

Product datasheet

Specifications



Contactor, EasyPact TVS, 3P(3NO), AC-3, <=440V, 50A, 380V AC coil, 50/60Hz

LC1E50Q7

Main

Range	EasyPact
Product or component type	Contactor
Device short name	LC1E
Contactor application	Motor control Resistive load
Utilisation category	AC-1 AC-3
Poles description	3P
[Ue] rated operational voltage	Power circuit: <= 690 V AC 50/60 Hz
[Ie] rated operational current	50 A (at <55 °C) at <= 440 V AC AC-3 for power circuit 70 A (at <55 °C) at <= 440 V AC AC-1 for power circuit

Complementary

Motor power kW	15 kW at 220...230 V AC 50/60 Hz 22 kW at 380...400 V 25 kW at 415 V 30 kW at 440 V 30 kW at 500 V 33 kW at 660...690 V
Pole contact composition	3 NO
Auxiliary contact composition	1 NO + 1 NC
[Ui] rated insulation voltage	690 V conforming to IEC 60947-4-1
[Uimp] rated impulse withstand voltage	6 kV coil not connected to the power circuit conforming to IEC 60947
Overvoltage category	III
[I _{th}] conventional free air thermal current	70 A (at 55 °C)
I _{rms} rated making capacity	500 A at 440 V AC for power circuit conforming to IEC 60947-4-1
Rated breaking capacity	400 A at 440 V for power circuit conforming to IEC 60947
Associated fuse rating	10 A gG at <= 690 V coordination type 1 for control circuit conforming to IEC 60947-5-1 100 A gG at <= 690 V coordination type 1 for power circuit
Control circuit type	AC at 50/60 Hz
Average impedance	1.5 mOhm - I _{th} 70 A 50 Hz for power circuit
Power dissipation per pole	3.8 W AC-3 7.4 W AC-1
Minimum switching current	5 mA for control circuit

Minimum switching voltage	17 V for control circuit
Non-overlap time	1.5 ms on energisation guaranteed between NC and NO contact 1.5 ms on de-energisation guaranteed between NC and NO contact
Maximum operating rate	1200 cyc/h 60 °C
Inrush power in VA	160 VA 50 Hz cos phi 0.75 (at 20 °C) 140 VA 60 Hz cos phi 0.75 (at 20 °C)
Hold-in power consumption in VA	15 VA 50 Hz cos phi 0.3 (at 20 °C) 13 VA 60 Hz cos phi 0.3 (at 20 °C)
Heat dissipation	6...10 W for control circuit
Insulation resistance	> 10 MOhm for control circuit
Connections - terminals	Control circuit: screw clamp terminals 1 1...4 mm ² - cable stiffness: flexible without cable end Control circuit: screw clamp terminals 2 1...4 mm ² - cable stiffness: flexible without cable end Control circuit: screw clamp terminals 1 1...4 mm ² - cable stiffness: flexible with cable end Control circuit: screw clamp terminals 2 1...2.5 mm ² - cable stiffness: flexible with cable end Control circuit: screw clamp terminals 1 1...4 mm ² - cable stiffness: solid without cable end Control circuit: screw clamp terminals 2 1...4 mm ² - cable stiffness: solid without cable end Power circuit: screw clamp terminals 1 2.5...25 mm ² - cable stiffness: flexible with cable end Power circuit: screw clamp terminals 2 2.5...10 mm ² - cable stiffness: flexible with cable end Power circuit: screw clamp terminals 1 2.5...25 mm ² - cable stiffness: solid without cable end Power circuit: screw clamp terminals 2 2.5...16 mm ² - cable stiffness: solid without cable end
Tightening torque	Control circuit: 1.2 N.m Power circuit: 5 N.m
Mounting support	DIN rail Plate
Mechanical durability	5000000 cycles
Operating altitude	3000 m without derating
Standards	IEC 60947-1 IEC 60947-5-1 IEC 60947-4-1
Product certifications	EAC CE

Environment

IP degree of protection	IP2x conforming to IEC 60529
Protective treatment	TH (pollution degree 3) conforming to IEC 60068-2-30 test Db
Permissible ambient air temperature around the device	-20...70 °C at U _c
Ambient air temperature for storage	-60...80 °C
Fire resistance	850 °C conforming to IEC 60695-2-1
Mechanical robustness	Vibrations contactor open: 1.5 Gn, 5...300 Hz Vibrations contactor closed: 3 Gn, 5...300 Hz Shocks contactor open: 6 Gn for 11 ms Shocks contactor closed: 7 Gn for 11 ms
Height	127 mm
Width	75 mm
Depth	114 mm
Net weight	0.98 kg

Packing Units

Unit Type of Package 1	PCE
Number of Units in Package 1	1
Package 1 Weight	980.0 g
Package 1 Height	11.4 cm
Package 1 Width	7.5 cm

Package 1 Length	12.7 cm
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Offer Sustainability

Sustainable offer status	Green Premium product
REACH Regulation	REACH Declaration
REACH free of SVHC	Yes
EU RoHS Directive	Compliant EU RoHS Declaration
Toxic heavy metal free	Yes
Mercury free	Yes
RoHS exemption information	Yes
China RoHS Regulation	China RoHS declaration
Environmental Disclosure	Product Environmental Profile
WEEE	The product must be disposed on European Union markets following specific waste collection and never end up in rubbish bins