

# Insignia AIO Steam Generator Manual



**Please read the manual carefully before installation  
and keep the manual for further reference.**

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## 1. Configuration List

Upon receiving your steam generator, please check you have all the following components in the box. Should any part be missing from the list, please contact our customer service team.





Photos	Item name	Quantity
	Steam generator in stainless steel housing	1pc
	Controller & housing box, waterproof touch screen	1set
	AIO Central function box	1pc
	Central function box power cord	1pc
	3/4" Full-bore straight auto drain valve	1pc
	Control cable, length 5 m (central function box -> controller)	1pc
	Temp sensor with box, length 5 m (central function box -> sensor end position)	1pc
	Central function box cable (steam generator -> central function box)	1pc
	Stainless steel#304 steam nozzle	1pc for 3kw~13.5kw 2pcs for 15kw~24kw
	Safety valve	1pc
	Manual	1pc

Table 1

## 2. Introduction

Thank you for choosing the Insignia AIO series steam generator which comprises of a well-designed structure, steady performance, and convenient installation. Ideal for a professional home or commercial installation the AIO system will delivery bellowing bouts of steam allowing you to enjoy the delightful feeling of warming steam that deeply relaxes your senses, reviving and rejuvenating tired skin and leaving you feeling glowing and refreshed.

Safety is paramount, and given the nature of these heavy-duty units, we only recommend that a professional electrician and plumber is used throughout the installation, NEVER undertake this yourself.

For a professional installation, operation, maintenance, and safety, please read all instructions carefully and keep this manual for further reference.

*Welcome to your own world of luxury!*

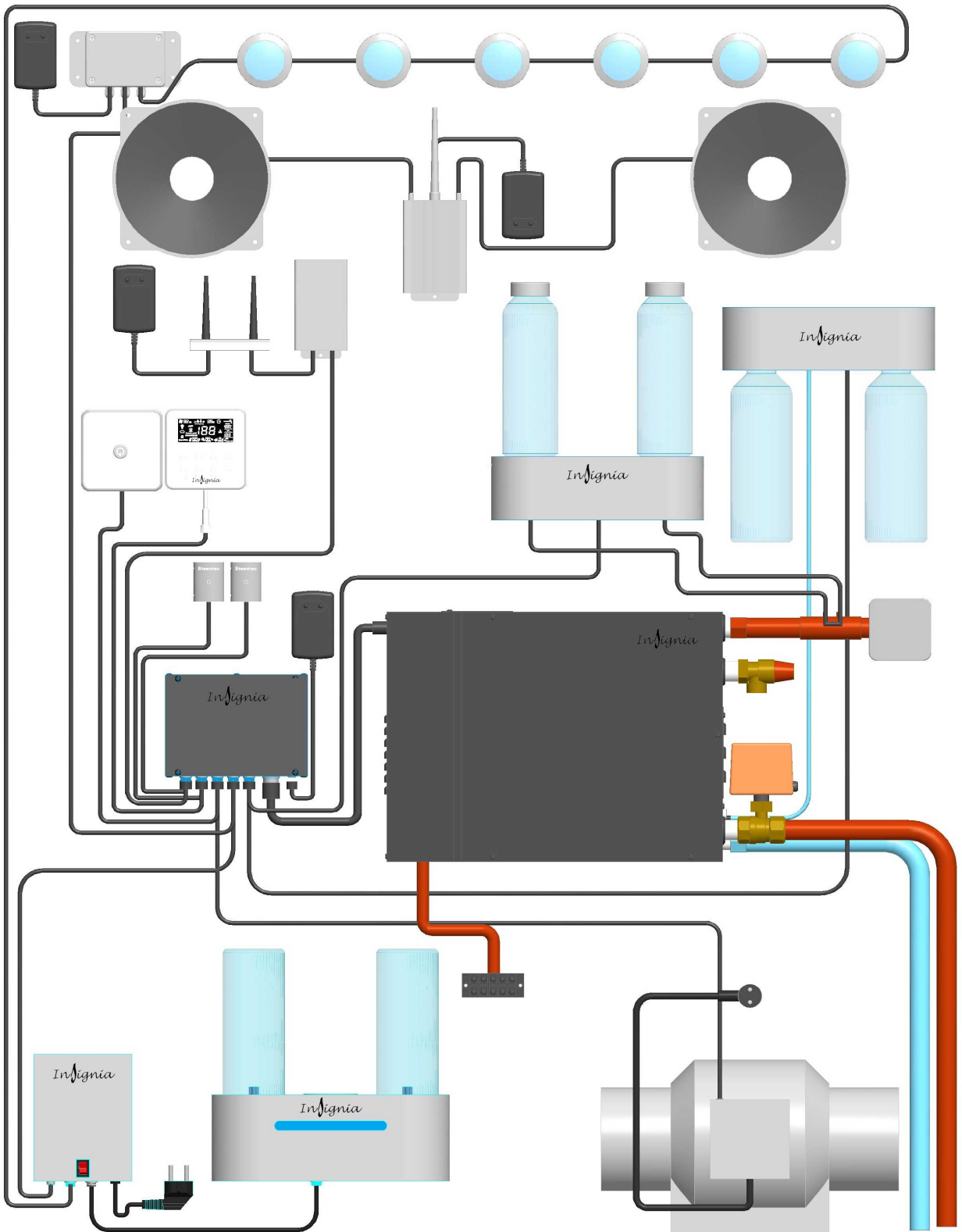


Figure 1 The whole AIO system (sold separately)

### 3. Safety Warning

- This appliance is not intended for use by person with reduced physical, sensory or mental capabilities, under 16 years old, or lack of experience and knowledge, unless they have been given supervision or instruction concerning use of the appliance by a person responsible for their safety.
- Children should be supervised to ensure that they do not play with the appliance.
- Check steam room before restart the controller.
- Smoking and alcohol are not permitted inside the steam room.
- Leave the steam room immediately if you feel uncomfortable or unwell.
- A ventilation fan is recommended for the steam room.
- This steam generator is for heating up the steam room, never undertake any change to the system by yourself, unless under the help or the guide of someone who can be responsible for the safety.



**When the steam room is not in use for a prolonged period of time, please DISCONNECT/ISOLATE the steam generator mains power supply and general water supply.**

### 4. Install Cautions

- If the generator is installed at a place where difficult for customer access, the water supply valve must be easy to access for emergencies.
- GFCI must be installed on the power supply, and the power supply, power wire, fuse and breaker must comply with the nameplate on the unit and table 2 in this manual.
- The solenoid valve can endure maximum 0.8MPa (8kg/cm<sup>2</sup>) water pressure. To protect the solenoid valve from extremely high water pressure, please turn down the inlet slightly or install water pressure reducing valve.
- Do not install saddle-backed or needle valves on the inlet. Please dredge and clean the pipe before installation.
- Strictly no blocked or blended pipe, otherwise this will have a negative effect on the flow of steam and condensate. The steam pipelines should be installed with a slight angle so that the condensate can flow back to the generator or the steam head.
- Steam generator should be installed indoor to avoid frozen. The generator should be installed and leveled with the arrow pointing upward at an easy-access place, otherwise do not switch on.
- The steam pipeline must be copper pipes or stainless-steel pipes, all other material such as plastic, acrylic should not be used since they cannot endure 150°C or higher temperature.
- All inlet and apertures should be sealed to prevent any leakage of steam and to protect the generator and customers.
- Don't drain water into the steam room from the water tank as may cause serious scald and damage the steam room.
- All inlet water pipes and steam pipelines should be built according to the National Standard and this should be done before sealing the wall.

## 5. Parameters

### 5.1. Models, parameters and dimension

(Only apply to European style voltage and phase)

Model	Power	Phase	Heating elements	Voltage / Current	Power wire	Breaker	Room volume	Dimension (L*W*H)
	kW	N	N*KW	V/A	N*mm2	A	m3	mm
T-30	3.0	1	2*1.5	215-240/13.6	3*2.5	16	2~3	425*160*315
T-40	4.0	1	2*2.0	215-240/18.2	3*2.5	25	3~5	
T-45	4.5	1	3*1.5	215-240/20.5	3*2.5	25	3.5~5.5	
		3		380-415/6.8	5*1.5	16		
T-50	5.0	1	2*1.5+1*2.0	215-240/22.7	3*2.5	32	4~6	
		3		380-415/9.1	5*1.5	16		
T-60	6.0	1	3*2.0	215-240/27.3	3*4.0	40	5~7	
		3		380-415/9.1	5*1.5	16		
T-70	7.0	1	2*2.5+1*2.0	215-240/31.8	3*6.0	40	5.5~8	
		3		380-415/10.6	5*2.5	16		
T-75	7.5	1	3*2.5	215-240/33.75	3*6.0	60	6.5~9	
		3		380-415/11.25	5*2.5	16		
T-90	9.0	3	6*1.5	380-415/13.6	5*2.5	16	8~11	475*185*450
T-105	10.5	3	3*1.5+3*2.0	380-415/15.9	5*2.5	25	9~12	
T-120	12.0	3	6*2.0	380-415/18.2	5*2.5	25	11~14	
T-135	13.5	3	3*2.0+3*2.5	380-415/20.25	5*2.5	32	12~15	
T-150	15.0	3	6*2.5	380-415/22.7	5*2.5	32	13~18	
T-165	16.5	3	6*2.0+3*1.5	380-415/24.75	5*4.0	40	14~20	510*185*460
T-180	18.0	3	9*2.0	380-415/27.3	5*4.0	40	16~22	
T-225	22.5	3	9*2.5	380-415/34.1	5*6.0	60	19~26	
T-240	24.0	3	6*2.5+3*3.0	380-415/36.4	5*6.0	60	22~30	

Table 2

## Notice:

- The rated power is measured under single phase 230V, therefore the actual operating power under single phase 215-240V, 50/60Hz, or three phases 380-415V, 50/60Hz may be different from the rated value.
- 3KW and 4KW machine, can be only under 215-240V single phase. Please note the earth wire should not less than 1.5mm<sup>2</sup>.
- From 4.5KW to 8KW machine, can be made as 215-240V single phase or 380-415V three phases. Please note the earth wire should not be less than 1.5mm<sup>2</sup>, the live wire and null wire should not less than 2.5mm<sup>2</sup>.
- More than 9KW machine, can be only be installed by 380-415V three phases. Please note the earth wire should not less than 2.5mm<sup>2</sup>, the live wire and null wire should not be less than 4.0mm<sup>2</sup>.

## How to choose the right KW steam generator?

Step One: Calculate the steam room m<sup>3</sup>, (Length\*Width\*Height) in meter.

(1 feet = 0.3048 meter, 1 inch=0.0254 meter)

Step Two: Check your steam room materials.

