
6-POSITIONING

HEIGHT ADJUSTMENT AND LEVELLING

The Plasma closed fireplace is supplied with adjustable feet which have the purpose of levelling the hearth of the closed fireplace, and have a range of about 3 cm.

Anyone wishing to raise the closed fireplace by more than 3 cm will need to create a brick pedestal to set the product on.

In any case do not remove the feet which are essential for levelling.

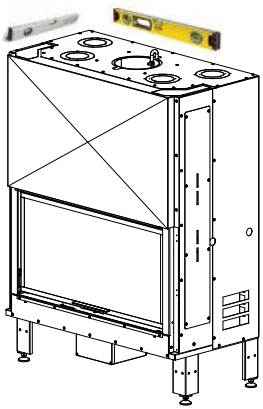


CLOSED FIREPLACE HEIGHT ADJUSTMENT

Levelling the closed fireplace is a crucial operation for the door to slide correctly.

CHECK SEVERAL TIMES THAT THE DOOR SLIDES CORRECTLY BEFORE INSTALLING THE CLADDING ON THE CLOSED FIREPLACE.

If the closed fireplace is not "levelled" you run the risk of the door not closing perfectly and that the internal counterweights hit the structure, making a noise every time the door is raised and lowered.



LEVELLING THE CLOSED FIREPLACE

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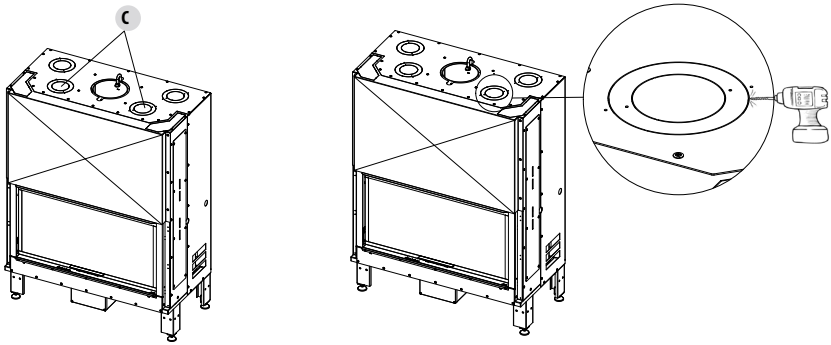
7-OPERATING MODE

OPERATING MODE SELECTION

IMPORTANT!
Before installation it is necessary to decide what system needs to be implemented.

The closed fireplace has the possibility of distributing hot air in **NATURAL CONVECTION (COMFORT AIR VN)** mode or **FORCED CONVECTION (COMFORT AIR VF)** mode through the use of a forced ventilation kit.

IMPORTANT!
With both systems the installer is required to take down the knockout holes set up above the closed fireplace to facilitate thermal exchange and air circulation.
The top knockout holes are round with Ø100 and Ø150 and at least two need to be opened and ducted ("C") for correct air diffusion.
To detach the knockout holes, use a drill with Ø4 mm bit (see image).



Natural convection (COMFORT AIR VN)
With natural ventilation, the air naturally enters the bottom of the closed fireplace.
Take off the diamond-shaped knockout hole from the back of the closed fireplace.

Forced convection (COMFORT AIR VF)
If you implement this system, purchase the Comfort Basic Air kit or the optional Comfort Air Slim kit and follow the instructions provided with each kit.

EARTHING INSTRUCTIONS
If any electrical equipment is installed, the chimney must be safely connected to an earth contact, in accordance with regulations in force.

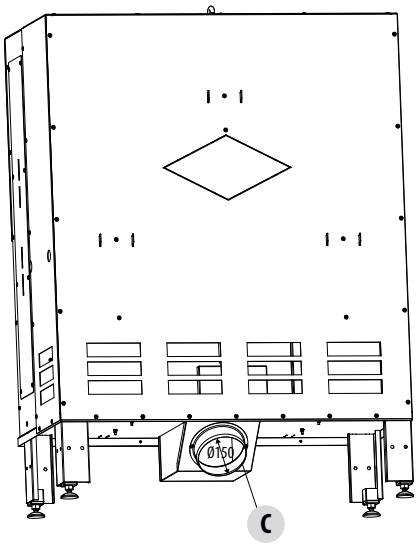
8-AIR INLETS

EXTERNAL AND INTERNAL AIR INLET

COMBUSTION AIR INLET

The closed fireplace has a hole with a diameter of 150 mm for the intake of the air required for combustion.
Use a hose to connect the air intake hole to the exterior of the cladding and connect it to a grid so that the route is separate from the natural or forced convection air.

NEVER CLOSE THE COMBUSTION AIR INTAKE HOLE.



C = COMBUSTION AIR INLET Ø150

NATURAL VENTILATION/FORCED VENTILATION AIR INLET

If the closed fireplace is installed with forced ventilation, that is by using a Comfort Air kit, the air inlets and ducting must be conducted as follows:

- to ensure correct oxygen renewal in the room, we recommend setting up a 180 cm2 external air inlet so that clean, fresh air can be drawn in and another inlet in the room where the closed fireplace is placed (again a 180 cm2 air inlet).
  This will ensure that the air inside the room where the equipment is installed is mixed properly and will guarantee better cooling for the closed fireplace's structure.
- If you cannot carry out this kind of connection, you will still need to set up the two air inlets, whether they are both from the inside or outside. Depending on the choice, you will have slightly higher or lower operating temperatures compared to average values, though they will not prevent the product from working properly.

Please bear in mind that:

- All external air inlets must have a closing damper that can be controlled from the outside, along with an insect screen.
- The air inlet section is a net value, so you need to consider the area of any other elements (netting, etc.)
- **Periodically clean the filters or netting to ensure the air can pass through**
- **Do not, for any reason, obstruct the air inlets if the closed fireplace or ventilation kit is running.**

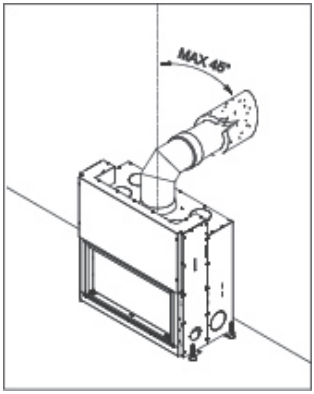
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8-AIR INLETS

CONNECTION TO THE FLUE

We recommend connecting the closed fireplace to the flue using aluminium-plated steel pipes and bends that are able to withstand the high temperatures of that section and smoke corrosion. These connections are available on request in various sizes (see our price list) and they simplify installation as they are assembled by fitting one inside the other.

FLUE CONNECTION



Any increase in the cross-section of the connection must be set up directly above the hood of the closed fireplace and not along the flue.

