

Contents

1. Information.....	3
1 Introduction.....	3
2 Safety.....	3
3 Electrical Installation Procedure.....	4
4 Plumbing Installation Procedure.....	4
5 Backflow Prevention.....	4
6 Maintenance.....	4
7 Descale Procedure.....	4
8 Limescale.....	5
9 Operating the Boiler for the First Time.....	5
10 Contact Details.....	5
2. Installation.....	6
3. Push Button Boiler.....	7
4.1 Operation: Multi Temp.....	7
4.2 Programming: Multi Temp.....	8
4.3 Operation: Single Temp.....	9
4.4 Programming: Single Temp.....	10
4. Tap Boiler.....	11
5.1 Operation: Tap.....	11
5.2 Programming: Tap.....	12
5. Under Counter Boiler.....	12
6.1 Operation: Under Counter.....	13
6.2 Programming: Under Counter.....	14
6.3 Set Up Single Button Font.....	14
6. Service Set Up.....	15
7. Changing Filter.....	16
8. Cleaning & Maintenance.....	17
9. Descale Procedure.....	18
10. Troubleshooting.....	20

Information

Introduction

The information provided in this manual is intended to assist in the installation and maintenance of the MIX range of hot water boilers. Please read the instructions carefully to prevent accidents and ensure an efficient installation. This manual is not a substitute for any safety instructions or technical data affixed to the machine or its packaging. All information in this manual is current at the time of publication and is subject to change without notice. The company accepts no responsibility for any damage or injury caused by incorrect or unreasonable installation and operation.

Safety

When using electrical appliances, basic safety precautions should always be followed to prevent the risk of fire, electric shock, burns, or other injuries or damages.

- Read all operating and safety instructions carefully.
- This appliance must be placed/installed on a horizontal flat stable surface.
- The ambient temperatures this appliance should operate within are 5 °C – 35 °C.
- This appliance may be placed in self-service areas if attended to by trained personnel.
- The hose supplied with the boiler is non-toxic food quality tested to 190psi. However, a hose is not a permanent connection. It is, therefore, advisable to switch off boiler and close the stopcock valve when boiler is not in use, e.g. overnight etc.
- The utmost care has been taken in the manufacture and testing of this machine. Failure to install, maintain and / or operate this machine according to the manufacturer's instructions may result in conditions that can cause injury or damage to property. If in any doubt about the serviceability of the machine always contact the manufacturer or your own supplier for advice.
- This machine is not intended for use by persons (including children) with reduced physical, sensory, or mental capabilities, or lack of experience and knowledge, unless they have been given supervision or instruction concerning use of the machine by a person responsible for their safety.
- Children should be supervised to ensure that they do not play with the machine.
- In the event where any wires are damaged, such wires can only be replaced by qualified service technicians.
- CAUTION – Risk of fire and electric shock. Only to be used with manufacturer's specified power cord set. Marco p/n 1501487 (USA), 1501488 (EU), 1501489 (UK/Ire).
- This appliance should not be installed in an area where a water jet could be used to clean it.
- Access to the service area of the appliance is restricted to persons having knowledge and practical experience of the appliance and the relevant safety and hygiene requirements.

Information

Electrical Installation Procedure

When installing the machine, always observe the local regulations and standards. The appliance is supplied with a moulded power cord. A suitable mains power supply socket should be available within easy access of the appliance so that it can be disconnected easily after install.

Plumbing Installation Procedure

- Ensure that the equipment is installed according to local plumbing & water regulations. Mains water pressure required (limits): 14.5 –145psi (100 –1000kPa, 0.1 – 1MPa).
- Fit a stop valve on a cold water line and attach a 3/4" BSP male fitting, (E.g. 3/4" x 1/2" 311 or washing machine type stop valve).
- Turn on the water to flush any impurities, dust etc from the inlet hose and water pipe. Allow several litres through. Especially for new installations.
- Connect the hose to the inlet valve of the boiler. Make sure a sealing washer is fitted.
- Turn on water and check for leaks.

Backflow Prevention

This equipment must be installed with adequate backflow protection to comply with all applicable federal, state and local codes.

Maintenance

This machine has been designed to give many years of trouble free service. The only regular maintenance required is occasional de-scaling.

Descale Procedure

- Isolate machine from power supply.
- Isolate machine from water supply.
- ALLOW TO COOL COMPLETELY!
- Drain water from machine.
- Remove lid.
- Clean the water level probes with scotch brite.
- Use ScaleKleen, Marco part No. 8000270 or similar. Follow instructions carefully.
- Thoroughly clean and flush the machine before re-use.
- Follow installation and first time operation instructions.
- See page 18 of this manual for further details.

Information

Limescale

In common with all water boiler manufacturers, service calls resulting from limescale are not covered by warranty. Fitting a scale reducer is recommended, especially in hard water areas. This can reduce the build-up of scale but may not stop it altogether. The frequency that descaling is required depends on the local water supply; hard water areas need more attention. Descaling of the machine should ideally be carried out by qualified service personnel.

Operating Boiler For The First Time

- Check that all installation procedures have been carried out.
- Ensure water valve is on.
- Plug boiler into suitable socket.
- Turn on the power switch.

The “Wait” progress circle will be visible on the screen and the machine will fill to a safe level, above the elements, before heating.

The “Ready” tick will come up on screen when the machine is full and up to normal operating temperature.

The boiler is now ready for use – the display will show the button settings and the “Ready” status tick.

- The Boiler may now be used to dispense Hot Water to the preset factory settings.

NOTE: Because the boiler is electronically controlled no priming is necessary. The element cannot switch on until a safe level of water is reached.

Contact Details

Marco Beverage Systems Limited.