- If Acrylic, steam generator KW= steam room m<sup>3</sup>
- If Ceramic Tile, steam generator KW= 1.30 X steam room m<sup>3</sup>
- If All Glass tile or Glass Block Walls, steam generator KW= 1.35 X steam room m<sup>3</sup>
- If Porcelain tile, steam generator KW= 1.6 X steam room m<sup>3</sup>
- If Natural stone tiles\* up to 1/2", steam generator KW= 2 X steam room m<sup>3</sup>
- If Natural stone slabs over 1/2", steam generator KW= 2.25 X steam room m<sup>3</sup>

## 5.2. Steam generator construction

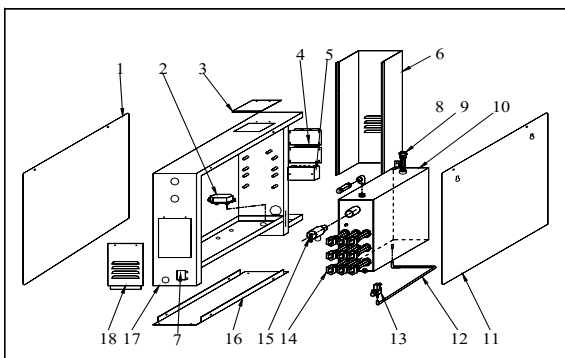


Figure 2 Steam generator structure chart

- |   |  |
|---|--|
| <ul style="list-style-type: none"> <li>17. Safety valve</li> <li>18. Base plate</li> <li>19. Drain valve</li> </ul> | <ul style="list-style-type: none"> <li>1. Front Cover</li> <li>2. Wire entry hole</li> <li>3. Small cover</li> <li>4. Sub-board (relay board)</li> <li>5. Wire terminal</li> <li>6. U shape cover</li> <li>7. Water inlet position</li> <li>8. Steam outlet</li> <li>9. Water level sensor</li> <li>10. Inner tank</li> <li>11. Back Cover</li> <li>12. Water inlet hose</li> <li>13. Solenoid water inlet valve</li> <li>14. Heating elements</li> <li>15. Base Plate</li> <li>16. Element access cover</li> <li>17. Safety valve</li> <li>18. Base plate</li> <li>19. Drain valve</li> </ul> |
|---|--|



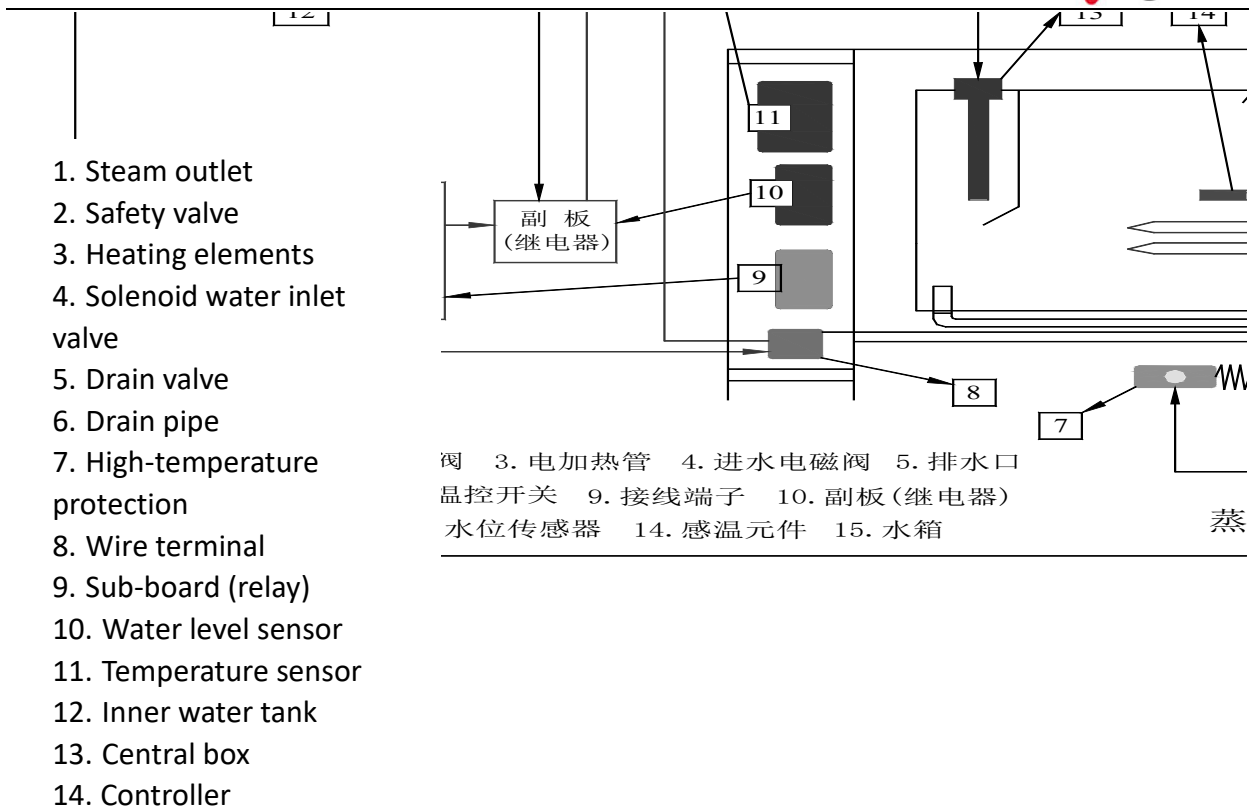


Figure 3 Steam generator schematic diagram

### 5.3. Control panel parameters and dimensions

Controller model	Controlling time range (minutes)	Temperature showing range	Temperature controlling range	Dimension (mm)
AIO	1~60 or long-term (CH)	6~60°C (43°F~140°F)	35~60°C (95°F~140°F)	103*103*45

Table 3

## Control Panel



Figure 4 AIO control panel

AIO Controller can be installed inside the steam room.

However, we recommend you install the controller outside the steam room to extend its service life.

## 6. Installation and Cautions

### 6.1. Installation cautions

- ◆ **DO NOT use locking pliers to over tight the DRAIN PIPE connection.**
- ◆ **Before installation, you MUST read all the install Cautions in this manual, as outlined on page 6.**

### ◆ **Selecting the proper steam generator**

To achieve comfort and relaxation, as well as energy efficiency, the selection of the correct steam generator model and size are just as critical as the design of the steam room itself. The power supply and circuit protector should be carefully checked to match the parameters of the generator. Please refer to table 2 to select the suitable model for your specification.

### 6.2. Installation of steam generator body

#### 6.2.1. Cautions

- Switch off all power supply before installation, and check whether you have the correct model for your steam room according to table 2 & its notice.
- Do not install the generator outdoors, in wet/moist place, freezing, or corrosive place. Do not install the generator near to inflammables such as oil paint, diluents and fuel. Be mindful of the steam pipeline and safety valve since the high temperature of steam is dangerous to customers.
- Generator **MUST** be installed as shown by the arrows on the unit, Level and all vents on the unit free from obstruction.
- The generator **MUST** be installed in a dry and very well-ventilated place - minimum requirement of 1.3cbm of air space is required. Never starve the unit of air as it could cause the unit to enter in to heat protection mode and could damage the unit.
- The Generator can be installed either on the wall or on the ground but must be well fixed. Install the generator as close as possible to the steam room. Examples as shown in Figure 5 (Always take note of ventilation)

#### 6.2.2. Installation

- i. Install the generator on the wall: drill two small holes with diameter of 8mm on the wall, insert the expansion screws and then hang the generator on those screws (not supplied)
- ii. Install the generator on the ground or deck: install a frame on the site and then screw the generator into the frame.
- iii. Central function box should be installed near to the steam generator as near as possible, as the length of the cable (connecting the steam generator and the central function box) is 50cm. Please do not use other extended cable, only the cable provided will work with the system.
- iv. For better service and maintenance, please install the generator with the nameplate face to front and leave more than 250mm space around the generator.

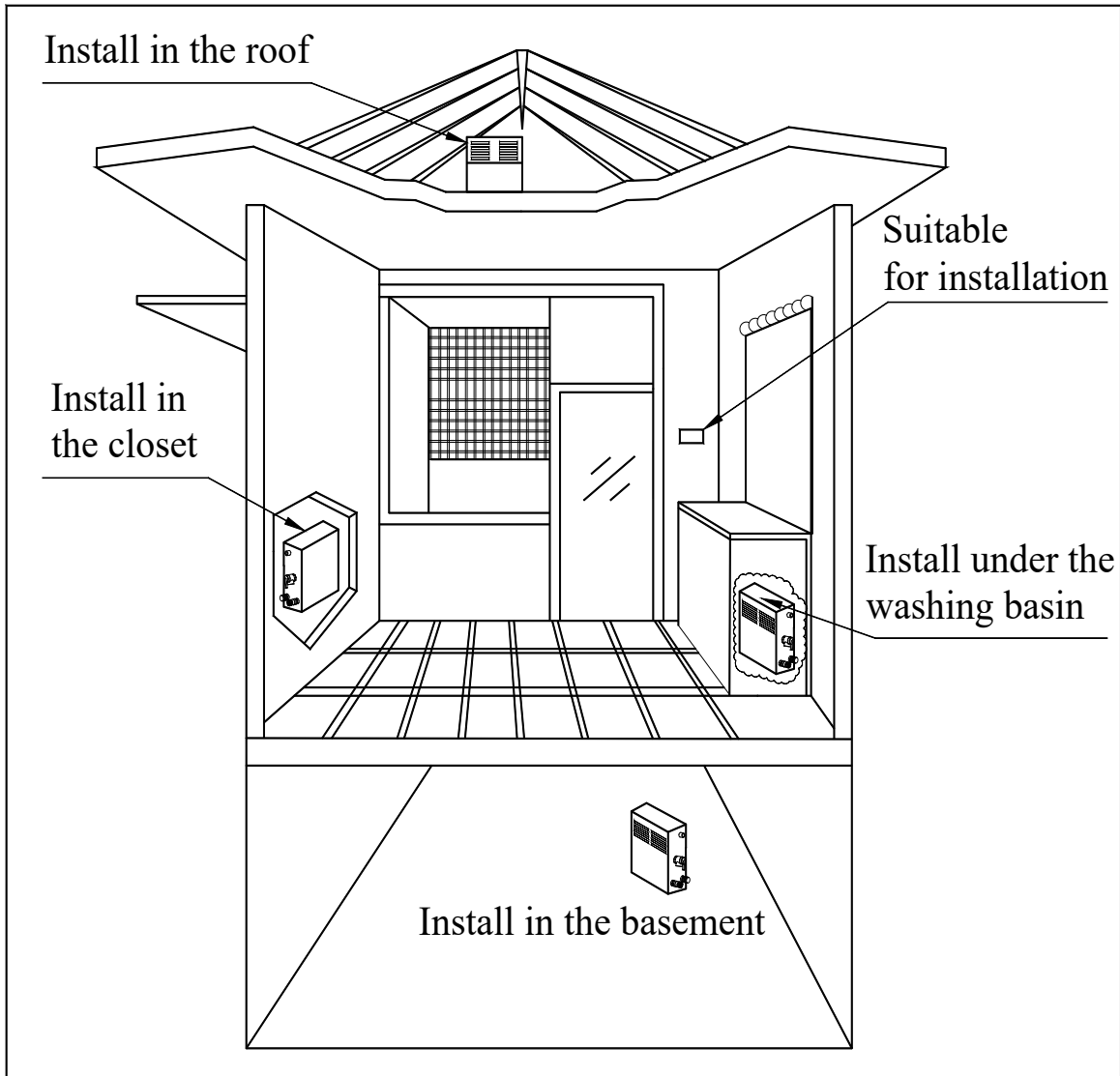


Figure 5 Places to install steam generator

### 6.3. Installation of Central function box

- Central function box should be installed near to the steam generator, as the cable for connecting the central function box and the steam generator is only 50 cm.
- Please hang the central function box on the wall.
- It requires a separate power supply which is supplied with the unit.
- Connect the function equipment (Like aroma pump, color lights etc) to the central function box respectively.

