Product datasheet
Characteristics

LC2D115004M7

TeSys D changeover contactor - 4P(4 NO) - AC-1 - <= 440 V 200 A - 220 V AC coil

Main

Range	TeSys
Product name	TeSys D
Product or component type	Changeover contactor
Device short name	LC2D
Contactor application	Resistive load
Utilisation category	AC-1
Device presentation	Preassembled with reversing power busbar
Poles description	4P
Pole contact composition	4 NO
[Ue] rated operational voltage	<= 1000 V AC 25...400 Hz for power circuit <= 460 V DC for power circuit
[Ie] rated operational current	200 A (<= 60 °C) at <= 440 V AC AC-1 for power circuit
Control circuit type	AC 50/60 Hz
Control circuit voltage	220 V AC 50/60 Hz
[Uimp] rated impulse withstand voltage	8 kV conforming to IEC 60947
Overvoltage category	III
[Ith] conventional free air thermal current	200 A at <= 60 °C for power circuit
Irms rated making capacity	1260 A at 440 V for power circuit conforming to IEC 60947
Rated breaking capacity	1100 A at 440 V for power circuit conforming to IEC 60947
[Icw] rated short-time withstand current	1100 A <= 40 °C 1 s power circuit 250 A <= 40 °C 10 min power circuit 550 A <= 40 °C 1 min power circuit 950 A <= 40 °C 10 s power circuit
Associated fuse rating	200 A gG at <= 690 V coordination type 2 for power circuit 250 A gG at <= 690 V coordination type 1 for power circuit
Average impedance	At 50 Hz - Ith 200 A for power circuit
[Ui] rated insulation voltage	1000 V for power circuit conforming to IEC 60947-4-1 600 V for power circuit certifications CSA 600 V for power circuit certifications UL
Electrical durability	0.8 Mcycles 200 A AC-1 at Ue <= 440 V
Power dissipation per pole	24 W AC-1
Protective cover	Without
Interlocking type	Mechanical
Mounting support	Plate Rail
Standards	EN 60947-4-1 EN 60947-5-1 IEC 60947-4-1 IEC 60947-5-1 UL 508 CSA C22.2 No 14
Product certifications	BV CCC CSA DNV GL GOST RINA

	UL LROS
Connections - terminals	Control circuit : screw clamp terminals 2 cable(s) 1...2.5 mm² - cable stiffness: flexible - without cable end Control circuit : screw clamp terminals 2 cable(s) 1...2.5 mm² - cable stiffness: flexible - with cable end Control circuit : screw clamp terminals 2 cable(s) 1...2.5 mm² - cable stiffness: solid - without cable end Control circuit : screw clamp terminals 1 cable(s) 1...2.5 mm² - cable stiffness: flexible - with cable end Control circuit : screw clamp terminals 1 cable(s) 1...2.5 mm² - cable stiffness: flexible - without cable end Control circuit : screw clamp terminals 1 cable(s) 1...2.5 mm² - cable stiffness: solid - without cable end Power circuit : connector 1 cable(s) 10...120 mm² - cable stiffness: flexible - without cable end Power circuit : connector 2 cable(s) 10...50 mm² - cable stiffness: flexible - without cable end Power circuit : connector 1 cable(s) 10...120 mm² - cable stiffness: flexible - with cable end Power circuit : connector 2 cable(s) 10...50 mm² - cable stiffness: flexible - with cable end Power circuit : connector 1 cable(s) 10...120 mm² - cable stiffness: solid - without cable end Power circuit : connector 2 cable(s) 10...50 mm² - 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 : 12 N.m - on connector hexagonal 4 mm
Operating time	6...20 ms opening 20...50 ms closing
Safety reliability level	B10d = 1369863 cycles contactor with nominal load conforming to EN/ISO 13849-1 B10d = 20000000 cycles contactor with mechanical load conforming to EN/ISO 13849-1
Mechanical durability	8000000 cycles
Operating rate	2400 cyc/h at <= 60 °C

Complementary

Coil technology	Built-in bidirectional peak limiting diode suppressor
Control circuit voltage limits	0.3...0.5 Uc at 55 °C drop-out 50/60 Hz 0.8...1.15 Uc at 55 °C operational 50/60 Hz
Inrush power in VA	280...350 VA at 20 °C (cos ϕ 0.8) 60 Hz 280...350 VA at 20 °C (cos ϕ 0.8) 50 Hz
Hold-in power consumption in VA	2...18 VA at 20 °C (cos ϕ 0.3) 60 Hz 2...18 VA at 20 °C (cos ϕ 0.3) 50 Hz
Heat dissipation	3...8 W at 50/60 Hz

Environment

IP degree of protection	IP2x front face conforming to IEC 60529
Protective treatment	TH conforming to IEC 60068-2-30
Pollution degree	3
Ambient air temperature for operation	-5...60 °C
Ambient air temperature for storage	-60...80 °C
Permissible ambient air temperature around the device	-40...70 °C at Uc
Operating altitude	3000 m without derating in temperature
Fire resistance	850 °C conforming to IEC 60695-2-1
Flame retardance	V1 conforming to UL 94
Mechanical robustness	Vibrations contactor open 2 Gn, 5...300 Hz

	Vibrations contactor closed 4 Gn, 5...300 Hz Shocks contactor closed 15 Gn for 11 ms Shocks contactor open 6 Gn for 11 ms
Height	158 mm
Width	334 mm
Depth	148 mm
Product weight	7.4 kg