

# Product data sheet

Specifications



IEC contactor, TeSys Deca, nonreversing, 25A, 15HP at 480VAC, up to 100kA SCCR, 3 phase, 3 NO, 480VAC 50/60Hz coil, open

LC1D25T7

Product availability: Stock - Normally stocked in distribution facility

Price\*: 181.20 USD

## Main

|                                |   |
|--------------------------------|---|
| Range of Product               | TeSys Deca  |
| Product or Component Type      | Contactors  |
| Device short name              | LC1D  |
| contactor application          | Motor control<br>Resistive load   |
| Utilisation category           | AC-3<br>AC-1<br>AC-4<br>AC-3e   |
| poles description              | 3P  |
| [Ue] rated operational voltage | Power circuit <= 690 V AC 25...400 Hz<br>Power circuit <= 300 V DC  |
| [Ie] rated operational current | 25 A (at <140.0000000000 °F (60 °C)) at <= 440 V AC AC-3 for power circuit<br>40 A (at <140.0000000000 °F (60 °C)) at <= 440 V AC AC-1 for power circuit<br>25 A (at <140.0000000000 °F (60 °C)) at <= 440 V AC AC-3e for power circuit |
| [Uc] control circuit voltage   | 480 V AC 50/60 Hz   |

## Complementary

|                            |   |
|----------------------------|---|
| Motor power kW             | 5.5 kW at 220...230 V AC 50/60 Hz (AC-3)<br>11 kW at 380...400 V AC 50/60 Hz (AC-3)<br>11 kW at 415...440 V AC 50/60 Hz (AC-3)<br>15 kW at 500 V AC 50/60 Hz (AC-3)<br>15 kW at 660...690 V AC 50/60 Hz (AC-3)<br>5.5 kW at 400 V AC 50/60 Hz (AC-4)<br>5.5 kW at 220...230 V AC 50/60 Hz (AC-3e)<br>11 kW at 380...400 V AC 50/60 Hz (AC-3e)<br>11 kW at 415...440 V AC 50/60 Hz (AC-3e)<br>15 kW at 500 V AC 50/60 Hz (AC-3e)<br>15 kW at 660...690 V AC 50/60 Hz (AC-3e) |
| Maximum Horse Power Rating | 3 hp at 230/240 V AC 50/60 Hz for 1 phase motors<br>2 hp at 115 V AC 50/60 Hz for 1 phase motors<br>7.5 hp at 230/240 V AC 50/60 Hz for 3 phase motors<br>15 hp at 460/480 V AC 50/60 Hz for 3 phase motors<br>20 hp at 575/600 V AC 50/60 Hz for 3 phase motors<br>7.5 hp at 200/208 V AC 50/60 Hz for 3 phase motors  |
| Compatibility code         | LC1D  |
| Pole contact composition   | 3 NO  |
| 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.

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|--|---|
| <b>[Ith] conventional free air thermal current</b> | 10 A (at 140.0000000000 °F (60 °C)) for signalling circuit<br>40 A (at 140.0000000000 °F (60 °C)) for power circuit   |
| <b>Irms rated making capacity</b>                  | 140 A AC for signalling circuit conforming to IEC 60947-5-1<br>250 A DC for signalling circuit conforming to IEC 60947-5-1<br>450 A at 440 V for power circuit conforming to IEC 60947  |
| <b>Rated breaking capacity</b>                     | 450 A at 440 V for power circuit conforming to IEC 60947  |
| <b>[Icw] rated short-time withstand current</b>    | 240 A 104.0000000000 °F (40 °C) - 10 s for power circuit<br>380 A 104.0000000000 °F (40 °C) - 1 s for power circuit<br>50 A 104.0000000000 °F (40 °C) - 10 min for power circuit<br>120 A 104.0000000000 °F (40 °C) - 1 min for power circuit<br>100 A - 1 s for signalling circuit<br>120 A - 500 ms for signalling circuit<br>140 A - 100 ms for signalling circuit |
| <b>Associated fuse rating</b>                      | 10 A gG for signalling circuit conforming to IEC 60947-5-1<br>63 A gG at <= 690 V coordination type 1 for power circuit<br>40 A gG at <= 690 V coordination type 2 for power circuit  |
| <b>Average impedance</b>                           | 2 mOhm - Ith 40 A 50 Hz for power circuit   |
| <b>Power dissipation per pole</b>                  | 3.2 W AC-1<br>1.25 W AC-3<br>1.25 W AC-3e   |
| <b>[Ui] rated insulation voltage</b>               | Power circuit 690 V IEC 60947-4-1<br>Power circuit 600 V CSA<br>Power circuit 600 V UL<br>Signalling circuit 690 V IEC 60947-1<br>Signalling circuit 600 V CSA<br>Signalling circuit 600 V UL   |
| <b>Overvoltage category</b>                        | III   |
| <b>Pollution degree</b>                            | 3   |
| <b>[Uimp] rated impulse withstand voltage</b>      | 6 kV IEC 60947  |
| <b>Safety reliability level</b>                    | B10d = 1369863 cycles contactor with nominal load EN/ISO 13849-1<br>B10d = 20000000 cycles contactor with mechanical load EN/ISO 13849-1  |
| <b>Mechanical durability</b>                       | 15 Mcycles  |
| <b>Electrical durability</b>                       | 1.65 Mcycles 25 A AC-3 <= 440 V<br>1.4 Mcycles 40 A AC-1 <= 440 V<br>1.65 Mcycles 25 A AC-3e <= 440 V   |
| <b>Control circuit type</b>                        | AC 50/60 Hz   |
| <b>Coil technology</b>                             | Without built-in suppressor module  |
| <b>Control circuit voltage limits</b>              | 0.3...0.6 Uc -40.0000000000...158.0000000000 °F (-40...70 °C) drop-out AC 50/60 Hz<br>0.8...1.1 Uc -40.0000000000...140.0000000000 °F (-40...60 °C) operational AC 50 Hz<br>0.85...1.1 Uc -40.0000000000...140.0000000000 °F (-40...60 °C) operational AC 60 Hz<br>1...1.1 Uc 140.0000000000...158.0000000000 °F (60...70 °C) operational AC 50/60 Hz                 |
| <b>Inrush power in VA</b>                          | 70 VA 60 Hz cos phi 0.75 (at 68.0000000000 °F (20 °C))<br>70 VA 50 Hz cos phi 0.75 (at 68.0000000000 °F (20 °C))  |
| <b>Hold-in power consumption in VA</b>             | 7.5 VA 60 Hz cos phi 0.3 (at 68.0000000000 °F (20 °C))<br>7 VA 50 Hz cos phi 0.3 (at 68.0000000000 °F (20 °C))  |
| <b>Heat dissipation</b>                            | 2...3 W at 50/60 Hz   |
| <b>Operating time</b>                              | 12...22 ms closing<br>4...19 ms opening   |
| <b>Maximum operating rate</b>                      | 3600 cyc/h 140.0000000000 °F (60 °C)  |
| <b>Maximum operating rate</b>                      | 3600 cyc/h at 60 °C   |

