COMBISTAR FX

INSTALLATION GUIDE

FX61E3
FX101E3
FX82E3
FX122E3
FX202E3

PROFESSIONALS REQUIRED:

- **ELECTRICIAN**
- **PLUMBER – ALL DOCUMENTS / COMPONENTS INSIDE OVEN**

COPPER PLUMBING ONLY

Revised August, 2023

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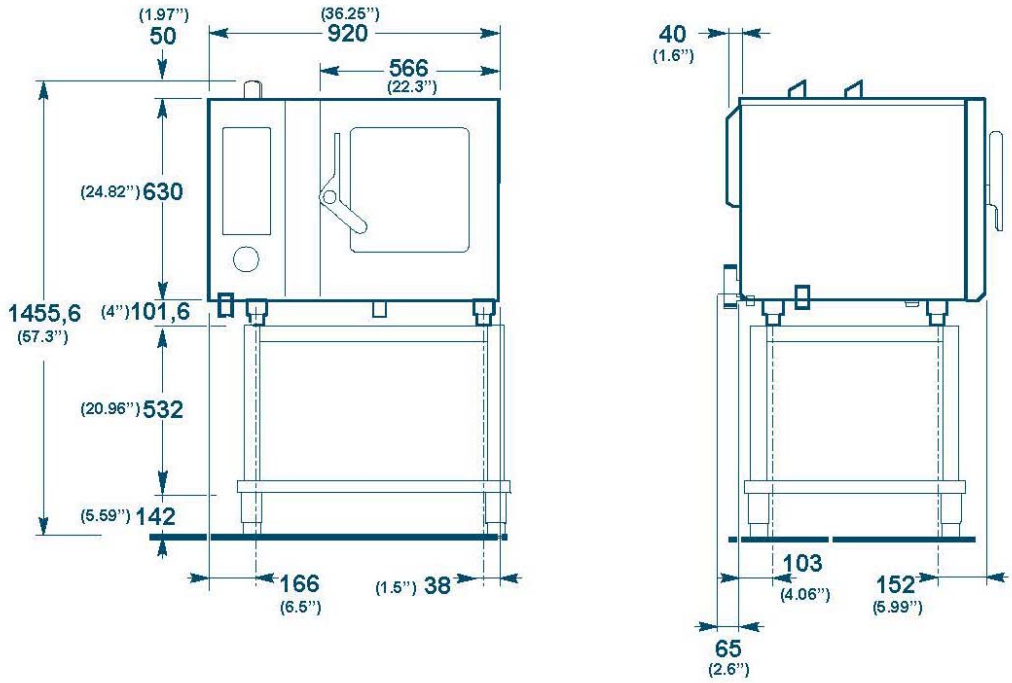
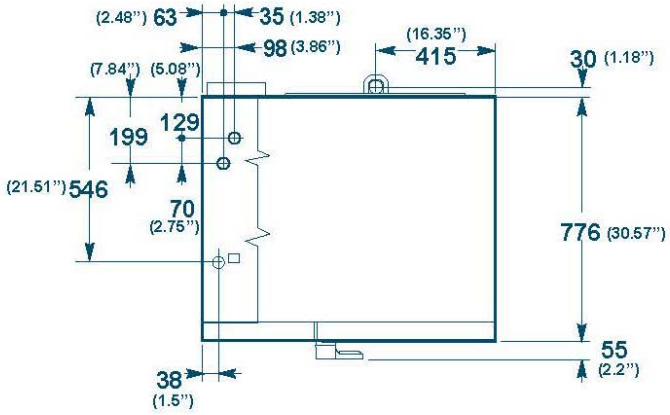
MODEL NO: FX61E3





Oven Dimensions:	**920x776x1455.6(mm)**	**36.25 x 30.57 x 51.37 (in.)**
Cooking Chamber Dimensions:	**645 x 650 x 510 (mm)**	**25.41 x 25.61 x 29.73 (in.)**
Crated Dimensions:	**1010 x 965 x 1016 (mm)**	**39.8 x 38 x 40 (in.)**
Electrical Supply:	**208 V, 9.4 kW, 26.1 A, 60 Hz, 3 ph**	
	240 V, 10.4 kW, 25 A, 60 Hz, 3 ph*	
Weight Net:	**254 lbs**	
Crated Weight:	**280 lbs**	
Capacity:	**G/N containers: 6 1 / 1**	

*** Special Order**

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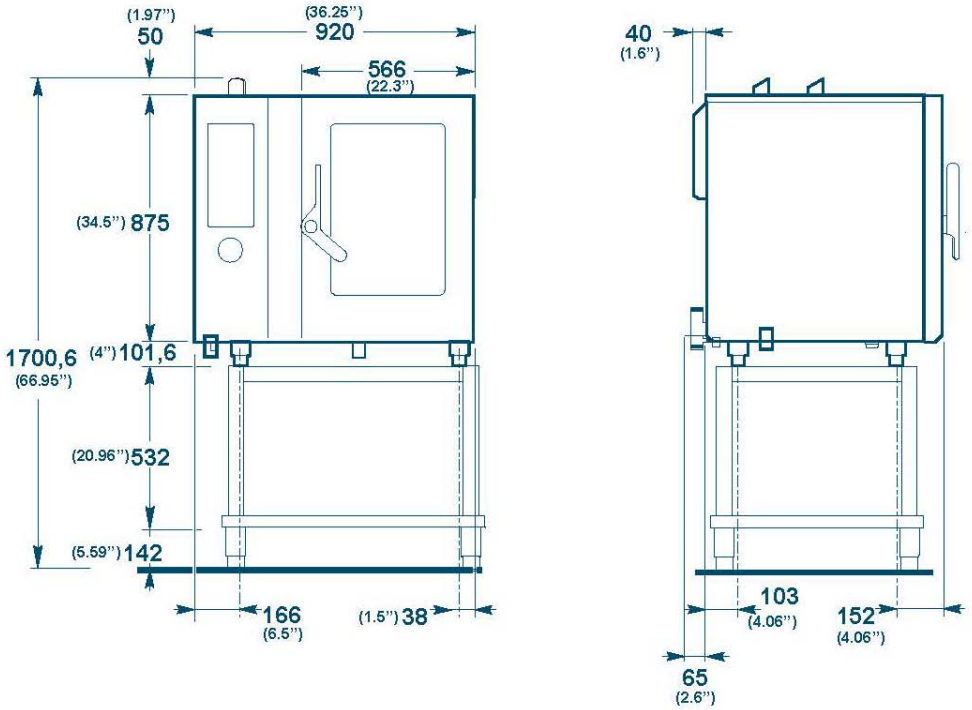
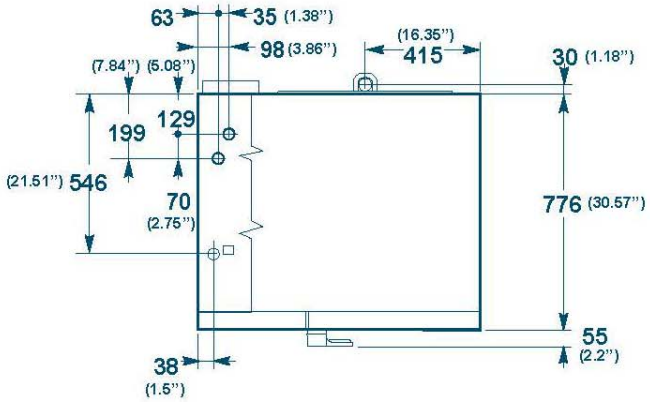
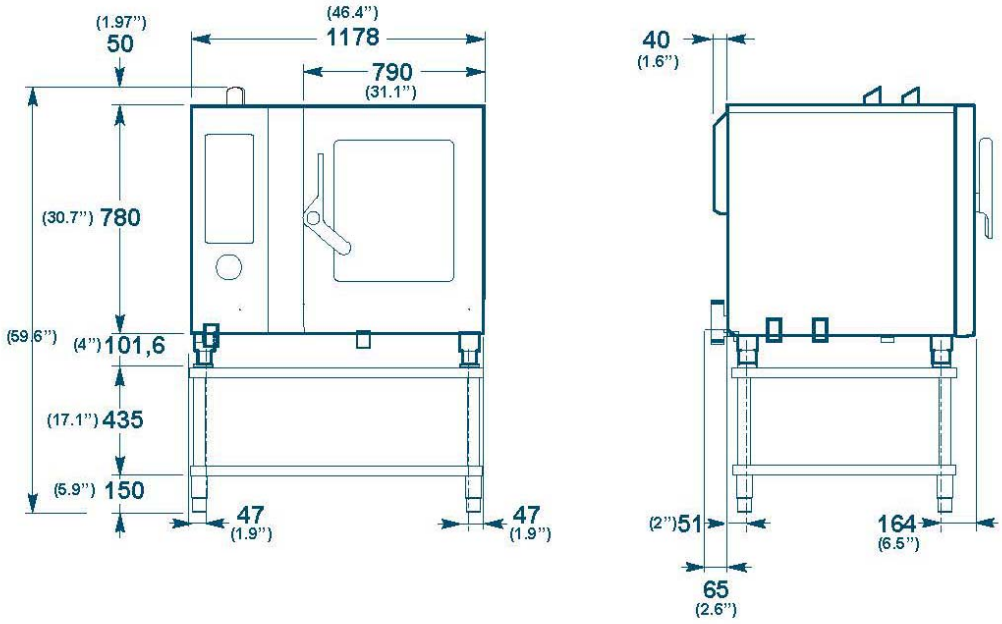
MODEL NO: FX101E3

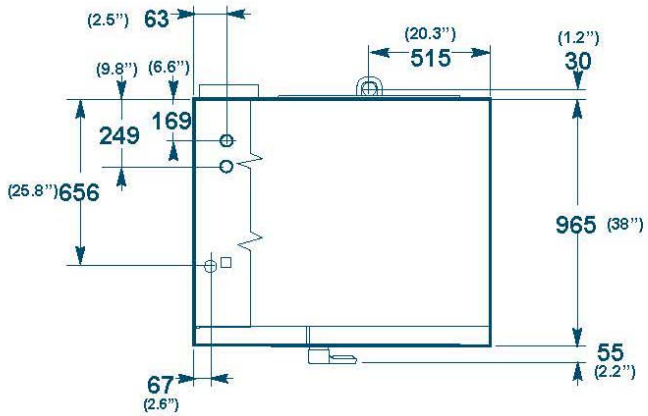




Oven Dimensions:	**920 x 776 x 1700.6 (mm)**	**36.25 x 30.57 x 66.95 (in.)**
Cooking Chamber Dimensions:	**645 x 650 x 755 (mm)**	**25.41 x 25.61 x 29.75 (in.)**
Crated Dimensions:	**1010 x 965 x 1256 (mm)**	**39.77 x 38 x 49.45 (in.)**
Electrical Supply:	**208 V, 17.75 kW, 49.3 A, 60 Hz, 3 ph**	
	240 V, 17.9 kW, 43.1 A, 60 Hz, 3 ph*	
	480 V, 17.9 kW, 21.6 A, 60 Hz, 3 ph*	
Weight Net:	**342 lbs**	
Crated Weight:	**368 lbs**	
Capacity:	**G/N containers: 10 1/1**	*** Special Order**

