Product data sheet we

Specifications





IEC contactor, TeSys Deca, nonreversing, 18A, 10HP at 480VAC, up to 100kA SCCR, 3 phase, 3 NO, 48VDC coil, open

LC1D18ED

Product availability: Non-Stock - Not normally stocked in distribution facility

Price*: 170.00 USD

Main

Range Of Product	TeSys Deca
Product Or Component Type	Contactor
Device Short Name	LC1D
Contactor Application	Motor control Resistive load
Utilisation Category	AC-3 AC-1 AC-4 AC-3e
Poles Description	3P
[Ue] Rated Operational Voltage	Power circuit <= 690 V AC 25400 Hz Power circuit <= 300 V DC
[le] 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
[Uc] Control Circuit Voltage	48 V DC

Complementary

Complementary		
Motor Power Kw	4 kW at 220230 V AC 50/60 Hz (AC-3)	
	7.5 kW at 380400 V AC 50/60 Hz (AC-3)	
	9 kW at 415440 V AC 50/60 Hz (AC-3)	
	10 kW at 500 V AC 50/60 Hz (AC-3)	
	10 kW at 660690 V AC 50/60 Hz (AC-3)	
	4 kW at 400 V AC 50/60 Hz (AC-4)	
	4 kW at 220230 V AC 50/60 Hz (AC-3e)	
	7.5 kW at 380400 V AC 50/60 Hz (AC-3e)	
	9 kW at 415440 V AC 50/60 Hz (AC-3e)	
	10 kW at 500 V AC 50/60 Hz (AC-3e)	
	10 kW at 660690 V AC 50/60 Hz (AC-3e)	
Maximum Horse Power Rating	1 hp at 115 V AC 50/60 Hz for 1 phase motors	
	3 hp at 230/240 V AC 50/60 Hz for 1 phase motors	
	5 hp at 200/208 V AC 50/60 Hz for 3 phase motors	
	5 hp at 230/240 V AC 50/60 Hz for 3 phase motors	
	10 hp at 460/480 V AC 50/60 Hz for 3 phase motors	
	15 hp at 575/600 V AC 50/60 Hz for 3 phase motors	
Compatibility Code	LC1D	
Pole Contact Composition	3 NO	
Contact Compatibility	M4	
Protective Cover	With	

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



[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
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	145 A 104 °F (40 °C) - 10 s for power circuit 240 A 104 °F (40 °C) - 1 s for power circuit 40 A 104 °F (40 °C) - 10 min for power circuit 84 A 104 °F (40 °C) - 1 min 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
Power Dissipation Per Pole	2.5 W AC-1 0.8 W AC-3 0.8 W AC-3e
[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
Overvoltage Category	III .
Pollution Degree	3
[Uimp] Rated Impulse Withstand Voltage	6 kV IEC 60947
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
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
Control Circuit Type	DC standard
Coil Technology	With integral suppression device
Control Circuit Voltage Limits	0.10.25 Uc -40158 °F (-4070 °C) drop-out DC 0.71.25 Uc -40140 °F (-4060 °C) operational DC 11.25 Uc 140158 °F (6070 °C) operational DC
Inrush Power In W	5.4 W 68 °F (20 °C))
Hold-In Power Consumption In W	5.4 W 68 °F (20 °C)
Operating Time	63 ±15 % ms closing 20 ±20 % ms opening
Time Constant	28 ms
Maximum Operating Rate	3600 cyc/h 140 °F (60 °C)

