



INSTALLATION & MAINTENANCE INSTRUCTIONS

SAFETY AND PROPER USAGE

To ensure safe and enduring performance of this product, you must comply strictly with the instructions enclosed herein. Non-compliance with instructions or improper handling of the product will void your warranty! Usage of this product in conditions not specified in this manual or in contrary to the instructions hereby provided is considered IMPROPER. The manufacturer will not be held liable for any damages resulting from improper use of the product.

SAFETY & WARNING INSTRUCTIONS

- Observe valid and generally accepted safety rules when planning, installing and using this product.
- Take proper measures to prevent unintentional operation of the product or damage to it.
- Do not attempt to disassemble this product or lines in the system while they are under pressure.
- Always depressurise the compressed air system before working on the system.

It is important that personnel use safe working practices and observe all regulations and legal requirements for safety when operating this product. When handling, operating or carrying out maintenance on this product, personnel must employ safe engineering practices and observe all local health & safety requirements & regulations. International users refer to regulations that prevail within the country of installation. Most accidents, which occur during the operation and maintenance of machinery, are the result of failure to observe basic safety rules or precautions. An accident can often be avoided by recognising a situation that is potentially dangerous. Improper operation or maintenance of this product could be dangerous and result in an accident causing injury or death. The manufacturer cannot anticipate every possible circumstance, which may represent a potential hazard. The WARNINGS in this manual cover the most common potential hazards and are therefore not all-inclusive. If the user employs an operating procedure, an item of equipment or a method of working which is not specifically recommended by the manufacturer he must ensure that the product will not be damaged or made unsafe and that there is no risk to persons or property.

NEVER CHANGE ORIGINAL COMPONENTS WITH ALTERNATIVES

1.1



1.2



1.3



1.4



1.5



1.6

AC:

1.L

2.N

DC:

1.+

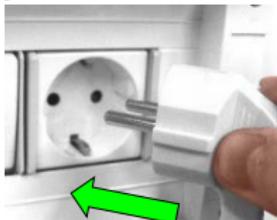
2.-



1.7



1.8



1.9



1.10



1.11



INSTALLATION INSTRUCTIONS

Before installing this product, make sure it complies with your request and that it suits your application!

1.1 Unpack the unit and visually inspect for any transport damage incurred after leaving our factory.

1.2 Depressurise the system before installation or maintenance is carried out!

1.3 Locate a suitable condensate draining point on your compressed air system and connect your valve using a 22 mm wrench. Connect the outlet to an oil/water separator.

- Make sure the arrow on the valve body complies with the flow direction of the condensate.

- Do not use the valve shaft as lever!

1.4 Slide the coil on to the valve shaft and screw on the top nut. Make sure the gaskets are placed properly to ensure IP65 rating. Place the timer gasket over the coil connection pins.

- Make sure there is no debris between the gasket and the coil.

1.5 Mount the timer on to the coil as illustrated, you can mount the timer up-right or upside-down.

1.6 Remove the protection cap from the connector and connect your power cable to the connector as illustrated. Close the connector and tighten the bottom nut firmly.

1.7 Place the connector gasket on the connector, place the connector on the timer as illustrated and tighten the screw (max. torque 1Nm). Make sure both gaskets are secured properly to ensure IP65 rating.

1.8 After double checking that the power supply corresponds with the voltage specified on the coil and falls within the range specified on the back of the timer, you can switch the power supply ON.

