Product data sheet

Specifications

TeSys Deca reversing contactor - 3P(3 NO) - AC-3 - <= 440 V 18 A - 24 V DC coil

LC2D18BDV

Discontinued

Main

Range	TeSys TeSys Deca
Product Name	TeSys D TeSys Deca
Product Or Component Type	Reversing contactor
Device Short Name	LC2D
Contactor Application	Motor control Resistive load
Utilisation Category	AC-3 AC-1 AC-3e
Device Presentation	Preassembled with reversing power busbar
Poles Description	3P
Power Pole Contact Composition	3 NO
[Ue] Rated Operational Voltage	Power circuit <= 690 V AC 25...400 Hz Power circuit <= 300 V DC
[Ie] Rated Operational Current	18 A (at <140 °F (60 °C)) at <= 440 V AC AC-3 for power circuit 32 A (at <140 °F (60 °C)) at <= 440 V AC AC-1 for power circuit 18 A (at <140 °F (60 °C)) at <= 440 V AC AC-3e for power circuit
Motor Power Kw	4 kW at 220...230 V AC 50-60 Hz 7.5 kW at 380...400 V AC 50-60 Hz 9 kW at 415 V AC 50-60 Hz 9 kW at 440 V AC 50-60 Hz 10 kW at 500 V AC 50-60 Hz 10 kW at 660...690 V AC 50-60 Hz
Motor Power Hp (Ul / Csa)	1 hp at 115 V AC 60 Hz for 1 phase motors 3 hp at 230/240 V AC 60 Hz for 1 phase motors 5 hp at 200/208 V AC 60 Hz for 3 phase motors 5 hp at 230/240 V AC 60 Hz for 3 phase motors 10 hp at 460/480 V AC 60 Hz for 3 phase motors 15 hp at 575/600 V AC 60 Hz for 3 phase motors
Control Circuit Type	DC standard
[Uc] Control Circuit Voltage	24 V DC
Auxiliary Contact Composition	1 NO + 1 NC
[Uimp] Rated Impulse Withstand Voltage	6 kV IEC 60947
Overvoltage Category	III
[Ith] Conventional Free Air Thermal Current	10 A (at 140 °F (60 °C)) for signalling circuit 32 A (at 140 °F (60 °C)) for power circuit

Price is “List Price” and may be subject to a trade discount – check with your local distributor or retailer for actual price.

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 60947-5-1 300 A at 440 V for power circuit conforming to IEC 60947
Rated Breaking Capacity	300 A at 440 V for power circuit conforming to IEC 60947
[Icw] Rated Short-Time Withstand Current	40 A 104 °F (40 °C) - 10 min for power circuit 84 A 104 °F (40 °C) - 1 min for power circuit 145 A 104 °F (40 °C) - 10 s for power circuit 240 A 104 °F (40 °C) - 1 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 50 A gG at <= 690 V coordination type 1 for power circuit 35 A gG at <= 690 V coordination type 2 for power circuit
Average Impedance	2.5 mOhm - Ith 32 A 50 Hz for power circuit
[Ui] Rated Insulation Voltage	Power circuit 690 V IEC 60947-4-1 Power circuit 600 V CSA Power circuit 600 V UL Signalling circuit 690 V IEC 60947-1 Signalling circuit 600 V CSA Signalling circuit 600 V UL
Electrical Durability	1.65 Mcycles 18 A AC-3 <= 440 V 1 Mcycles 32 A AC-1 <= 440 V 1.65 Mcycles 18 A AC-3e <= 440 V
Power Dissipation Per Pole	0.8 W AC-3 2.5 W AC-1 0.8 W AC-3e
Front Cover	With
Interlocking Type	Electrical and mechanical
Mounting Support	Rail Plate
Standards	CSA C22.2 No 14 EN 60947-4-1 EN 60947-5-1 IEC 60947-4-1 IEC 60947-5-1 UL 508 IEC 60335-1
Product Certifications	DNV CSA CCC UL GL LROS (Lloyds register of shipping) BV RINA GOST UKCA

