

Product datasheet

Specifications



Contactor, EasyPact TVS, 3P(3NO), AC-3, <=440V, 80A, 220V AC coil, 50/60Hz

LC1E80M7

Main

Range	EasyPact
Product or component type	Contactor
Device short name	LC1E
Contactor application	Resistive load Motor control
Utilisation category	AC-3 AC-1
Poles description	3P
[Ue] rated operational voltage	Power circuit: <= 690 V AC 50/60 Hz
[Ie] rated operational current	80 A (at <55 °C) at <= 440 V AC AC-3 for power circuit 110 A (at <55 °C) at <= 440 V AC AC-1 for power circuit

Complementary

Motor power kW	22 kW at 220...230 V AC 50/60 Hz 37 kW at 380...400 V 45 kW at 415 V 45 kW at 440 V 45 kW at 500 V 45 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
[Ith] conventional free air thermal current	100 A (at 60 °C) for power circuit
Irms rated making capacity	800 A at 440 V AC for power circuit conforming to IEC 60947-4-1
Rated breaking capacity	640 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 60947-5-1 160 A gG at <= 690 V coordination type 1 for power circuit
Control circuit type	AC at 50/60 Hz
Average impedance	0.8 mOhm - Ith 110 A 50 Hz for power circuit
Power dissipation per pole	5.1 W AC-3 9.7 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	200 VA 50 Hz cos phi 0.75 (at 20 °C) 220 VA 60 Hz cos phi 0.75 (at 20 °C)
Hold-in power consumption in VA	22 VA 60 Hz cos phi 0.3 (at 20 °C) 20 VA 50 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 4...50 mm ² - cable stiffness: flexible with cable end Power circuit: screw clamp terminals 2 4...16 mm ² - cable stiffness: flexible with cable end Power circuit: screw clamp terminals 1 4...50 mm ² - cable stiffness: solid without cable end Power circuit: screw clamp terminals 2 4...50 mm ² - cable stiffness: solid without cable end
Tightening torque	Control circuit: 1.2 N.m Power circuit: 12 N.m
Mounting support	DIN rail Plate
Mechanical durability	300000 cycles
Operating altitude	3000 m without derating
Standards	IEC 60947-4-1 IEC 60947-5-1 IEC 60947-1
Product certifications	CE EAC

Environment

IP degree of protection	IP2x conforming to IEC 60529
Protective treatment	TH (pollution degree 3) conforming to IEC 60068-2-30
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	85 mm
Depth	121 mm
Net weight	1.52 kg

Packing Units

Unit Type of Package 1	PCE
Number of Units in Package 1	1
Package 1 Weight	1.54 kg
Package 1 Height	15.0 cm
Package 1 Width	15.5 cm

Package 1 Length	11.0 cm
Unit Type of Package 2	P06
Number of Units in Package 2	40
Package 2 Weight	73.864 kg
Package 2 Height	75.0 cm
Package 2 Width	60.0 cm
Package 2 Length	80.0 cm
Unit Type of Package 3	S03
Number of Units in Package 3	5
Package 3 Weight	8.233 kg
Package 3 Height	30.0 cm
Package 3 Width	30.0 cm
Package 3 Length	40.0 cm

Offer Sustainability

Sustainable offer status	Green Premium product
REACH Regulation	REACH Declaration
EU RoHS Directive	Compliant EU RoHS Declaration
Mercury free	Yes
RoHS exemption information	Yes
China RoHS Regulation	China RoHS declaration Product out of China RoHS scope. Substance declaration for your information
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