1.9 Slowly open the ball valve to restore normal system pressure.

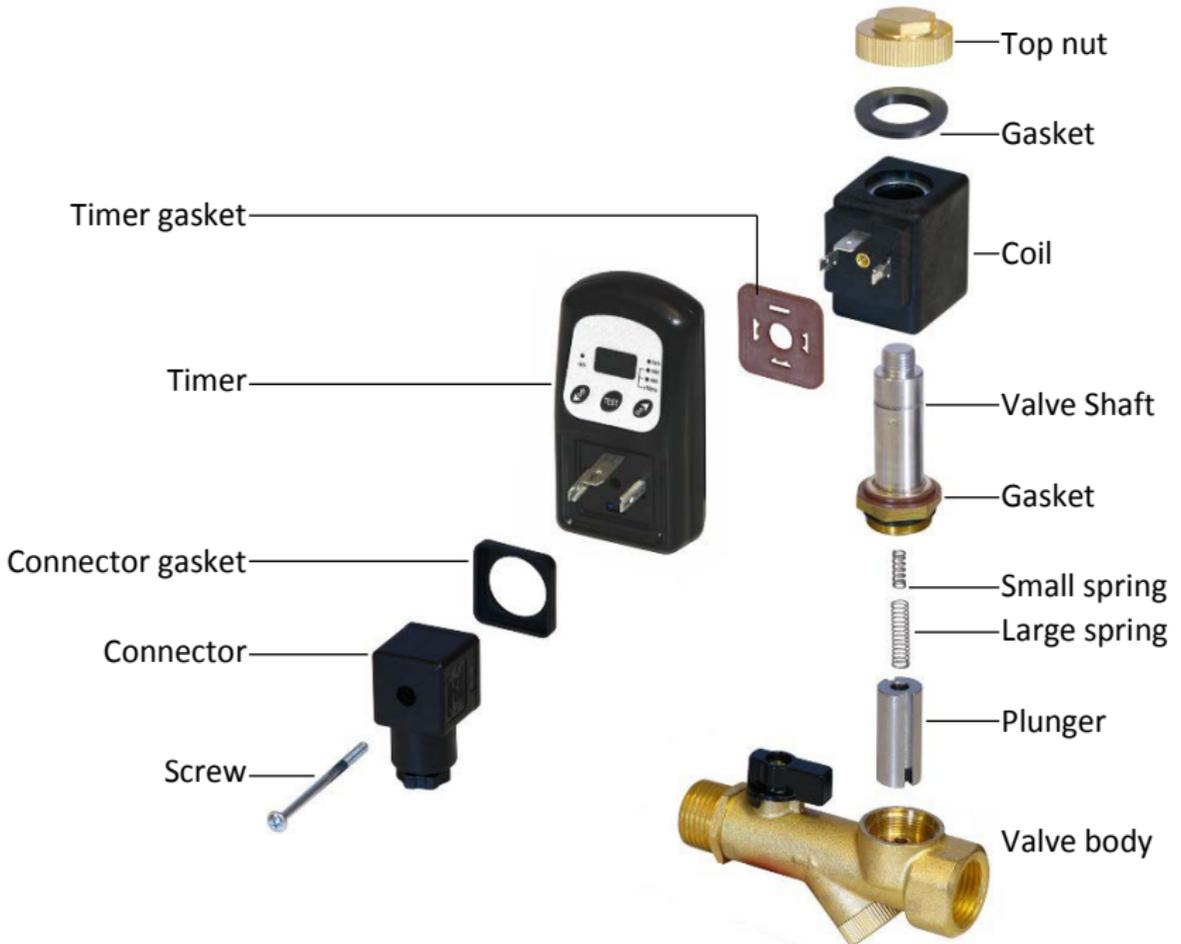
1.10 Press the TEST button to check the valve function. Adjust the ON and OFF buttons to suit your system.

1.11 Your drain is ready for operation!

Note: We advise to check this product at least once a year and replace serviceable parts when necessary.

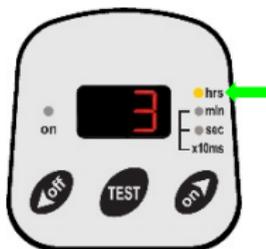
Note: (If applicable!) Clean the strainer periodically to avoid possible blocking causes by rust and/or debris.

Note: Check the valve function periodically. A purging sound must be heard.

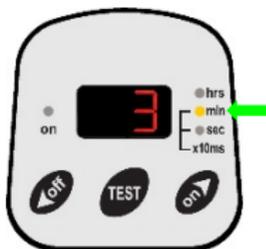


TIME SETTING OPTIONS

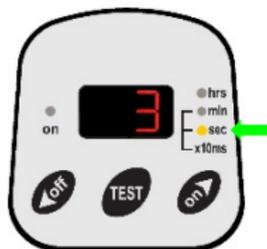
The ON and OFF time of the timer can be programmed anywhere between 10ms and 99h.
The set time will be indicated by the LED display.