63d Heather Road,

Sandyford Industrial Estate,

Dublin 18

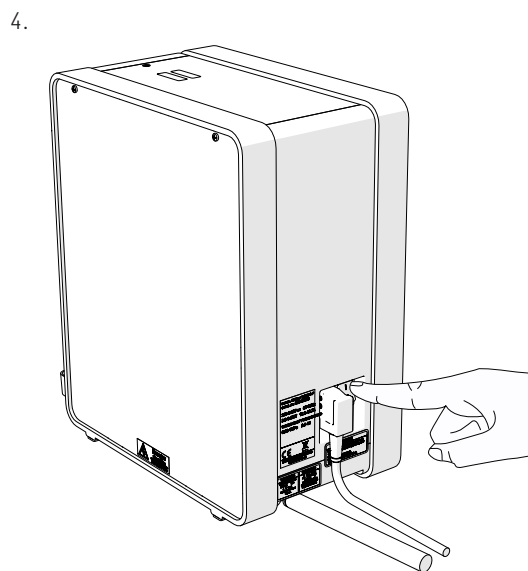
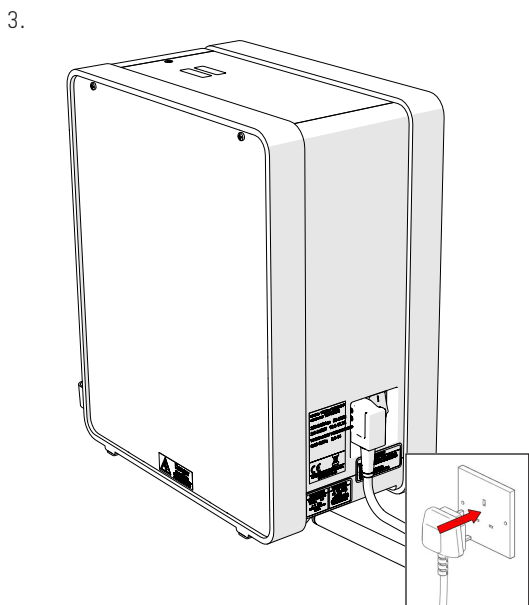
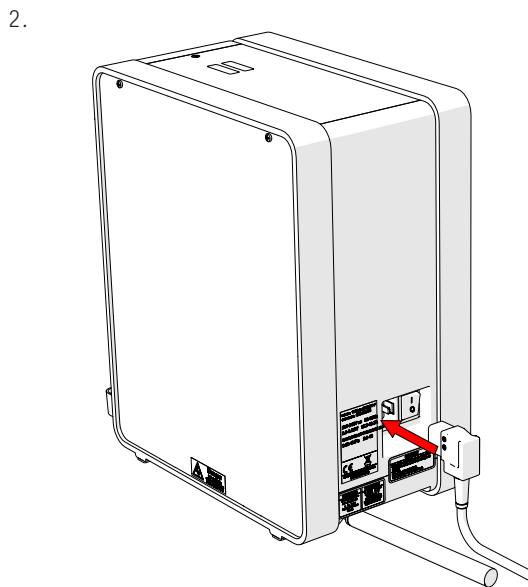
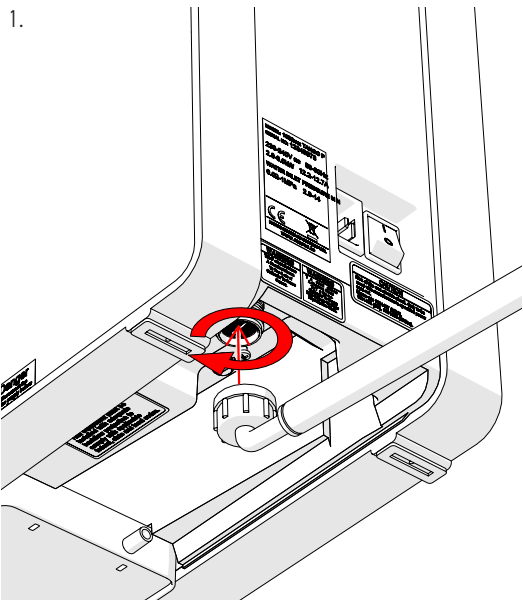
Tel: +353 (0)1 295 2674

Fax: +353 (0)1 295 3715

email: sales@marco.ie

www.marcobeveragesystems.com

Installation



Push Button Boiler

Operation: Multi Temp

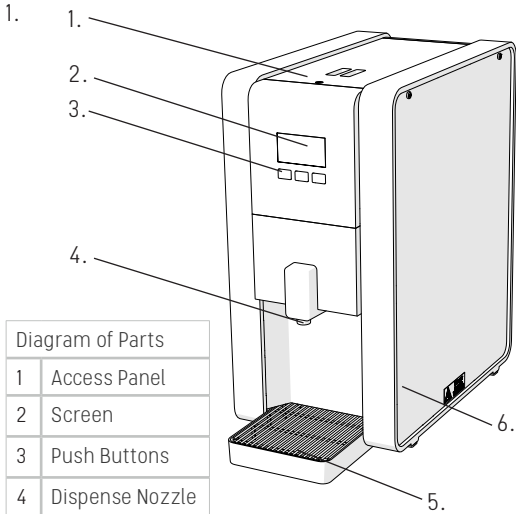
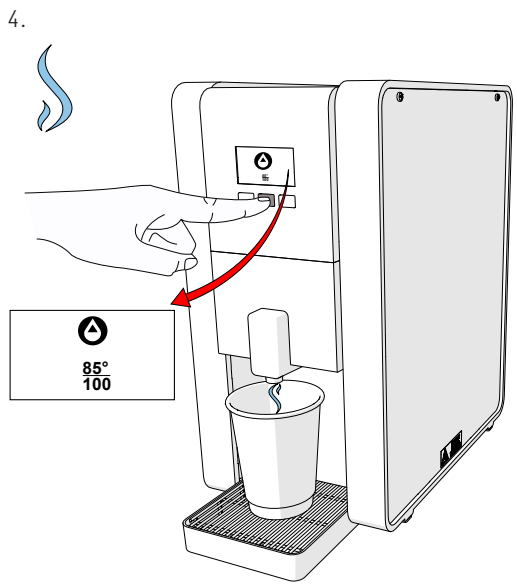
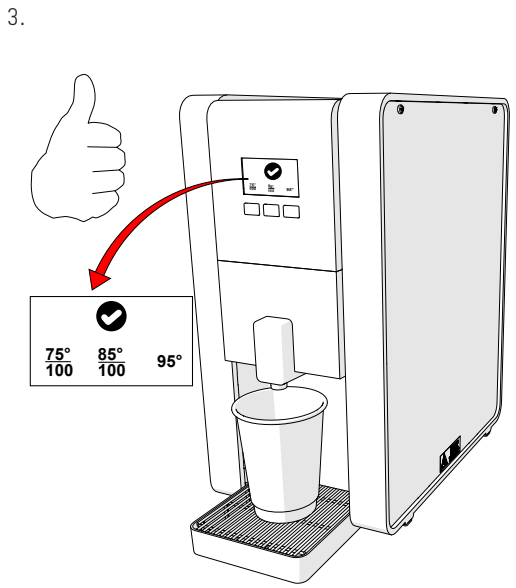
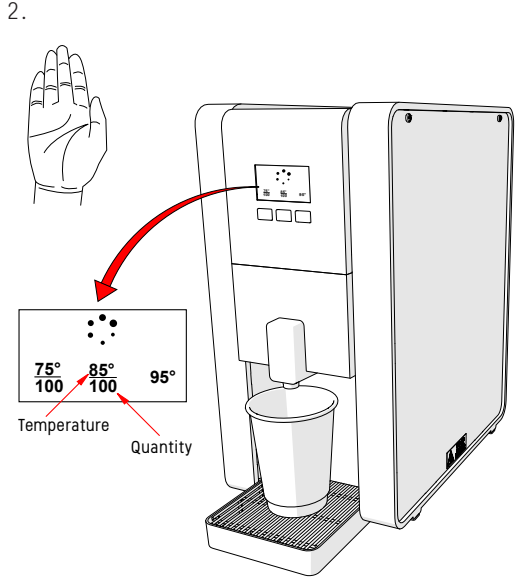
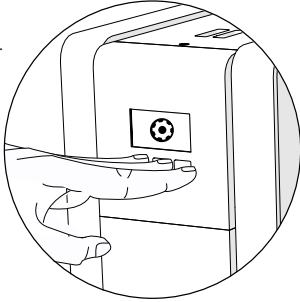