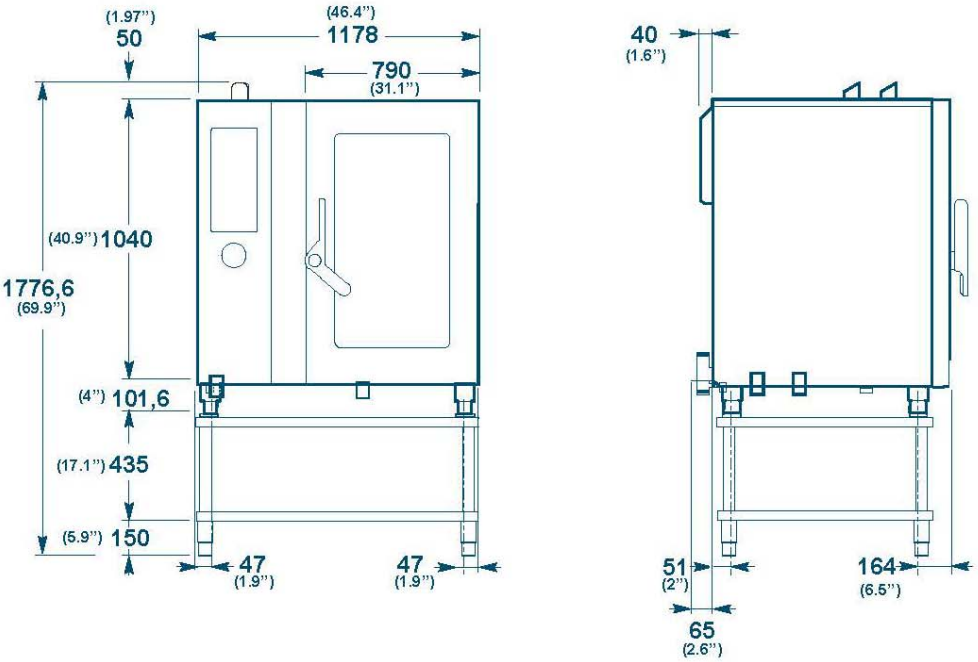
MODEL NO: FX82E3

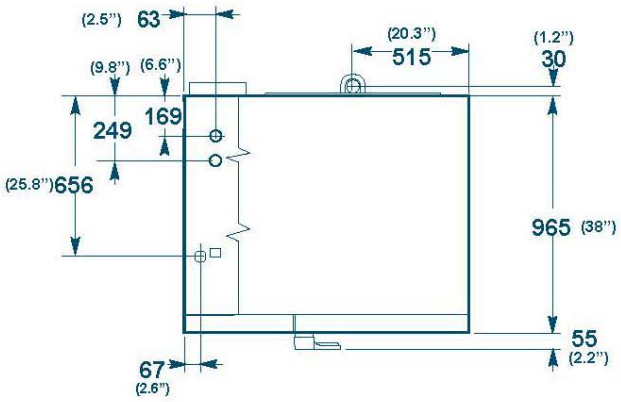




Oven Dimensions:	**1178.2x965x1516.6(mm)**	**46.4 x 38 x 59.7 (in.)**
Cooking Chamber Dimensions:	**890 x 825 x 665 (mm)**	**35.07 x 32.51 x 26.2 (in.)**
Crated Dimensions:	**1180 x 1316 x 1648(mm)**	**46.45 x 51.82 x 64.9 (in.)**
Electrical Supply:	**208 V, 20 kW, 55.6 A, 60 Hz, 3 ph**	
	240 V, 20.7 kW, 49.9A, 60 Hz, 3 ph*	
	480 V, 20.7 kW, 24.9 A, 60 Hz, 3ph*	
Weight Net:	**503 lbs**	
Crated Weight:	**547 lbs**	
Capacity:	**G/N containers: 8 2/1 16 1/1**	* Special Order

MODEL NO: FX122E3





Oven Dimensions:	**1178 x 965 x 1776.6(mm)**	**46.4 x 38 x 69.94 (in.)**
Cooking Chamber Dimensions:	**890 x 825 x 925 (mm)**	**35.07 x 32.51 x 36.45 (in.)**
Crated Dimensions:	**1320 x 1180 x 1900 (mm)**	**51.97 x 46.45 x 74.80 (in.)**
Electrical Supply:	**208 V, 26 kW, 72.3 A, 60 Hz, 3 ph**	
	240 V, 26 kW, 62.6 A, 60 Hz, 3 ph*	
	480 V, 26 kW, 31.3 A, 60 Hz, 3 ph*	
Weight Net:	**573 lbs**	
Crated Weight:	**617 lbs**	
Capacity:	**G/N containers: 12 2 / 1 ; 24 1 / 1**	

Positioning:

Left side clearance:	19.7 inches
Right:	4 inches
Back:	4 inches

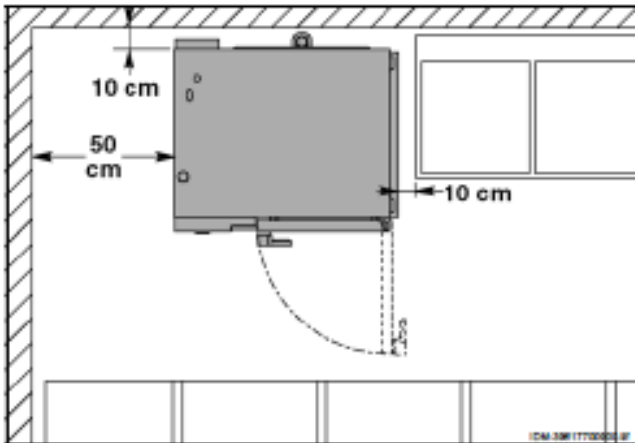
Important

Install the appliance on a stand (available as an optional) and position it as shown in the diagram (For version FX61-101-82-122 only).

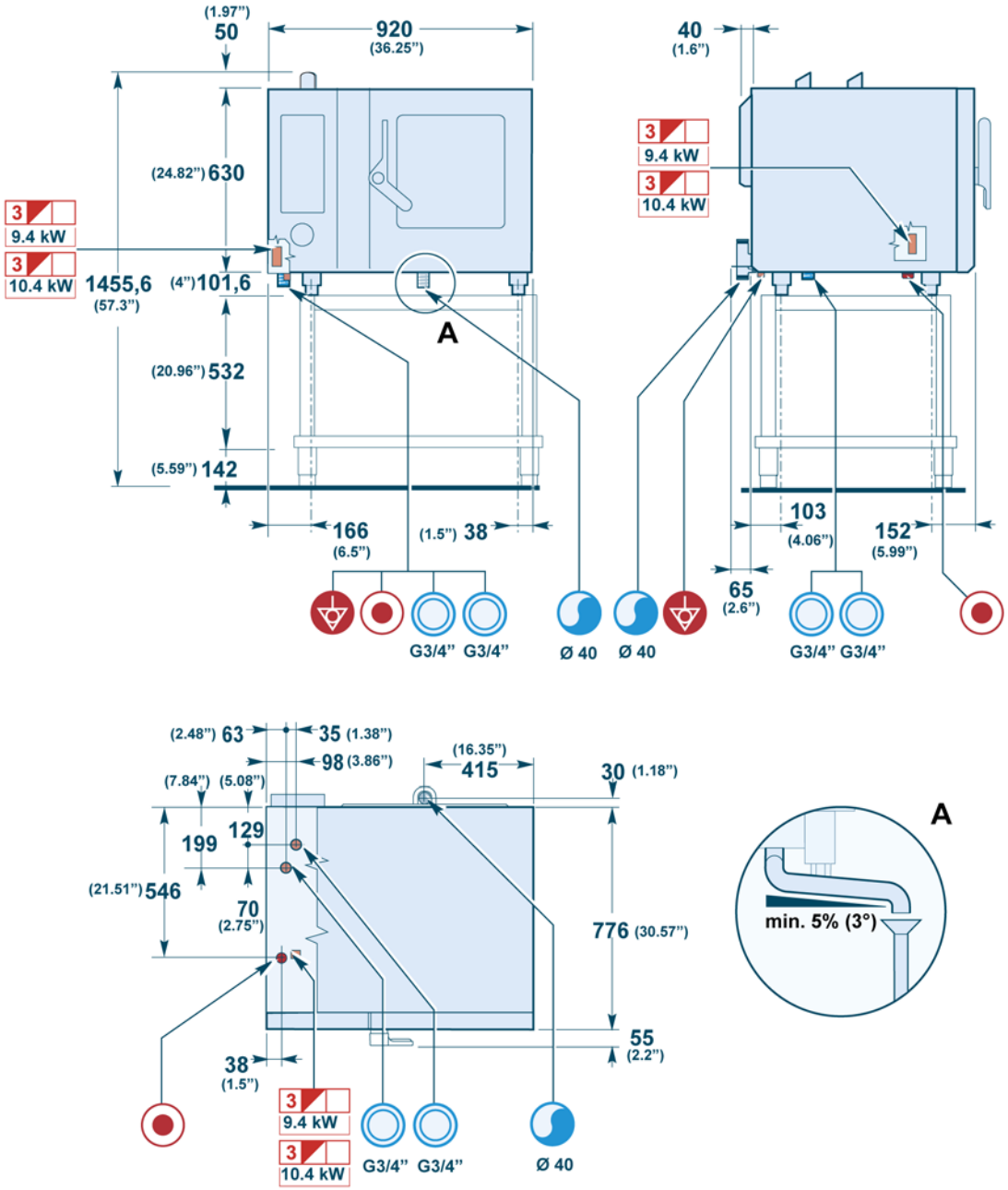
If the oven is installed in the middle of the room, please leave at least a distance of 50 cm between its back and other appliances.

Important

All clearance requirements are the same for combustible or non combustible constructions. Suitable for installation on combustible floors.



OVEN CONNECTION DIAGRAM (FX61 E3)



Cold water input
Entrée eau froide

Equipotential terminal
Borne équipotentiel

Water drain
Vidage eau

3 Terminal board
Plaque à bornes
3~
208 V

Electric connection
Branchement electrique

3 Terminal board
Plaque à bornes
3~
240 V

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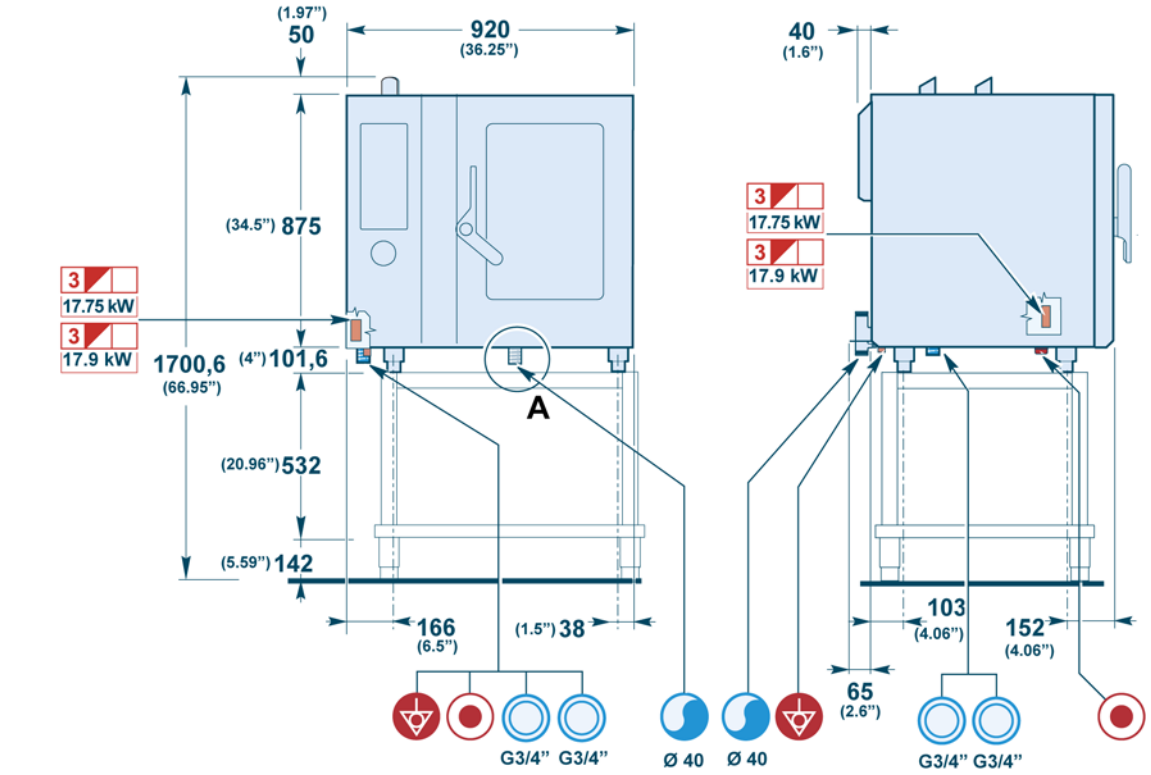
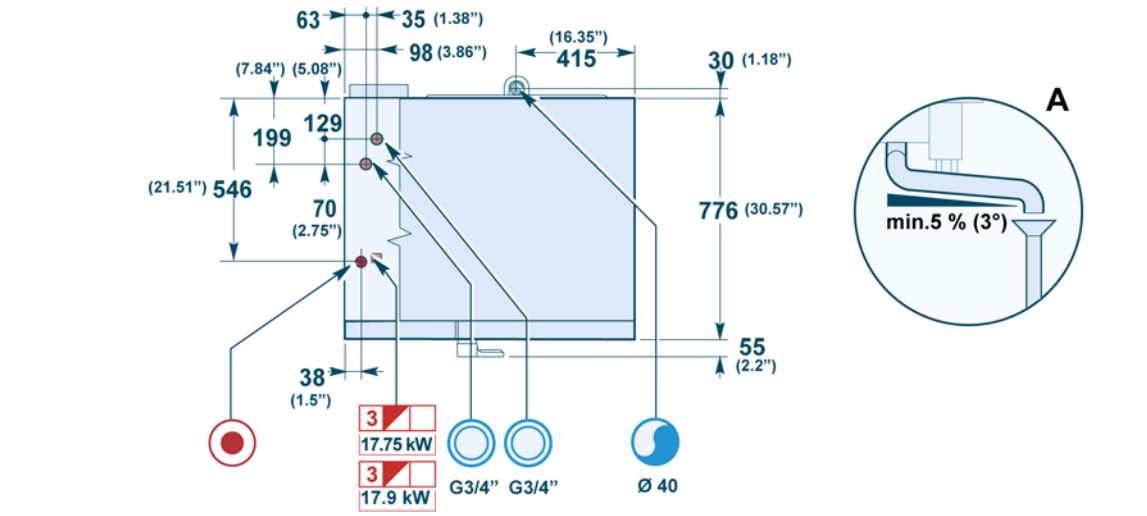
OVEN CONNECTION DIAGRAM (FX101E3)