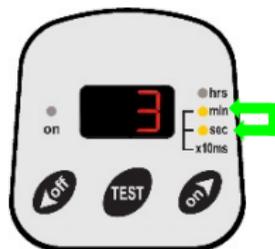
3 Hours



3 Minutes

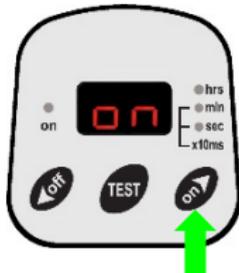


3 Seconds

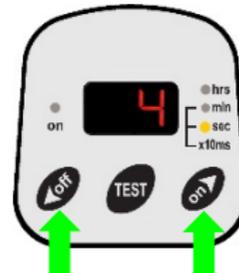


30 Milliseconds

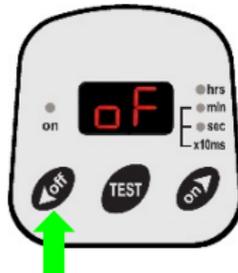
2.1



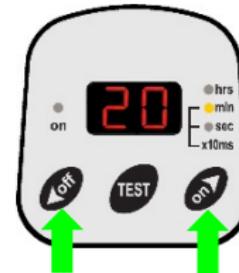
2.2



2.4



2.5



TIME SETTING OPTIONS

2.1 To change the ON time, press the right 'on/arrow up' button and 'ON' will appear briefly on the display.

2.2 You can now press the left 'off/arrow down' button for decreasing the time or the right 'on/arrow up' button to increase the time.

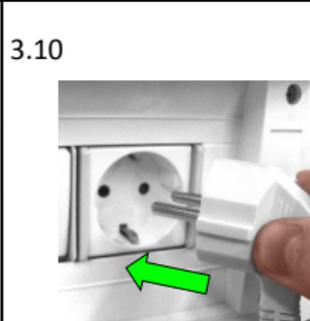
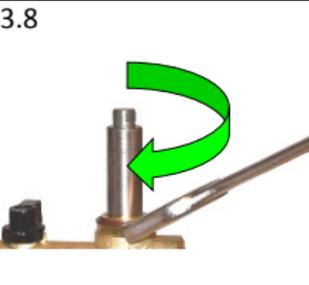
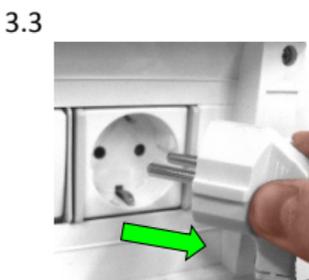
2.3 When the desired ON time is set, don't press any buttons. After a few seconds the display will start flashing, indicating that the new time is being saved. Once the new time is saved, the timer will start operating with the new time setting.

2.4 To change the OFF time, press the left 'off/arrow down' button and 'OF' will appear briefly on the display.

2.5 You can now press the left 'off/arrow down' button for decreasing the time or the right 'on/arrow up' button to increase the time.

2.6 When the desired OFF time is set, don't press any buttons. After a few seconds the display will start flashing, indicating that the new time is being saved. Once the new time is saved, the timer will start operating with the new time setting.

2.7 The timer is now fully programmed to your desired time settings and will work fully automatically.



CLEANING INSTRUCTIONS

These instructions are for cleaning the drain. If your drain requires maintenance, i.e. replacement of wearing components, please refer to our dedicated maintenance instructions (supplied with the service kit).



Depressurise the system before installation or maintenance is carried out!

3.1 Close the condensate supply, i.e. close the ball valve.

3.2 Press the TEST button to empty the unit of any residual condensate and to depressurise the valve.

3.3 Switch off the electrical supply.

- Make sure the power is switched OFF before continuing this cleaning operation!

3.4 Unscrew the valve top nut.

3.5 Remove the connector, timer and coil assembly from the valve shaft.

3.6 Unscrew the valve shaft using a 23 mm wrench.

- Do not use the valve shaft as a lever!

3.7 Clean all the valve parts.

- Note: if any parts are damaged, please replace them using a service kit!

3.8 Reassemble the inner parts and shaft. Screw the shaft assembly back on to the valve body using a 23 mm wrench (max. torque 10Nm).

3.9 Replace the connector, timer and coil assembly on to the valve. Screw on the top nut, make sure the gaskets are placed properly to ensure IP65 rating.

3.10 Switch on the electrical supply.

3.11 Slowly open the ball valve to restore normal system pressure.

3.12 Press the TEST button to check the valve function. *- Your drain is ready for operation!*

Note: We advise to check this product at least once a year and replace serviceable parts when necessary.

Note: (If applicable!) Clean the strainer periodically to avoid possible blocking causes by rust and/or debris.

Note: Check the valve function periodically. A purging sound must be heard.

