



Level control  
relay for  
emptying  
function. Single  
voltage. Modular  
version  
LVM20  
Emptying

Product designation

Product type designation

Function

#### Auxiliary supply

Supply voltage Type	Single voltage
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Rated auxiliary supply voltage $U_s$ AC	
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	min	VAC	24
Operating voltage range			0.85...1.1 $U_s$
Rated frequency		Hz	50/60
Power consumption Max		VA	3.5
Power dissipation Max		W	1.8

#### Output characteristics

Number of connectable electrodes	Nr.	3
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Type of electrode

		Electrode and electrode holders: SN1 / SCM / CGL / PS31 / PS3S or similar
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Electrode voltage		7.5 VAC
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Sensitivity	k $\Omega$	2.5...50 adjustable
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#### Time delay

Tripping time	s	$\leq 0.6$
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Resetting time	s	$\leq 0.75$
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#### Relay outputs

Number of relays	Nr.	1
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Relay state

		Normally de- energised, energises at tripping
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Contact arrangement

		1 changeover contact C/O- SPDT
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Rated operational voltage AC (IEC)	VAC	250
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Maximum switching voltage	VAC	400
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IEC Conventional free air thermal current $I_{th}$	A	8
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UL/CSA and IEC/EN 60947-5-1 designation		B300
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Electrical life (with rated load)	cycles	$10^5$
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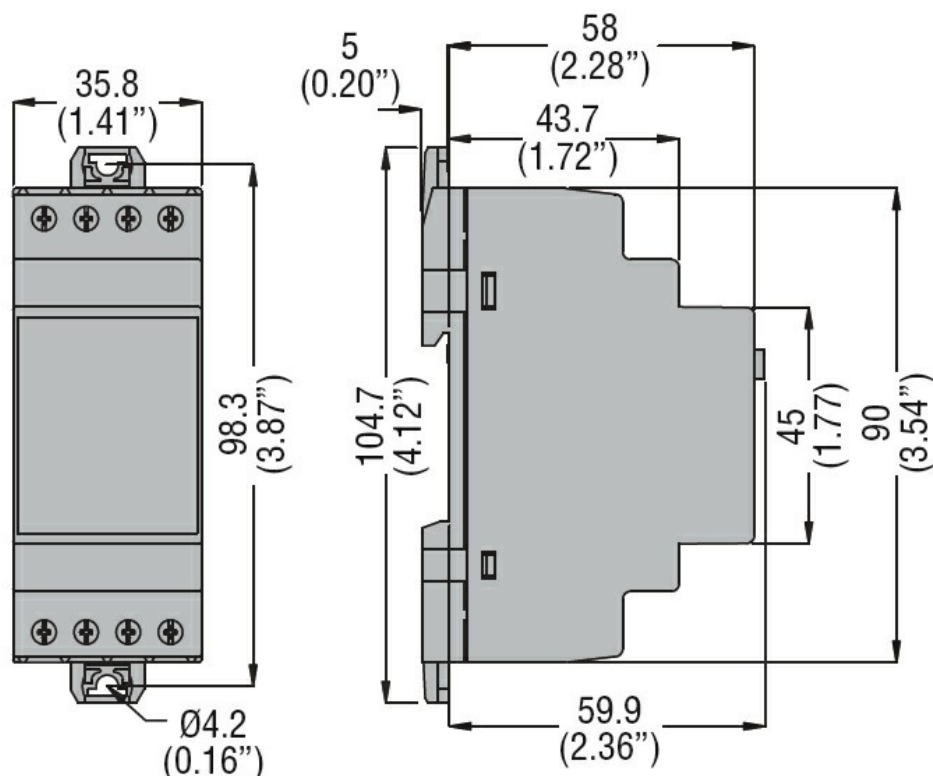
Mechanical life	cycles	$30 \times 10^6$
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#### Indications

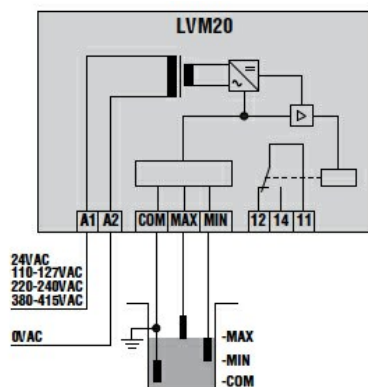
Indication	1 green LED for power on 1 red LED for relay state			
Functions				
3 detecting electrodes (MIN, MAX and COM)	Yes			
5 detecting electrodes (MIN1, MAX1, MIN2, MAX2 and COM)	No			
Sensitivity adjustment 2.5...50k Ω	Yes			
Sensitivity adjustment 2.5...100k Ω	No			
Sensitivity adjustment 2.5...200k Ω	No			
Adjustable sensitivity full-scale value 25-50-100-200 k Ω	No			
Separate sensitivity adjustment for MAX probe (foam detection)	No			
Emptying function	Yes			
Filling function	No			
Emptying function with MIN and/or MAX alarm	No			
Filling function with MIN and/or MAX alarm	No			
Emptying function with pump priority change	No			
Filling function with pump priority change	No			
Tank filling, well drawing and alarm	No			
Filling-emptying adjustment selector	No			
Programming selector for 5 different	No			
Motor start-up priority change	No			
Connections				
Terminals type	Screw			
Tightening torque for terminals	max	Nm	0.8	
	max	lbin	7	
Conductor cross section				
AWG/Kcmil	min	AWG	24	
	Max	AWG	12	
IEC	min	mm²	0.2	
	Max	mm²	4	
Insulations				
Rated insulation voltage Ui		V	415	
Rated impulse withstand voltage Uimp		kV	6	
Operating frequency withstand voltage		kV	4	
Double insulation Supply / relay / electrode		VAC	≤250	
Ambient conditions				
Temperature	Operating temperature			
	min	°C	-20	
	max	°C	+60	
	Storage temperature			
	min	°C	-30	
	max	°C	+80	
Housing				
Execution	Modular DIN rail mounting			
N° of modules	2			
Material	Self-extinguishing polyamide			

Mounting	35mm DIN rail (IEC/EN 60715) or by screws using extractable clips	
IEC degree of protection	IP40 on front / IP20 on terminals	
Dimensions (W x H x D)	mm	35.8 x 104.7 x 64.9
Weight	g	215

#### Dimensions



#### Wiring diagrams



#### Certifications and compliance

##### Compliance

CSA C22.2 n° 14.

IEC/EN 60255-5

IEC/EN 61000-6-2

IEC/EN 61000-6-3

UL508

##### Certificates

cULus

EAC

ETIM classification

ETIM 8.0

EC001447 - (Fill)  
level monitoring  
relay