Diagram of Parts	
1	Access Panel
2	Screen
3	Push Buttons
4	Dispense Nozzle
5	Drip Tray
6	Service Panel

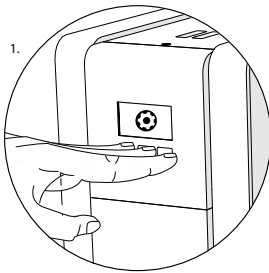
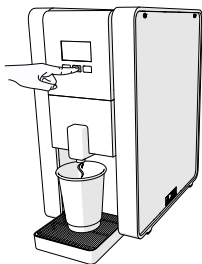


Push Button Boiler

Programming: Multi Temp – Method 1

- 
- | | | |
|-------------------------------------|----------------------------------|----------------------------------|
| 75°
100 | 85°
100 | 95°
000 |
| Next - + | | |
| <input type="button" value="Next"/> | <input type="button" value="-"/> | <input type="button" value="+"/> |
- | | | |
|-------------------------------------|----------------------------------|----------------------------------|
| 75°
100 | 85°
100 | 95°
150 |
| Save - + | | |
| <input type="button" value="Save"/> | <input type="button" value="-"/> | <input type="button" value="+"/> |
- | | | |
|-------------------------------------|----------------------------------|----------------------------------|
| 75°
100 | 85°
100 | 95°
150 |
| Save - + | | |
| <input type="button" value="Save"/> | <input type="button" value="-"/> | <input type="button" value="+"/> |
- | | | |
|-------------------------------------|----------------------------------|----------------------------------|
| ✔ | | |
| 75°
100 | 85°
100 | 95°
150 |
| <input type="button" value="Next"/> | <input type="button" value="-"/> | <input type="button" value="+"/> |

Programming: Multi Temp – Method 2

- 
- | | | |
|-------------------------------------|----------------------------------|----------------------------------|
| 75°
100 | 85°
100 | 95°
000 |
| Next - + | | |
| <input type="button" value="Next"/> | <input type="button" value="-"/> | <input type="button" value="+"/> |
- | | | |
|-------------------------------------|----------------------------------|----------------------------------|
| 75°
100 | 85°
100 | 95°
600 |
| Save - + | | |
| <input type="button" value="Save"/> | <input type="button" value="-"/> | <input type="button" value="+"/> |
- | | | |
|------------------------------------|----------------------------------|----------------------------------|
| 75°
100 | 85°
100 | 95°
SET |
| Set - + | | |
| <input type="button" value="Set"/> | <input type="button" value="-"/> | <input type="button" value="+"/> |
- | | | |
|-------------------------------------|-------------------------------------|----------------------------------|
| 75°
100 | 85°
100 | 95°
68 |
| Save Disp | | |
| <input type="button" value="Save"/> | <input type="button" value="Disp"/> | <input type="button" value="+"/> |
- 
- | | | |
|-------------------------------------|-------------------------------------|----------------------------------|
| 75°
100 | 85°
100 | 95°
183 |
| Save Disp | | |
| <input type="button" value="Save"/> | <input type="button" value="Disp"/> | <input type="button" value="+"/> |
- | | | |
|-------------------------------------|----------------------------------|----------------------------------|
| ✔ | | |
| 75°
100 | 85°
100 | 95°
183 |
| <input type="button" value="Next"/> | <input type="button" value="-"/> | <input type="button" value="+"/> |