CHANGING THE TIMER FUNCTION

- Function 'A' - *start with the ON time and then the OFF time, etc.*
- Function 'C' - *start with the OFF time and then the ON time, etc.*
- Function 'B' - *single shot, starts with the ON time and then switches OFF indefinite.*
- Function 'D' - *single shot, starts with the OFF time and then switches ON indefinite.*
- Function 'E' - *start with ON time then OFF time and then switches ON indefinite.*
- Function 'F' - *start with OFF time then ON time and then switches OFF indefinite.*

The timer is factory set to function 'A'. Follow these steps to change the timer function:

1. Disconnect the unit from the power supply.
2. Press and hold down the 'TEST' button and connect the unit to the power supply.
3. Release the 'TEST' button after the current timer function appears on the display (A/ B/ C/ D/ E or F).
4. Use 'off/arrow down' and 'on/arrow up' buttons to select the function (A/ B/ C/ D/ E or F).
5. When the function is selected do not press anything, after a few seconds the unit will resume operation with the new function setting.
6. Change the pre-set ON and/or OFF times if required (see pages 6-7).

RETURNING TO THE FACTORY SETTINGS

Factory settings of the timer: 3 seconds ON time, 30 minutes OFF time, function 'A'.

No matter how you change the settings you can always reset all settings to factory settings.

To do so please follow these easy steps:

1. Disconnect the unit from the power supply.
2. Press and hold down 'off/arrow down' and 'TEST' buttons, connect the unit to the power supply.
3. Release the buttons after 'P' appears on the display.
4. When 'A' appears on the display, do not press anything.
5. After a few seconds the unit will resume operation with factory settings.

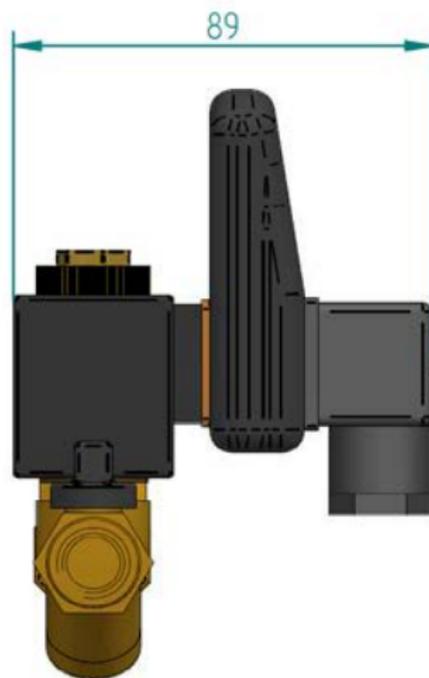
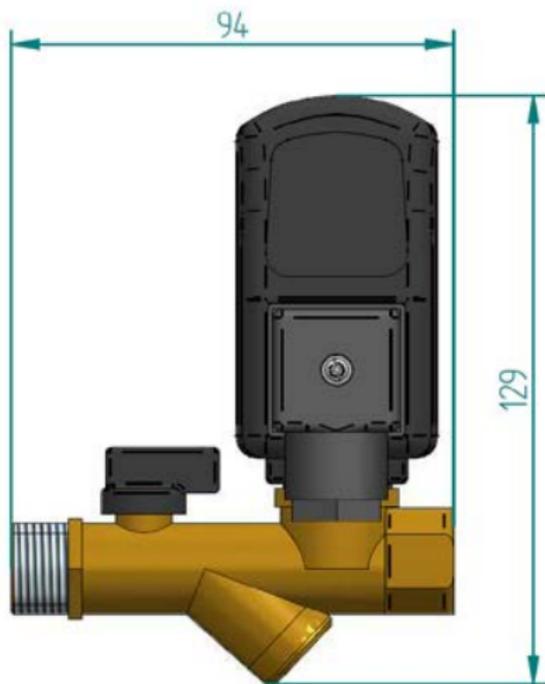
TECHNICAL SPECIFICATIONS

Maximum compressor capacity	Any size	
Pressure range	0 – 16 bar	0 – 230 psi
Supply voltage options	12 – 380 VAC/DC 50/60Hz	
Medium temperature	1 – 55 °C	34 – 131 °F
Ambient temperature	1 – 55 °C	34 – 131 °F
Timer cycle range (ON / OFF)	0,01 second to 99 hours (both ON and OFF)	
Timer PCB	SMD technology	
Timer cycle indication	LED	
Test feature	Yes	
Valve type	2/2 way, direct acting	
Valve orifice	4 mm	0,157"
Valve seals	FPM	
Inlet/Outlet connections	1/4" & 1/2" inlet, 1/2" outlet (BSP or NPT)	
Inlet connection height	1 cm	0,4"
Serviceable valve	Yes	
Valve housing material	Brass, Stainless steel	
Power connection	DIN 43650-A	
Environmental protection	IP65 (NEMA4)	