Size :18\*14\*5CM



Figure 6 Central function box

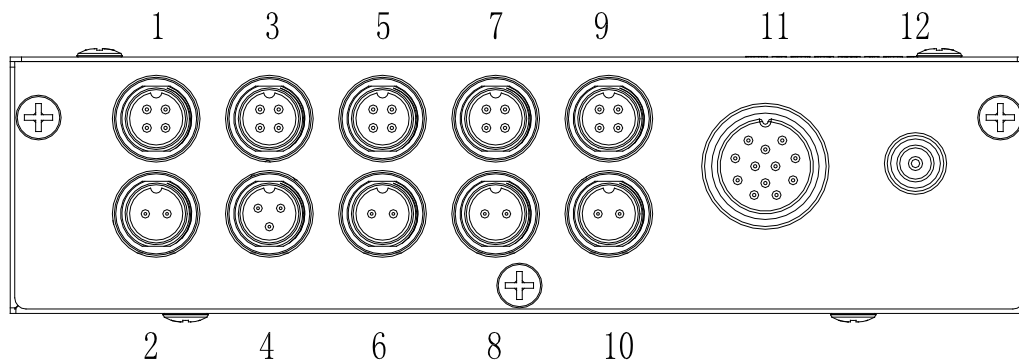


Figure 7 Central function box connectors

- |                                  |                                      |
|----------------------------------|--------------------------------------|
| 1. APP ( <b>Not functional</b> ) | 7. Color lights                      |
| 2. Steam room temperature sensor | 8. Salt spray generator              |
| 3. Controller                    | 9. Aroma pump                        |
| 4. Steam room humidity sensor    | 10. Descaling pump                   |
| 5. Fast steam switch             | 11. Connector to the steam generator |
| 6. Fan                           | 12. Power supply 12V DC              |

Connect the steam generator with the central function box by using the 12-core cable we provided. Please install the central function box near to the steam generator as close as possible. Please note the 12-core cable can't be extended.

NOTES: (indicators explanation)

D34: Main board power supply indicator

D39: Relay contact on-off state indicator

D24: Water level detection signal indicator  
 D18,D19,D20: Heating indicator

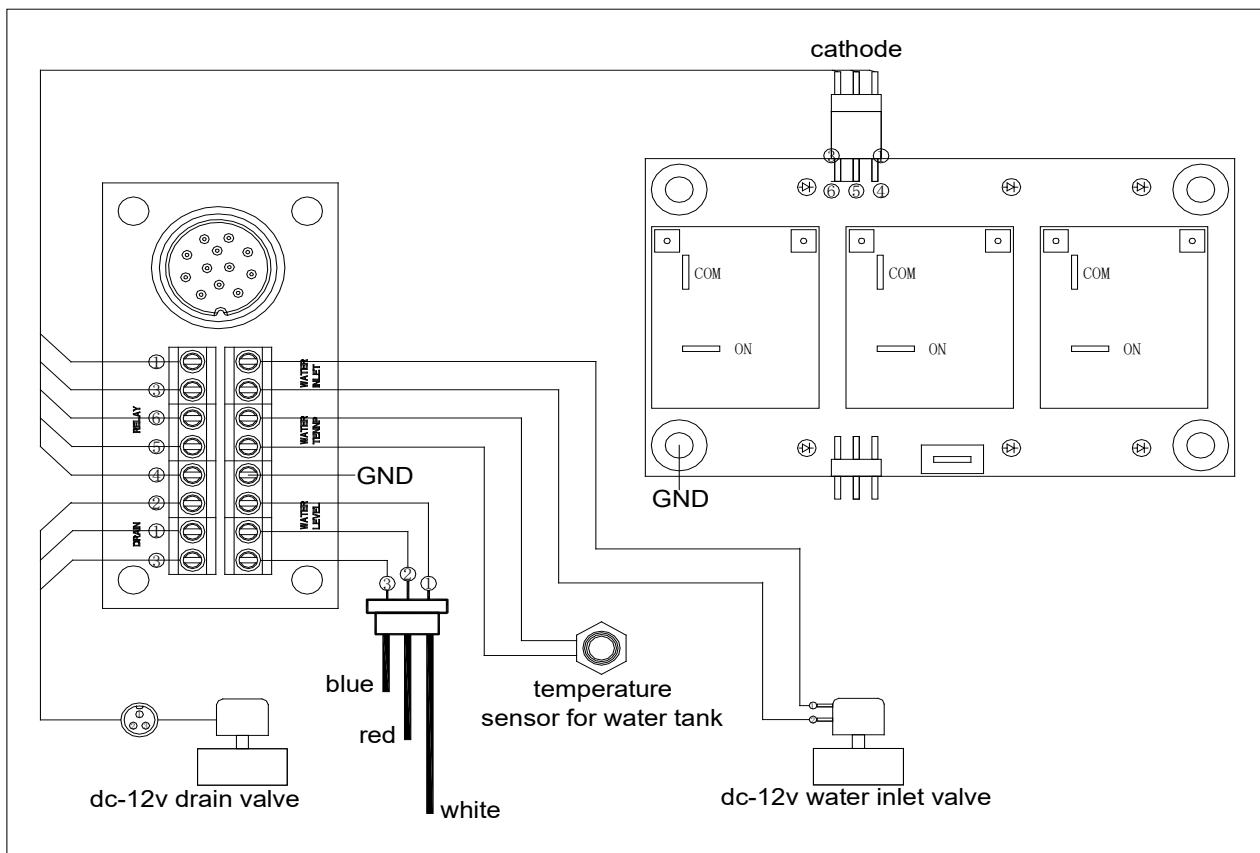


Figure 8 Steam generator 12-core cable socket corresponding functions

## 6.4. Installation of controller and temperature sensor

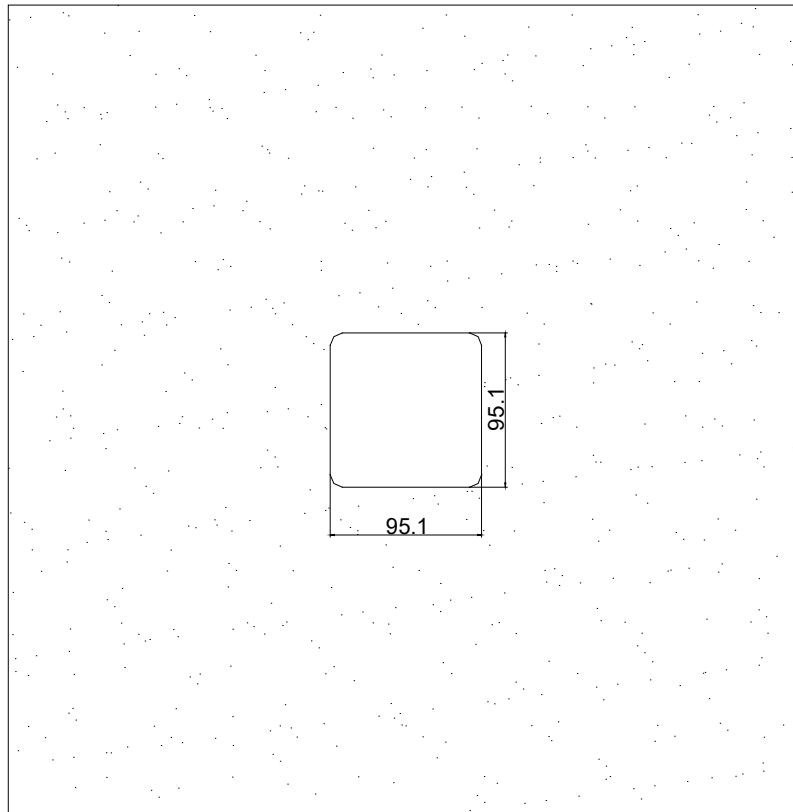
### 6.4.1. Cautions

The control wire and temperature wire should not be parallel to or intersect with the power wire. The temperature sensor should NOT be installed on the side of the wall which is behind the door.

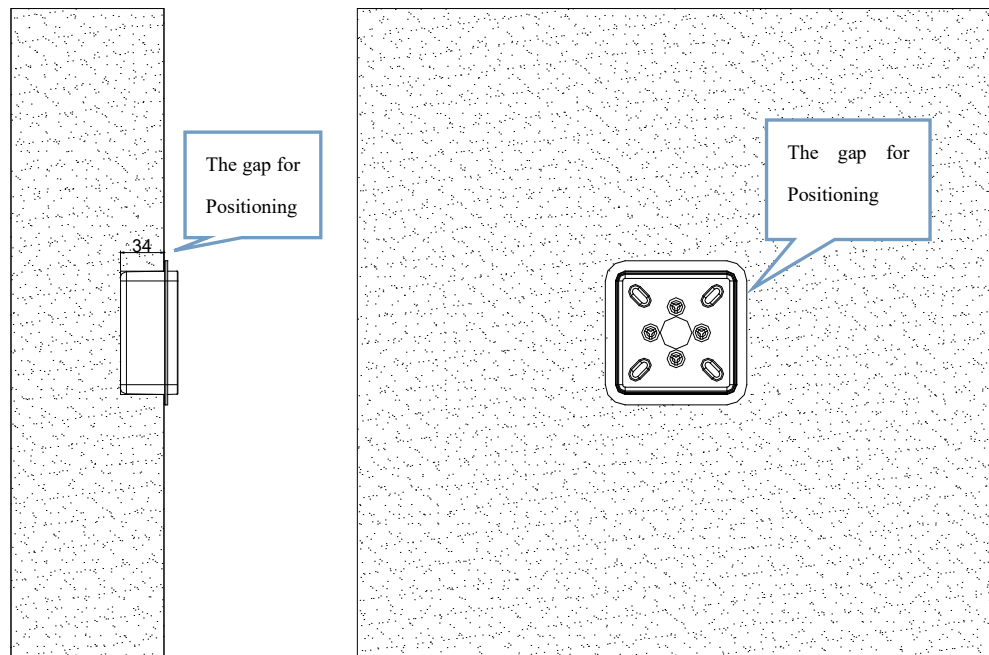
### 6.4.2. Installation of controller

The controller should be installed with height of 1.2 m inside or outside the steam room but somewhere it's easy to operate. Firstly follow below 4 steps for install housing box, then pull the control wire through the conduit, then connect the control wire to the central function box. Finally, the controller can be inserted into the housing box on the wall (Refer to figure 9).