Cold water input
Entrée eau froide

Equipotential terminal
Borne équipotentiel

Water drain
Vidage eau

3 Terminal board
Plaque à bornes
3~ ⏚
208 V

Electric connection
Branchement electrique

3 Terminal board
Plaque à bornes
3~ ⏚
240 V

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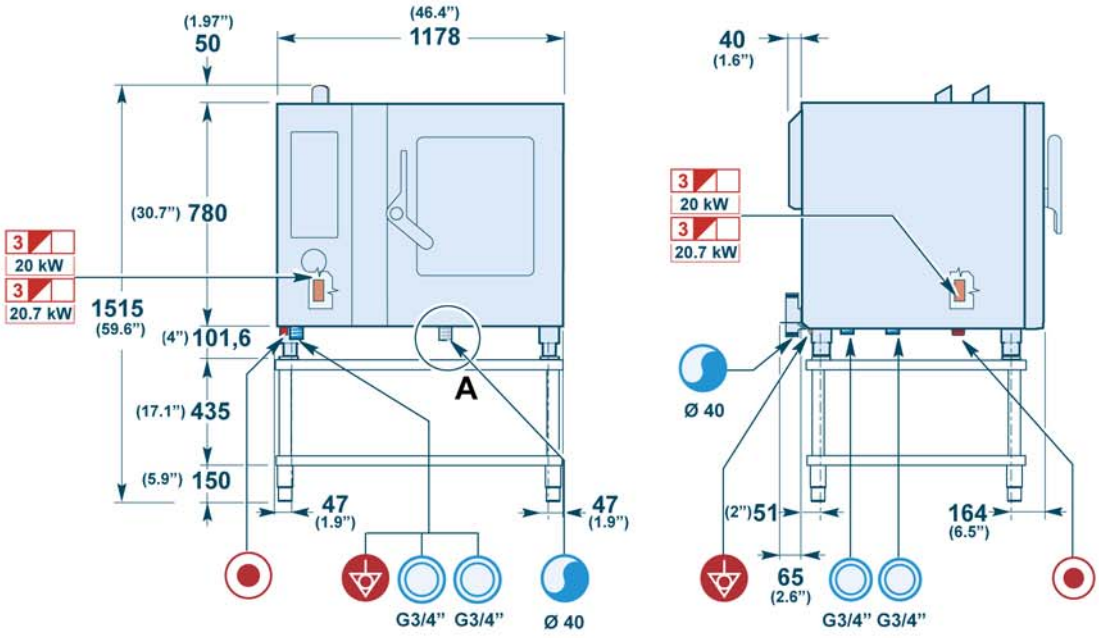
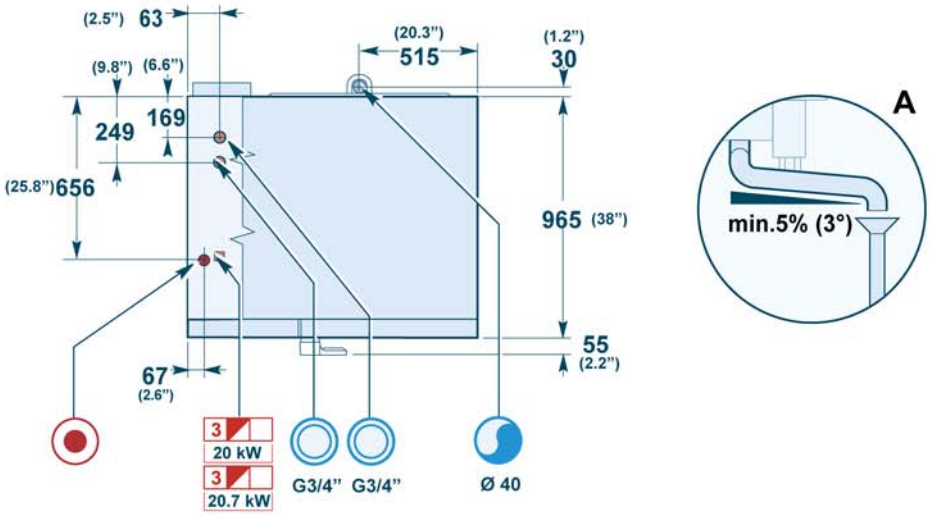
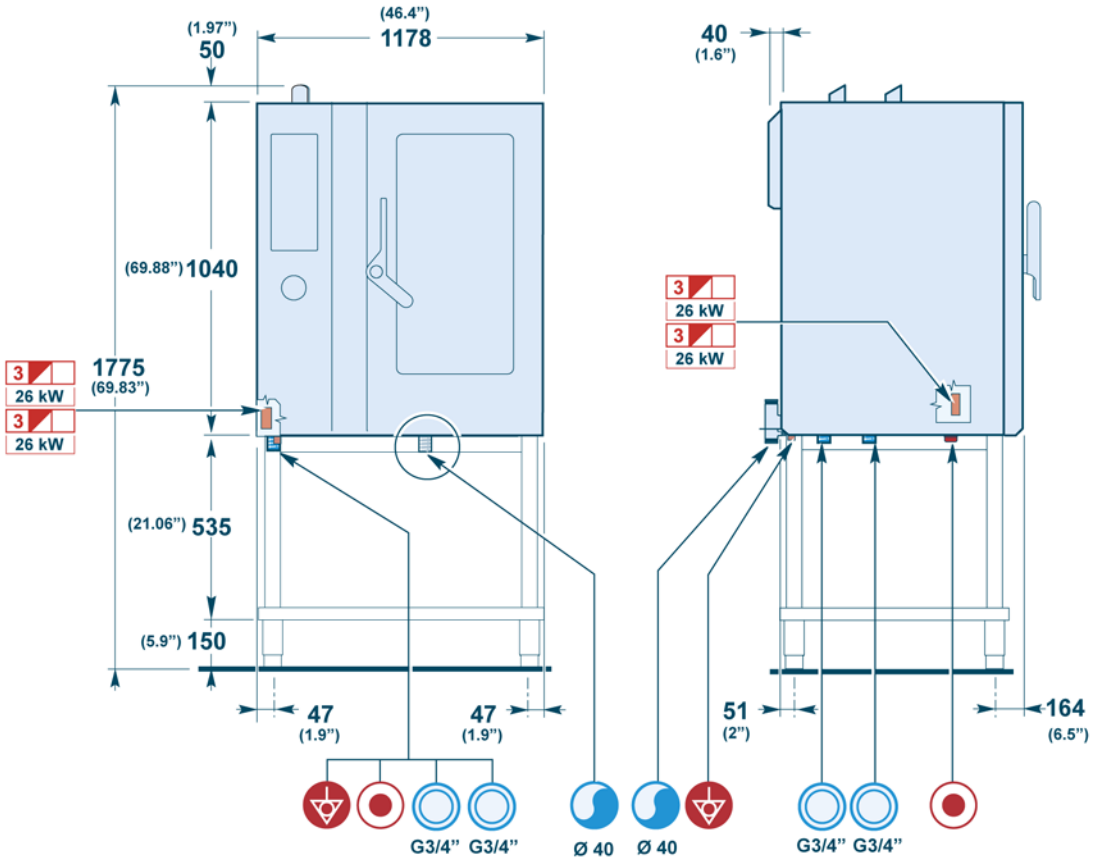
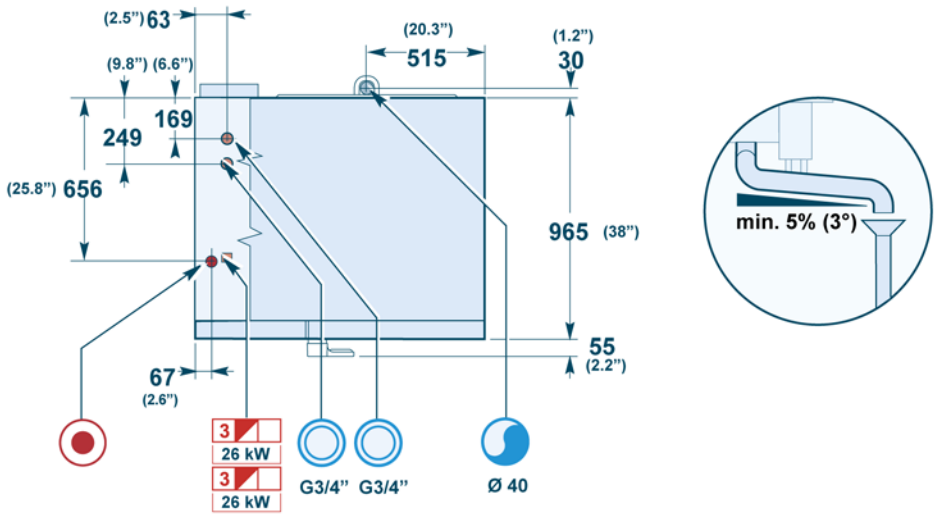
OVEN CONNECTION DIAGRAM (FX82 E3)





OVEN CONNECTION DIAGRAM (FX122 E3)





Cold water input
Entrée eau froide

Electric connection
Branchement électrique

3 Terminal board
Plaque à bornes
3~ ⏚
208 V

Water drain
Vidage eau

Equipotential terminal
Borne équipotentiel

3 Terminal board
Plaque à bornes
3~ ⏚
240 V

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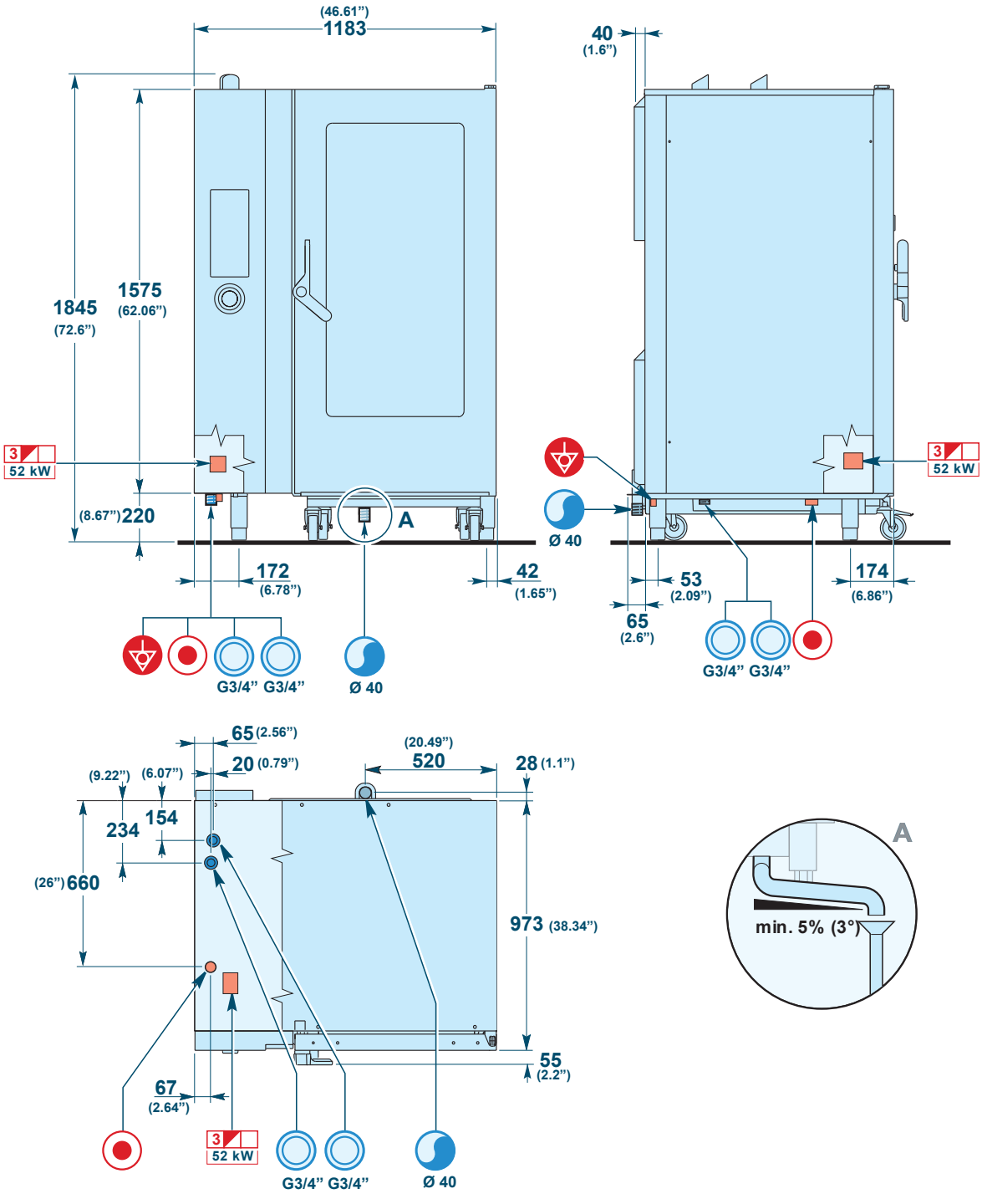
OVEN CONNECTION DIAGRAM (FX202 E3)

