Product datasheet

Specifications



() Discontinued

TeSys Deca contactor , 3P(3 NO) , AC-3 , <= 440V, 38 A , 415V AC 50/60 Hz coil

LC1D386N7

Main

| Range | TeSys |
|--------------------------------|--|
| Range Of Product | TeSys D |
| Product Or Component Type | Contactor |
| Device Short Name | LC1D |
| Contactor Application | Resistive load Motor control |
| Utilisation Category | AC-3 AC-1 |
| Poles Description | 3P |
| [Ue] Rated Operational Voltage | Power circuit: <= 690 V AC 25400 Hz Power circuit: <= 300 V DC |
| [le] Rated Operational Current | 50 A (at <60 °C) at <= 440 V AC AC-1 for power circuit 38 A (at <60 °C) at <= 440 V AC AC-3 for power circuit |
| [Uc] Control Circuit Voltage | 415 V AC 50/60 Hz |

Complementary

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|--|--|--|
| Motor Power Kw | 18.5 kW at 500 V AC 50/60 Hz 18.5 kW at 660690 V AC 50/60 Hz 18.5 kW at 380400 V AC 50/60 Hz 9 kW at 220230 V AC 50/60 Hz 18.5 kW at 415440 V AC 50/60 Hz | |
| Motor Power Hp | 10 hp at 230/240 V AC 50/60 Hz for 3 phases motors 10 hp at 200/208 V AC 50/60 Hz for 3 phases motors 5 hp at 240 V AC 50/60 Hz for 1 phase motors 20 hp at 480 V AC 50/60 Hz for 3 phases motors 25 hp at 600 V AC 50/60 Hz for 3 phases motors | |
| Compatibility Code | LC1D | |
| Pole Contact Composition | 3 NO | |
| Contact Compatibility | M2 | |
| Protective Cover | With | |
| [Ith] Conventional Free Air Thermal Current | 10 A (at 60 °C) for signalling circuit 50 A (at 60 °C) for power circuit | |
| Irms Rated Making Capacity | 140 A AC for signalling circuit conforming to IEC 60947-5-1 250 A DC for signalling circuit conforming to IEC 60947-5-1 550 A at 440 V for power circuit conforming to IEC 60947 | |
| Rated Breaking Capacity | 550 A at 440 V for power circuit conforming to IEC 60947 | |

| [Icw] Rated Short-Time Withstand Current | 60 A 40 °C - 10 min for power circuit |
|---|---|
| ourrent | 430 A 40 °C - 1 s for power circuit 150 A 40 °C - 1 min for power circuit |
| | 310 A 40 °C - 10 s for power circuit |
| | 100 A - 1 s for signalling circuit |
| | 120 A - 500 ms for signalling circuit |
| | 140 A - 100 ms for signalling circuit |
| Associated Fuse Rating | 10 A gG for signalling circuit conforming to IEC 60947-5-1 |
| | 63 A gG at <= 690 V coordination type 1 for power circuit |
| | 63 A gG at <= 690 V coordination type 2 for power circuit |
| Average Impedance | 2 mOhm - Ith 50 A 50 Hz for power circuit |
| Power Dissipation Per Pole | 5 W AC-1 3 W AC-3 |
| [Ui] Rated Insulation Voltage | Power circuit: 600 V CSA certified |
| | Power circuit: 600 V UL certified |
| | Signalling circuit: 690 V conforming to IEC 60947-1 |
| | Signalling circuit: 600 V CSA certified |
| | Signalling circuit: 600 V UL certified Power circuit: 690 V conforming to IEC 60947-4-1 |
| Overvoltage Category | 111 |
| Pollution Degree | 3 |
| [Uimp] Rated Impulse Withstand | |
| Voltage | 6 kV conforming to IEC 60947 |
| 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 |
| | 13049-1 |
| Mechanical Durability | 15 Mcycles |
| Electrical Durability | 1.4 Mcycles 50 A AC-1 at Ue <= 440 V 1.4 Mcycles 38 A AC-3 at Ue <= 440 V |
| Control Circuit Type | AC at 50/60 Hz |
| | |
| Coil Technology | Without built-in suppressor module |
| Control Circuit Voltage Limits | 0.30.6 Uc (-4070 °C):drop-out AC 50/60 Hz |
| | 0.81.1 Uc (-4060 °C):operational AC 50 Hz |
| | 0.851.1 Uc (-4060 °C):operational AC 60 Hz |
| | 11.1 Uc (6070 °C):operational AC 50/60 Hz |
| Inrush Power In Va | 70 VA 60 Hz cos phi 0.75 (at 20 °C) |
| | 70 VA 50 Hz cos phi 0.75 (at 20 °C) |
| Hold-In Power Consumption In Va | 7.5 VA 60 Hz cos phi 0.3 (at 20 °C) |
| | 7 VA 50 Hz cos phi 0.3 (at 20 °C) |
| Heat Dissipation | 23 W at 50/60 Hz |
| Operating Time | 419 ms opening |
| | 1222 ms closing |
| Maximum Operating Rate | 3600 cyc/h 60 °C |
| Connections - Terminals | Control circuit: lugs-ring terminals - external diameter: 8 mm Power circuit: lugs-ring terminals - external diameter: 10 mm |
| Tightening Torque | Control circuit: 1.7 N.m - on lugs-ring terminals - with screwdriver flat Ø 6 mm M3.5 |
| | Control circuit: 1.7 N.m - on lugs-ring terminals - with screwdriver Philips No 2 M3.5 |
| | Power circuit: 2.5 N.m - on lugs-ring terminals - with screwdriver flat Ø 8 mm M4 |
| | Power circuit: 2.5 N.m - on lugs-ring terminals - with screwdriver Philips No 2 M4 |
| Auxiliary Contact Composition | 1 NO + 1 NC |
| 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 | 25400 Hz |
| Minimum Switching Voltage | 17 V for signalling circuit |
| Minimum Switching Current | 5 mA for signalling circuit |
| | |