SERVICE CHART

<i>Date</i>	<i>Description</i>	<i>Name</i>

DIMENSIONS (mm)



INSTALLATION GUIDE FOR COMBO VALVE



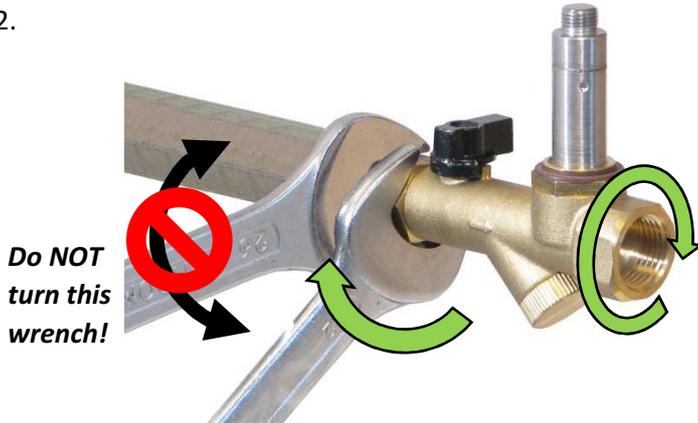
To correctly install a COMBO VALVE.



1.

Use a wrench to lock the point of installation.

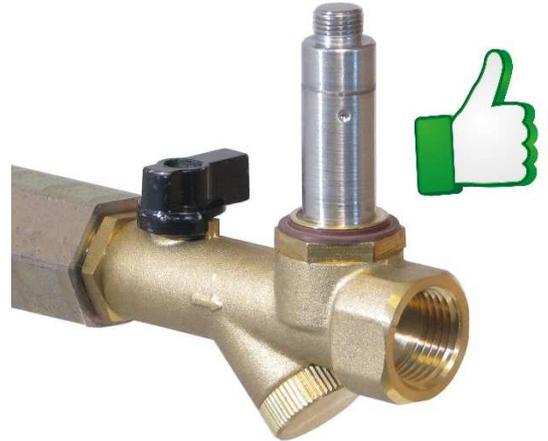
2.



Do NOT turn this wrench!

Use a second wrench to install the COMBO VALVE. Keep the first wrench in place! Do not use the Valve Shaft as lever!

3.



Proper installation

4.



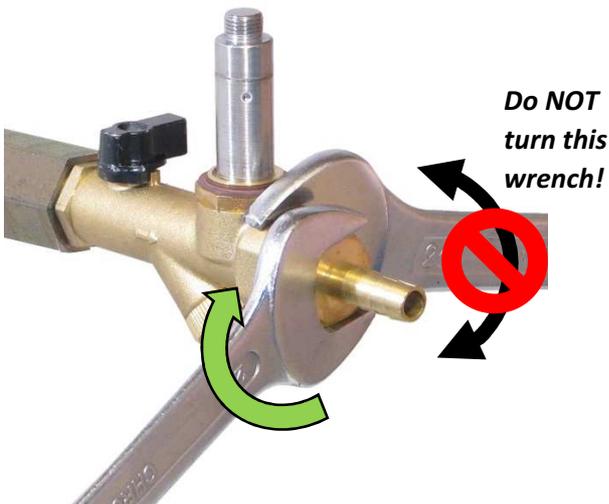
Screw in a hose barb adapter.

5.



Use a wrench to lock the valve.

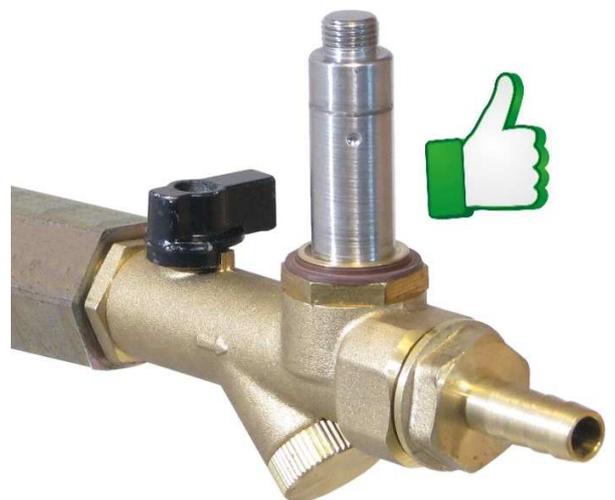
6.



Do NOT turn this wrench!

Use a second wrench to install the hose barb adapter. Use the first wrench to keep the valve in place! Do not use the Valve Shaft as lever!

7.



Proper installation