Product data sheet
Characteristics

LC1D95E7C
Contactor, TeSys Deca, 3P(3 NO), AC-3/ AC-3e, 0 to 440V, 95A, 48V AC 50/60Hz coil, Screw terminal



⚠ End of Commercialisation

Commercial status
End of Commercialisation :

Main

Range	TeSys Deca
Range of product	TeSys Deca
Product or component type	Contactor
Device short name	LC1D
Contactor application	Resistive load Motor control
Utilisation category	AC-4 AC-1 AC-3 AC-3e
Poles description	3P
[Ue] rated operational voltage	Power circuit: 660 V AC Power circuit: <= 225 V DC 25...400 Hz
[Ie] rated operational current	125 A (at <60 °C) at <= 440 V AC AC-1 for power circuit 95 A (at <60 °C) at <= 440 V AC AC-3 for power circuit 95 A (at <60 °C) at <= 440 V AC AC-3e for power circuit
[Uc] control circuit voltage	48 V AC 50/60 Hz

Complementary

Motor power kW	55 KW at 500 V AC 50/60 Hz (AC-3) 45 KW at 1000 V AC 50/60 Hz (AC-3) 45 KW at 415/440 V AC 50/60 Hz (AC-3) 45 KW at 660/690 V AC 50/60 Hz (AC-3) 15 KW at 400 V AC 50/60 Hz (AC-4) 25 KW at 220/240 V AC 50/60 Hz (AC-3) 45 KW at 380/400 V AC 50/60 Hz (AC-3) 55 KW at 500 V AC 50/60 Hz (AC-3e) 45 KW at 1000 V AC 50/60 Hz (AC-3e) 45 KW at 415/440 V AC 50/60 Hz (AC-3e) 45 KW at 660/690 V AC 50/60 Hz (AC-3e) 25 KW at 220/240 V AC 50/60 Hz (AC-3e) 45 KW at 380/400 V AC 50/60 Hz (AC-3e)
Compatibility code	LC1D
Pole contact composition	3 NO
Protective cover	With
[Ith] conventional free air thermal current	10 A (at 60 °C) for signalling circuit 125 A (at 60 °C) for power circuit

[Icw] rated short-time withstand current	135 A 40 °C - 10 min for power circuit 1100 A 40 °C - 1 s for power circuit 800 A 40 °C - 10 s for power circuit 400 A 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 60947-5-1 200 A gG at <= 690 V coordination type 1 for power circuit 160 A gG at <= 690 V coordination type 2 for power circuit
Average impedance	0.8 MOhm - Ith 125 A 50 Hz for power circuit
[Ui] rated insulation voltage	Signalling circuit: 690 V conforming to IEC 60947-1 Power circuit: 690 V conforming to IEC 60947-4-1
Overvoltage category	III
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
Mechanical durability	4 Mcycles
Electrical durability	1.2 Mcycles 95 A AC-3 at Ue <= 440 V 1.3 Mcycles 125 A AC-1 at Ue <= 440 V 3.2 Mcycles 48 A AC-3 at Ue 660/690 V 1.2 Mcycles 95 A AC-3e at Ue <= 440 V 3.2 Mcycles 48 A AC-3e at Ue 660/690 V
Control circuit type	AC at 50/60 Hz
Coil technology	Without built-in suppressor module
Control circuit voltage limits	0.3...0.6 Uc (-40…55 °C):drop-out 50/60 Hz 0.8...1.1 Uc (-40…55 °C):operational 50 Hz 0.85...1.1 Uc (-40…55 °C):operational 60 Hz
Inrush power in VA	245 VA 60 Hz cos phi 0.75 (at 20 °C) 245 VA 50 Hz cos phi 0.75 (at 20 °C)
Hold-in power consumption in VA	26 VA 50 Hz cos phi 0.3 (at 20 °C) 26 VA 60 Hz cos phi 0.3 (at 20 °C)
Operating time	20...35 ms closing 6...20 ms opening
Connections - terminals	Control circuit: screw clamp terminals 1…4 mm² - cable stiffness: flexible without cable end Control circuit: screw clamp terminals 1…2.5 mm² - cable stiffness: flexible with cable end Control circuit: screw clamp terminals 1…4 mm² - cable stiffness: solid without cable end Power circuit: bus terminal - cable stiffness: solid - busbar cross section: 3 x 16 mm Power circuit: connector 4…50 mm² - external diameter: 17 mm - cable stiffness: flexible without c Power circuit: connector 4…25 mm² - external diameter: 17 mm - cable stiffness: flexible without c Power circuit: connector 4…50 mm² - external diameter: 17 mm - cable stiffness: flexible with cabl Power circuit: connector 4…16 mm² - external diameter: 17 mm - cable stiffness: flexible with cabl Power circuit: connector 4…50 mm² - external diameter: 17 mm - cable stiffness: solid without cab Power circuit: connector 4…25 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 screw clamp terminals - with screwdriver flat Ø 6...8 mm Power circuit: 12 N.m - on screw clamp terminals hexagonal screw head 4 mm Power circuit: 12 N.m - on connector hexagonal screw head 10 mm M6 Power circuit: 12 N.m - on connector - with screwdriver flat Ø 8 mm Power circuit: 12 N.m - on screw clamp terminals - with screwdriver pozidriv No 2 Control circuit: 1.2 N.m - on screw clamp terminals - with screwdriver pozidriv No 2
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
Auxiliary contact composition	1 NO + 1 NC
Signalling circuit frequency	25...400 Hz
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	IEC 60947-1 IEC 60947-4-1 GB/T 14048.4
Product certifications	CE[RETURN]UKCA[RETURN]CCC
IP degree of protection	IP2X front face for main circuit conforming to IEC 60529 IP2X front face for coil circuit conforming to IEC 60529
Protective treatment	TH conforming to IEC 60068-2-30
Permissible ambient air temperature around the device	-40…60 °C operation 60…70 °C with derating -60…80 °C storage
Operating altitude	3000 m without derating
Fire resistance	850 °C conforming to IEC 60695-2-11
Mechanical robustness	Vibrations contactor open (2 Gn, 5...300 Hz) conforming to IEC 60068-2-6 Shocks 11 ms contactor open (8 gn) conforming to IEC 60068-2-27 Shocks 11 ms contactor closed (10 Gn) conforming to IEC 60068-2-27 Vibrations contactor closed (3 Gn, 5...300 Hz) conforming to IEC 60068-2-6
Height	127 Mm
Width	85 Mm
Depth	130 Mm
Net weight	1.61 Kg

