

Low water level limiter type LMC1

Application and function

The low water level limiter LMC1 in connection with the level probes EL 041, EL 4-1 respectively multiple probes EL912, EL913 and EL914 is a liquid level limiter for electric conductive liquids.

The product according to PED directive 97/23/EEC annex VII (Module B+D, category II) has the CE-mark no. 0035 of the notified body. Applied rules as per TRD, AD2000 and "Wasserstand 100".

Function LMC1

When the electrode rod is immersed the internal alarm relays in the controller are kept energised to maintain the burner circuit at normal. If the water level drops and the electrode rod is exposed, the controller alarm relays are de-energised.

The burner is shut down. The indicator lamp **"STÖRUNG"** lights immediately to show the alarm condition and the contact of the auxiliary relay is closing. An interlocking system of cut-off burner to be assured on site.

The controller alarm relays will also go to alarm to shut down the burner in case of :

- failure on power supply
- cable break
- cable short circuit

The auxiliary relay could be used to connect an additional alarm , e.g. a hooter. A performance check of the controller is carried out all two minutes during one second as a fully automatic process.

The lighting-up of the yellow LED **"TEST"** indicates this test.



Significance of indicator lamps

power supply on	green lamp "UB" lights
low water level alarm, cable break, cable short circuit	red lamp "STÖRUNG" lights
automatic performance check	yellow lamp "Test" lights



Technical basic equipment

- LMC1 is delivered in a plastic plug-in housing for installation in control panels
- Fixation on standard rail 35 mm according to DIN EN 50022 or directly screwed to chassis plate

Technical data

Component mark	WB-06-385
CE-mark	0035
Power supply	230V ± 15% / 50-60 Hz
Input	ca. 4,5 VA
Fuse	80 mA/T
Protection as per DIN EN 60529	IP40 ¹⁾
Allowable ambient temperature	0 – 60° C

¹⁾ according to the German regulations VdTÜV-Wasserstand 100, 4.90
a protection of IP54 has to be maintained in the boiler area

Max. operating data of potential free contacts		
Burner cut-off	Voltage	max. 250 Vac
	Current	max. 4 A ohmsch
		max. 0,75 A inductiv φ 0,5
Auxiliary relay	Voltage	max. 250 Vac
	Current	max. 8 A ohmsch
		max. 0,75 A inductiv φ 0,5
Electrical conductivity of the liquid	5 μ S/cm $\leq \rho \leq$ 10.000 μ S/cm	
	0,5 μ S/cm $\leq \rho \leq$ 2.000 μ S/cm	
Length of connection line	max. 100 m at 5 – 10.000 μ S/cm	
	max. 30 m at 0,5 – 2.000 μ S/cm	