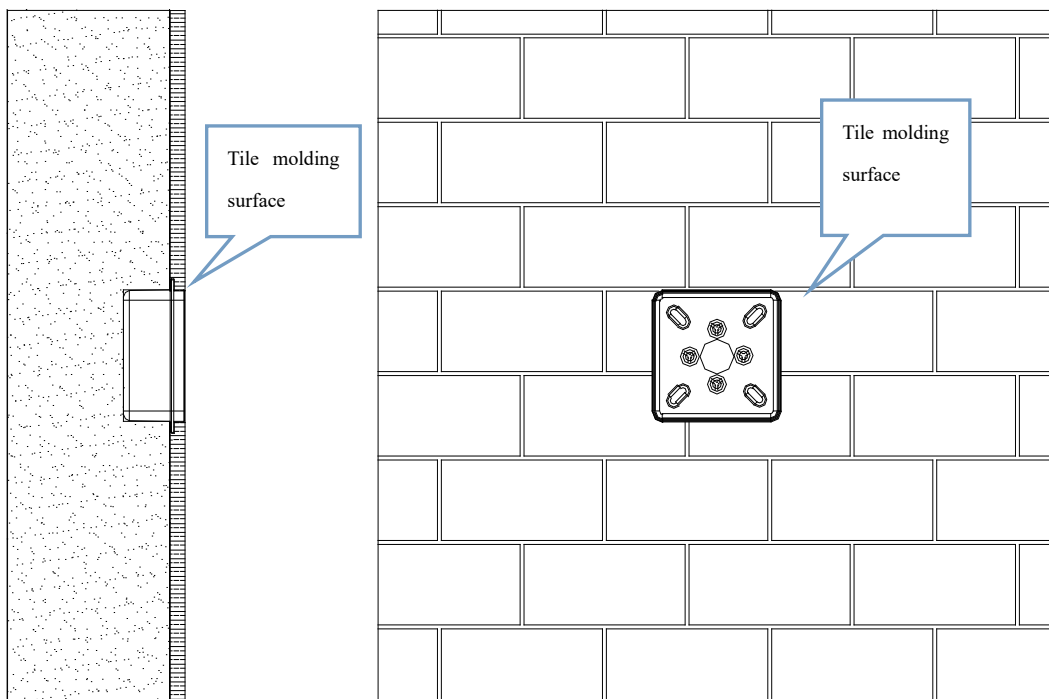
Steps for install housing box:



First step: open the hole on wall :95\*95MM Depth:34MM

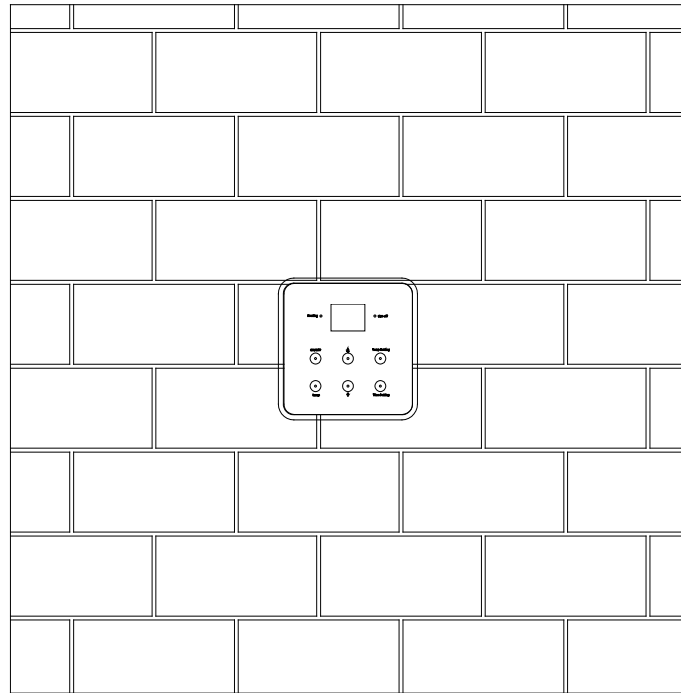
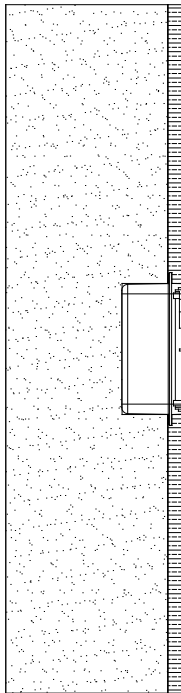


Second step: Housing box into the wall at the gap, horizontal installation



Third step: make the tiles cover the gap and keep in line with tiles





Forth step: insert the controller into the housing box

Real picture



Figure 9 Controller installations

### 6.4.3. Installation of temperature sensor

The temperature sensor is used to measure the temperature inside the steam room, so that the generator can work automatically according to the pre-set temperature and maintain the room temperature constant.

The installation height of the sensor should be about 1.2 –1.5 m from ground. Drill a hole (diameter 16mm ), and screw down the sensor in the steam room (Refer to figure 10), pull the sensor wire through the conduit then connect into the central function box.

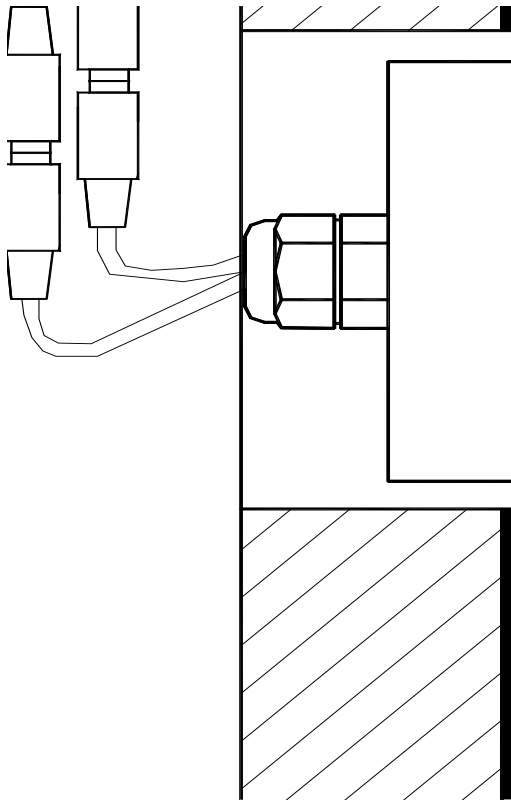


Figure 10 Temp sensor installations

## 6.5. Installation of pipeline



Figure 11 3kw- 13.5kw pipe connection

### 3kw ~ 13.5kw

- ① Service hole 1/2"
- ② Steam outlet:  
3kw~6kw: 1/2"  
7kw~13.5kw: 3/4"
- ③ Safety valve 1/2"
- ④ Water inlet 1/2"
- ⑤ Drain outlet 3/4"
- ⑥ Power supply for drain valve.



Figure 12 15kw-24kw pipe connection

### 15kw ~ 24kw

- ① Service hole 1/2"
- ② Steam outlet 3/4" x 2
- ③ Safety valve 1/2"
- ④ Water inlet 1/2"
- ⑤ Drain outlet 3/4"
- ⑥ Power supply for drain valve.

### **i. Water Inlet:**

First connect the water magnetizer (if applicable) to the water inlet solenoid valve. Then please use a 1/2" flexible stainless steel hose to connect the other side of the water magnetizer and the water supply pipeline. Do not connect to metal water supply pipeline directly which may damage the water inlet valve.

**Attention:** Only use cold water supply.

### **ii. Drain Outlet**

Use 3/4" copper pipe or stainless steel pipe to connect the drain outlet and the drain pipeline of the house. The drain pipeline should be installed with small angle so as to help residual water in the steam generator flow to the drain pipe.

**Attention: DO NOT** use locking pliers to over tight the drainpipe connection. Just make sure its watertight by using PTFE sealing tape. The water which comes out from the steam generator will be over 100°C. Therefore don't use plastic pipe/acrylic pipe/FRP pipe or other similar material pipe.

### **iii. Steam outlet**

Please use copper or stainless steel pipe to connect the steam head and the steam outlet pipe of the generator. The pipe should Ideally be less than 3 meters long and minimize the number of elbows, otherwise heat isolating methods should be implemented.

We **DO NOT** recommend installing a right angle bend immediately on the steam outlet as the pressure from the steam generator can not exit the steam unit quick enough and can cause the unit to trip out or activate the pressure valve.

- For 3KW-6KW steam generator, steam outlet is 1/2", please **AT LEAST** use 1/2" steam pipe, must be stainless steel pipe or copper pipe.
- For 7KW-13.5KW steam generator, steam outlet is 3/4", please **AT LEAST** use 3/4" steam pipe, must be stainless steel pipe or copper pipe.
- For 15KW-24KW steam generator, steam outlets are **TWO** 3/4" , please **AT LEAST** use **TWO SEPARATE** 3/4" steam pipes, don't cross the two steam pipes, must be stainless steel pipe or copper pipe.

**Attention:** Always choose the right diameter steam pipe, as if the pipe size is smaller than our recommendation, it may cause the steam generator internal pressure to increase suddenly which may damage the steam generator and have safety risk.

### **iv. Safety Valve**

It's to release the pressure of steam generator, use 1/2" copper pipe or stainless steel pipe to connect the safety valve and the drain pipeline of the house. Never block it.

## v. Steam Head

The steam head should be about 300mm from the ground and at least 150mm from the installed seating. Please apply silicone glue on the steam pipe nipple and back of the steam head, and then screw the steam head on to the steam pipe nipple. Please refer to figure 13, the Aromatherapy reservoir should face upwards.

## vi. Service hole

Can be used as maintenance hole or another steam outlet 1/2". For maintenance, please refer to Warranty And Services.