Push Button Boiler

Operation: Single Temp

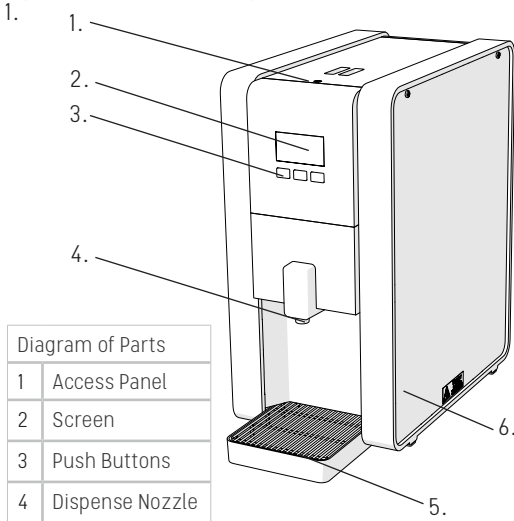
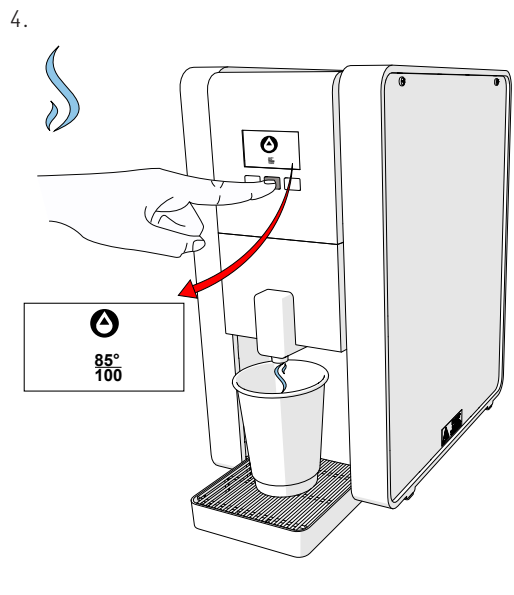
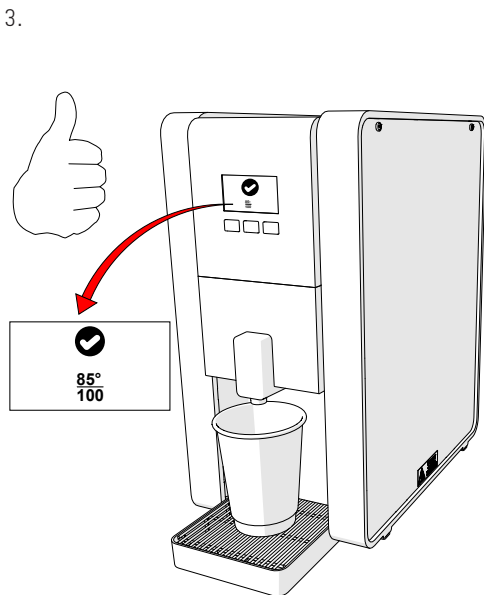
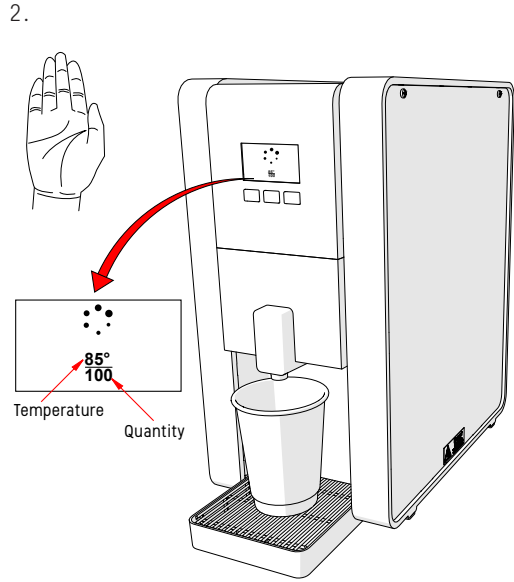
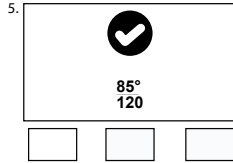
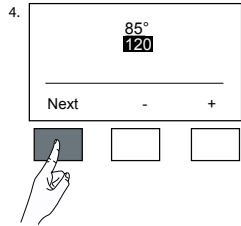
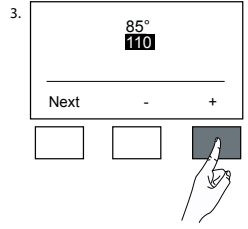
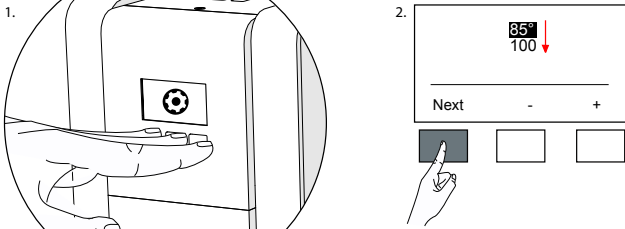
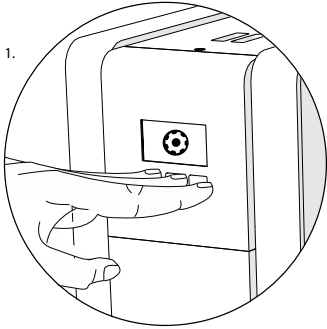


Diagram of Parts	
1	Access Panel
2	Screen
3	Push Buttons
4	Dispense Nozzle
5	Drip Tray
6	Service Panel

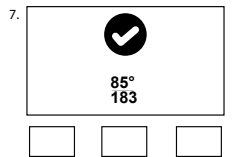
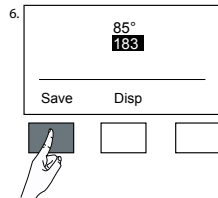
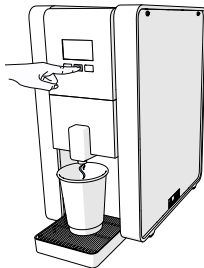
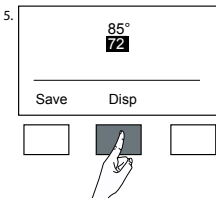
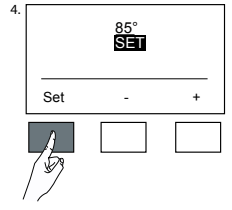
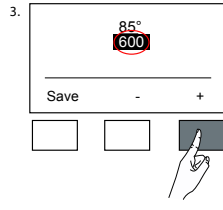
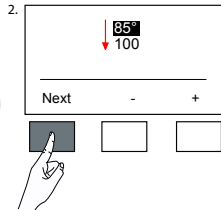
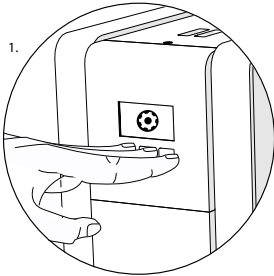