When installation is complete, it is compulsory to insulate the smoke fittings with ceramic fibre padding or any material that is resistant to at least 600°C.

CLADDING AND COUNTER-HOOD ASSEMBLY

READ THE "OPERATION TEST" CHAPTER BEFORE STARTING ANY CLOSED FIREPLACE CLADDING OPERATION

The closed fireplace and parts of the cladding must be fastened to each other **WITHOUT TOUCHING THE STEEL STRUCTURE** to avoid transmitting heat to the marble and/or stone and to allow for normal thermal dilation; pay attention to wood finishes like beams or shelves.

It is recommended to construct the counter-hood in fire-retardant plasterboard, 15/20 mm thick with self-supported galvanized profile frame in order not to bear on the cladding components (wooden beams or marble architraves) which do not have a load bearing structure and to be able to operate easily in the event of faults and/or future maintenance.

Dry-assemble the hearth of the **cladding leaving a 1 cm gap between closed fireplace and hearth to perform insulation.**

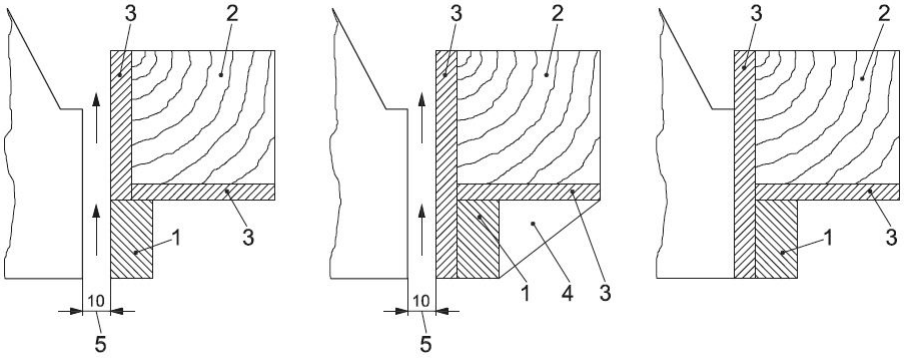
CLOSED FIREPLACE INSULATION

The closed fireplace always needs to be separate from the adjacent walls and ceiling.

If necessary, use insulating materials to insulate the walls touching the closed fireplace, if they run the risk of getting damaged or even catching fire (wood walls, plasterboard, etc...).

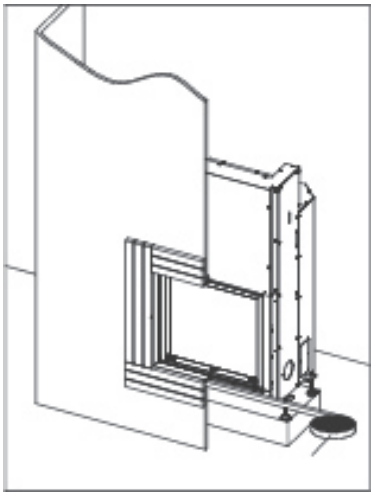
WOODEN BEAM INSULATION

The wooden beam must be protected with adequate insulation from hot parts in order to prevent the risk of fire or damage to the cladding.



THERMAL PROTECTION OF THE BEAM (CONSTRUCTION EXAMPLES)

1. *MARBLE SPANDREL, OR OTHER NON-FLAMMABLE MATERIAL*
2. *WOODEN BEAM*
3. *INSULATION TO BE APPLIED*
4. *DEFLECTOR IN NON-FLAMMABLE MATERIAL*
5. *AIR GAP (MM)*



INSULATION OF THE CLOSED FIREPLACE FROM THE WALLS AND CLADDING

8-AIR INLETS

HOOD VENTILATION OUTLETS

Both in the case of installation with natural ventilation and if using the Comfort Air kit for forced ventilation, **it is mandatory to install the manufacturer's hood ventilation vents or vents that can guarantee the same kind of operation and the same air passage section.**

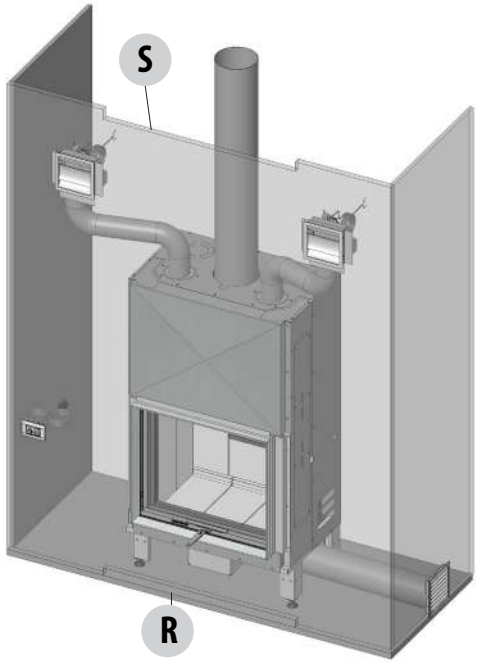
The producer is not liable for any damage to the structure or to the electric components caused by failure to comply with this warning.

For correct operation of ambient ventilation, remember that:

- Lower part "**R**" of the cladding **must have** a convective air inlet opening of no less than 400 cm^2
- Upper part "**S**" **must have** a relief outlet (in addition to the ducted outlets) of at least 520 cm^2 to release the residual heat that has accumulated inside the cladding into the room.

This practice - as well as assuring perfect operation of the product - makes it possible to recover some of the structure's heat, which would be lost if it remained inside the cladding.

For a better understanding of the amounts, dimension and function of the ventilation outlets to be installed on the cladding, we provide three examples below of installation with the relative outlets.



The images provided are purely indicative

8-AIR INLETS

NATURAL VENTILATION CONNECTION

Combustion air

The combustion air inlet "C" Ø *150* provided on the Plasma closed fireplace must be connected to the exterior of the cladding by a pipe with 150 mm diameter and a maximum length of 3 metres.