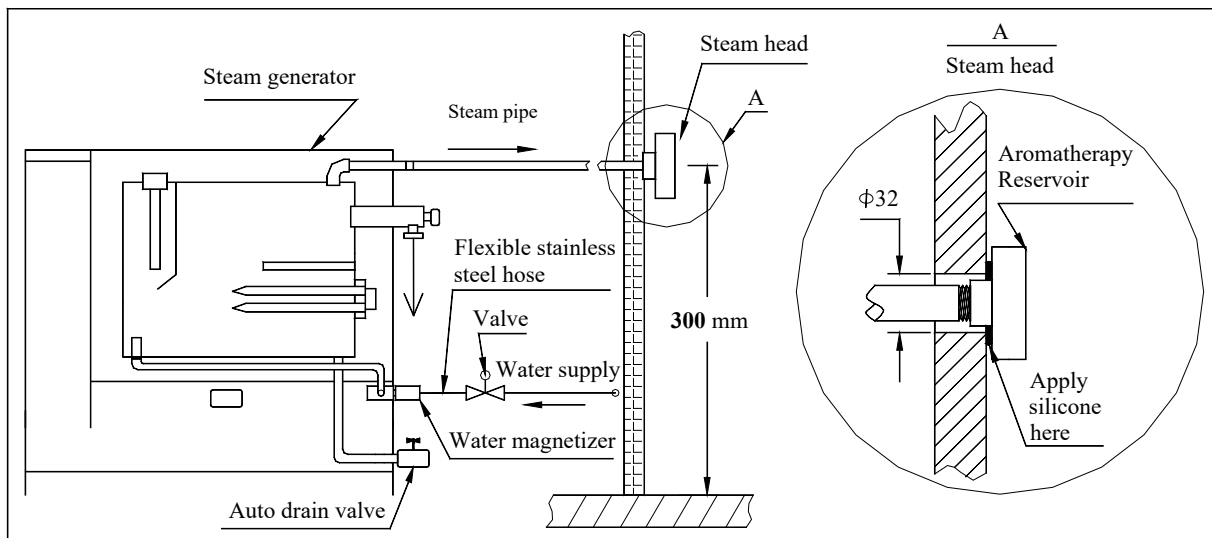


Figure 13

## 6.6. Installation of electrical circuits


### Cautions

- All circuits should be installed by licensed electricians and conform to local and national codes.
- Power supply must be cut off before installation, maintenance and repair. Pressing the on/off button on the controller will **NOT** cut off the power supply.
- No additional power supply or wire is allowed to connect to the generator. Do **NOT** connect the earth wire to the neutral/null wire.
- Only the original parts and elements from our factory are allowed to be used in installation, operation, maintenance and repair.
- After the installation of the pipeline and electrical circuits, careful checking must be performed before switch on the generator.
- The generator has been carefully installed, checked and tested in factory; thus user only need to install the power wire.
- The power supply should be 215-240V or 380-415V, 50/60Hz, please refer to the nameplate of the generator.

- The selection of fuse and breaker must strictly follow the data in table 2.
- Choose the suitable power wire according to table 2 and local codes.
- Take off the back cover of the generator, insert the 3-core (1 live, 1 neutral/null and 1 earth) power wire (single phase, 215-240V, 50/60Hz ) or 5-core (3 lives, 1 neutral/null and 1 earth) power wire (three phases 380-415V, 50/60Hz) into the hole at the back of the generator case and connect to the correct terminal. (Refer to figure12-13). After that, tightening the wire terminal to prevent the wire(s) becoming loose and potentially arcing the power and damaging the unit.

### 6.6.1. Power Supply

#### Single phase, 215-240V, 50/60Hz power supply:

Connect the live wire to the terminal labeled as “L”; connect the neutral/null wire to the terminal labeled as “N” ; and connect the earth wire to the terminal labeled as “”. Please see figure 14.

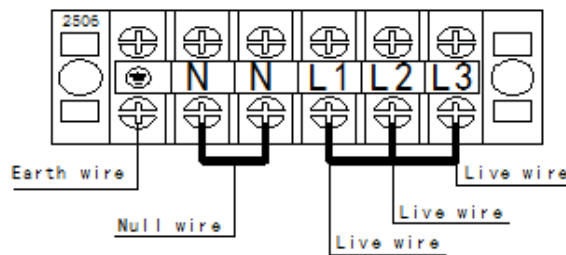



Figure 14 Single phase, 215-240V

#### Three phases, 380-415V, 50/60Hz power supply :

Connect the 3 live wires to the terminal labeled as “L1”, “L2” and “L3” respectively; connect the null wire to the terminal labeled as “N”; and connect the earth wire to the terminal labeled as “”. Please see below figure 15.

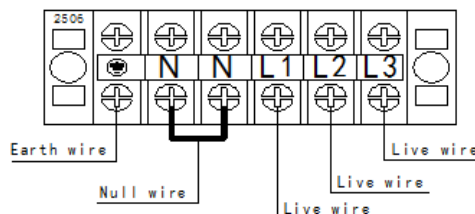
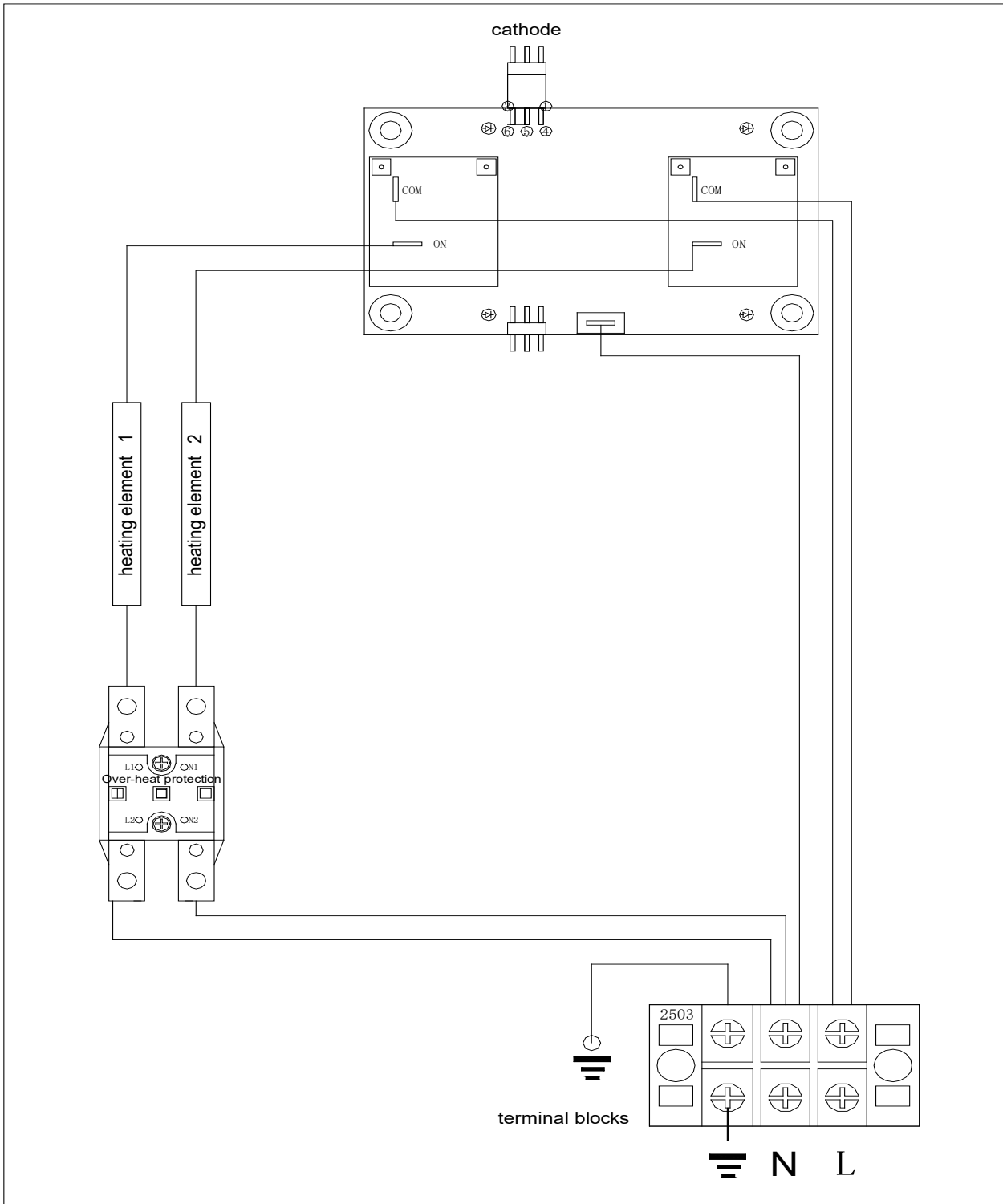