Push Button Boiler

Programming: Single Temp - Method 1

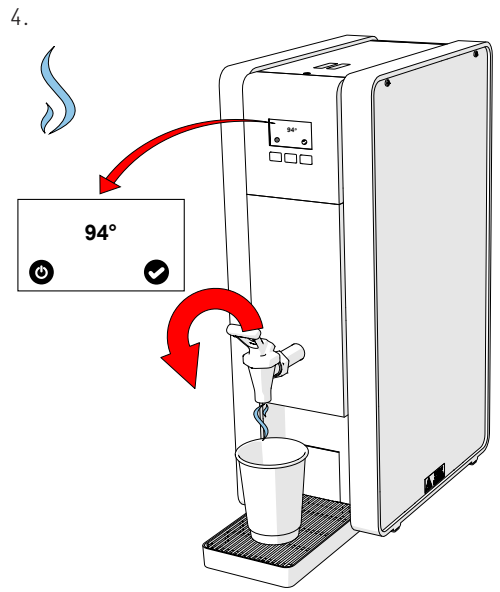
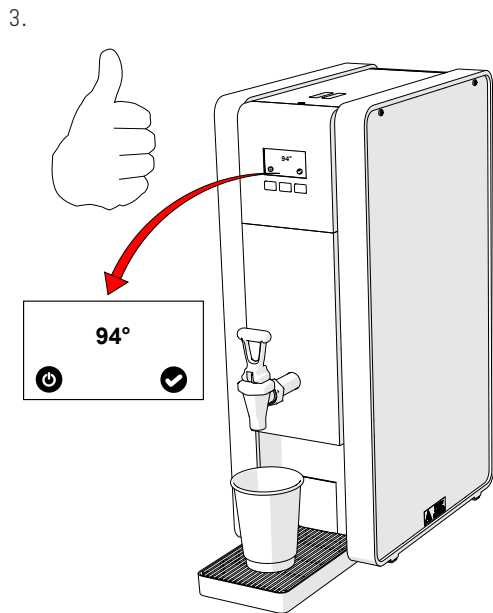
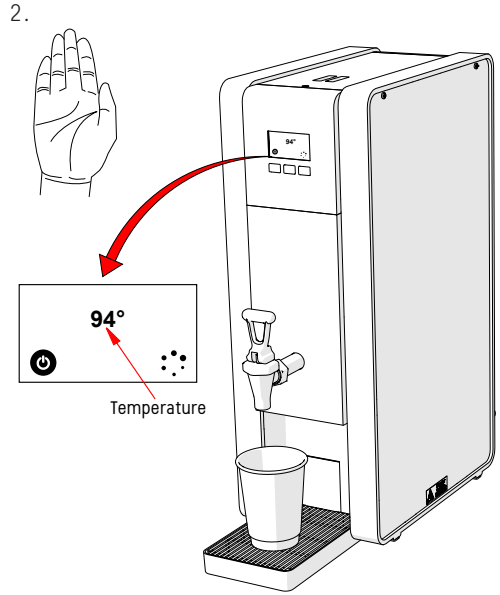
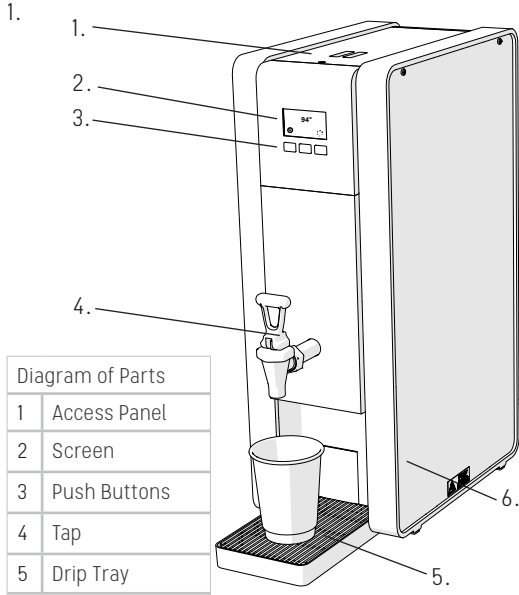


Programming: Single Temp - Method 2



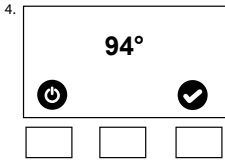
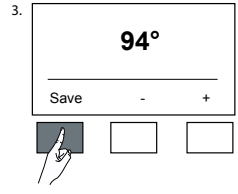
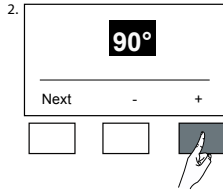
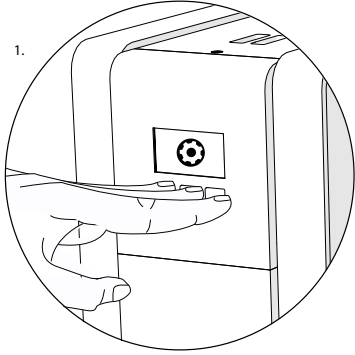
Tap Boiler