Connections - Terminals	Control circuit screw clamp terminals 1 0.00…0.01 in² (1…4 mm²)flexible without cable end Control circuit screw clamp terminals 2 0.00…0.01 in² (1…4 mm²)flexible without cable end Control circuit screw clamp terminals 1 0.00…0.01 in² (1…4 mm²)flexible with cable end Control circuit screw clamp terminals 2 0.00…0.00 in² (1…2.5 mm²)flexible with cable end Control circuit screw clamp terminals 1 0.00…0.01 in² (1…4 mm²)solid Control circuit screw clamp terminals 2 0.00…0.01 in² (1…4 mm²)solid Power circuit screw clamp terminals 1 0.00…0.01 in² (1.5…6 mm²)flexible without cable end Power circuit screw clamp terminals 2 0.00…0.01 in² (1.5…6 mm²)flexible without cable end Power circuit screw clamp terminals 1 0.00…0.01 in² (1…6 mm²)flexible with cable end Power circuit screw clamp terminals 2 0.00…0.01 in² (1…4 mm²)flexible with cable end Power circuit screw clamp terminals 1 0.00…0.01 in² (1.5…6 mm²)solid Power circuit screw clamp terminals 2 0.00…0.01 in² (1.5…6 mm²)solid
Tightening Torque	Power circuit 15.05 lbf.in (1.7 N.m) screw clamp terminals flat Ø 6 mm Power circuit 15.05 lbf.in (1.7 N.m) screw clamp terminals Philips No 2 Control circuit 15.05 lbf.in (1.7 N.m) screw clamp terminals flat Ø 6 mm Control circuit 15.05 lbf.in (1.7 N.m) screw clamp terminals Philips No 2 Control circuit 15.05 lbf.in (1.7 N.m) screw clamp terminals pozidriv No 2 Power circuit 22.13 lbf.in (2.5 N.m) screw clamp terminals pozidriv No 2
Operating Time	53.55...72.45 ms closing 16...24 ms opening
Safety Reliability Level	B10d = 1369863 cycles contactor with nominal load EN/ISO 13849-1 B10d = 20000000 cycles contactor with mechanical load EN/ISO 13849-1
Mechanical Durability	30 Mcycles
Maximum Operating Rate	3600 cyc/h 140 °F (60 °C)

Complementary

Coil Technology	Built-in bidirectional peak limiting diode suppressor
Control Circuit Voltage Limits	0.1...0.25 Uc -40…158 °F (-40…70 °C) drop-out DC 0.7...1.25 Uc -40…140 °F (-40…60 °C) operational DC 1...1.25 Uc 140…158 °F (60…70 °C) operational DC
Time Constant	28 ms
Inrush Power In W	5.4 W 68 °F (20 °C))
Hold-In Power Consumption In W	5.4 W 68 °F (20 °C)
Auxiliary Contacts Type	Mechanically linked 1 NO + 1 NC IEC 60947-5-1 Mirror contact 1 NC IEC 60947-4-1
Signalling Circuit Frequency	25...400 Hz
Minimum Switching Current	5 mA for signalling circuit
Minimum 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

Environment

Ip Degree Of Protection	IP20 front face IEC 60529
Climatic Withstand	IACS E10 IEC 60947-1 Annex Q category D
Protective Treatment	TH IEC 60068-2-30
Pollution Degree	3

Ambient Air Temperature For Operation	-40…140 °F (-40…60 °C) 140…158 °F (60…70 °C) with derating
Ambient Air Temperature For Storage	-76…176 °F (-60…80 °C)
Operating Altitude	0...9842.52 ft (0...3000 m)
Fire Resistance	1562 °F (850 °C) IEC 60695-2-1
Flame Retardance	V1 conforming to UL 94
Mechanical Robustness	Vibrations contactor open2 Gn, 5...300 Hz Vibrations contactor closed4 Gn, 5...300 Hz Shocks contactor open10 Gn for 11 ms Shocks contactor closed15 Gn for 11 ms
Height	3.03 in (77 mm)
Width	3.54 in (90 mm)
Depth	3.74 in (95 mm)
Net Weight	2.29 lb(US) (1.037 kg)

Ordering and shipping details

Category	22355-CTR,TESYS D,OPEN,9-38A DC
Discount Schedule	I12
Gtin	3389110414028
Returnability	No
Country Of Origin	FR

Packing Units

Unit Type Of Package 1	PCE
Number Of Units In Package 1	1
Package 1 Height	3.70 in (9.4 cm)
Package 1 Width	4.49 in (11.4 cm)
Package 1 Length	4.33 in (11.0 cm)
Package 1 Weight	2.38 lb(US) (1.08 kg)

Contractual warranty

Warranty	18 months

Sustainability

Green Premium^{TM} label is Schneider Electric's commitment to delivering products with best-in-class environmental performance. Green Premium promises compliance with the latest regulations, transparency on environmental impacts, as well as circular and low-CO_2 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 >

Transparency

RoHS/REACh

Well-being performance

Mercury Free	
Rohs Exemption Information	Yes
Pvc Free	

Certifications & Standards

Reach Regulation	REACh Declaration
Eu Rohs Directive	Compliant with Exemptions
China Rohs Regulation	China RoHS declaration Product out of China RoHS scope. Substance declaration for your information.
Environmental Disclosure	Product Environmental Profile
Circularity Profile	End of Life Information
California Proposition 65	WARNING: This product can expose you to chemicals including: Antimony oxide & Antimony trioxide, which is known to the State of California to cause cancer. For more information go to www.P65Warnings.ca.gov