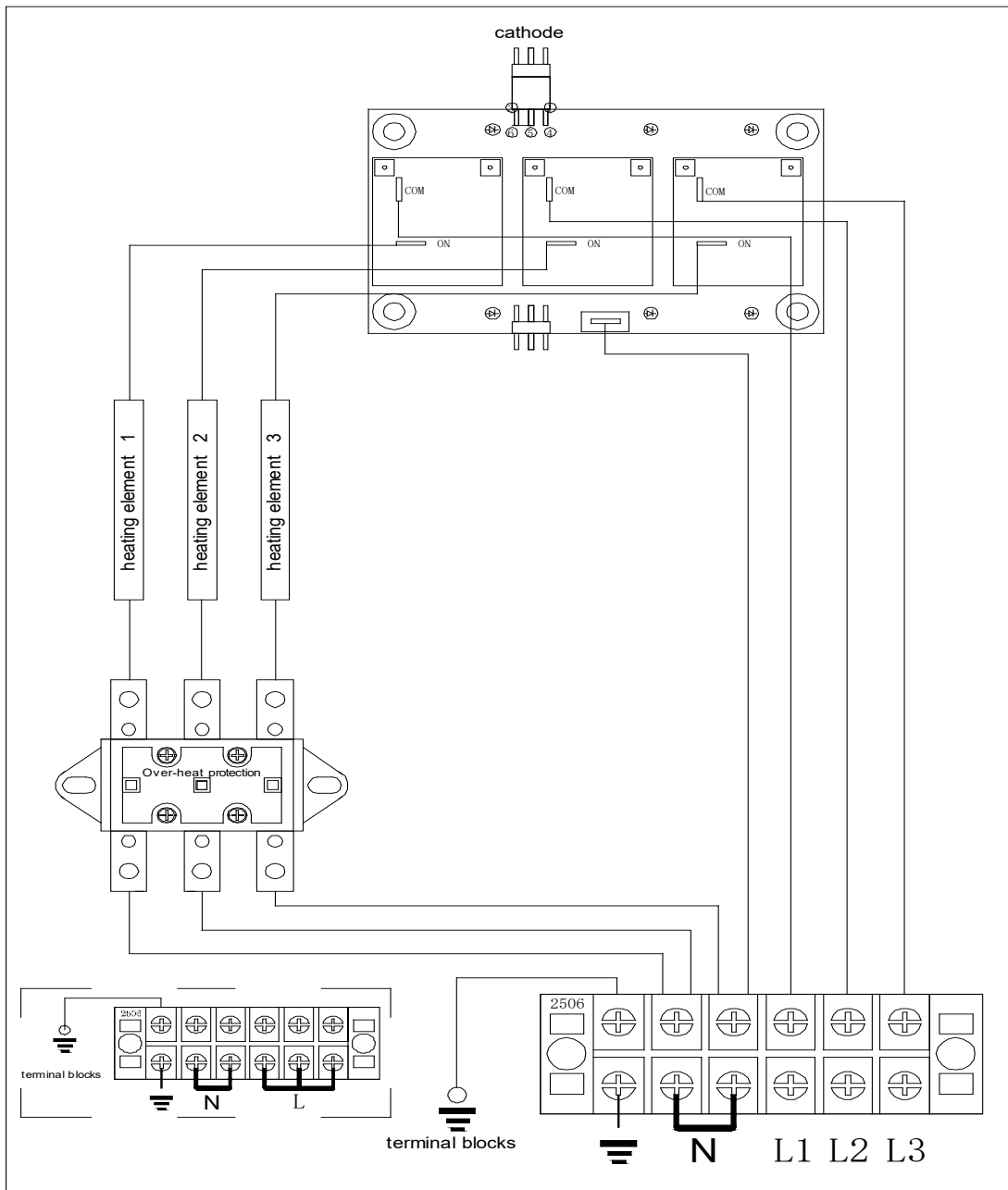
Figure 15 Three phase, 380-415V

6.6.2. Wire Diagram AIO



3KW, 4KW European 215 ~240 V single phase

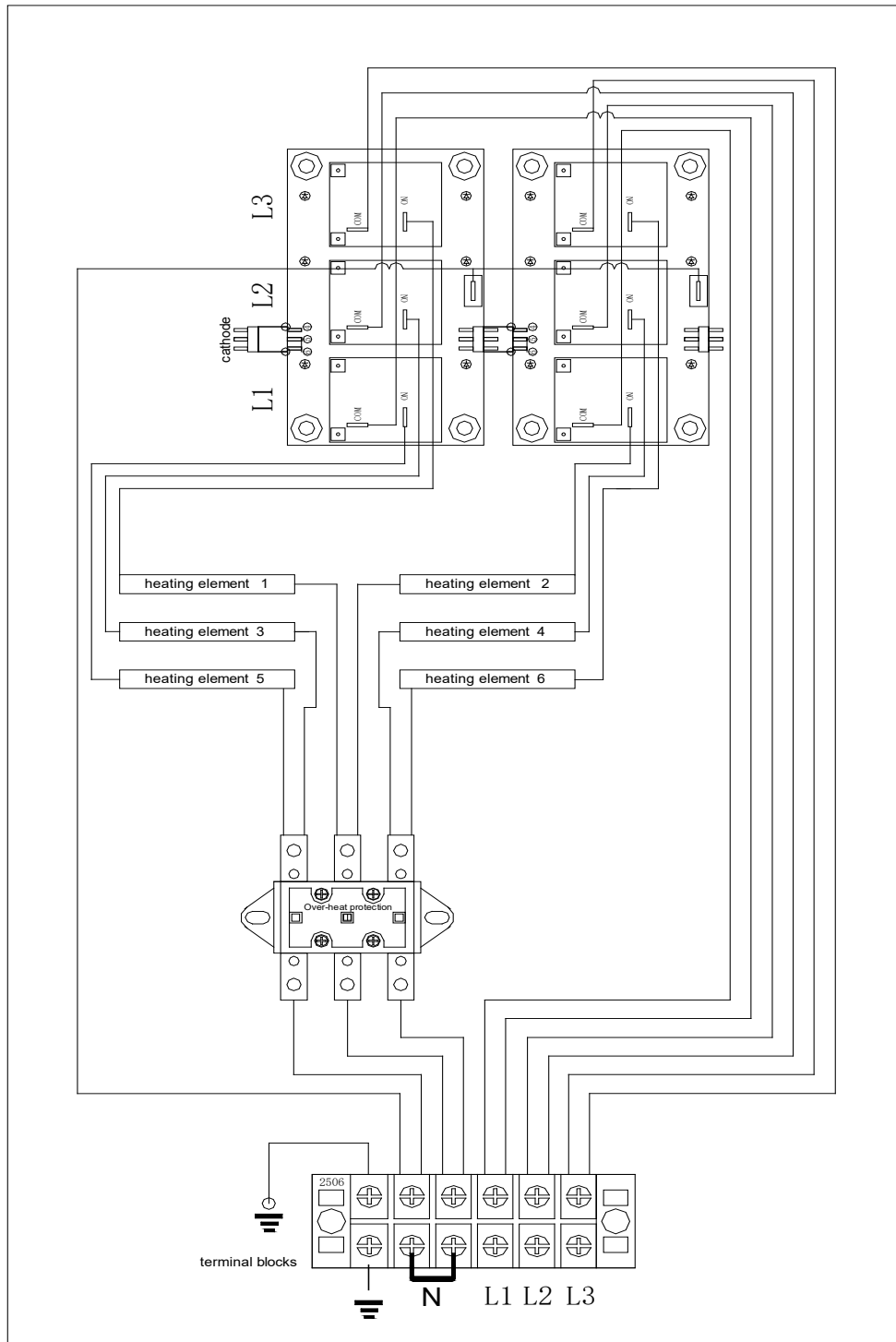
Figure 16



AIO 4.5kw 5kw 6kw 7kw 7.5kw - European 215 ~240V Single Phase or 380 ~415V 3Phases