Operation: Tap



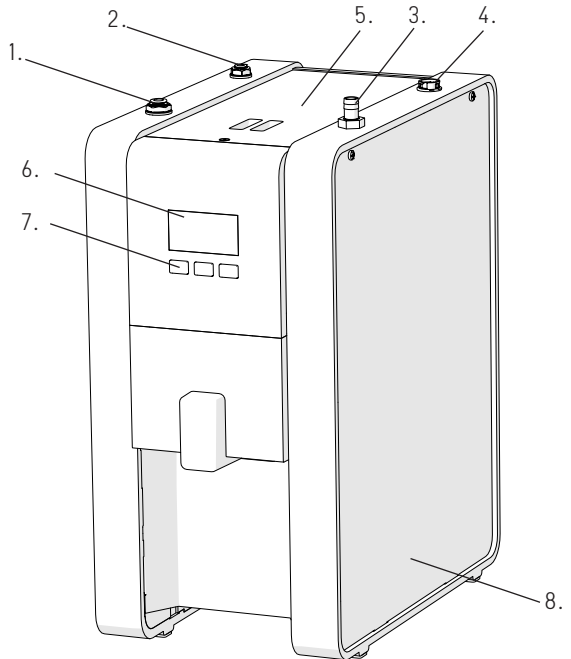
Tap Boiler

Programming: Tap



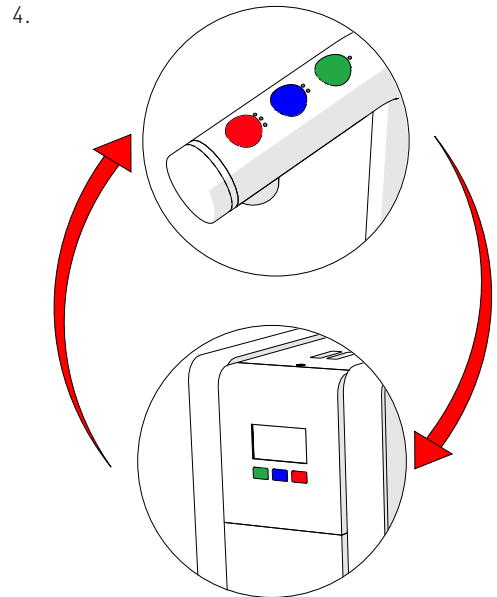
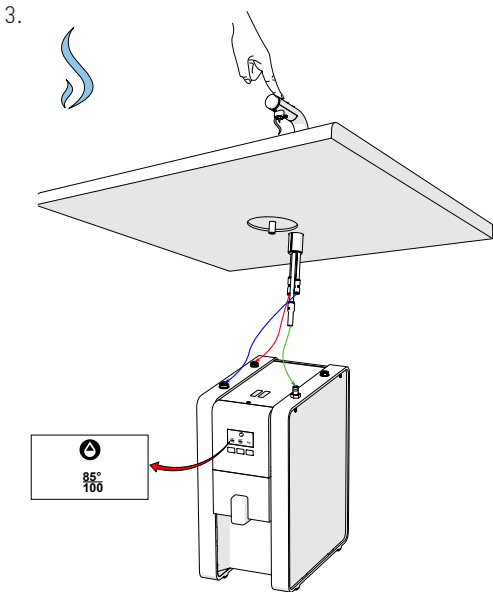
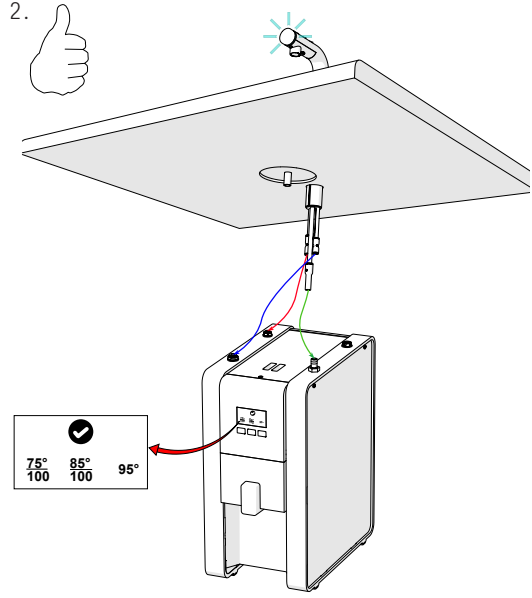
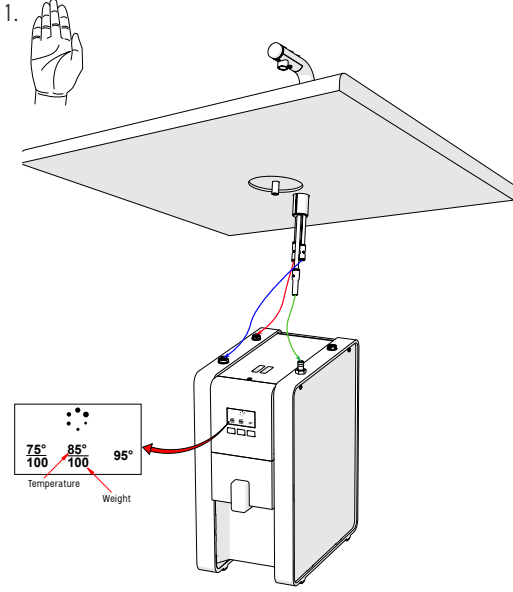
Under Counter Boiler

Diagram of Parts	
1	Hot Connection
2	Cold Connection
3	Vent
4	Wiring Connection
5	Access Panel
6	Screen
7	Push Buttons
8	Service Panel



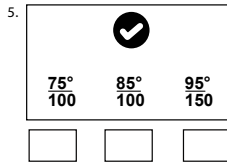
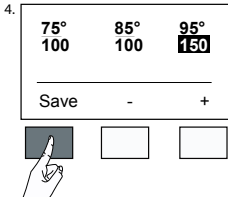
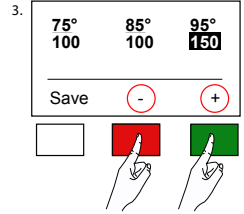
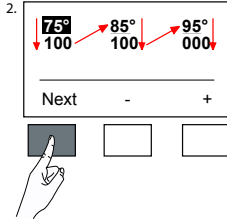
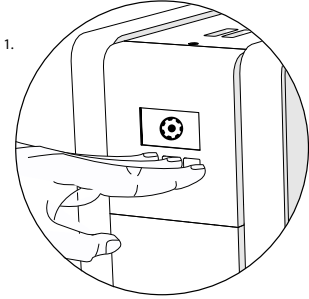
Under Counter Boiler

Operation: Under Counter

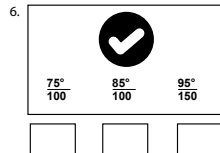
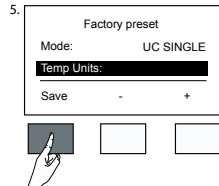
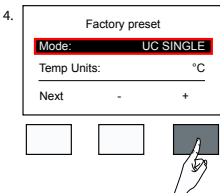
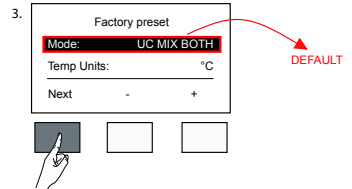
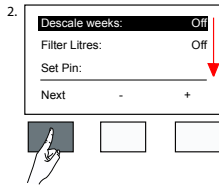
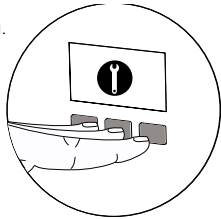


Under Counter Boiler

Programming: Under Counter



Set Up Single Button Font (default is 3 button font)



Service Set Up

1.

1.

2a. **Enter Pin**
0000
Next - +

IF PIN IS SET

OR

2b. **Descal weeks:** Off
Filter Litres: Off
Set Pin:
Next - +

2.

1.

2. **Descal weeks:** Off
Filter Litres: Off
Set Pin:
Next - +

3. **Factory preset**
Mode: MIX BOTH
Temp Units: °C
Next - **GO**

Set appropriate time for descale & filter flags

4. **Factory preset**
Mode: MIX BOTH
Temp Units:
Save - +

MODE OPTIONS

- UC HOT COLD
- UC COLD HOT
- UC MIX BOTH
- UC SINGLE
- HOT COLD
- COLD HOT
- MIX BOTH
- SINGLE
- TAP
- COLD 60S
- HOT 5S

5.

MACHINE TYPE OPTIONS

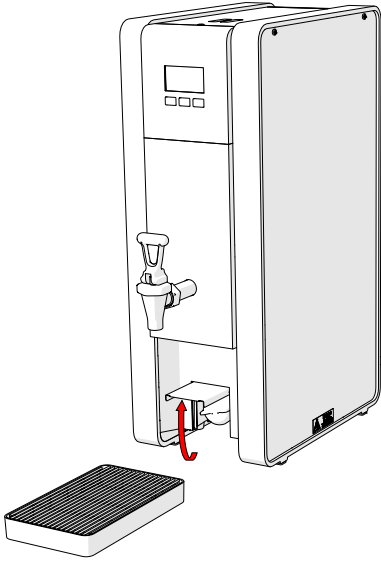
- TAP
- PB3
- PB8
- UC3 (3 button)
- UC3 (1 button)