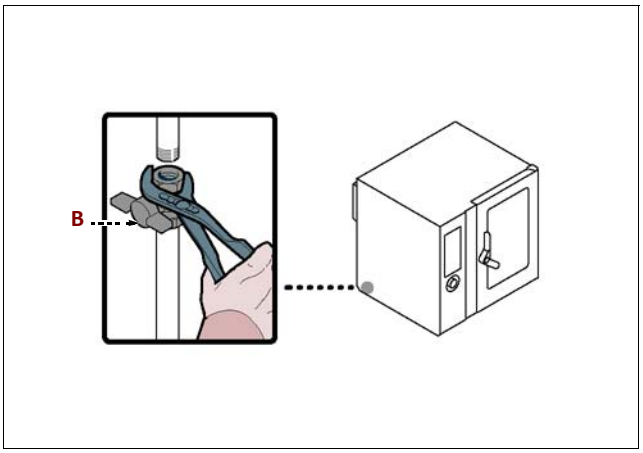


WATER CONNECTION

Make the connection in compliance with the relevant legal requirements, using appropriate and recommended materials.

Water supply connection

Connect the mains line to the appliance's connection pipe, fitting a shut-off tap **(B)** to allow the water sup-ply to be cut off when necessary.



Important

The tap (B), not supplied with the appliance, must be installed in an easily accessible position and its status (on or off) must be obvious at a glance.

Caution - warning

The appliance must be supplied with drinking water having the characteristics shown in the ta-ble. If these characteristics are not complied with the appliance might suffer damage; a water treat-ment device should therefore be installed.

Description	*Value*
Pressure	200÷400 kPa (2÷ 4 bar) (*)
Water flow rate (l/h)	9 l/h (FX 61) (*) 12 l/h (FX 101) (*) 17,5 l/h (FX 82) (*) 17,5 l/h (FX 122) (*) 24 l/h (FX 201) (*) 32 l/h (FX 202) (*)
pH	7÷7.5
Conductivity	< 200µS/cm
Hardness	9÷13°f (5÷7°d, 6.3÷8.8°e, 90÷125 ppm)
Salt and metallic ion content	
Chlorine	<0,1 mg/l
Chlorides	< 30 mg/l
Sulphates	< 40 mg/l
Iron	< 0,1 mg/l
Copper	< 0.05 mg/l
Manganese	< 0,05 mg/l

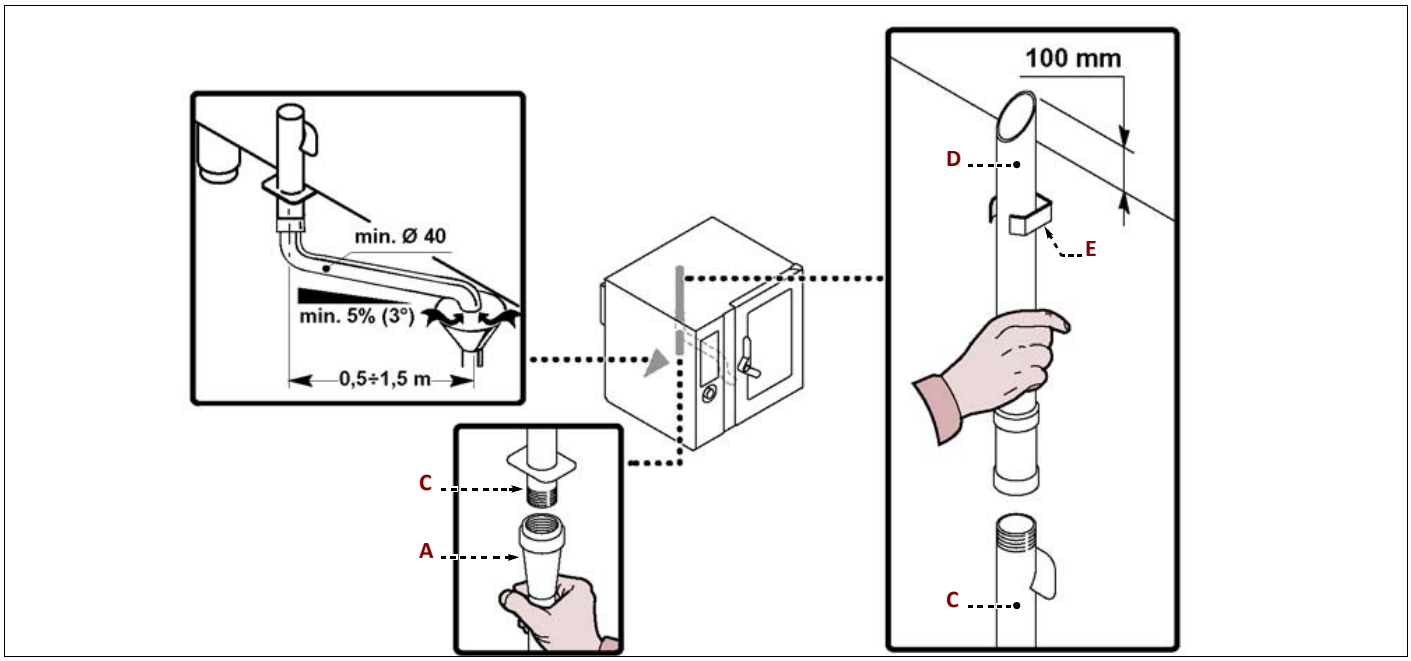
(*) The value refers to the amount of water needed for steam production inside the cooking chamber.

US

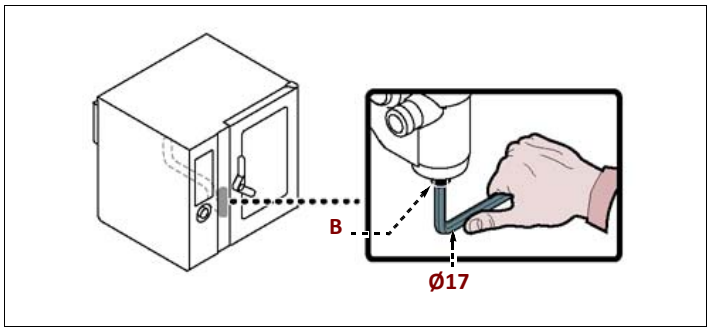
WATER DRAIN CONNECTION

To carry out this operation, proceed as follows.

1. Connect the mains water pipe **(A)** to the appliance's connection pipe **(C)**.
2. Connect the vent pipe **(D)** to the appliance connection pipe **(C)** and fix it to the support **(E)**.



The appliance's drain line is fitted with the plug (B) allowing discharge of the waste deposited.



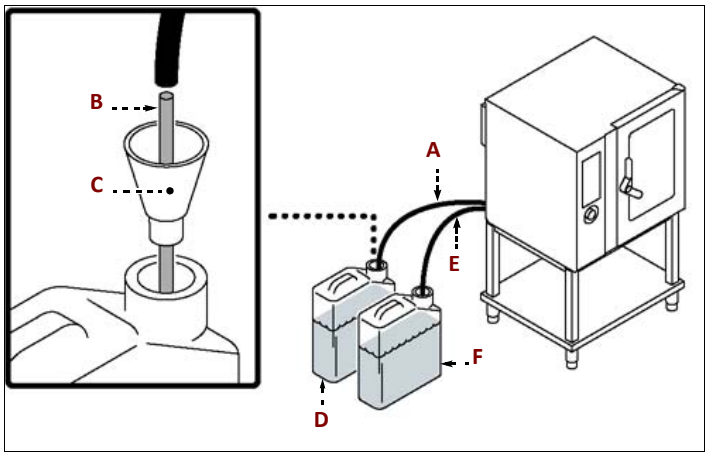
WASHING SUPPLY CONNECTION

To carry out this operation, proceed as follows.

1. Connect the red pipe **(A)** to the pipe **(B)** and fit the cone **(C)** into the cleaner tank **(D)**.
2. Connect the blue pipe **(E)** to the pipe **(B)** and fit the cone **(C)** into the sanitizing cleaner tank **(F)**. Use the cleaner and sanitizing supplied by the oven manufacturer for the best results.

The chemical composition of the products referred to above is as follows:

- Cleaner: caustic soda, concentration less than 20%.
- Sanitizing cleaner: containing citrates and organic sequestering agents, less than 15%.



Important

The use of products with different compositions may damage the system and the oven walls, and any residues deposited may contaminate foods.

ELECTRICAL CONNECTION

The appliance must be connected grounded in accordance with local codes, or in the absence of local codes, with the National Electrical Code, ANSI/NFPA 70, or the Ca-nadian Electrical Code, CSA C22.2.

Important

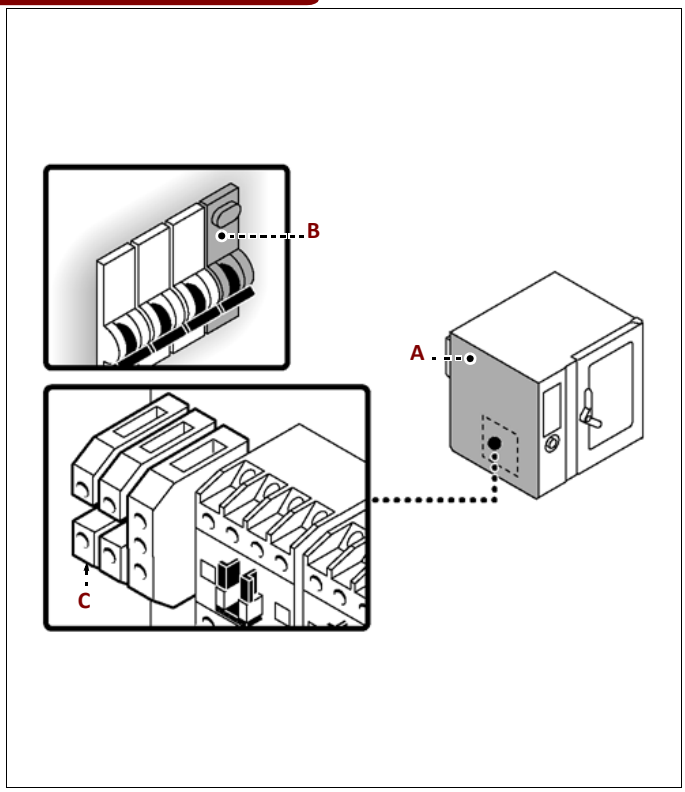
The connection must be made by authorised, skilled personnel, in accordance with the relevant legal requirements, using appropriate and specified materials. The appliance is supplied with operating voltage 208V/3 or 240V/3 (avaible on request only for model FX61-101-82-122) or 480V/3 (avaible on request) (see at-tached wiring diagrams).

Caution - warning

Before doing any work, cut off the mains electricity supply.

Connect the appliance to the mains electricity supply as follows.

1. Undo the screws and remove the side panel **(A)**.
2. Connect field wires **(B)** to the appliance's terminal board **(C)**, in accordance with the electrical system diagram provided at the back of the manual and using a cable with the following characteristics.
    a. Temperature of use: ≥ 75°C (167°F).
3. Replace the panel **(A)** and re-tighten the screws when the operation is complete.



Important

Cooking chamber convection fan can rotate in a clockwise and anti-clockwise verse.

US

TESTING OF THE APPLIANCE

Important

Before it is put into service, the system must be tested to check the operating conditions of every single component and identify any malfunctions. In this stage, it is important to check that all health and safety requirements have been complied with in full.

To test the system, make the following checks.

1. Turn on the water supply tap and make sure that the connection is watertight.
2. Make sure that the mains voltage is the same as that of the appliance.
3. Check the water pressure and adjust if necessary (see page 66).
4. Check that the safety device is operating correctly.
5. Carry out a cooking cycle without food to ensure that the appliance is operating correctly.

After testing, if necessary instruct the user in all the skills necessary for putting the ap-pliance into operation in conditions of safety, in accordance with legal requirements.