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Connections - Terminals	Control circuit: screw clamp terminals 1 0.000.01 in² (14 mm²) - cable stiffness: flexible without cable end		
	Control circuit: screw clamp terminals 2 0.000.01 in² (14 mm²) - cable stiffness:		
	flexible without cable end Control circuit: screw clamp terminals 1 0.000.01 in² (14 mm²) - cable stiffness:		
	flexible with cable end		
	Control circuit: screw clamp terminals 2 0.000.00 in² (12.5 mm²) - cable stiffness: flexible with cable end		
	Control circuit: screw clamp terminals 1 0.000.01 in² (14 mm²) - cable stiffness:		
	solid without cable end Control circuit: screw clamp terminals 2 0.000.01 in² (14 mm²) - cable stiffness:		
	solid without cable end		
	Power circuit: screw clamp terminals 1 0.000.01 in² (1.56 mm²) - cable stiffness:		
	flexible without cable end Power circuit: screw clamp terminals 2 0.000.01 in² (1.56 mm²) - cable stiffness:		
	flexible without cable end		
	Power circuit: screw clamp terminals 1 0.000.01 in ² (16 mm ²) - cable stiffness: flexible with cable end		
	Power circuit: screw clamp terminals 2 0.000.01 in² (14 mm²) - cable stiffness:		
	flexible with cable end Power circuit: screw clamp terminals 1 0.000.01 in² (1.56 mm²) - cable stiffness:		
	solid without cable end		
	Power circuit: screw clamp terminals 2 0.000.01 in ² (1.56 mm ²) - cable stiffness:		
	solid without cable end		
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 15.05 lbf.in (1.7 N.m) screw clamp terminals pozidriv No 2		
Auxiliary Contact Composition	1 NO + 1 NC		
Auxiliary Contacts Type	Mechanically linked 1 NO + 1 NC IEC 60947-5-1 Mirror contact 1 NC 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			
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		
	120 00005-1		
Product Certifications	UL DNV		
	RINA		
	CCC		
	GL GOST		
	CSA		
	LROS (Lloyds register of shipping) BV		
	UKCA		
Ip Degree Of Protection	IP20 front face IEC 60529		
Protective Treatment	THIEC 60068-2-30		
Climatic Withstand	IACS E10 exposure to damp heat IEC 60947-1 Annex Q category D exposure to damp heat		



Permissible Ambient Air Temperature Around The Device	-40140 °F (-4060 °C) 140158 °F (6070 °C) with derating		
Operating Altitude	09842.52 ft (03000 m)		
Fire Resistance	1562 °F (850 °C) 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 open 10 Gn for 11 ms) Shocks contactor closed 15 Gn for 11 ms)		
Height	3.03 in (77 mm)		
Width	1.77 in (45 mm)		
Depth	3.74 in (95 mm)		
Net Weight	1.08 lb(US) (0.49 kg)		

Ordering and shipping details

Category	US10I1222355	
Discount Schedule	0112	
Gtin	3389110354812	
Returnability	No	
Country Of Origin	FR	

Packing Units

Unit Type Of Package 1	PCE
Number Of Units In Package 1	1
Package 1 Height	1.97 in (5.000 cm)
Package 1 Width	3.62 in (9.200 cm)
Package 1 Length	4.41 in (11.200 cm)
Package 1 Weight	18.31 oz (519.000 g)
Unit Type Of Package 2	S02
Number Of Units In Package 2	15
Package 2 Height	5.91 in (15.000 cm)
Package 2 Width	11.81 in (30.000 cm)
Package 2 Length	15.75 in (40.000 cm)
Package 2 Weight	17.89 lb(US) (8.115 kg)
Unit Type Of Package 3	P06
Number Of Units In Package 3	120
Package 3 Height	17.72 in (45.000 cm)
Package 3 Width	23.62 in (60.000 cm)
Package 3 Length	31.50 in (80.000 cm)
Package 3 Weight	160.76 lb(US) (72.920 kg)

Contractual warranty

Warranty 18 months

Sustainability Green Premium*

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 >





Transparency RoHS/REACh

Well-being performance



Mercury Free



Rohs Exemption Information

Yes



Pvc Free

Certifications & Standards

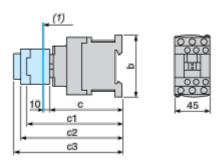
Reach Regulation	REACh Declaration		
Eu Rohs Directive	Compliant with Exemptions		
China Rohs Regulation	China RoHS declaration Product out of China RoHS scope. Substance declaration for your information.		
Environmental Disclosure	Product Environmental Profile		
Circularity Profile	End of Life Information		
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		

Product data sheet

LC1D18ED

Dimensions Drawings

Dimensions





(1) Minimum electrical clearance

LC1		D09D18	D093D123	D099D129
b		77	99	80
	without cover or add-on blocks	93	93	93
С	with cover, without add-on blocks	95	95	95
с1	with LAD N or C (2 or 4 contacts)	126	126	126
c2	with LA6 DK10	138	138	138
-2	with LAD T, R, S	146	146	146
с3	with LAD T, R, S and sealing cover	150	150	150



Connections and Schema

Wiring