75° 85° 95°
100 100 150

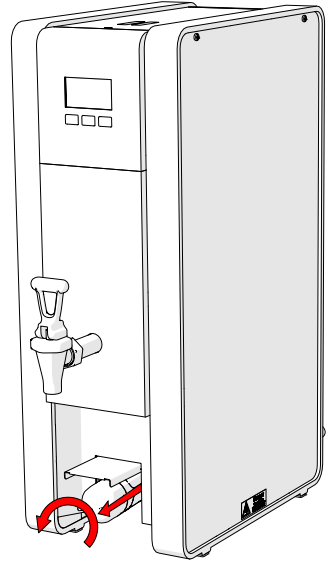
Only required for factory reset, not for install

Changing Filter

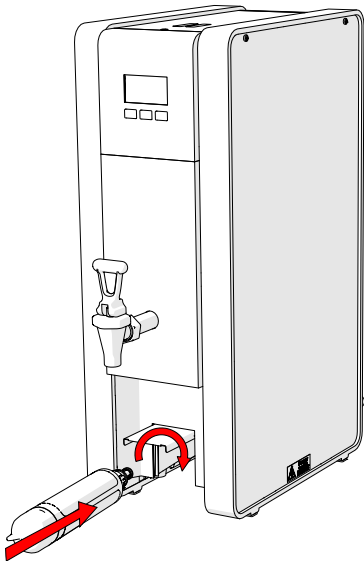
1.



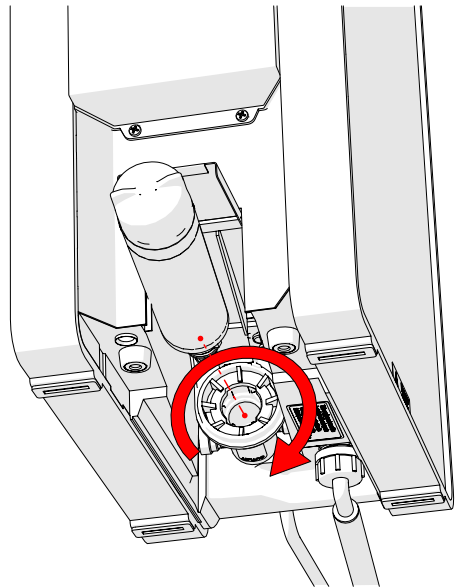
2.



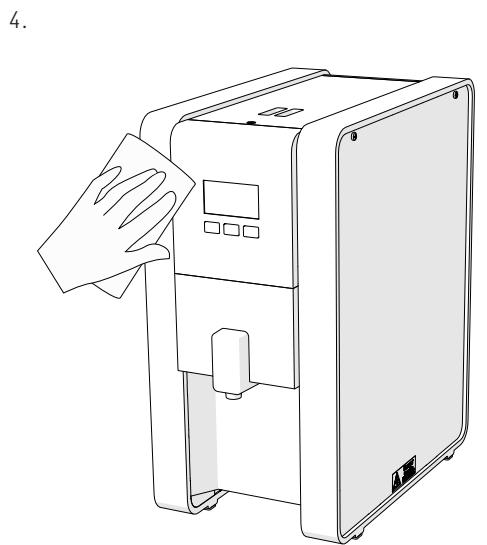
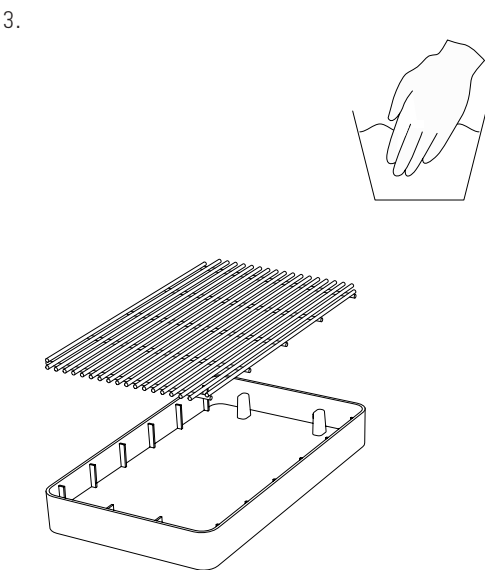
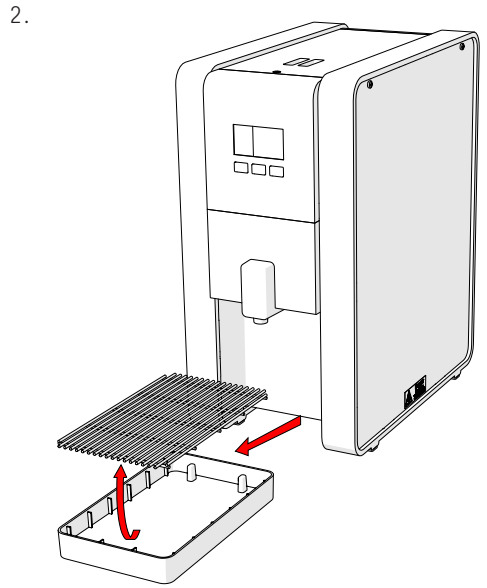
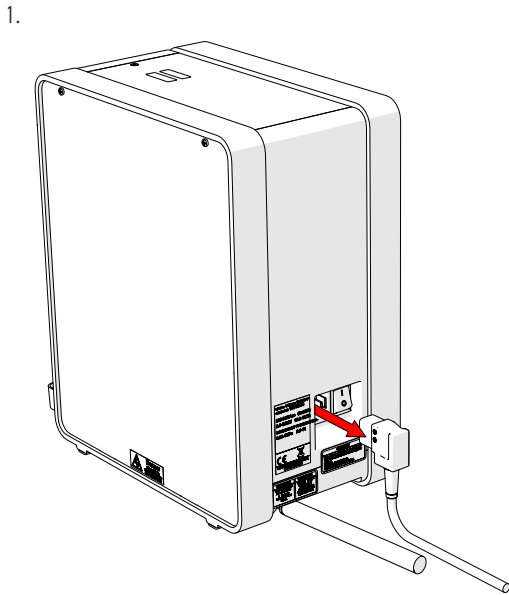
3.



4.