RECOMMENDATIONS FOR ADJUSTMENTS

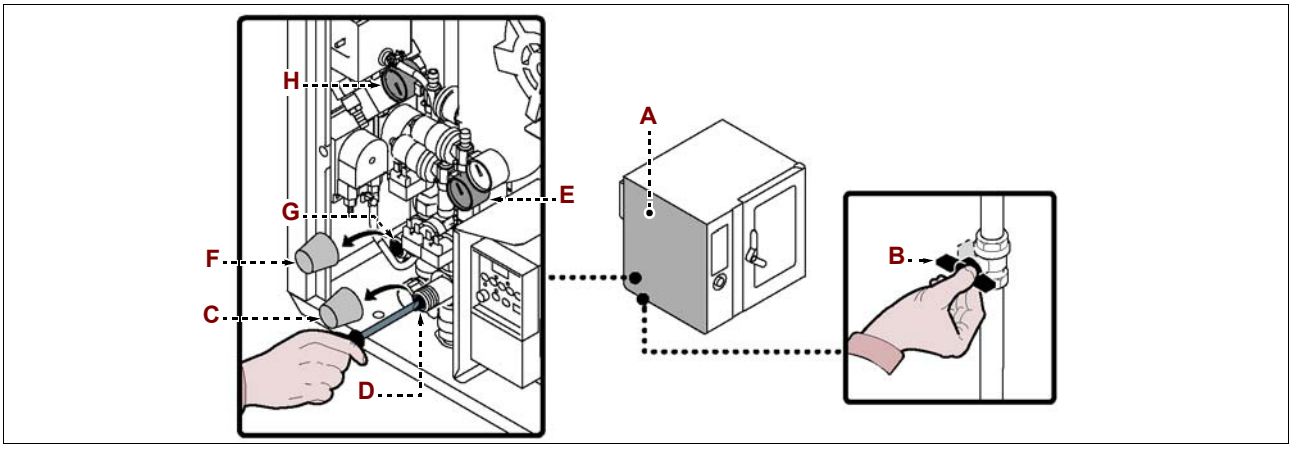
Important

Before making any type of adjustment, activate all the safety devices provided and decide whether staff at work and those in the vicinity should be informed. In particular, turn off the water supply tap, cut off the electricity supply using the master switch and prevent access to all devices that might cause unexpected health and safety hazards if turned on.

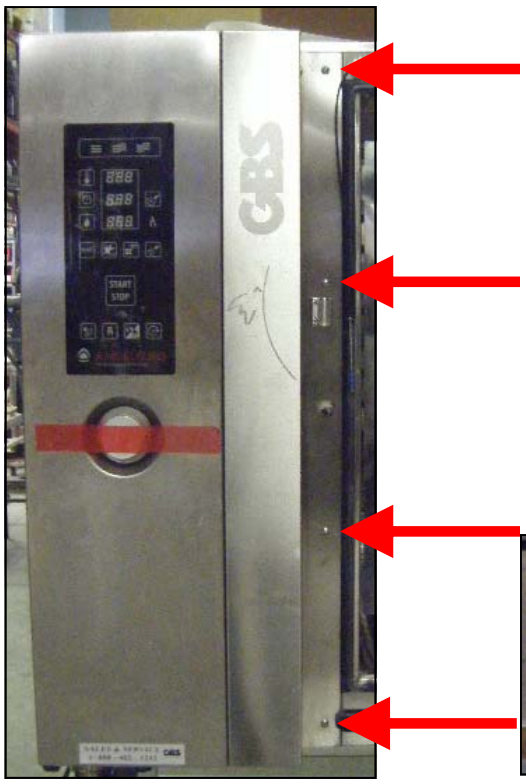
ADJUSTING THE WATER PRESSURE

To carry out this operation, proceed as follows.

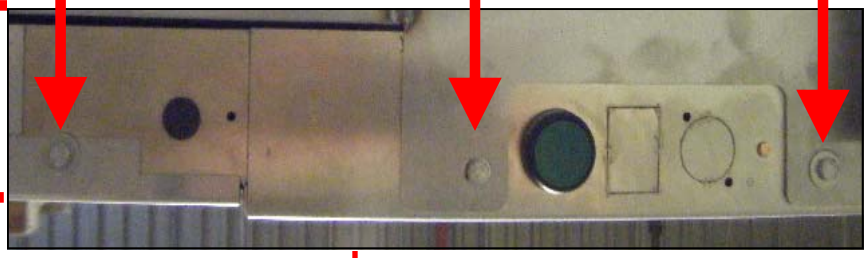
1. Undo the screws and remove the side panel **(A)**.
2. Turn on the water supply tap **(B)**.
3. Unscrew the ring nut **(C)**.
4. Turn the cooking chamber water intake screw **(D)** to bring the pressure reading on the pressure gauge **(E)** to 1,5 bar.
   If the water pressure is too low, install a device to increase the pressure.
5. Re-tighten the ring nut **(C)**.
6. Unscrew the ring nut **(F)**.
7. Turn the cooking chamber water drain screw **(G)** to bring the pressure reading on the pressure gauge **(H)** to 1 bar.
   If the water pressure is too low, install a device to increase the pressure.
8. Re-tighten the ring nut **(F)**.
9. Replace the panel **(A)** and screw the screws back into place.
10. Turn the water supply tap **(B)** back off when the operation is complete.



HOW TO ACCESS PCB's and FUSES



REMOVE SCREWS and/or BOLTS



BOLTS LOCATED BENEATH PANEL

GENTLY LIFT PANEL AND SWING OPEN

Reverse Osmosis Water Filter Installation

PLEASE MAKE NOTE OF THE FOLLOWING

The sediment pre filters in the Reverse Osmosis filtration system MUST be changed at least every six (6) months to ensure proper operating conditions. Failure to change these pre-filters on a timely basis may lead to the failure of the internal membranes of the filter.*

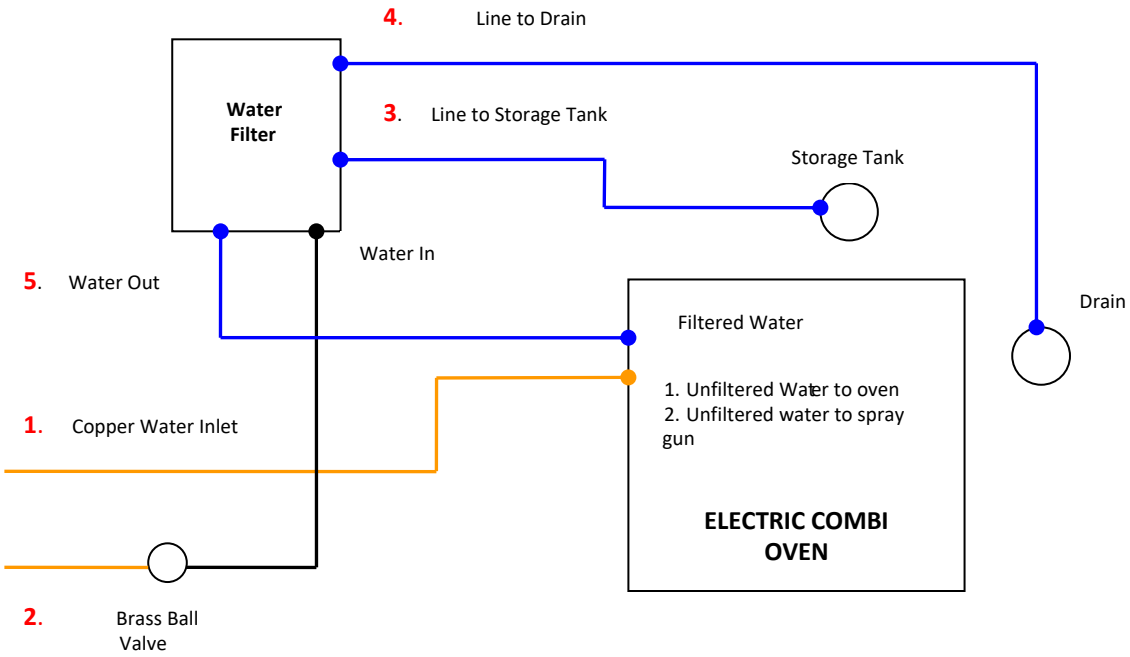
Failure to replace these sediment pre-filters will void the warranty on the filter itself. If this filter has been purchased in conjunction with any GBS FX CombiStar combination oven, and such purchase has extended the warranty of the oven, failure to replace the sediment pre-filters as prescribed above, will extinguish any warranty extension.

**if water conditions exceed those specified in the Installation Manual more frequent sediment pre-filter changes may be warranted. GBS always suggests that the operator have the water tested to determine the proper frequency of sediment pre-filter changes.*

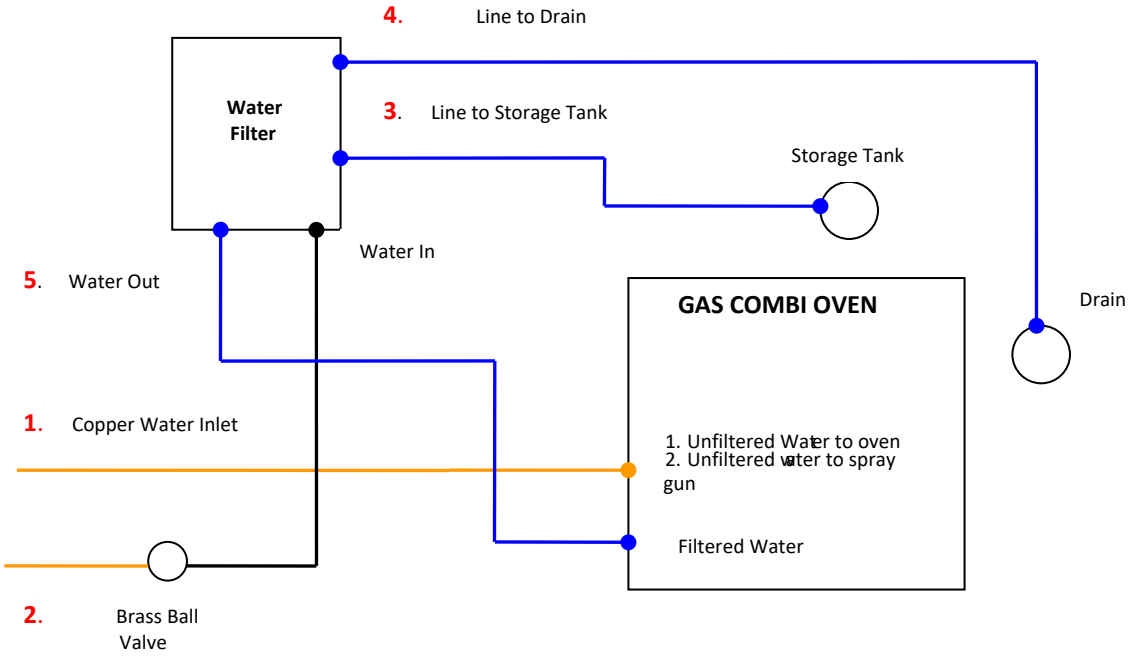
IMPORTANT:

- ALL PLUMBING SHOULD BE OF COPPER CONSTRUCTION.
- THERE SHOULD BE NO PLUMBING UNDERNEATH THE OVEN
- MAKE SURE THAT NO POLY TUBING IS RUN UNDERNEATH THE OVEN
- ENSURE POLY TUBING DOES NOT COME INTO CONTACT WITH ANY HEAT SOURCE
    - LOCATED ON THE LEFT HAND UNDERSIDE OF THE OVEN

ELECTRIC COMBI OVEN CONNECTION DIAGRAM



GAS COMBI OVEN CONNECTION DIAGRAM



Vertically mount unit on wall beside the oven no more than 6 feet high. Utilize the mounting plates affixed to the interior of the water filter cabinet (located top centre and bottom centre) to secure the cabinet to the wall.

Unit must be easily accessible for future filter change outs

Pressurized storage tank must be located behind the oven on the right hand side of the unit away from the heat source.

You will need two fresh water supplies. The solenoids are clearly labeled on the oven "FILTERED" AND "UNFILTERED".

1. Connect one of the main water supplies (unfiltered) to the combi oven using a brass coupling connection. **(Spray gun attaches to this unfiltered water connection)**.

2. Connect the second main water supply to the filter using a brass ball valve. Attach one end of plastic tubing to poly tube connector. Attach the other end to the "water in" coupler on the water filter.