Smoke outlet

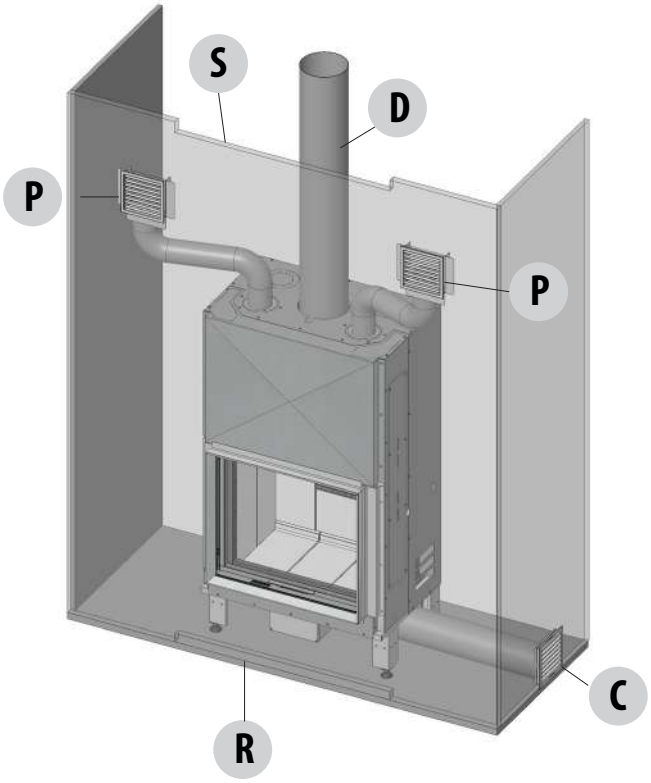
Smoke outlet "D" must be connected by a smoke fitting to a suitable flue.

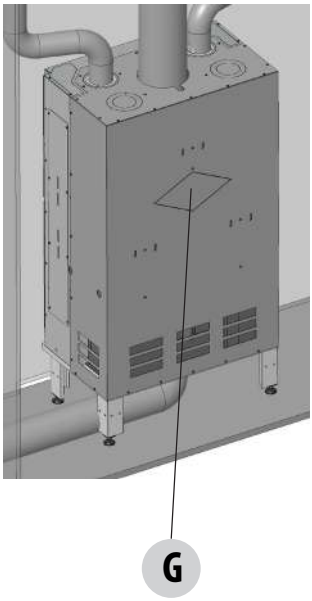
Convection air

Set up a low air intake grid "R" of at least 400 sq cm net and a high outlet "S" of at least 520 sq cm net, to decompress the hood.

Heating air

With natural ventilation open the two front knockout holes, connect at least two pipes with a diameter of 150 mm and connect them to two outlets for the release of hot air "P". Also open the rear diamond-shaped knockout hole "G".





The images provided are purely indicative

8-AIR INLETS

VENTILATION CONNECTION COMFORT AIR BASIC

Combustion air

The combustion air inlet "C" Ø *150* provided on the Plasma closed fireplace must be connected to the exterior of the cladding by a pipe with 150 mm diameter and a maximum length of 3 metres.

Smoke outlet

Smoke outlet "D" must be connected by a smoke fitting to a suitable flue.

Convection air

Set up a low air intake grid "R" of at least 400 sq cm net and a high outlet "S" of at least 520 sq cm net, to decompress the hood.

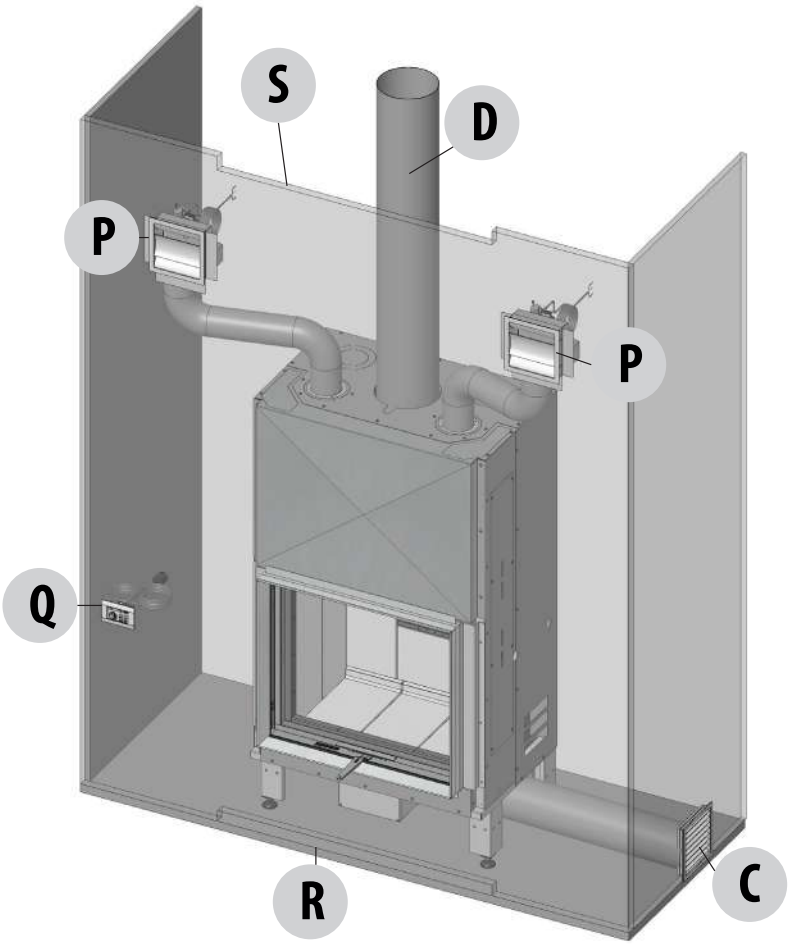
Heating air

With forced ventilation open the two front knockout holes, connect two pipes with a diameter of 100 mm and connect them to two outlets for the release of hot air "P".

Control unit

Position control unit "Q" in a cold area to avoid overheating the electronics.

The images provided are purely indicative



9-FIRST START-UP

OPERATION TEST

ATTENTION!
BEFORE CONTINUING WITH ANY CLADDING INSTALLATION OPERATION, PERFORM A GENERAL TEST ON THE PRODUCT ACCORDING TO THE FOLLOWING:

- Light the fire moderately, to ensure that the smoke fitting is tight / not leaking soot.

THE MANUFACTURER WILL NOT BE HELD LIABLE FOR DAMAGE TO THE CLADDING, IF THE ABOVE PREVENTIVE CHECKS ARE NOT CARRIED OUT AND IT ENDS UP BEING NECESSARY TO DEMOLISH THE CLADDING TO MAKE REPAIRS OR ADJUSTMENTS.

FIRST IGNITION WARNINGS

Before lighting the product, make sure you have read and understood the contents of this instruction manual.

- Remove all components that could burn from the firebox and door (instructions and various adhesive labels).
- Remove the stickers from the ceramic glass otherwise the high temperature could melt them and cause irreparable damage to the glass. If this is the case, the manufacturer will not guarantee the glass.
- Open the front combustion air grid register all the way.
- Put in wood in small pieces and thoroughly-dry (moisture of 15/20%).
- Turn the fire on at moderate rate without excessively overheating the structure.
- If necessary, leave the door slightly ajar so that the flame can start better and the moisture in the refractories evaporate. When the flame is stable, close the door all the way.
- When combustion has started up, normal sized wood can be introduced
- Each time the wood is loaded, open the door slowly to prevent smoke backflow into the room.

