## **Product datasheet** Characteristics

# LR97D25M7

electronic overload relay for motor TeSys - 5...25 A - 200...240 V AC



### Main

Device short name	LR97
Product or component type	Electronic overcurrent relay
Relay application	Locked rotor, mechanical jamming I > 3 x Isetting Overload Imax > Isetting Sensitivity to phase failure
Product compatibility	LC1D09D38
Network type	AC
[Us] rated supply voltage	200240 V AC
Thermal protection adjustment range	525 A
[Ue] rated operational voltage	600 V AC 50/60 Hz for power circuit conforming to CSA 600 V AC 50/60 Hz for power circuit conforming to UL 690 V AC 50/60 Hz for power circuit conforming to IEC 60947-4-1
Quantity per set	Set of 10

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Complementary Network frequency	5060 Hz	
Mounting support	Direct on contactor Rail	
Tripping threshold	Rail	
Tripping threshold Surge withstand	Rail 521 A	
Tripping threshold Surge withstand Contacts type and composition  [Ith] conventional free air thermal	Rail 521 A 6 kV conforming to IEC 61000-4-5 1 NC	
Mounting support  Tripping threshold  Surge withstand  Contacts type and composition  [Ith] conventional free air thermal current  Protection type	Rail 521 A 6 kV conforming to IEC 61000-4-5 1 NC 1 NO	

[Ui] rated insulation voltage	140 VA at 48 V AC conforming to IEC 60947 360 VA at 110 V AC conforming to IEC 60947 360 VA at 220 V AC conforming to IEC 60947 70 VA at 24 V AC conforming to IEC 60947 600 V power circuit conforming to CSA 600 V power circuit conforming to UL
	690 V power circuit conforming to IEC 60947-4-1
[Uimp] rated impulse withstand voltage	6 kV
Phase failure sensitivity	< 3 s
Reset	Automatic reset 120 s fixed Electrical by interruption of power supply for minimum 0.1 s Manual reset
Time range	0.210 s - O-time knob 0.310 s - O-time knob 0.530 s - D-time knob
Signalling function	2 LEDs
Connections - terminals	Control circuit: cable 1 cable 125 mm² - cable stiffness: flexible - with cable end Control circuit: cable 1 cable 125 mm² - cable stiffness: flexible - without cable end Power circuit: cable 1 cable 14 mm² - cable stiffness: flexible - with cable end Power circuit: cable 1 cable 1.510 mm² - cable stiffness: flexible - without cable end Power circuit: lug-clamp 1 cable 14 mm² - cable stiffness: flexible - with cable end Power circuit: lug-clamp 1 cable 1.510 mm² - cable stiffness: flexible - without cable end Control circuit: cable 2 cable 125 mm² - cable stiffness: flexible - with cable end Control circuit: lug-clamp 1 cable 125 mm² - cable stiffness: flexible - without cable end Control circuit: lug-clamp 1 cable 125 mm² - cable stiffness: flexible - with cable end Control circuit: lug-clamp 1 cable 125 mm² - cable stiffness: flexible - without cable end Control circuit: lug-clamp 2 cable 125 mm² - cable stiffness: flexible - without cable end Control circuit: lug-clamp 2 cable 125 mm² - cable stiffness: flexible - with cable end
Tightening torque	Power circuit : 2 N.m - on cable Control circuit : 0.61.2 N.m - on lug-clamp
Height	67.5 mm
Width	45 mm
Depth	67.5 mm
Product weight	0.172 kg

### Environment

Standards	IEC 60947 IEC 60255-6
Product certifications	CSA UL GOST
Protective treatment	TH conforming to IEC 60068
IP degree of protection	IP20 conforming to IEC 60529
Ambient air temperature for operation	-2560 °C conforming to IEC 60947-4-1
Ambient air temperature for storage	-3080 °C
Operating altitude	2000 m
Fire resistance	850 °C conforming to IEC 60695-2-1
Shock resistance	15 gn 11 ms conforming to IEC 60068-2-7
Vibration resistance	4 gn conforming to IEC 60068-2-6
Dielectric strength	2 V at 50 Hz conforming to IEC 60255-5
Resistance to electrostatic discharge	6 kV in indirect mode 8 kV in air
Resistance to radiated fields	10 V/m level 3
Resistance to fast transients	2 kV
Disturbance radiated/conducted	10 V conforming to EN 61000-4-6 Class A conforming to EN 55011

## Contractual warranty

Warranty period	18 months