3. Attach one length of plastic tubing from the coupler on the filter labeled "tank" to the pressurized storage tank.

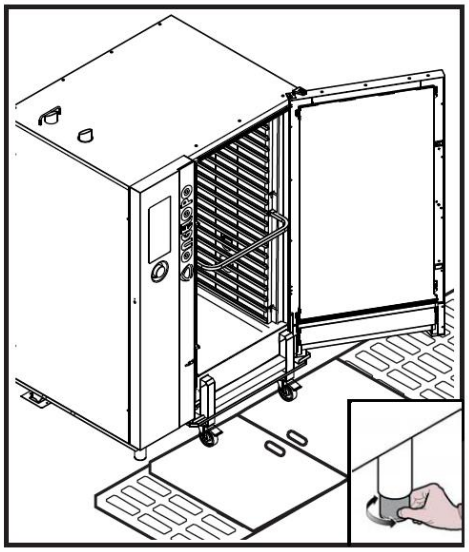
4. Attached one length of plastic tubing from the coupler on the filter labeled "drain" to the copper drainage pipe

5. Attach one length of plastic tubing from the coupler on the filter labeled "water out" to the combi oven using a brass coupler and poly tube connector.

IMPORTANT

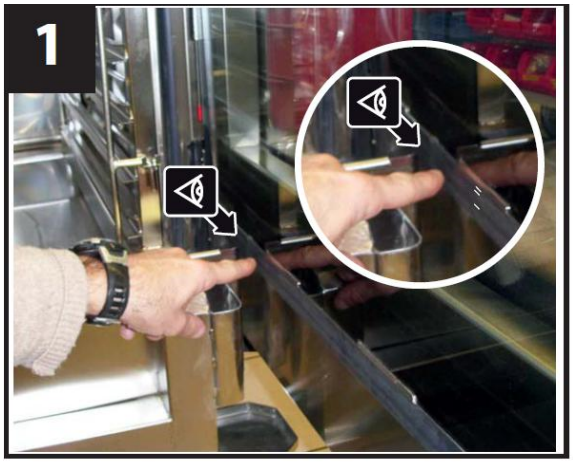
- **MAKE SURE THAT NO POLY TUBING IS RUN UNDERNEATH THE OVEN**
- **ENSURE POLY TUBING DOES NOT COME INTO CONTACT WITH ANY HEAT SOURCE – LOCATED ON THE LEFT HAND UNDERSIDE OF THE OVEN**

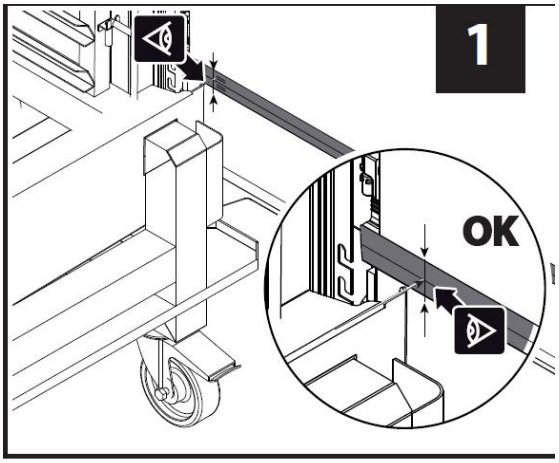
Roll in Rack Adjustment – RX201 and RX202

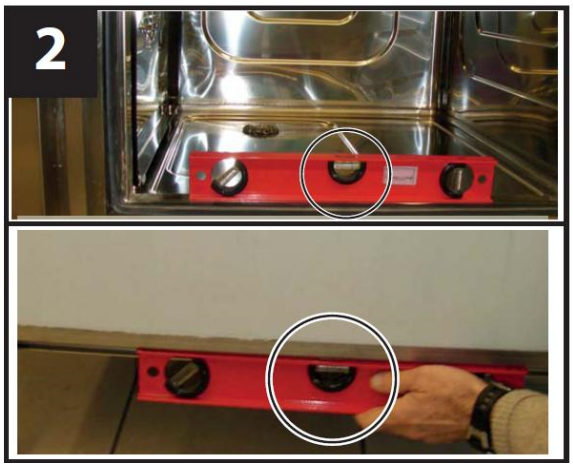


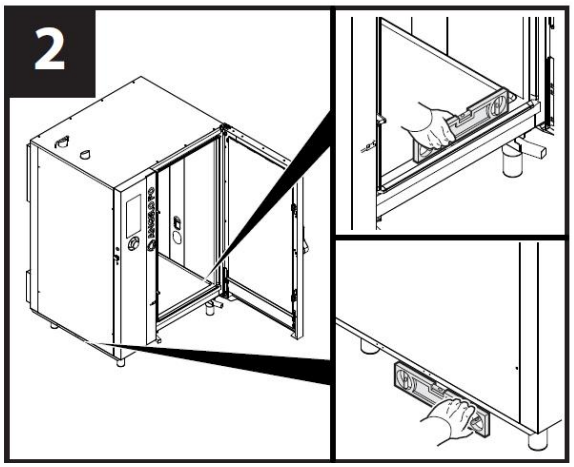
Important – if there is a grate at the front of the oven, must use a rigid structure to cover it.

Warning: Avoid sources of steam in the air of the cooling air filter. The moisture intake may cause a malfunction.

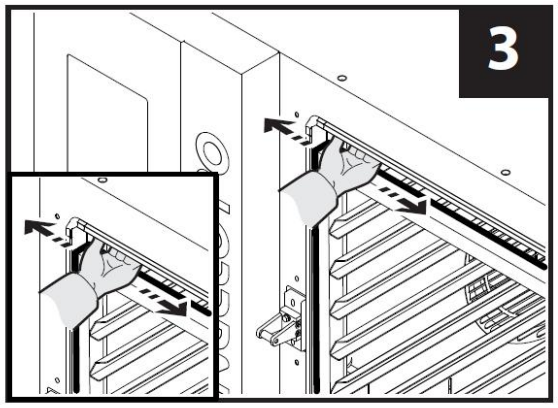









3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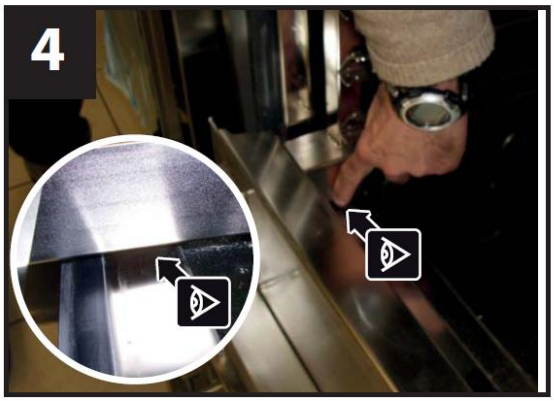
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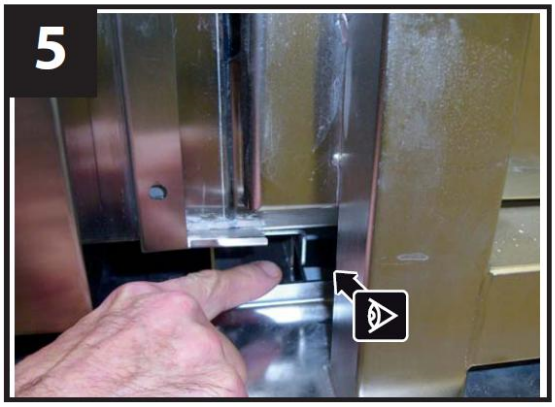
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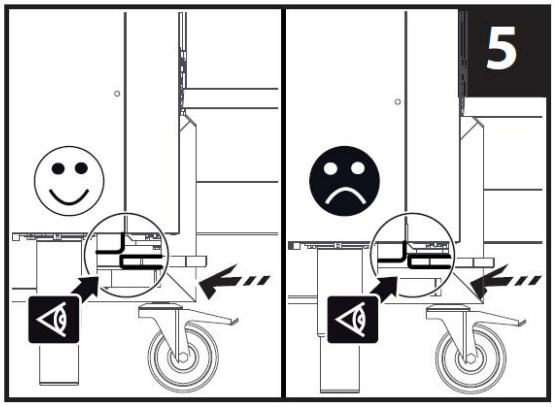
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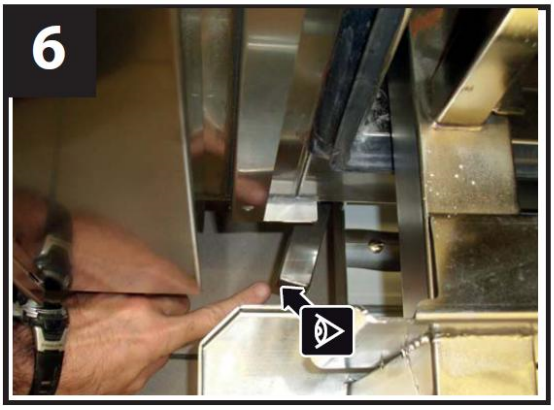
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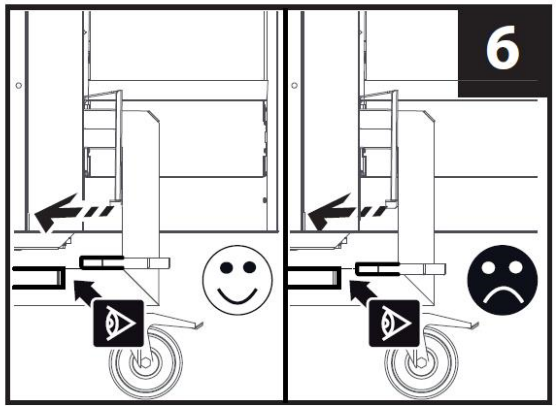
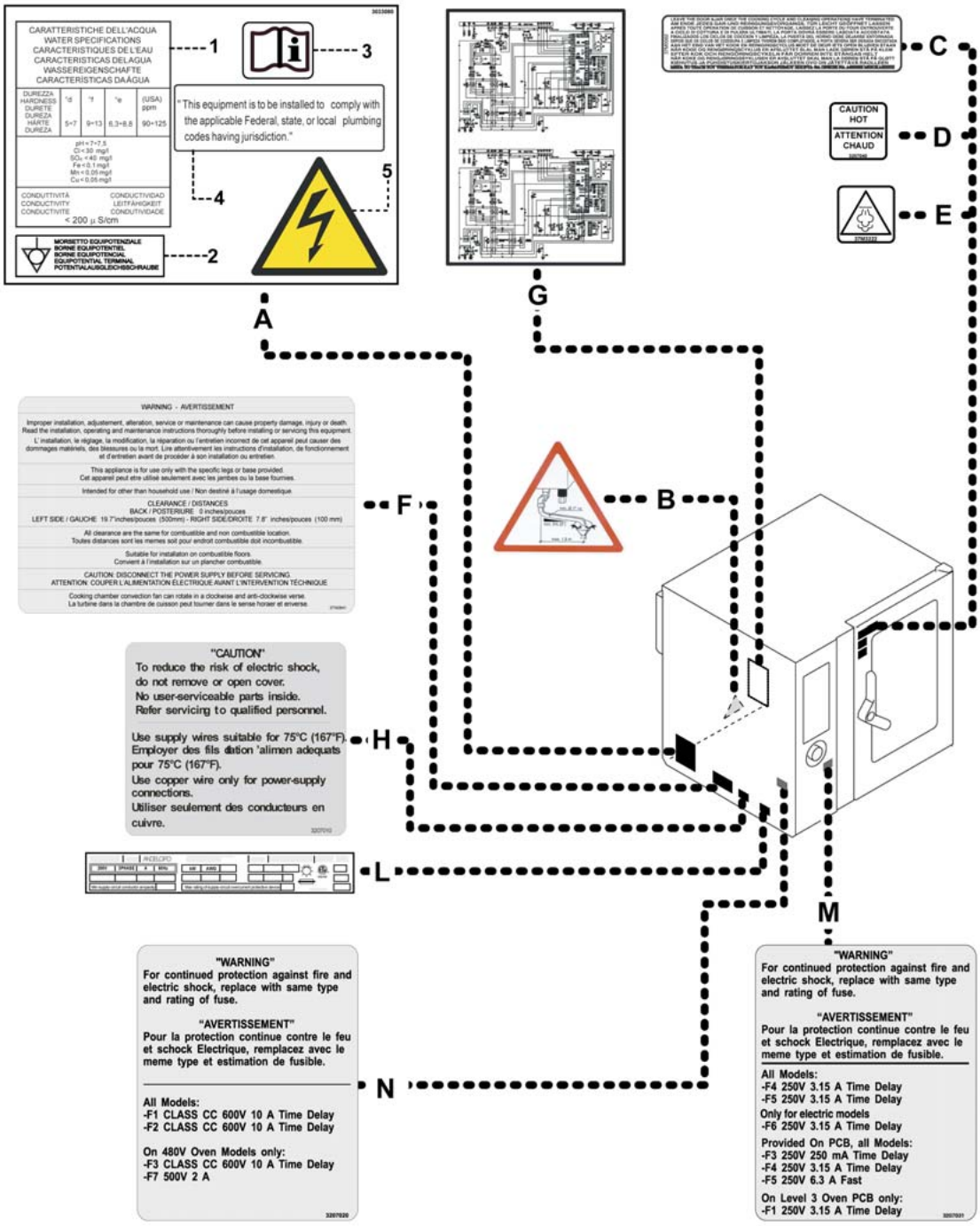