ONLY FOR FIRST TIME START-UP

It is important to make sure the product is not immediately overheated and the temperature must be increased gradually.

When the product is lit the first time, the refractory materials are still damp, so they may slow down the development of flame and cause abnormal fouling of the glass. Optimum combustion is only achieved after a few hours of operation at rated speed.

Avoid touching the product during the initial start-up, since the paint completes its drying process during this time and hardens. It is recommended to ventilate the room well when first lighting the product, as it is quite normal for the product to vent some smoke and have a smell of paint.

At first start-up, do not stay near the product and ventilate the room well. The smoke and smell of paint will disappear after about an hour of operation, however, they are not harmful to health in any case.

The product will be subject to expansion and contraction during the start-up and cooling stages, therefore slight creaking noises may be heard.
This is perfectly normal as the structure is made of steel and must not be considered a defect.

9-FIRST START-UP

For all tips on fuel, please refer to the dedicated section in Chapter 2.

Use only natural and well-dried wood to achieve the best functional, thermal and emissive performance of the product.

It is strictly forbidden to use fossil fuels, impregnated, painted or glued wood, sheets of particle board, plastic or colour magazines as fuel. They seriously pollute the environment and severely damage the combustion chamber and chimney.

HOW TO LIGHT THE FIREBOX

It is strictly forbidden to ignite/revive the flame using alcohol, petrol, charcoal lighter fluid or similar liquid fuels. Serious danger of burns.

In order to optimally light the product and reduce harmful emissions, we recommend the so-called 'top lighting' (first figure below). This type of ignition makes it possible to achieve:

- rapid heating of the chimney with relative activation of the draught
- a reduction in emissions that can be significant when the product is cold and generate unwanted smoke in the chimney
- gradual and prolonged combustion requiring no special supervision/corrective action until the next load
- a more controlled flame and consequently cleaner glass



Stack of wood lit from the top with dry wood
So-called 'top lighting' is the most correct and cleanest method of lighting wood.



Stack of wood lit from the bottom with dry wood
It is the most widely used method but not the recommended one due to the emissions it produces and increased soiling of the glass.



Mixed stack of wood with no lighting module. This method must be avoided.



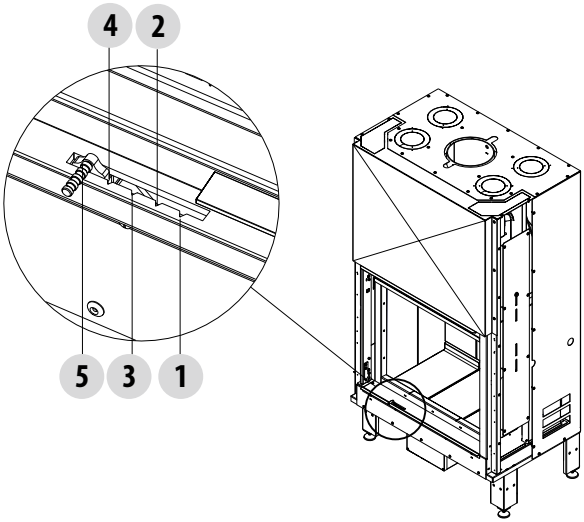
Stack of vertical logs lit from underneath. This
method must be avoided.

COMBUSTION CONTROL

The new "Easy Going" air adjustment system is based on the choice of 5 types of use of the closed firebox.

PRIMARY AIR

The primary air comes in directly through the openings between the casing and the structure of the closed fireplace. This air makes combustion possible. With the aid of the cold handle, moving the provided lever, as shown in the figure, to the right, we achieve full opening with quicker combustion, while moving it to the left will close it and combustion will be slower.



PRIMARY/SECONDARY AIR CONTROL

The lever has 5 positions:
1 - START - position for quick ignition of the flame
2 - CLEAN - position for a cleaner glass
3 - COMFORT - for a lively flame with the right compromise of primary and secondary air
4 - PERFORMANCE - for better heat exchange of the fireplace
5 - SLEEP - for slower combustion without almost any oxygen

The lever turned to the START position is designed to bring a large quantity of primary air under the hearth of the firebox, to allow rapid and effective ignition of the fire.

To achieve the best performance of the fireplace, after having started it and obtained a bed of uniform embers, set the air register in position 4 - PERFORMANCE. Load every 41 minutes with 3 x 25 cm logs with an overall weight between 2.5 and 3,7 kg depending on what model is chosen (see technical data table).



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10-EASY GOING

SECONDARY AIR

The adjustment needs to be made using the same lever as the primary air. The secondary air comes out proportionately to the primary air in a pre-calculated balance that the user can never modify, risking poor adjustments. Accordingly there will never be excessive combustion. Secondary air allows the completion of combustion and increases the efficiency. In the position to the far left (SLEEP) the amount of air in the combustion chamber, namely, where there is only a minimum amount of primary and secondary air.
This position is used to prolong combustion (for instance, at night, or when you are not at home) so that the closed fireplace is set to minimum for auto-combustion, to save on fuel and keep the flame burning.



The use of moist or treated wood releases a greater amount of smoke, which could soil the glass more quickly. The poor performance of the flue pipe can also compromise the cleanliness of the glass, considering that the smoke remains in the combustion chamber longer than usual.



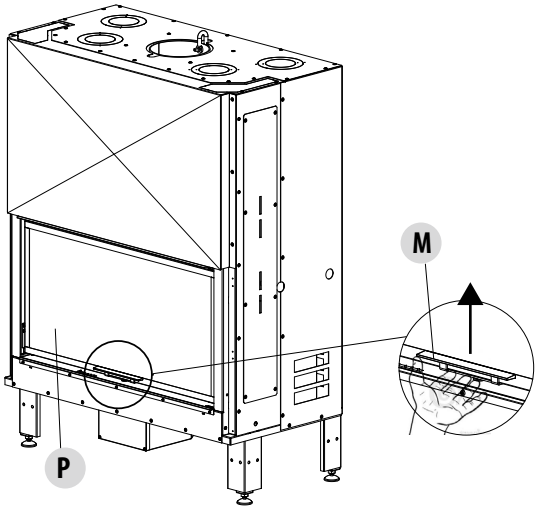
Attention! The air flow lever of the models PLASMA 95B/115B can be found only on one side by the rise and fall door with opening span of 90°.