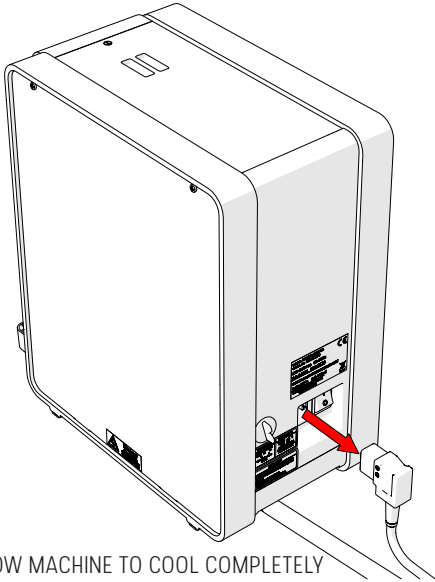


Cleaning & Maintenance

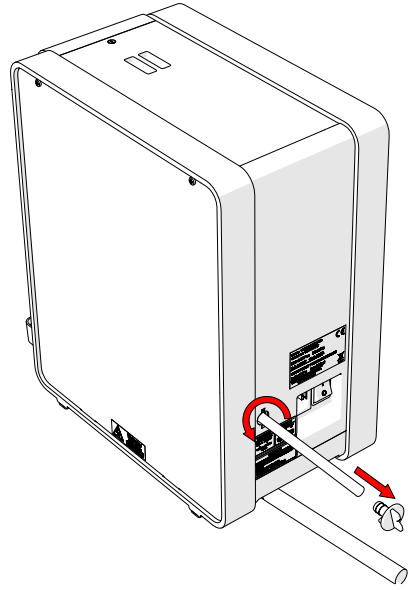


Descalce Procedure

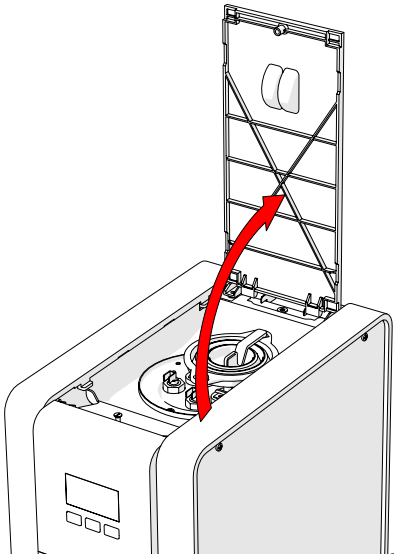
1.



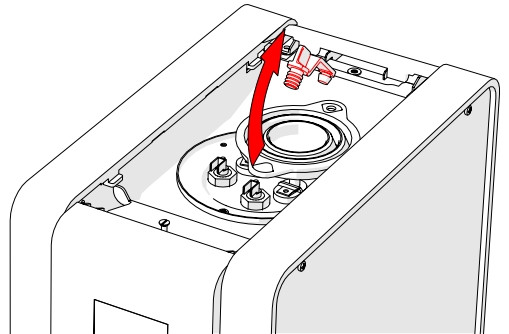
2.



3.

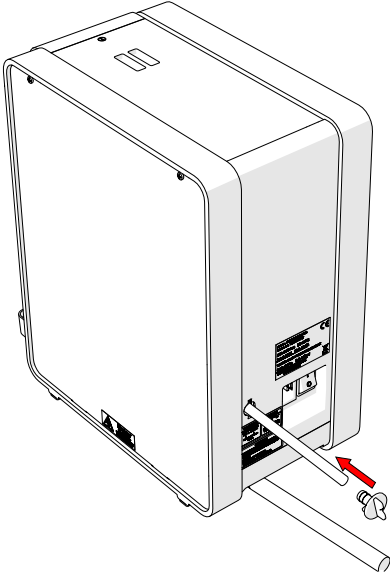


4.

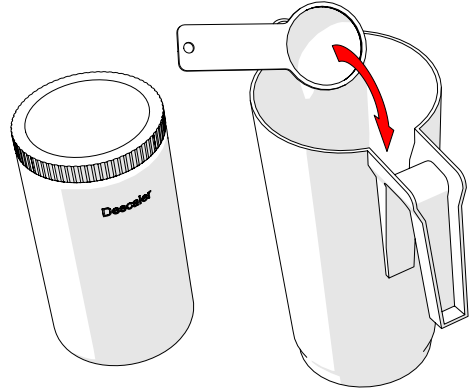


Descale Procedure

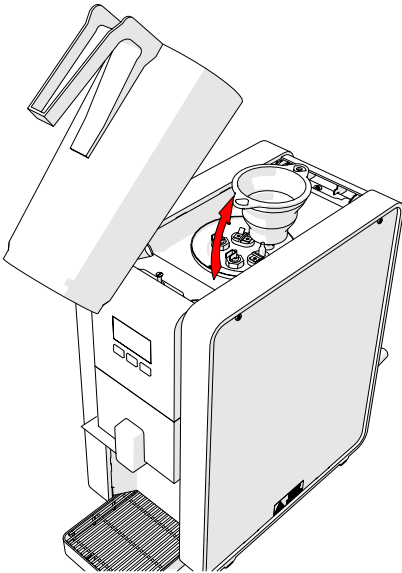
4.



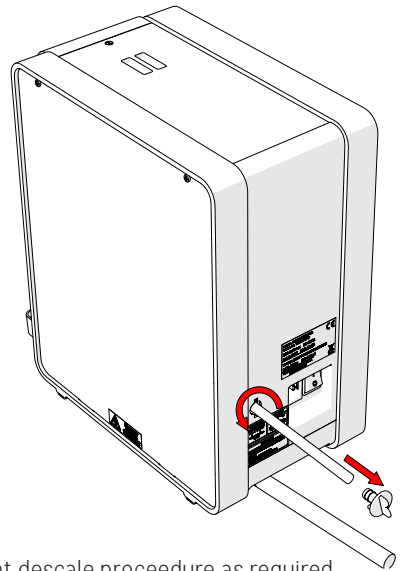
5.



7.










8.



Repeat descale procedure as required

Troubleshooting

The screen of the boiler indicates various errors or problems with the machine. See diagnostic table below for further details.

Code / Icon	Type	Description	Action
	Status	Boiler Ready	
	Status	Boiler not ready	Wait until the boiler ready symbol appears
	Button Description	Turn machine ON/ OFF (only in Tap mode)	Press Button
	Status	Dispensing (not in Tap mode)	
	Warning	Low water pressure	Check mains pressure
	Warning	Descal flag	Check level probe for scale build up. Descale the tank. Reset the Descal flag
	Warning	Change filter flag	Change the filter. Reset the Filter flag
Check low level probe!	Error	Probes connection mixed up / low level probe failure	Call a qualified service technician
Check thermistor!	Error	Temperature sensor is out of range	Call a qualified service technician
Heater failure!	Error	Heating element not heating	Call a qualified service technician
Tank overflow!	Error	Too much water in the tank	Call a qualified service technician