Packing Units

Unit Type of Package 1	PCE
Number of Units in Package 1	1
Package 1 Height	11.076 Cm
Package 1 Width	14.915 Cm
Package 1 Length	15.762 Cm
Package 1 Weight	1.581 Kg
Unit Type of Package 2	CAR
Number of Units in Package 2	5
Package 2 Height	19.3 Cm
Package 2 Width	29.7 Cm
Package 2 Length	40.7 Cm
Package 2 Weight	8.33 Kg
Unit Type of Package 3	PAL
Number of Units in Package 3	60
Package 3 Height	75.0 Cm
Package 3 Width	60.0 Cm
Package 3 Length	80.0 Cm
Package 3 Weight	104.7 Kg

Offer Sustainability

Recyclability potential, in %	88
Total lifecycle Carbon footprint	1 191 kg CO2 eq.
Carbon footprint of the manufacturing phase [A1 to A3]	10.008008535489656
Carbon footprint of the manufacturing phase [A1 to A3]	10 kg CO2 eq.
Carbon footprint of the distribution phase [A4]	0.3371195081660066
Carbon footprint of the distribution phase [A4]	0.3 kg CO2 eq.
Carbon footprint of the installation phase [A5]	0.0290633875127581
Carbon footprint of the installation phase [A5]	0 kg CO2 eq.
Carbon footprint of the use phase [B2, B3, B4, B6]	1177.632275404644
REACh free of SVHC	Yes
Carbon footprint of the use phase [B2, B3, B4, B6]	1 178 kg CO2 eq.
Toxic heavy metal free	Yes
Mercury free	Yes
Sustainable packaging	No

Carbon footprint of the end-of-life phase [C1 to C4]	3.303818054351956
Carbon footprint of the end-of-life phase [C1 to C4]	3 kg CO2 eq.
Environmental Disclosure	Product Environmental Profile
Total lifecycle Carbon footprint	1191
Packaging made with recycled cardboard	Yes
Packaging without single use plastic	No
SCIP Number	C94a5ba1-ed1b-4724-b5a0-b0a9f1f2a1f9
REACh Regulation	Free of Substances of Very High Concern above the threshold
EU RoHS Directive	Compliant
End of life manual availability	No need of specific recycling operations
Take-back	No

Contractual warranty

Warranty (in months)	18

Product Life Status : End of commerc. - Block