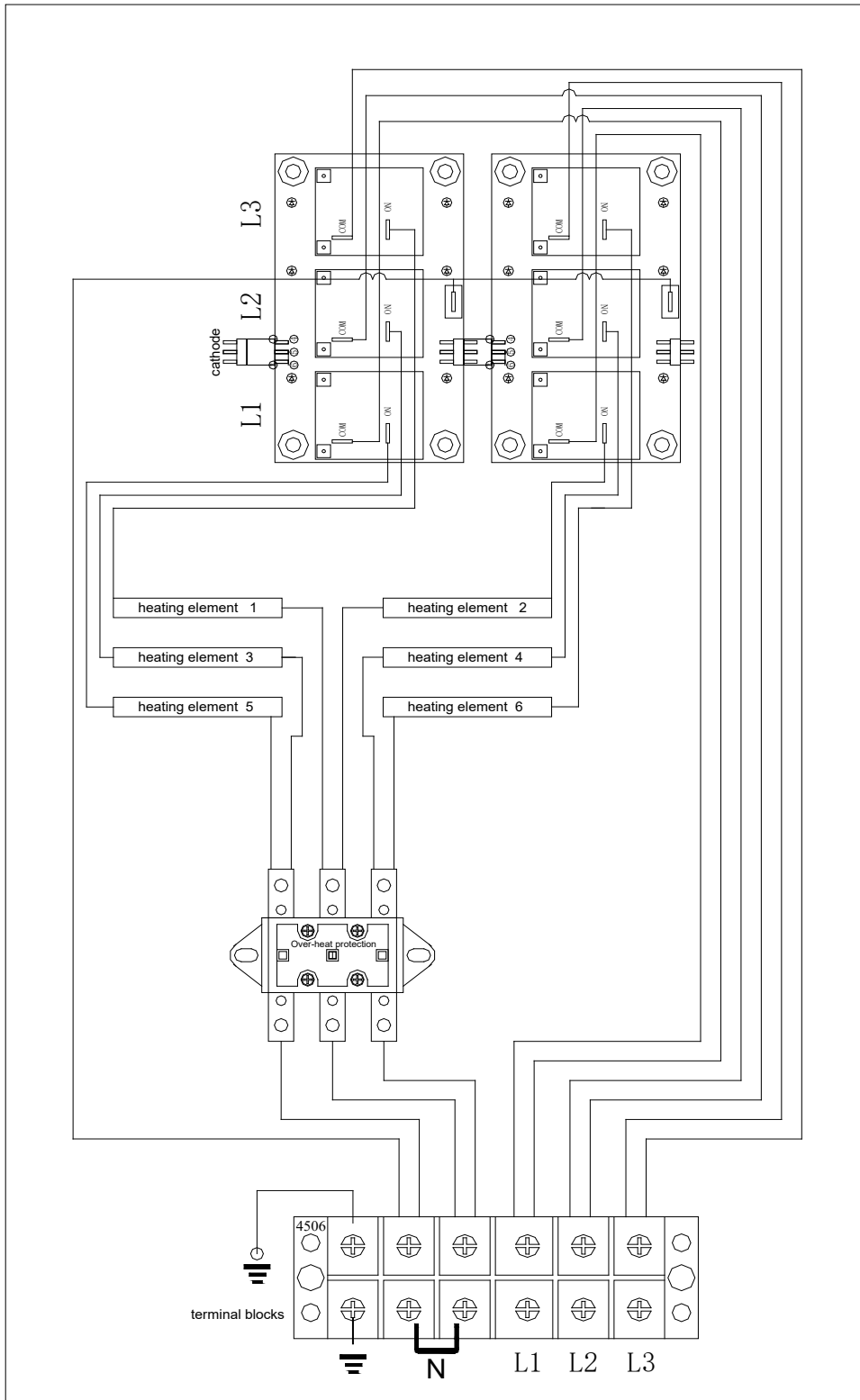
Figure 17





AIO 9kw 10.5kw 12kw 13.5kw European 380 ~ 415V 3 Phases

Figure 18



AIO 15kw European 380 ~ 415V 3 Phases

Figure 19

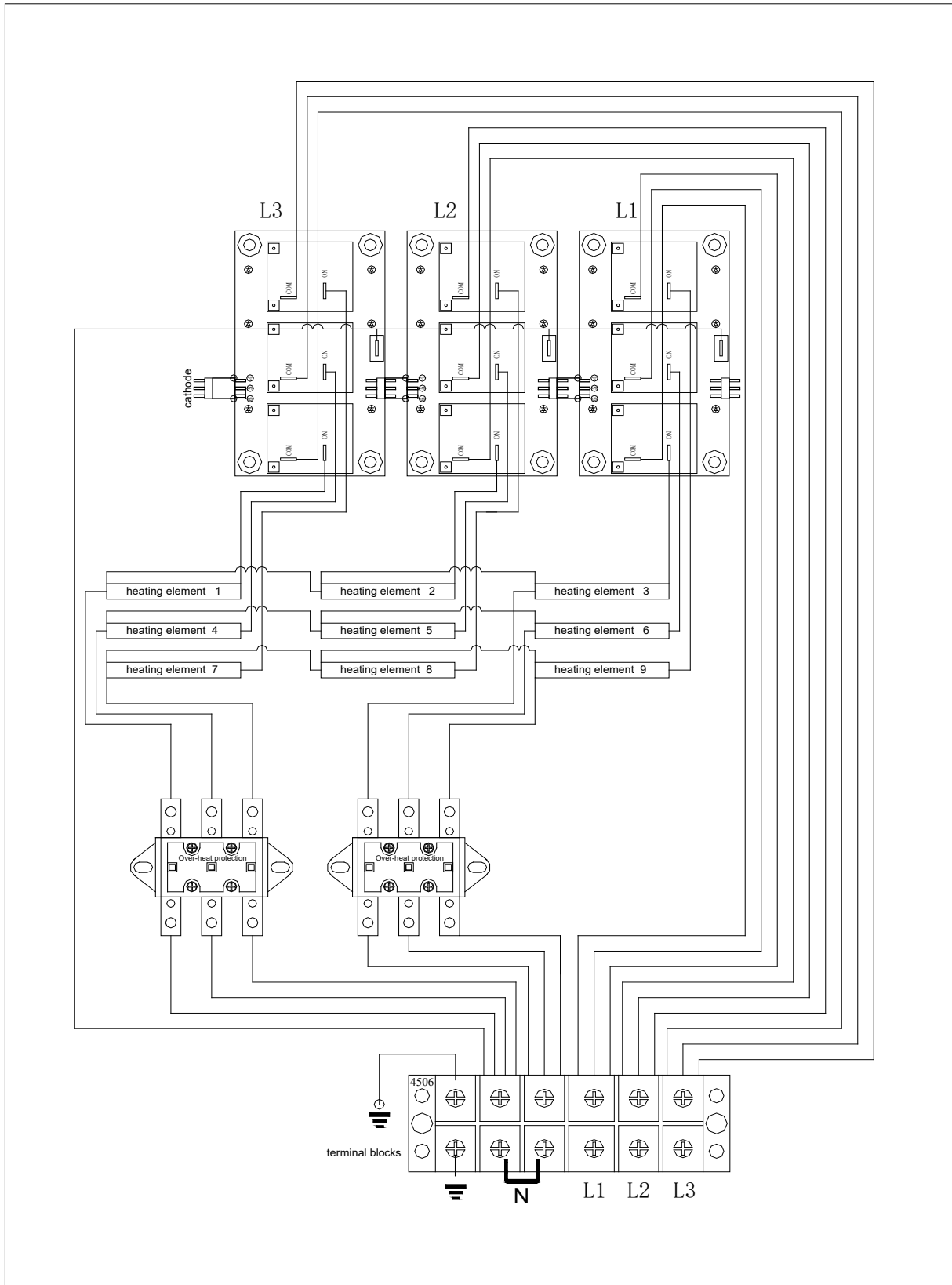


Figure 20 AIO 16.5kw 18kw 22.5kw 24kw European 380 ~ 415V 3 Phases

## 7. Functions and Operation

### 7.1. Controller display items

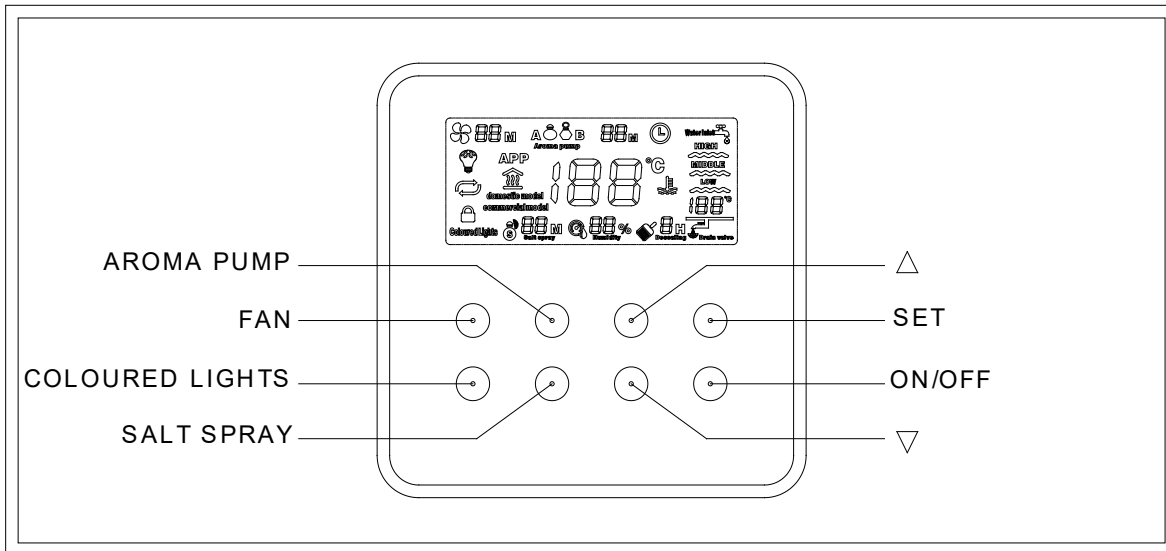
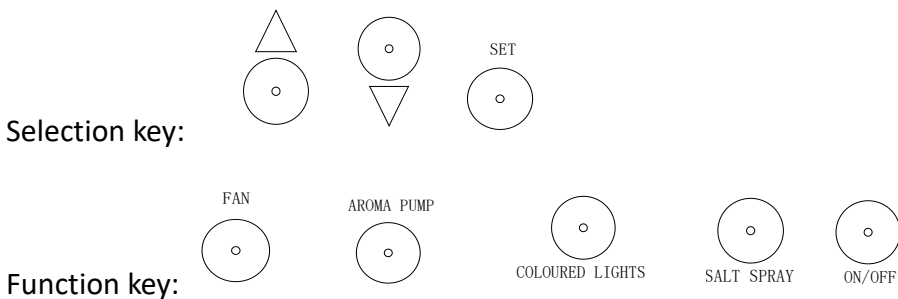


Figure 21 AIO Controller

Each first touch will wake up the touch panel.



Working time range: 1~60 minutes or continuous (CH). The default working time is 45 minutes.

Temperature setting range: 35~60°C. The default temperature is 43°C.

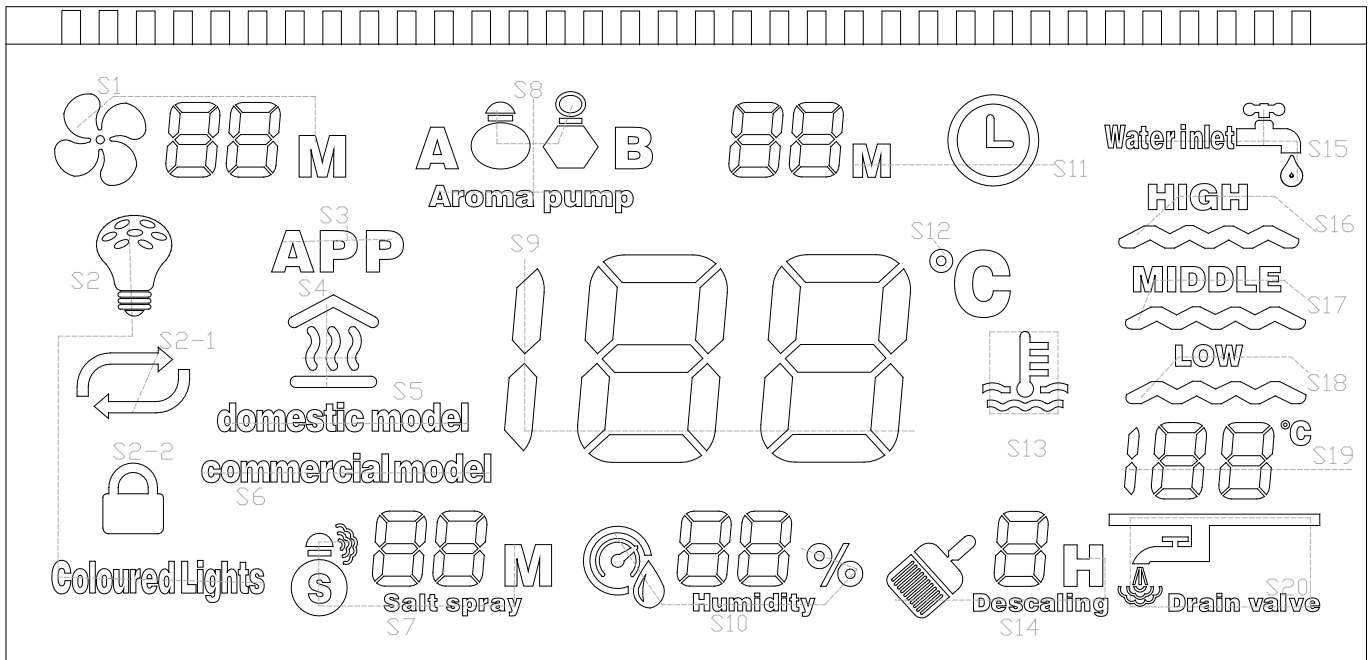


Figure 22 Controller display

S1	Exhaust fan	S7	Salt spray	S14	Descaling
S2	Colored lights	S8	Aroma pump	S15	Water inlet valve
S2-1	Change colors automatically	S9	Temperature instructions	S16	High water level
S2-2	Lock the color	S10	Humidity instructions	S17	Middle water level
S3	APP	S11	Working time	S18	Low water level
S4	Heating instructions	S12	Celsius degree	S19	Water tank temperature
S5	Domestic model	S13	Heat preservation instructions	S20	Drain valve
S6	Commercial model				

Table 4

### S1 Exhaust fan:





Fan ON/OFF button


The working time setting is from 1-60 minutes, after time arrived, will stop working automatically. Default time is 5 minutes.

The time show on the display is the remaining working time.

## S2 Coloured lights:

Colored lights on/off button  COLOURED LIGHTS

Change colors automatically(S2-1): touch , move the cursor on screen to colored lights,

press  to choose the work model “change colors automatically”, then wait for 5 seconds, it will revert back to home screen.

Lock the color (S2-2): the same way as setting (S2-1).

## S3 APP: Steam Room in AppStore (No longer functional)

### S4 Heating instructions:

S4 lights: steam generator is heating.

### S5 Domestic model:

S5 lights: steam generator is under domestic model. (Change to commercial model, please cut off the general power supply, then switch the button inside the central function box).

### S6 Commercial model:

Designed for commercial places like spa or gym centers. Under commercial mode, the water tank always keep the water temperature at 80°C, once the customer enters into the steam room, press the “fast steam” controller, the steam will come out in 30 seconds, runs 30 minutes, then reverts back to stand by (Heat preservation state).