11-EASY SWITCH

DOOR OPENING SYSTEM

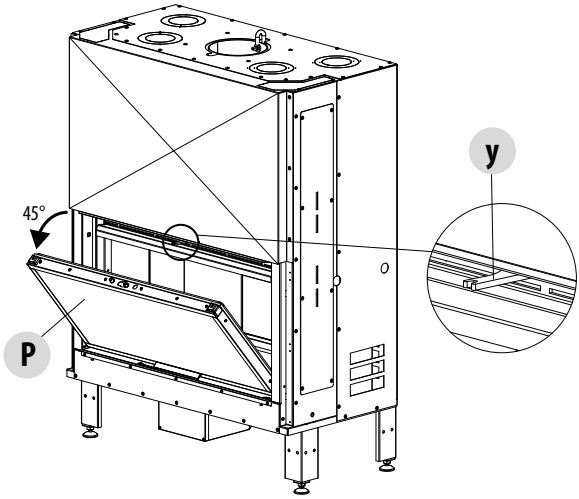
The "Easy Switch" guarantees the possibility of using either the handle or a "hands cool" element.
The door of the closed fireplace can be opened using the handle or without the handle and therefore with the cold handle.
With the handle:

- grip handle "**M**" and pull upwards.



- or (to clean the glass), with door "**P**" closed, pull the top hook "**y**" towards you and tilt the door by approximately 45°

Attention! there are retainers on the door/closed fireplace that make it impossible for the door to lower below a certain angle, otherwise the handle could damage the base of the closed fireplace.



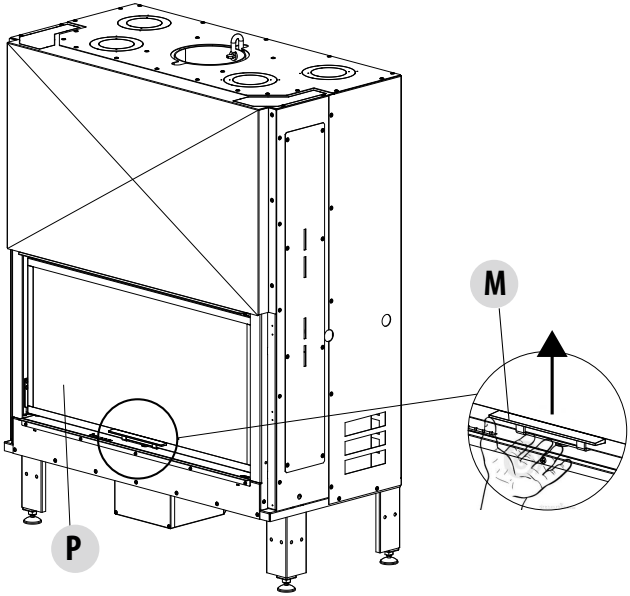
For use without a handle:

- use the cold handle to lift the door
- or, for opening to clean the glass, pull the hook towards you and lower the door to approximately 90°.

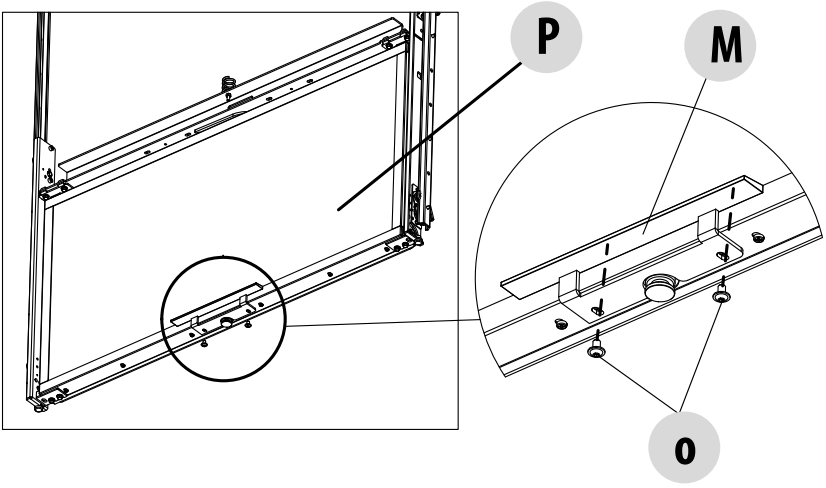
11-EASY SWITCH

For opening without a handle, follow the points below in the stated order; an incorrect manoeuvre could cause parts of the closed fireplace to break:

- raise door "**P**" with handle "**M**"



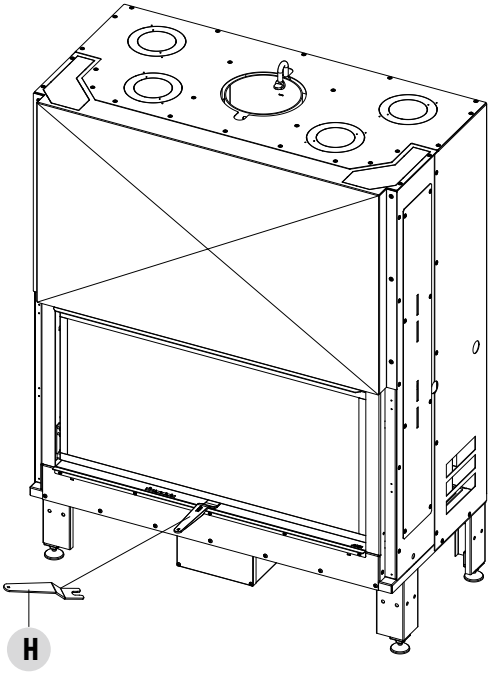
- take out the two screws "**o**" that secure the handle "**M**"
- take off handle "**M**" and set aside



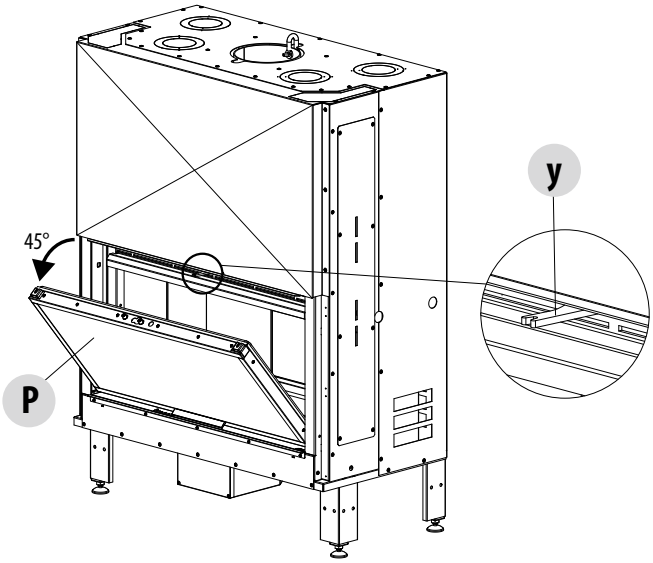
11-EASY SWITCH

- lower door "**P**"

Attention! Once the handle is off to lower and raise the door you need to use the cold handle "H", provided.

