

# **Automatic Desalination Type I-S-P**

(Item no. 310160)

## Important safety information

- Always disconnect the relevant system component from the power source before working at the mounting plate. Secure the system against an unintentional restart (according to DIN VDE 0105).
- Only connect the plate to the mains voltage that is specified on the type plate of the MultiControl CT.
- · Observe the technical data and the environmental parameters.
- Follow these instructions during installation, operation or maintenance of the mounting plate. The operating instructions of the relevant manufacturers apply to the instruments used on the mounting plate. Read these carefully before commissioning the plate.

### Intended use

The MultiControl CT mounting plate was developed as an automatic desalination device for cooling towers and air washers. It consists of:

- MultiControl CT control
- Inductive probe
- Flow switch
- Motor valve
- Flow control with panel for discharge of salt water

Desalination takes place automatically, when the selected conductivity limit value is exceeded. The automatic monitoring and control of the biocide and inhibitor dosage is also possible.

#### Installation

The mounting plate must be installed in the pressure line to the cooling tower (see system example), ensuring that the circulating water flows continuously through the inlet over the inductive probe and the flow switch.

### Operation

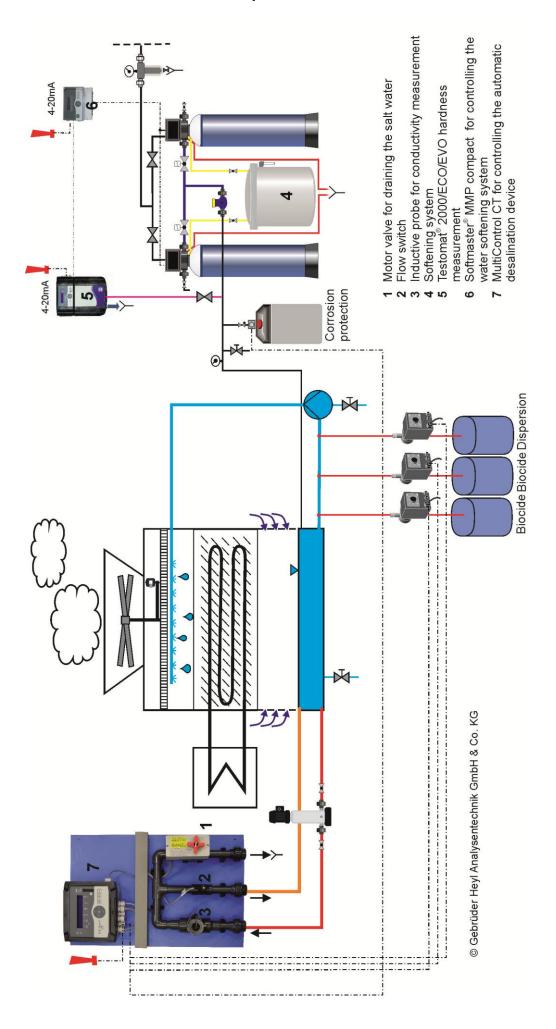
Set the limit values at the MultiControl CT control. Please read the operating instructions of the MultiControl CT device.

If the set limit value is exceeded, the motor valve switches and the salt water is discharged until it goes below the limit value again.

If the default settings of the inductive probe need to be changed, we recommend the optional "Jumo-PC-Interface" (Item No. 310133)



## Connection example automatic desalination



## Structure

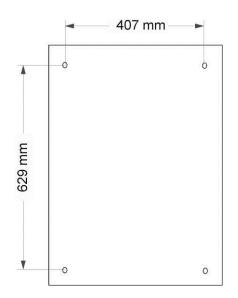
- 1 MultiControl CT control
- 2 Inductive probe for conductivity measurement
- 3 Flow monitor
- 4 Motor valve
- 5 Inlet
- 6 Outlet
- 7 Duct (draining of salt water)
- 8 Panel
- 9 Power supply 230 V







# Mounting the plate



## **Technical data**

Dimensions	450 x 700 x 300 mm (W x H x D)
Mounting dimensions	629 x 407 mm
Piping material	PVC-U
Inlet	DN 32; inner diameter approx. 25 mm
Outlet	DN32; inner diameter approx. 25 mm
Outlet duct	DN 32; inner diameter approx. 25 mm
Max. water pressure	4 bar
Power supply	230 VAC
Power consumption	20 VA
Ambient temperature	5 – 40°C
Water temperature	5 – 40°C
Weight	8.2 kg
Protection type	IP54
MultiControl CT	
Item no.	341030
Temperature display	0.0 to 150 °C $\pm$ 0.5 °C
Display accuracy	$\pm$ 2 digits or $\pm$ 5% of full-scale end
Resolution	1.2 μS / cm
Dosing	3 relays for control of biocide/inhibitor dosing pumps
SD card	for logging measurement data and alarm messages
Inductive probe	
Item no.	310132
Conductivity measuring range	20 mS / cm

Inductive probe	
Item no.	310132
Conductivity measuring range	20 mS / cm
RS232 output	
Power consumption	20 V – 50 mA
Temperatur sensor	0 – 100 °C

# Flow monitor

Nominal pressure max. flow rate Switching range

Motor valve Motor power 10.4 ... 14.8 I / min 230 V-valve 10 W

Type VH3 PN 25

100 l/min