S6 lights: steam generator is under commercial model. (Change to domestic model, please cut off the general power supply, then switch the button inside the central function box).

domestic model  
and commercial  
model change-over  
switch

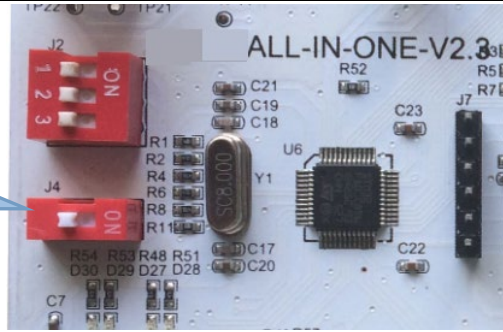



Figure 23

**S7 Salt spray:**


S7 lights: salt spray is on. Working time is from 1~60 minutes and “EH”(non stop). The default working time is 30 minutes.

**S8 Aroma pump:**

S8 lights: aroma pump is on. There has A/B aroma pump with 2 kinds of aroma oil. Change


A/B pump at  . Pump’s default working time is 5 seconds, then waiting time is 5 minutes. The working time is non-adjustable. If you like the more heavy fragrance, please restart it again and again.

**S9 Temperature instructions:**

S9 shows the steam room temperature value. Set the temperature at  .

If the steam room temperature lower than 6°C, controller display shows “-L”. If the steam room temperature higher than 60°C, controller display shows “-H”. Under “-L” or “-H”, the heating elements will not work.

**S10 Humidity instructions: (not in standard equipment)**

S10 Humidity sensor default value is 60%. Setting range: 60~99%. Adjust it by  .

If steam generator is with humidity sensor, the steam generator will stop when the humidity reach the setting value. (Notice: the humidity sensor is not in standard equipment). Without humidity sensor, steam generator works depends on the temperature sensor. If steam

generator works with humidity sensor, it will stop when the humidity reach the setting value.

**S11 Working time:**

S11 timing functions: the default value is 45minutes. Working time is from 1~60 minutes and “EH” (non stop).

**S12 Celsius degree:**

S12 shows the steam room temperature in Celsius degree.

**S13 Heat preservation instructions:**

S13 lights: shows the room temperature reaches 2°C higher than your setting value, then all heating elements stop working, steam generator under heat preservation state.

**S14 Descaling:**

S14 lights: steam generator is off, going into descaling mode. Descaling time is from 0~8 hours. “0” means automatically drain immediately, “1~3H” is waiting time, then drain, “4~8H” is where the descaling mode is activated. To activate, select a time between “4~8H”, after you turn off the steam generator, it will automatically pump descaling liquid into water tank for soaking for the set time. For example, if you set 6 hours, it will soak with descaling liquid for 6 hours. When time reaches, steam generator will start to drain, flushing, and then power off.

Pump working time:  
 1----30seconds  
 2----60seconds  
 3----90seconds  
**NOTE:** Default setting was set in factory according to the power of steam generator



Figure 24

**S15 Water inlet valve:**

S15 lights: shows steam generator is inflow

**S16 High water level:**

S16 lights: shows the water level in water tank reach to high level.

**S17 Middle water level:**



S17 lights: shows the water level in water tank reach to middle level.

**S18 Low water level:**

S18 lights: shows the water level in water tank reach low level.

**S19 Water tank temperature:**

S19 lights: shows the water tank temperature, if it is over 115 °C, steam generator go into protection state, controller screen shows “OH”, steam generator stop heating. When the temperature lower than 100°C, steam generator start to work again, (if “OH” persists, please also contact your seller).


**S20 Drain valve:**

S20 shows the working state of drain valve. The drain valve light “ON”, means it is draining the water now.

## 7.2. Auto Functions

**i. Auto filling:**

Inlet valve will open automatically once the system has started and fill water automatically until the water level reaches maximum level. If water level is still lower than the minimum water level 10 minutes after, it indicates a fault of the water supply system, so all heating


elements will stop working. If the screen display “”, this means it’s filling with water.

**ii. Auto heating up by sections:**

Generator will compare the measured room temperature with the setting temperature and then decides the number of working heating elements for the best efficiency.

**iii. Auto water supplementing:**

If the water level is lower than the desired level when operating, auto water supplementing

function will be on and open the inlet valve, the screen will display “”. Once the water level reaches the desired level, auto water supplementing function turns off. If water level is lower than the desired level 3 minute after the water supplementing order is activated, it indicates faults of the water supply system, so all heating elements stop working.

**iv. Auto drainage:**

If the Descaling time is set as “0”, and after the steam generator is off, system will drain



automatically and displays ‘**Drain valve**’ on the screen. The drainage valve will be turned on to drain. If the Descaling time is NOT set as “0”, please ref to “S14 Descaling”.

## 8. Maintenance

- Any leakage of the steam will damage the equipment. To prevent any hazard, steam generators, steam head, parts and pipeline connections should be checked regularly.
- Clean the solenoid valve, magnetizer and all the other sets in the pipeline regularly according to the local water quality and usage of the steam generator.
- Periodically, check the equipment visually to see whether it’s over heated, check the stability and corrosion of all the wire plugs.

### i. **Replace the heating elements:**

Switch off the steam generator at the mains/isolation switch and remove the element access cover when the generator completely cools down. Label the wires which connect to the heating elements which need to be replaced and unplug the wires. Unscrew the heating elements of the housing. Clear the scale in the water tank and screw in the heating elements after putting the rubber rings on them (airproof gasket should be pressed firmly without reversion). Plug on the wires, make sure the heating elements are properly connected before replacing the element access cover.

### ii. **Replace the main board:**

The main board is inside the central function box. If you need to replace the main board, please contact your dealer.

### iii. **Replace the sub-board:**

Switch off the steam generator and remove the U shape cover when the generator completely cools down. Unplug all the wires on the sub-board. Label all the wires on the relay and remove the sub-board. Install the sub-board back carefully.

### iv. **Replace the solenoid water inlet valve:**

Switch off the steam generator at the mains/isolation switch and disconnect the water supply. Remove the water inlet, steam outlet and draining pipelines after the generator completely cools down. Then lean the steam generator over to remove the base panel. After that, remove the soft pipes, wires and screws so that the faulty valve could be removed. Finally, please install the replacing valve carefully.

### v. **Replace the water level sensor:**

Switch off the steam generator at the mains/isolation switch and remove the small cover on the equipment when the generator cools down. Special care should be taken with the plugs of the water level sensor corresponding to the blue wire, the red wire, and the white wire respectively. Take off all the wires, screw out the water level sensor, and screw in the new water level sensor until the bottom of the plastic nut reaches the same height as the old one. Finally reconnect the wires (all wires must be plugged back to the right place).

- Always cut off the mains power supply before any maintenance.
- Test the equipment after maintenance.

## 9. Troubleshooting

Repair can only be performed by qualified professionals, for more services or technical helps please contact the dealer.

AIO steam generator has self-diagnose function, and some common faults will be displayed on the screen if occur.

Code	Meaning	Diagnose and Solution
-L	Temperature measured by temperature sensor is below 6 °C	Check whether the room temperature is below 6 °C, the code should disappear after the room temperature reaches 6 °C. Otherwise check the connection of the sensor.
-H	Temperature measured by temperature sensor is higher than 60 °C	Check whether the room temperature is above 60 °C, the code should disappear after the room temperature drops below 60 °C. Otherwise check the connection of the sensor.
-E	Water supply or water fill in faults, the heating elements will not heat up or stop heating up.	Check whether the water inlet solenoid valve works. Check the valve on the water pipeline or water supply source. Check the magnetizer (if installed). Check whether the water level sensor connection cable is intact and connected. If any problem on above items, please clean, replace or process the problem, then restart the machine to see if you have resolved the problem.
EE	Communication fault between the controller and circuit board on the central box.	Please check the connection cable wire is in connected and not damaged.

d or dd	Time runs out or pressed the "ON/OFF" button, machine stop working and go in the auto drain progress.	Normal
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Table 5

A manual resetting high temperature control switch is installed in the steam generator for over-heat protection. If temperature of inner tank exceeds 115 °C accidentally, the switch will automatically disconnect power supply to heating element. In this case, it is necessary to disconnect the main power supply to steam generator, allow the unit to completely cool down and then carefully check heating elements, water level sensor, relay on sub-board and water supply pipeline. **The temperature switch could only be manually reset after the fault has been located and solved.**

**Diagnosing procedure:**

- i. The AIO controller can show the status of the steam generator working.
  - ii. If the generator can fill with water and drain out water properly but does not heat up, please check the connection wire between main circuit board and the sub-board, the relays on sub-board, and heating elements.
  - iii. If water comes out from the steam outlet pipe, please clean or change the outlet solenoid valve.
  - iv. If the system keeps on heating up even if the current temperature is more than 2 °C above the setting value with the indicator on, carefully test the relays on the sub-board and if faulty change the whole sub-board.
- The above fault diagnosis and troubleshooting can refer to the function of the following main board indicators.
 

D24: 12V power supply	D18.19.20: heating elements	D11: aroma pump A
D34: 5V power supply	D14: descaling	D12: Aroma pump B
D22: drain OFF	D15: salt spray generator	D27.28: APP
D26: drain ON	D16: Fan	D29.30: Controller
  - Please refer to the circuit and connection diagrams for diagnosing and repair.
  - **ALWAYS** cut off the power supply before carrying out any repair.
  - If problems still cannot be solved by the procedures listed above, please contact the dealer.

## 10. Warranty

Product	Operating with Descaling pump	Without Descaling Pump
Controller	2 Years	2 Year
Heating Element	2 Years	1 Year
Steam Generator Body	5 Years	1 Year
Water Level Sensor	2 Years	1 Year
Temperature Sensor	2 Years	1 Year
AIO Control Box	1 Year	1 Year
Drain Valve	1 Year	1 Year
Fast Steam Controller	2 Years	2 Years
Music System	1 Year	1 Year
Aroma System	1 Year	1 Year
Descaling System	1 Year	1 Year
Led Light System	1 Year	1 Year
Exhaust Fan	1 Year	1 Year
Salt Generator	1 Year	1 Year

Table 6 AIO warranty time

For full details please visit [www.insigniashowers.com/warranty-terms](http://www.insigniashowers.com/warranty-terms)

### Tips for maintenance:

If you buy the AIO auto descaling device, please follow its guideline, if not, please follow the instructions below for manually descaling your steam generator.

#### How to descale the Steam Generator manually?

There is a service hole on top of steam generator, you can pour descaling liquid through service hole, and let it sit in water tank for 4-8 hours, then flush.

#### How frequently should descaling be done?

\*For home use: at least once per month

\*For commercial use: at least once per week