6

ANNEXES

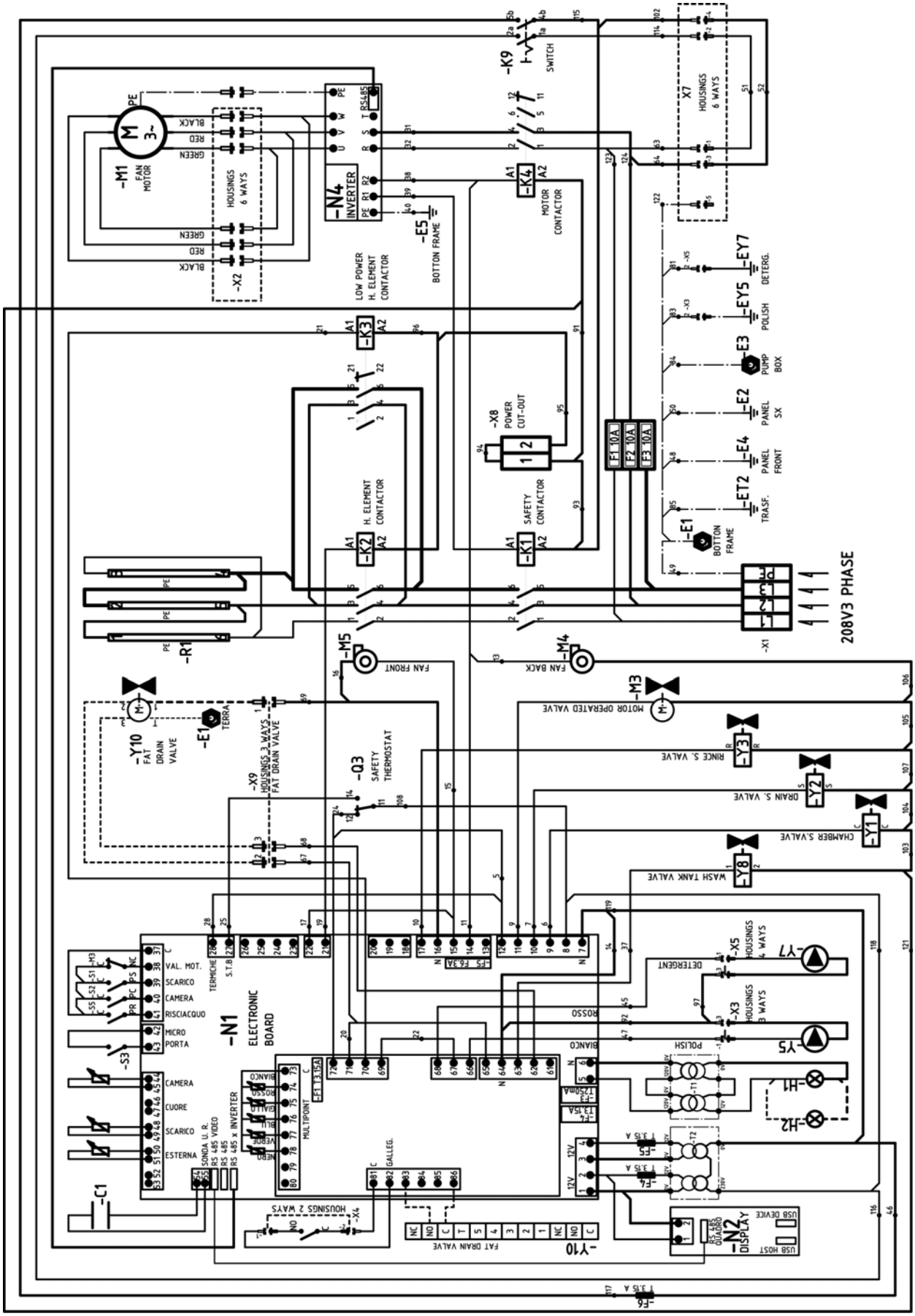
SAFETY AND INFORMATION SIGNS



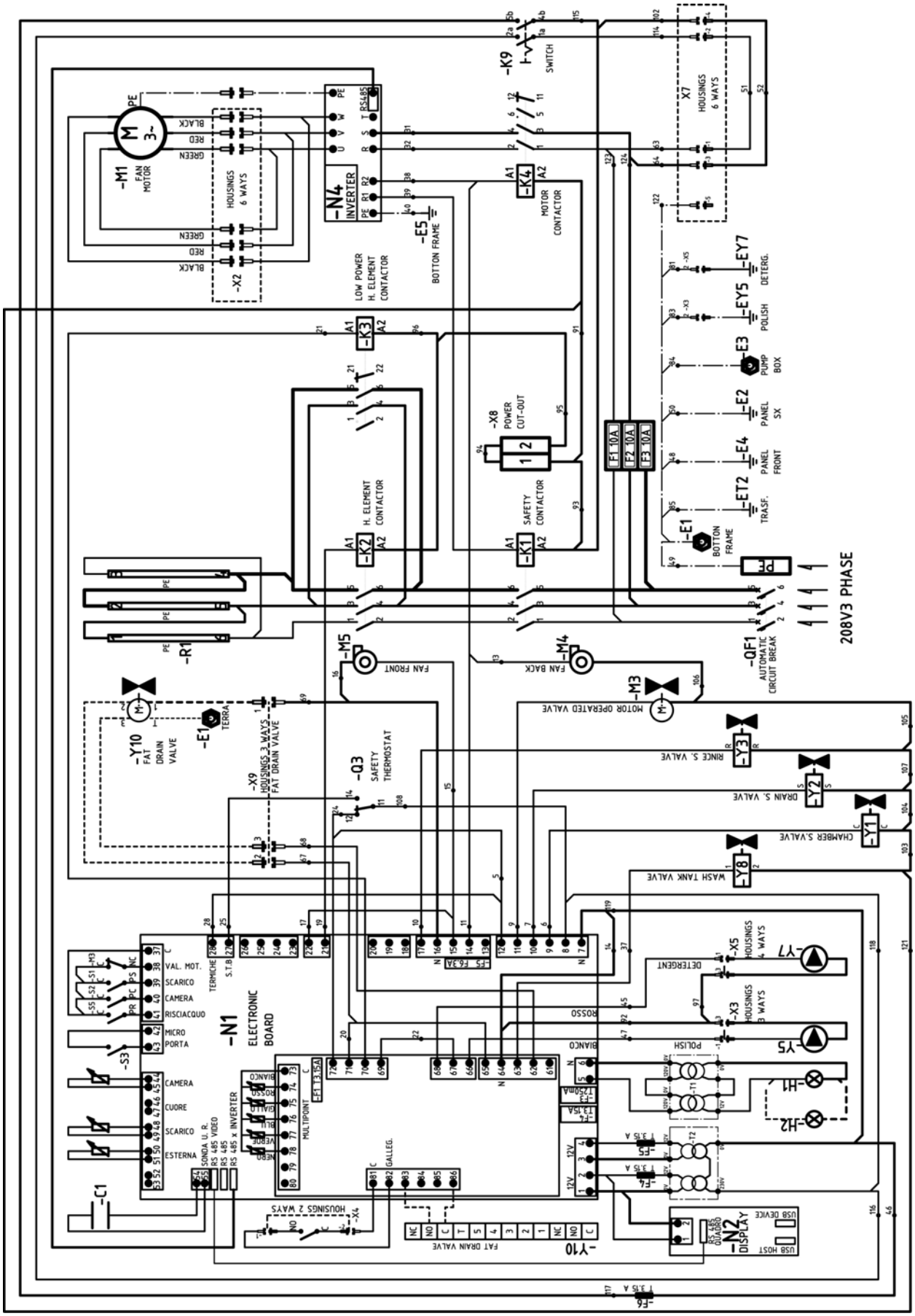
A)
- i) Water specications (Hardness, pH, Conductivity)
- ii) Equipotential terminal
- iii) Read the manual
- iv) This equipment is to be installed to comply with the applicable Federal, state, or local plumbing codes having jurisdiction.
- v) DANGEROUS VOLTAGE

B) **Fan Exhaust**
C) Leave the door ajar once the cooking cycle and cleaning operations have terminated
D) **Caution:** hot surfaces
E) **Caution:** very hot steam
F) **Warning:** Improper installation, adjustement alteration, service or maintenance can cause property damage, injury or death. Read the installation operating and main-tenance instructions thoroughly before installing or servicing the equipmentt; This appliance is for use only with the specific legs or base provided; Intended for other than household use. CLERANCE / BACK / 0 inches / LEFT SIDE 19.7" inches (500 mm) - RIGHT SIDE 7.8" inches (100 mm); All clearance are the same for combustible and non combustible location; Suitable for installation on combustible floors; CAUTION: DISCONNECT THE POWER SUPPLY BEFORE SERVICING; Cooking chamber con-vection fan can rotate in a clockwise and anti-clockwise verse.
G) **ELECTRIC DIAGRAM**
H) **CAUTION:** To reduce the risk of electric shock, do not remove or open cover. No user-serviceable parts inside. Refer servicing to qualified personnel. For continued protection against fire and electric shock, replace with same type and rating of fuse. Use supply wires suitable for 75°C (167°F).
I) NAME PLATE
J) Warning: Type and rating of fuse
K) Warning: Type and rating of fuse

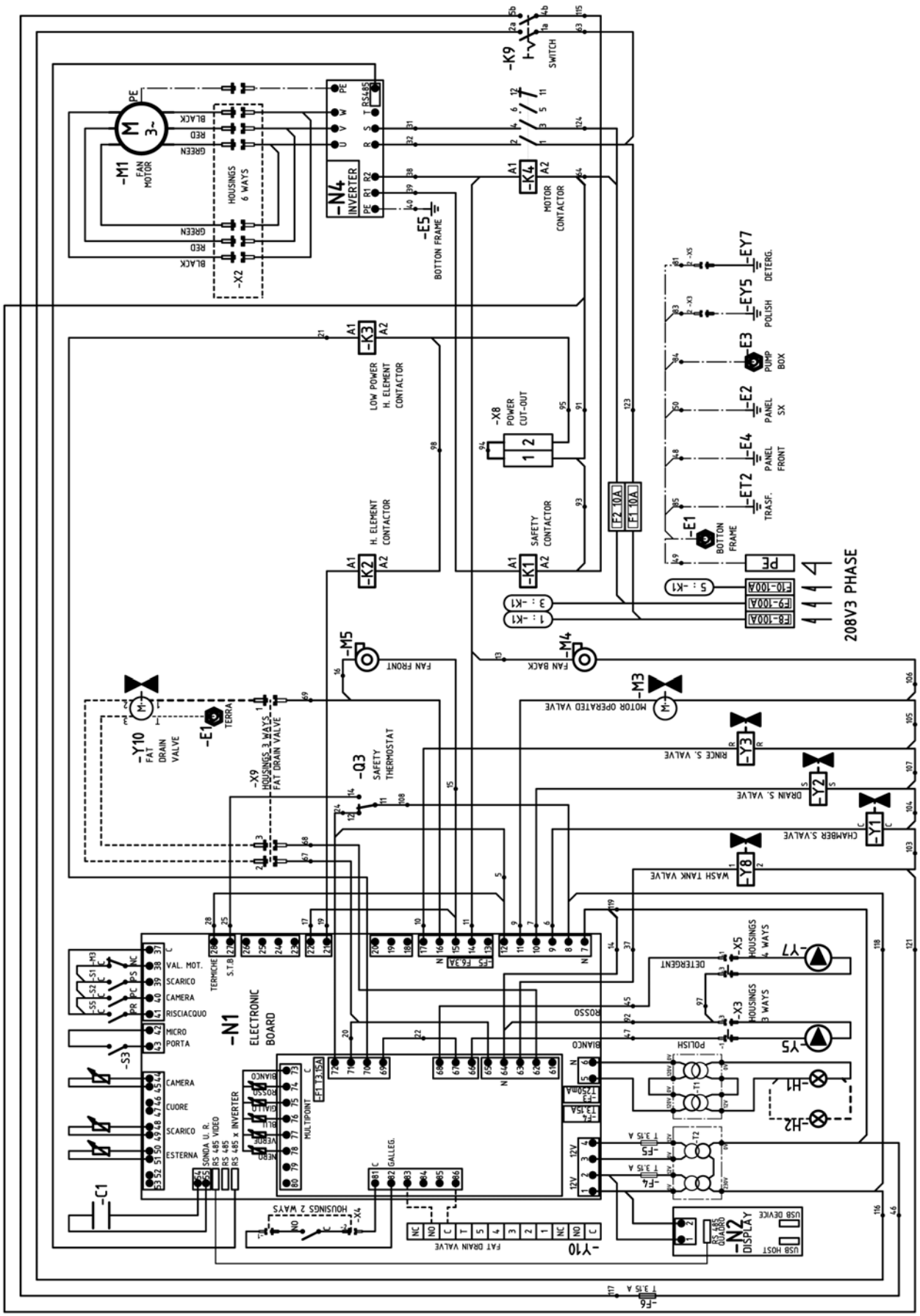
ELECTRICAL SYSTEM DIAGRAM (FX61 E3 208V3 / 240V3)