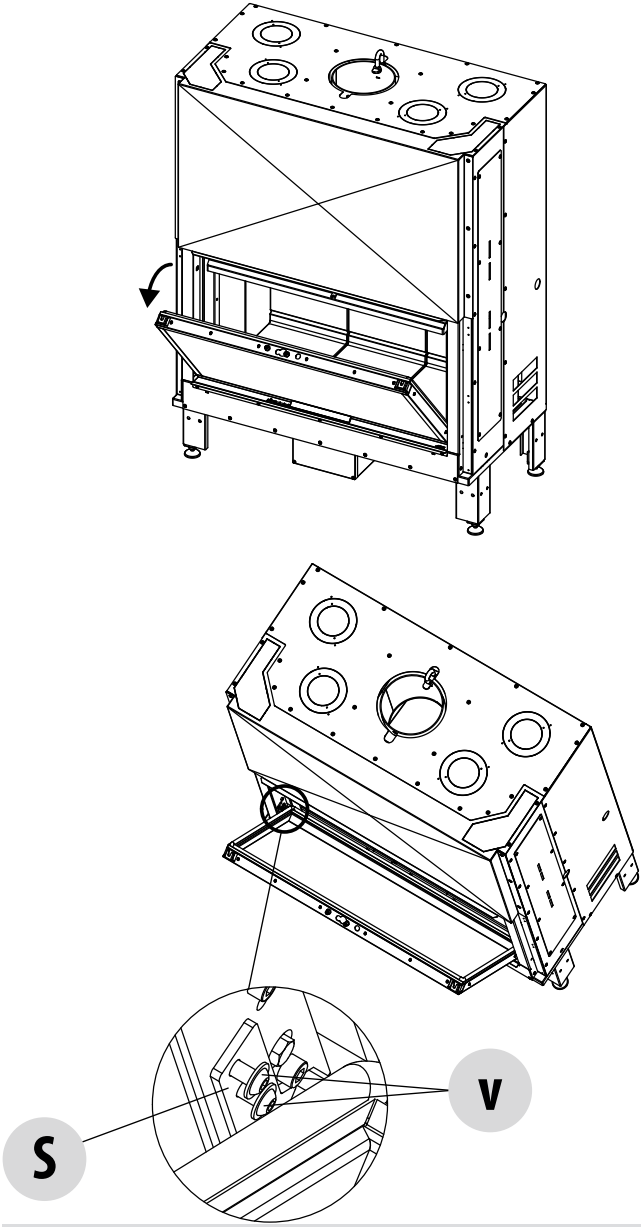


- pull the top hook "**y**" towards you



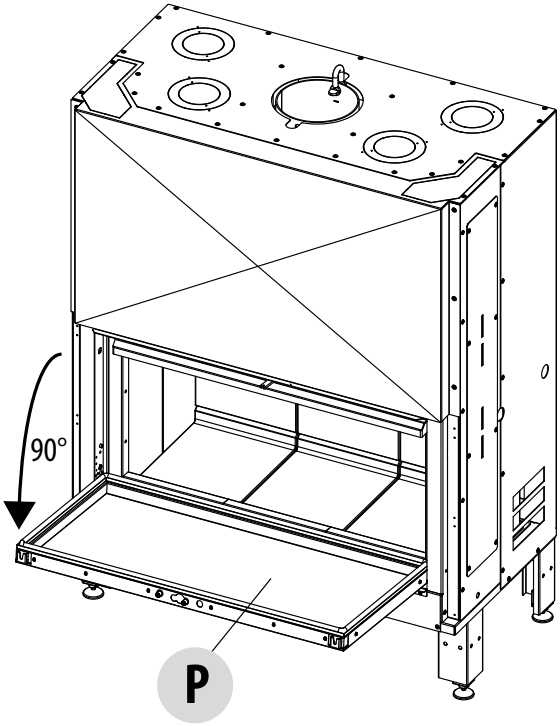
11-EASY SWITCH

- lower door "**P**" to an inclination of approximately 45° (the position stopped by the retainers)
- take out the two internal screws "**v**" and bracket "**S**" on both the right and left of the door



11-EASY SWITCH

- it is now possible to lower door "P" to 90°



During operation, the door of the closed fireplace must stay shut all the way.
When the fire is lit the door gets very hot.

Attention! For the models Plasma 95B and 115B, the door at the point of the air flow lever is as described above, while on the other side the door does NOT rise and fall but moves only downwards by 90° for the purpose of cleaning.

DOOR OPENING SWITCH

On closed fireplaces there is **a switch** installed by MCZ and in the case of forced ventilation, **it turns off the fans when the door of the closed fireplace is open** (see the relative manual for the basic-slim comfort air kit).

QUICK RESPONSE

If for any reason it is necessary to put out the fire in the closed fireplace suddenly and quickly or put out a fire that has started in the flue pipe, respond as follows:

- Time permitting, remove the embers and ashes using a metal container.
- Immediately request help from the competent bodies.
- Close the combustion air register to 0

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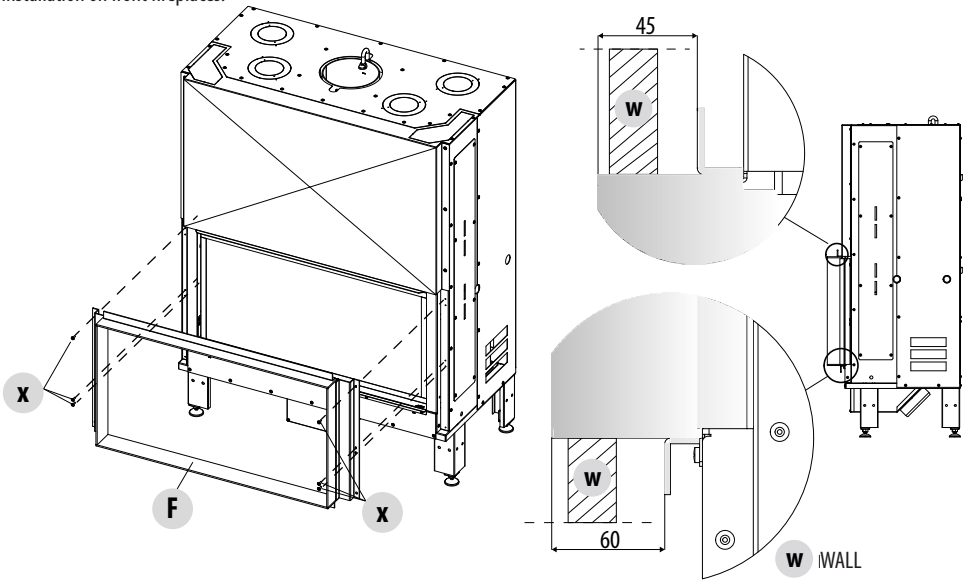
12-ACCESSORIES

