Product data sheet
Characteristics

LC1R40M5N
Contactor,EasyPact TVR,3P,1NO +1NC,18.5kW,40A,220V AC coil

Main

Range	EasyPact
Product name	EasyPact TVR
Product or component type	Contactor
Device short name	LC1R
Contactor application	Resistive load Motor control Reversing
Utilisation category	AC-1 AC-3
Poles description	3P
Power pole contact composition	3 NO
[Ie] rated operational current	40 A (at <40 °C) at <= 400 V AC AC-3 for power circuit 60 A (at <40 °C) at <= 400 V AC AC-1 for power circuit
[Uc] control circuit voltage	220 V AC 50 Hz
Auxiliary contact composition	1 NO + 1 NC
[Ue] rated operational voltage	Power circuit: 690 V AC 50 Hz Signalling circuit: 690 V AC 50 Hz

Complementary

Motor power kW	11 KW at 220/230 V AC 50 Hz 18.5 KW at 380/400 V AC 50 Hz 30 kW at 660/690 V AC 50 Hz
Electrical durability	0.8 Mcycles 40 A AC-3 at Ue <= 440 V
Mechanical durability	8 Mcycles
Maximum operating rate	1000 cyc/h 40 °C
Operating time	20...26 ms closing 8...12 ms opening
Control circuit voltage limits	Drop-out: 0.3...0.6 Uc Operational: 0.8...1.1 Uc
Hold-in power consumption in VA	36.6 VA cos phi 0.3
[Ith] conventional free air thermal current	60 A (at 40 °C) for power circuit 10 A (at 40 °C) for signalling circuit
Average impedance	1.5 mOhm - Ith 50 A 50 Hz for power circuit
Power dissipation per pole	AC-3: 2.4 W AC-1: 5.4 W
Heat dissipation	6…10 W at 50 Hz
Irms rated making capacity	400 A 380 V AC power circuit AC-3 IEC 60947 400 A 380 V AC power circuit AC-3 GB 14048
Rated breaking capacity	320 A at 380 V for power circuit AC-3 conforming to IEC 60947 320 A at 380 V for power circuit AC-3 conforming to GB 14048
[Icw] rated short-time withstand current	100 A - 1 s for signalling circuit 120 A - 500 ms for signalling circuit 140 A - 100 ms for signalling circuit 320 A 40 °C - 10 s for power circuit 165 A 40 °C - 1 min for power circuit 72 A 40 °C - 10 min for power circuit

Associated fuse rating	10 A gG for signalling circuit conforming to IEC 60947-5-1 80 A gG at <= 690 V coordination type 1 for power circuit
Overvoltage category	III
[Ui] rated insulation voltage	Power circuit: 690 V conforming to IEC 60947-4-1 Signalling circuit: 690 V conforming to IEC 60947-1 Power circuit: 690 V conforming to GB 14048.4
Coil technology	Without built-in suppressor module
Auxiliary contacts type	Type mechanically linked 1 NO + 1 NC conforming to IEC 60947-5-1 Type mirror contact 1 NC conforming to IEC 60947-4-1
Signalling circuit frequency	50 Hz
Minimum switching current	5 mA for signalling circuit
Switching voltage	17 V for signalling circuit
Non-overlap time	1.5 Ms on de-energisation between NC and NO contact 1.5 ms on energisation between NC and NO contact
Insulation resistance	> 10 MOhm for signalling circuit
Mounting support	Plate Rail
Connections - terminals	Control circuit: screw clamp terminals 1 1…4 mm² - cable stiffness: flexible without cable end Control circuit: screw clamp terminals 2 1…4 mm² - cable stiffness: flexible without cable end Control circuit: screw clamp terminals 2 1…2.5 mm² - cable stiffness: flexible with cable end Control circuit: screw clamp terminals 1 1…4 mm² - cable stiffness: solid without cable end Control circuit: screw clamp terminals 2 1…4 mm² - cable stiffness: solid without cable end Control circuit: screw clamp terminals 1 1…2.5 mm² - cable stiffness: flexible with cable end Power circuit: screw clamp terminals 1 2.5…25 mm² - external diameter: 16 mm - cable stiffness: flexible without cable end Power circuit: screw clamp terminals 2 2.5…16 mm² - external diameter: 16 mm - cable stiffness: flexible without cable end Power circuit: screw clamp terminals 1 2.5…25 mm² - external diameter: 16 mm - cable stiffness: flexible with cable end Power circuit: screw clamp terminals 2 2.5…10 mm² - external diameter: 16 mm - cable stiffness: flexible with cable end Power circuit: screw clamp terminals 1 2.5…25 mm² - external diameter: 16 mm - cable stiffness: solid without cable end Power circuit: screw clamp terminals 2 2.5…16 mm² - external diameter: 16 mm - cable stiffness: solid without cable end
Tightening torque	Control circuit: 1.2 N.m - on screw clamp terminals - with screwdriver flat Ø 6 mm Control circuit: 1.2 N.m - on screw clamp terminals - with screwdriver Philips No 2 Power circuit: 5 N.m - on screw clamp terminals - with screwdriver flat Ø 6 to Ø 8 mm M6
Height	127 mm
Width	75 mm
Depth	114 mm
Standards	IEC 60947-4-1 GB 14048.1 GB 14048.4 IEC 60947-1
Product certifications	CCC

Environment

Pollution degree	3
Protective treatment	TH conforming to IEC 60068-2-30
Ambient air temperature for operation	-5…40 °C
Ambient air temperature for storage	-40…60 °C
Permissible ambient air temperature around the device	-20…55 °C at Uc
Operating altitude	2000 m without derating
Fire resistance	850 °C conforming to IEC 60695-2-11
Mechanical robustness	Vibrations contactor open (1.2 gn, 5...300 Hz) conforming to IEC 60068-2-6 Vibrations contactor closed (2.5 Gn, 5...300 Hz) conforming to IEC 60068-2-6 Shocks 11 ms contactor open (4 gn) conforming to IEC 60068-2-27 Shocks 11 ms contactor closed (6 Gn) conforming to IEC 60068-2-27

Packing Units

Unit Type of Package 1	PCE
Number of Units in Package 1	1
Package 1 Height	7.5 cm
Package 1 Width	11.4 cm
Package 1 Length	12.7 cm
Package 1 Weight	910 g

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
China RoHS Regulation	China RoHS Declaration
RoHS exemption information	Yes
Environmental Disclosure	Product Environmental Profile
Circularity Profile	End Of Life Information
WEEE	The product must be disposed on European Union markets following specific waste collection and never end up in rubbish bins