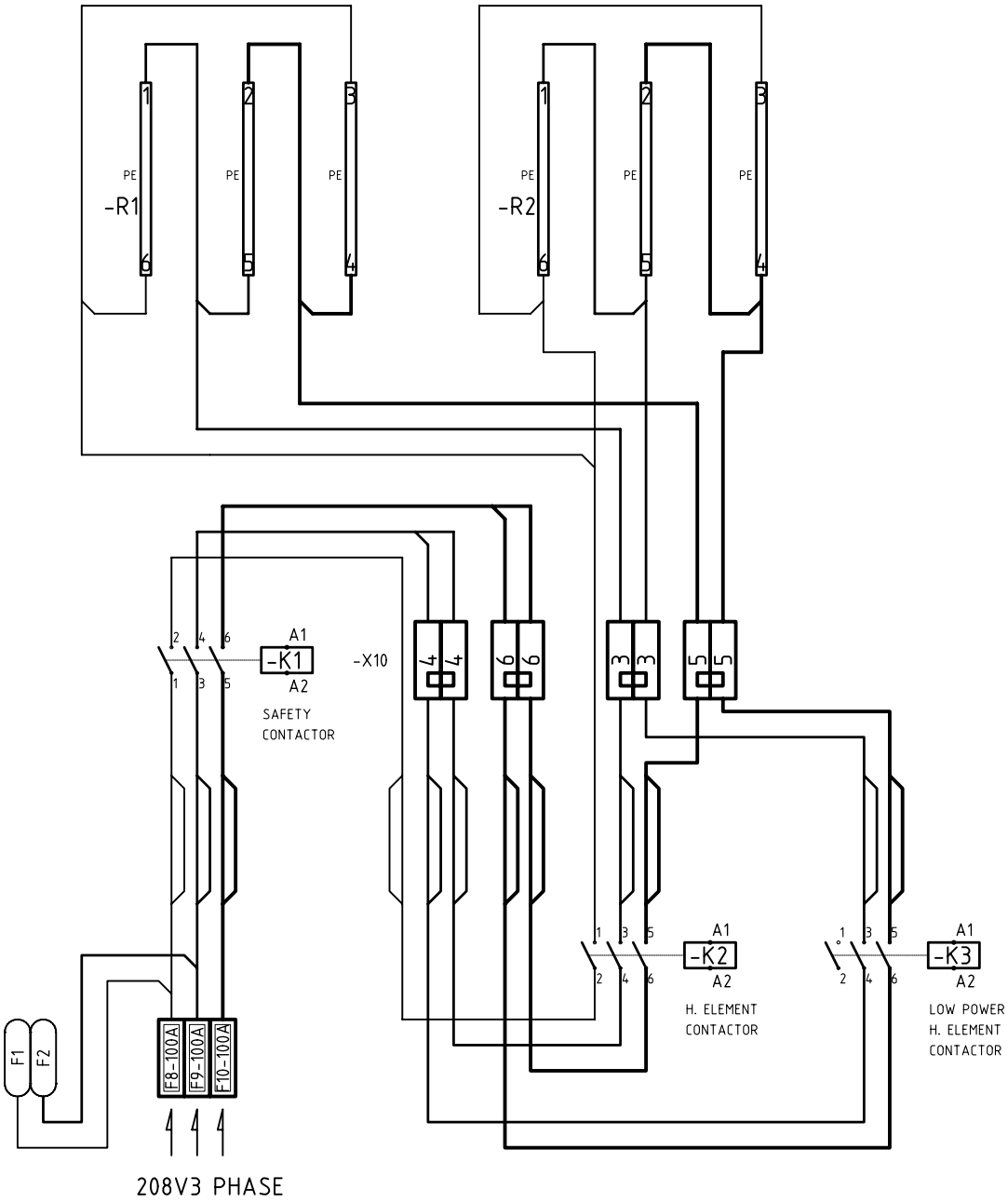
ELECTRICAL SYSTEM DIAGRAM (FX 82-101 E3 208V3 / 240V3)



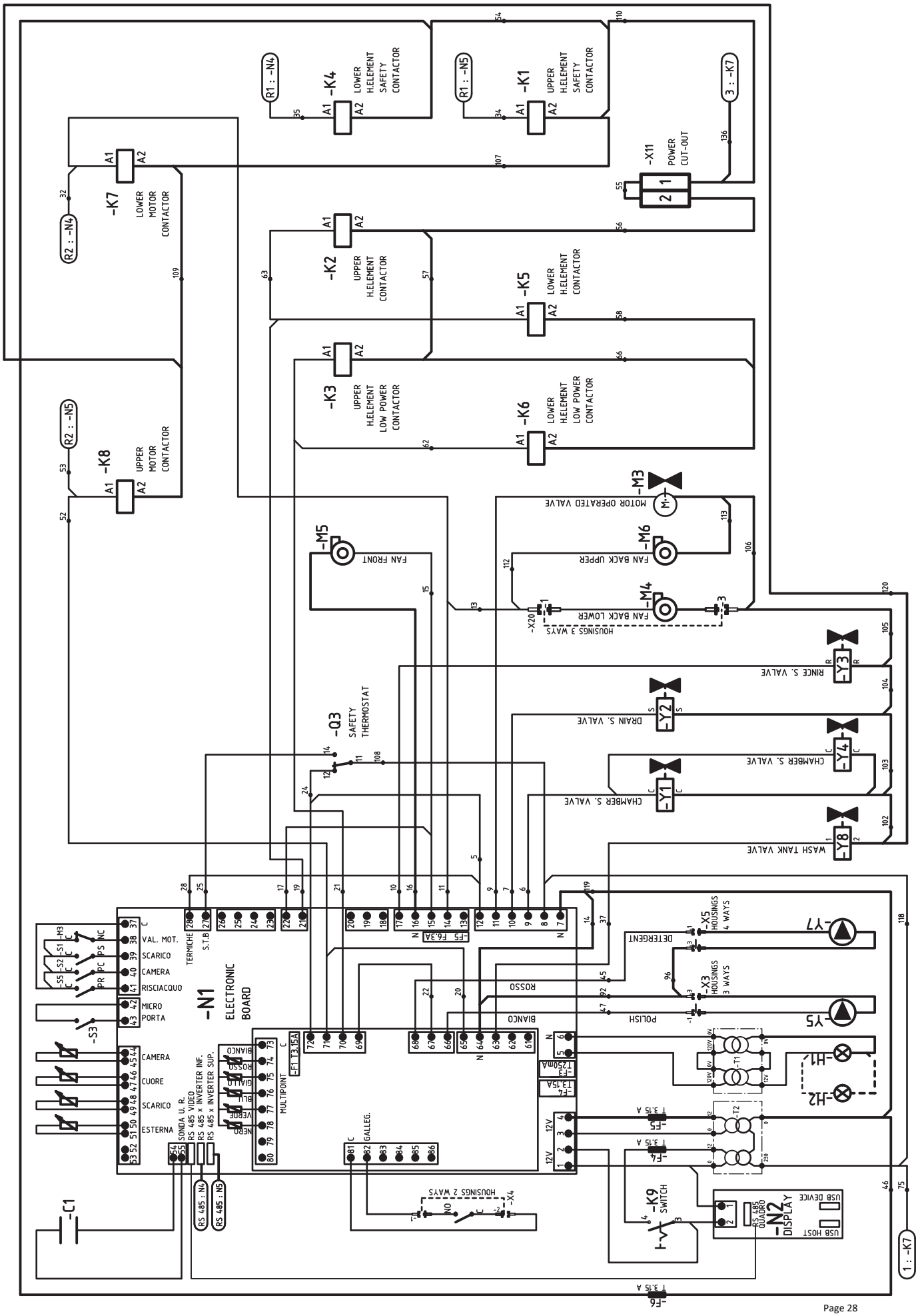
ELECTRICAL SYSTEM DIAGRAM (FX122 E3 208V3 / 240V3 - A)



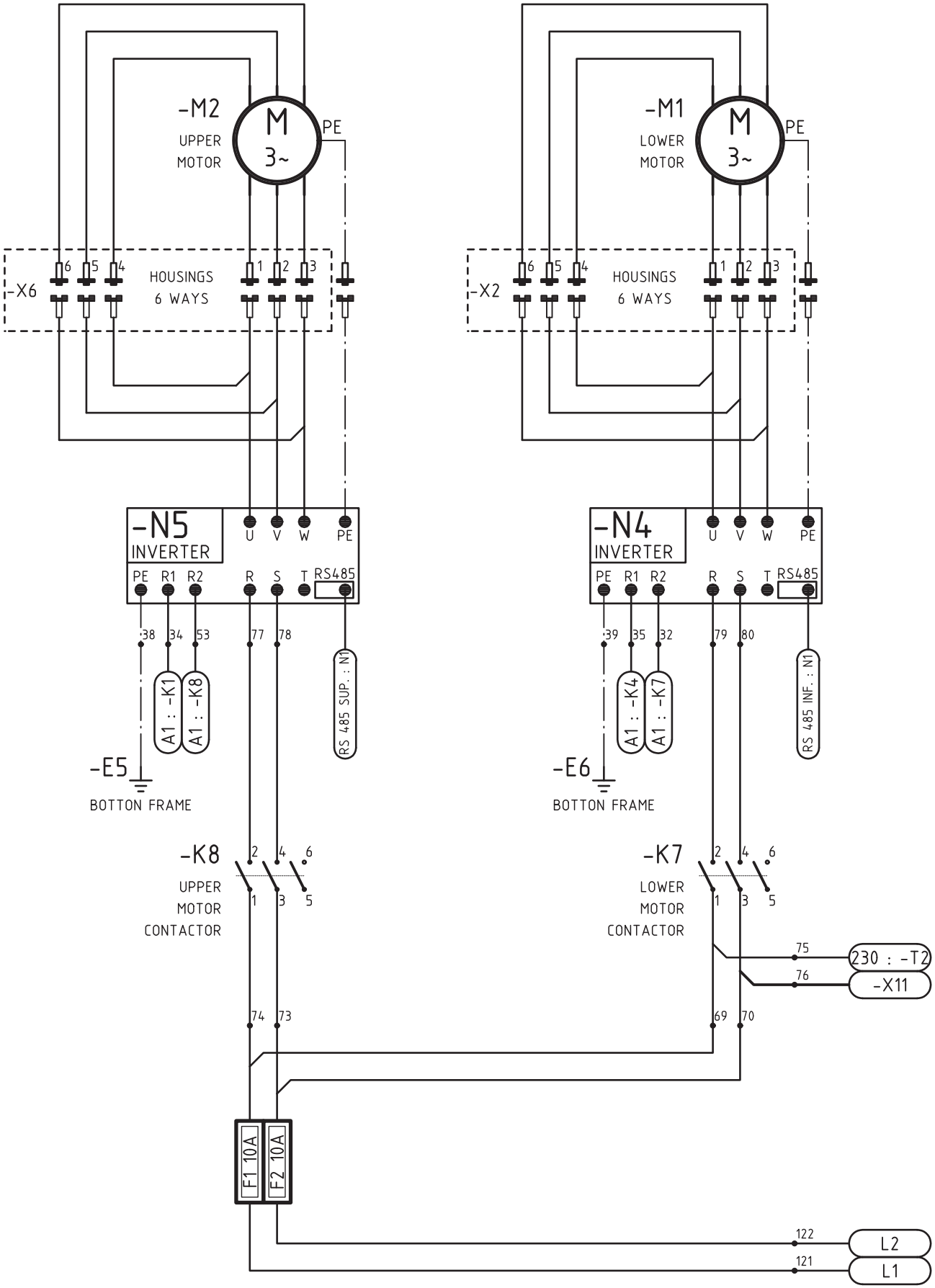
ELECTRICAL SYSTEM DIAGRAM (GBS FX122 E3 208V3 / 240V3 - B)



ELECTRICAL SYSTEM DIAGRAM (FX202 E3_208V3/240V3_A)



ELECTRICAL SYSTEM DIAGRAM (FX202 E3 208V3/240V3 B)



ELECTRICAL SYSTEM DIAGRAM (FX202 E3 208V3/240V3 C)