ACCESSORIES

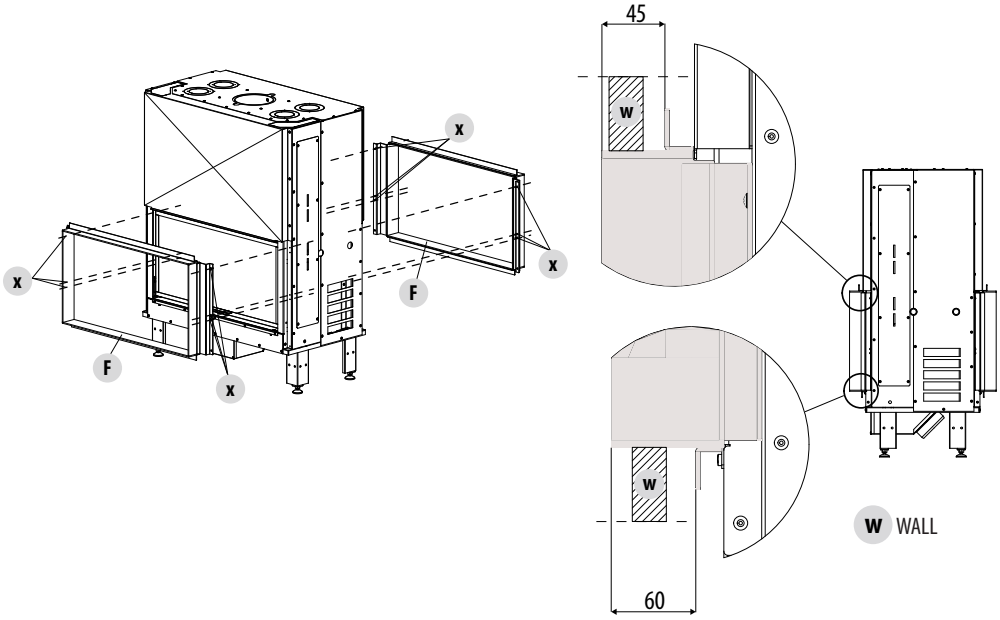
PASSE-PARTOUT

Passe-partout "F" is used for installations without cladding. It is attached to the structure by six screws "x". All of the relative instructions are inside the kit.

Installation on front fireplaces.



Installation on dual-front fireplaces.

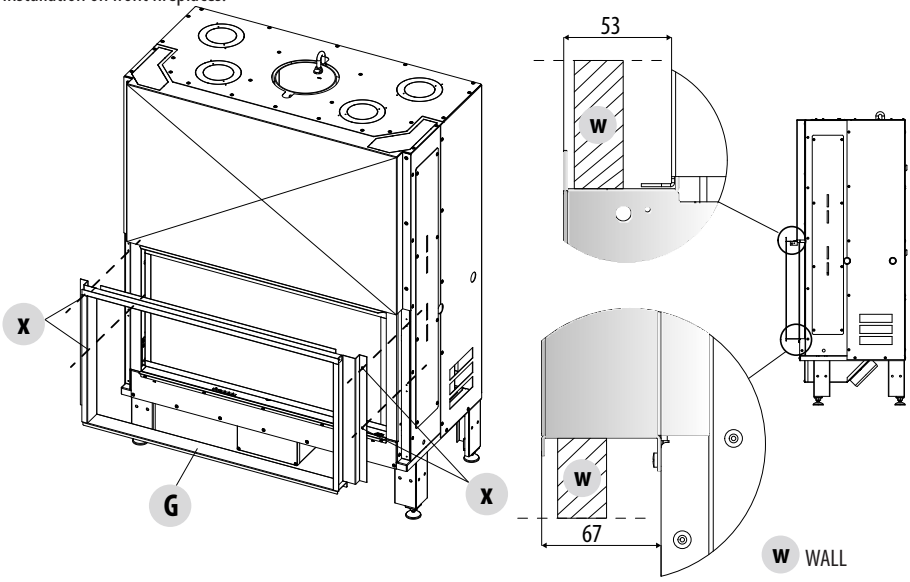


12-ACCESSORIES

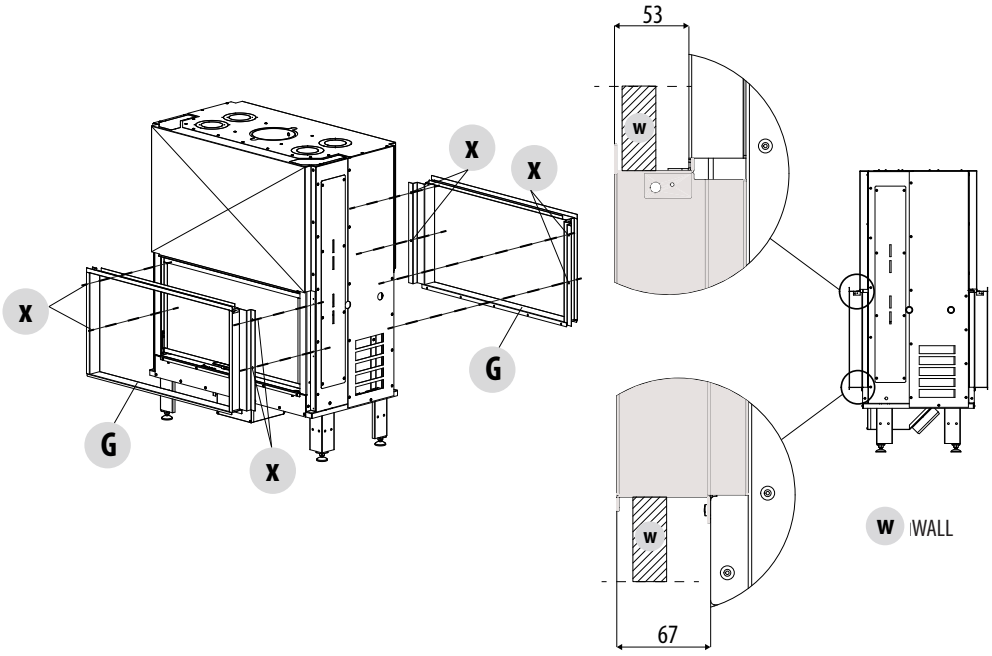
SPACER

Spacer "G" is supplied to compensate for the hole between the closed fireplace and the craft cladding. MCZ claddings already compensate for this hole. It is attached to the structure by four screws "x". All of the relative instructions are inside the kit.

Installation on front fireplaces.



Installation on dual-front fireplaces.

