

LC1D18M7C

TeSys D Three Pole Contactor - 18 A - 220 V - 50/60Hz



Main Information	
Product Series	TeSys
Product Name	D
product type	contactor
product short name	LC1D
Application field of contactor	Applied to AC loads with power factor greater than or equal to 0.95 Applied to squirrel cage motors that normally start when on and off
use category	AC-4 AC-1 AC-3
Number	3P
of poles Main contact	3 NO
type Rated operating current [Ie]	32 A (AC-1, Ue<= 440 V, γ<= 60 °C) 18 A (AC-3, Ue<= 440 V, γ<= 60 °C)
Control circuit voltage	220 V, AC 50/60 Hz
auxiliary contact type	1 NO + 1 NC
Supplementary	
Information Rated Operating Voltage [Ue]	Power loop: <= 690 V Power loop: <= 225 V
Motor power (kW)	10 kW (500 V) AC-3 4 kW (220/240 V) AC-3 7.5 kW (380/400 V) AC-3 9 kW (415/440 V) AC-3 10 kW (660/690 V) AC-3 4 kW (400 V) AC-4
Electrical life	1 kA².s (AC-1) 1.6 kA².s (AC-3) 3 kA².s (AC-3)
Mechanical life	15 kA².s
maximum operating	3600 operations/hour (ambient temperature <= 60
frequency action time	°C) breaking: 4...19 ms closing: 12...22 ms

Control voltage limit	Release: 0.3...0.6 Uc 50/60 Hz Operation: 0.8...1.1 Uc 50 Hz Operation: 0.85...1.1 Uc 60 Hz
(~50Hz hold) power consumption (VA)	7.5 VA 60 Hz 7 VA 50 Hz
Conventional thermal current [Ith]	Signal circuit: 10 A (y<= 60 °C) Power circuit: 32 A (y<= 60 °C)
average impedance	2.5 mΩ (Ith 50 Hz)
heat dissipation	2...3W (50/60Hz)
Rated short-time withstand current [Icw]	Signal circuit: 100 A, duration: 1 s Signal circuit: 120 A, duration: 500 ms Signal circuit: 140 A, duration: 100 ms Power circuit: 145 A, duration: 10 s (<= 40 °C) power circuit: 84 A, duration: 1 minute (<= 40 °C) power circuit: 40 A, duration: 10 minutes (<= 40 °C) power circuit: 240 A, duration: 1 s (< = 40 °C) Signal circuit: gG 10 A, conforming to IEC 60947-5-1 Power circuit: gG 50 A, type 1, U<= 690 V Power circuit: gG 35 A, type 2, U<= 690 V
Fuses for use with relays	
Overvoltage	III
Category Rated Insulation Voltage [Ui]	Power circuit: 690 V, conforming to IEC 60947-4-1 Signal circuit: 690 V, conforming to IEC 60947-1
Surge Suppression Module	No built-in surge suppression module
Auxiliary contact type	Mechanical connection: 1 NO + 1 NC, (according to IEC 60947-5-1) Mirror image with main contact status: 1 NC, (according to IEC 60947-4-1)
Signal loop frequency	25...400 Hz
Minimum switching current [Imin]	Signal loop: 5 mA
non-overlapping time	De-energized: 1.5 ms (between NC and NO contacts) Energized: 1.5 ms (between NC and NO contacts)
Insulation resistance	> 10 MΩ (signal loop)
installation method	DIN-rail mounting
Wiring capacity	Subplate mounting Control circuit: Screw-on, 1 cable 1...4 mm², flexible, without cable terminals. Control circuit: Screw-on, 2 cables 1...4 mm², flexible, without Cable terminal. Control circuit: screw- on, 1 cable 1...4 mm², flexible, with cable terminal. Control circuit: screw-on, 2 cables 1...2.5 mm², flexible, with cable Terminals. Control circuit: screw-on, 1 cable 1...4 mm², solid, without cable terminals. Control circuit: screw-on, 2 cables 1...4 mm², solid, without cable Terminals. Power circuit: screw-on, 1 cable 1.5...6 mm² Lug O.D. Ø: 8 mm, rigid, without wire terminal. Power circuit: screw- on, 2 cables 1.5...6 mm² Lug outer diameter Ø: 8 mm, solid, without wire terminal. Power circuit: screw fastening, 1 cable 1.5...6 mm² Lug outer diameter: 8 mm, flexible, without wire terminal . Power circuit: screw-on, 2 cables 1.5...6 mm² Lug O.D. Ø: 8 mm, flexible, without wire terminal. Power circuit: screw-on, 1 cable 1...6 mm² terminal Lug outer diameter Ø: 8 mm, flexible, with cable terminals. Power circuit: screw fastened, 2 cables 1...4 mm² Lug outer diameter: 8 mm, flexible, with cable terminals. Power circuit : 1.7 Nm (No 2 Phillips screw) Power circuit: 1.7 Nm (No 2 Phillips screw) Power circuit: 1.7 Nm (Ø 6 flat) Power circuit: 1.7 Nm (Ø 6 flat) Control circuit: 1.7 Nm (Ø 6 flat) Control circuit: 1.7 Nm (No 2 Phillips screw)
Tightening torque	
high	77 mm
width	45 mm
depth	86 mm
Control loop characteristics	AC 50/60 Hz
Rated impulse withstand voltage [Uimp]	6 kV (according to IEC 60947)
protective cover	none
(~50Hz pickup) power consumption (VA)	70 VA at 20 °C 60 Hz 70 VA at 20 °C 50 Hz
product weight	0.33 kg
Contactors Compatibility Features	M2
model	LC1D

The environment meets the standard		IEC 60947-4-1 GB 14048.4
certified product		CCC
Pollution Level		3
Protection Measures		TH (according to IEC 60068-2-30)
IP protection class		IP2x front panel for main circuits conforming to IEC 60529 IP2x front panel for coil circuits conforming to IEC 60529
operating temperature		-5...60 °C
Storage Ambient		-60...80 °C
Temperature Ambient Air		-40...70 °C (permissible at Uc) 3000 m (none)
Temperature Working Altitude		850 °C (according to
Fire resistance and abnormal high temperature resistance		IEC 60695-2-11) Shock resistance (contacts open): 2
Shock and vibration resistance		gn (5...300 Hz) shock resistance (contacts closed): 4 gn (5...300 Hz) Shock (contacts open): 10 gn 11 ms Shock (contacts closed): 15 gn 11 ms
quality mark		CE declaration

Sustainable

Product Types		Green Product Certification Mark Product
RoHS Regulations (Date Code: YYWW)		Conformity - Since Week 47, 2008 - Schneider Electric declaration of conformity  Schneider Electric declaration of conformity
REACH regulations		The contents of toxic and harmful substances are all within the range stipulated by REACH The contents of toxic and harmful substances are all within the range stipulated by REACH
Environmental compliance		provide support
Recycling Guide		No need for special recycling