| Insulation Resistance | > 10 MOhm 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 | |
| Mounting Support | Plate Rail | |

Environment

| LINIOIIIIeilt | |
|--|---|
| Standards | CSA C22.2 No 14 EN 60947-4-1 EN 60947-5-1 IEC 60947-4-1 IEC 60947-5-1 UL 508 |
| Product Certifications | CSA DNV RINA GOST CCC LROS (Lloyds register of shipping) GL UL BV |
| Ip Degree Of Protection | IP20 front face conforming to IEC 60529 |
| Protective Treatment | TH conforming to IEC 60068-2-30 |
| Climatic Withstand | conforming to IACS E10 exposure to damp heat conforming to IEC 60947-1 Annex Q category D exposure to damp heat |
| Permissible Ambient Air Temperature Around The Device | -6080 °C storage -4060 °C operation 6070 °C with derating |
| Operating Altitude | 03000 m |
| Fire Resistance | 850 °C conforming to IEC 60695-2-1 |
| Flame Retardance | V1 conforming to UL 94 |
| Mechanical Robustness | Vibrations contactor open (2 Gn, 5300 Hz) Vibrations contactor closed (4 Gn, 5300 Hz) Shocks contactor closed (15 Gn for 11 ms) Shocks contactor open (8 Gn for 11 ms) |
| Height | 85 mm |
| Width | 45 mm |
| Depth | 92 mm |
| Net Weight | 0.38 kg |
| | |

Packing Units

| Unit Type Of Package 1 | PCE |
|------------------------------|-----|
| Number Of Units In Package 1 | 1 |

Contractual warranty

Warranty

18 months

Sustainability

Green PremiumTM label is Schneider Electric's commitment to delivering products with best-inclass environmental performance. Green Premium promises compliance with the latest regulations, transparency on environmental impacts, as well as circular and low-CO₂ products.

Guide to assessing product sustainability is a white paper that clarifies global eco-label standards and how to interpret environmental declarations.

Learn more about Green Premium >

Guide to assess a product's sustainability >

Well-being performance

| Toxic Heavy Metal Free | |
|----------------------------|------------------------|
| Mercury Free | |
| Rohs Exemption Information | Yes |
| | |
| Eu Rohs Directive | Compliant |
| | EU RoHS Declaration |
| China Rohs Regulation | China RoHS declaration |