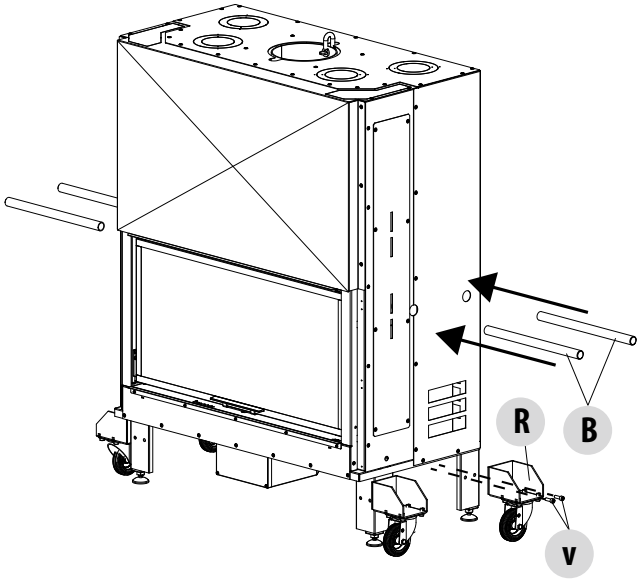


12-ACCESSORIES

HANDLING KIT

The handling kit is supplied to simplify closed fireplace transport operations.

The kit is composed of four handling units "R", and four chimney holding bars "B". The bars "B" need to be inserted into the relative holes on the sides of the closed fireplaces, while the handling units need to be attached to the legs of the closed fireplace by the relative screws "v". All of the instructions are contained in the kit.



COMFORT AIR SLIM/BASIC KIT

Ventilation kit to connect pipes and outlets for conveying hot air.

ADDITIONAL WEIGHTS KIT

Additional weights to naturally lower and close the firebox door, according to regulation Bauart A1.

13-MAINTENANCE AND CLEANING

ATTENTION!
All cleaning operations of all parts need to be carried out when the closed fireplace is completely cold; make sure that the ashes are out, use personal protective equipment and use appropriate maintenance equipment.

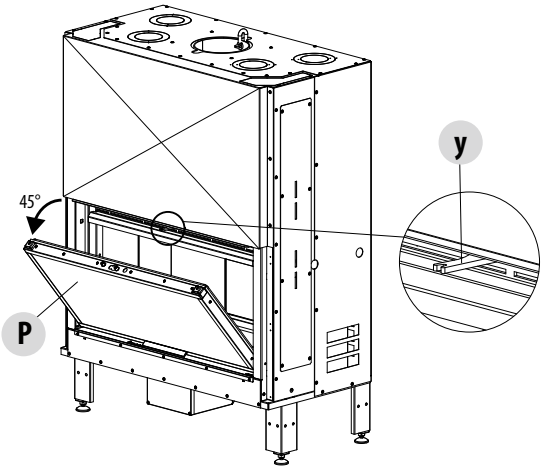
CLEANING UNDER THE USER'S RESPONSIBILITY

CLEANING THE GLASS

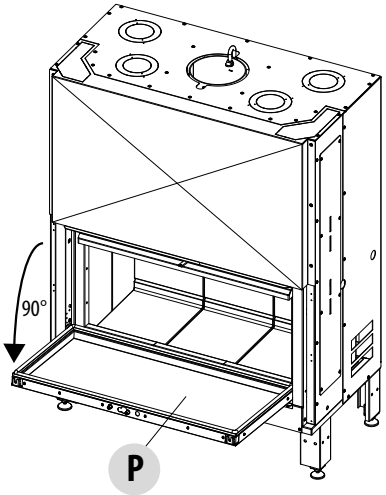
To clean the glass, use specific products (see our price list) or a cloth dipped in water and ammonia solution or a little white ash and a sheet of newspaper.
To open the door follow the procedure set forth in the dedicated chapter, depending on whether the handle or the cold handle is being used (see chapter on door opening/EASY SWITCH)

WHEN OPENING THE DOOR BUT ESPECIALLY WHEN CLOSING IT, GUIDE IT WITHOUT PRESSING ON IT.
FOR EXAMPLE, FORCING THE DOOR DOWNWARDS TO CLOSE THE GLASS COULD MAKE IT HIT THE SPANDREL AT THE BOTTOM OF THE CLOSED FIREPLACE, MAKING IT BREAK.

ATTENTION!
Do not spray the cleaner onto the painted parts or onto the seals of the door (ceramic fibre cord)



DOOR OPENING WITH HANDLE



DOOR OPENING WITHOUT HANDLE AND THEREFORE WITH THE USE OF THE COLD HANDLE

13-MAINTENANCE AND CLEANING

ASH REMOVAL

Adequate cleaning of the fire bed before each re-ignition of the product is recommended in order to achieve proper combustion. With the embers completely out, use a metal pan and a brush to remove the remaining ash from the fire bed and place the ash in non-flammable containers for transport.

Hot ashes must not be stored outside unsupervised or thrown into the rubbish bin. Allow them to cool down in the open air in a metal container.

Only if ash is completely cold ***may a vacuum cleaner be used to remove it. To vacuum the ash, use specific vacuum cleaners, readily available on the market.***

CLEANING THE REFRACTORY WALLS (ALUTEC®)

These do not need to be cleaned because the feature of this material (ALUTEC®) is that it does not absorb soot, rather, but it facilitates self combustion it when the firebox is hot. After ignition, when the firebox would normally tend to blacken, the refractory walls will tend to turn white again, starting from the base of the flam, when the combustion chamber reaches the operating temperature (~ 400Â° C).
If this does not happen, it may be due to:

- Moist or resin-rich wood that does not release enough heat or that soils the combustion chamber
- Chimney with poor performance and therefore the smoke stays too long in the combustion chamber, soiling the firebox
- Chimney with poor draught, which does not facilitate the development of flame and thus the attainment of the appropriate refractory temperatures.

Never clean the refractory wall with a damp cloth, or other, as this could stain it.
At most use a dry paintbrush to remove large soot deposits.

The failure of Alutec® to 'whiten' is not considered a defect in light of the warnings and instructions provided above.

CLEANING BY CERTIFIED TECHNICIAN

CLEANING THE CHIMNEY

We recommend the mechanical cleaning of the flue **at least once a year**; excess build-up of unburned waste could cause problems with the smoke outlet and start a fire in the chimney itself. To access flue cleaning from the appliance, remove the smoke deflector: to slide it out correctly, lift the front of it and at the same time push it forwards to detach it from the rear supports.

The flue must be cleaned, annually, as soot/creosote deposits reduce its cross-sectional area reducing the draught, impairing the proper functioning of the product and, in severe cases, may even ignite a soot fire in the chimney, with the risk of mechanical failure of the chimney itself and a fire in the home.
The flue and chimneypot must be cleaned and checked by a qualified chimney sweep **at least once a year**. Once maintenance/ inspection has been performed, request a written declaration that the system has been serviced.

Caution: failure to clean the chimney over time jeopardises the safety and proper functioning of the system.

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