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| <b>Connections - terminals</b> | Control circuit: screw clamp terminals 1 0.002...0.006 in <sup>2</sup> (1...4 mm <sup>2</sup> ) - cable stiffness: flexible without cable end<br>Control circuit: screw clamp terminals 2 0.002...0.006 in <sup>2</sup> (1...4 mm <sup>2</sup> ) - cable stiffness: flexible without cable end<br>Control circuit: screw clamp terminals 1 0.002...0.006 in <sup>2</sup> (1...4 mm <sup>2</sup> ) - cable stiffness: flexible with cable end<br>Control circuit: screw clamp terminals 2 0.002...0.004 in <sup>2</sup> (1...2.5 mm <sup>2</sup> ) - cable stiffness: flexible with cable end<br>Control circuit: screw clamp terminals 1 0.002...0.006 in <sup>2</sup> (1...4 mm <sup>2</sup> ) - cable stiffness: solid without cable end<br>Control circuit: screw clamp terminals 2 0.002...0.006 in <sup>2</sup> (1...4 mm <sup>2</sup> ) - cable stiffness: solid without cable end<br>Power circuit: screw clamp terminals 1 0.004...0.02 in <sup>2</sup> (2.5...10 mm <sup>2</sup> ) - cable stiffness: flexible without cable end<br>Power circuit: screw clamp terminals 2 0.004...0.02 in <sup>2</sup> (2.5...10 mm <sup>2</sup> ) - cable stiffness: flexible without cable end<br>Power circuit: screw clamp terminals 1 0.002...0.02 in <sup>2</sup> (1...10 mm <sup>2</sup> ) - cable stiffness: flexible with cable end<br>Power circuit: screw clamp terminals 2 0.002...0.009 in <sup>2</sup> (1.5...6 mm <sup>2</sup> ) - cable stiffness: flexible with cable end<br>Power circuit: screw clamp terminals 1 0.002...0.02 in <sup>2</sup> (1.5...10 mm <sup>2</sup> ) - cable stiffness: solid without cable end<br>Power circuit: screw clamp terminals 2 0.004...0.02 in <sup>2</sup> (2.5...10 mm <sup>2</sup> ) - cable stiffness: solid without cable end |
|--------------------------------|--|

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|--------------------------|---|
| <b>Tightening torque</b> | Control circuit 15.05 lbf.in (1.7 N.m) screw clamp terminals flat Ø 6 mm<br>Control circuit 15.05 lbf.in (1.7 N.m) screw clamp terminals Philips No 2<br>Power circuit 22.1 lbf.in (2.5 N.m) screw clamp terminals flat Ø 6 mm<br>Power circuit 22.1 lbf.in (2.5 N.m) screw clamp terminals Philips No 2<br>Control circuit 15.05 lbf.in (1.7 N.m) screw clamp terminals pozidriv No 2<br>Power circuit 22.1 lbf.in (2.5 N.m) screw clamp terminals pozidriv No 2 |
|--------------------------|---|

|                                      |             |
|--------------------------------------|-------------|
| <b>Auxiliary contact composition</b> | 1 NO + 1 NC |
|--------------------------------------|-------------|

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| <b>Auxiliary contacts type</b> | Mechanically linked 1 NO + 1 NC IEC 60947-5-1<br>Mirror contact 1 NC IEC 60947-4-1 |
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|-------------------------------------|-------------|
| <b>Signalling circuit frequency</b> | 25...400 Hz |
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|----------------------------------|-----------------------------|
| <b>Minimum switching voltage</b> | 17 V for signalling circuit |
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|                                  |                             |
|----------------------------------|-----------------------------|
| <b>Minimum switching current</b> | 5 mA for signalling circuit |
|----------------------------------|-----------------------------|

|                              |                                  |
|------------------------------|----------------------------------|
| <b>Insulation resistance</b> | > 10 MOhm for signalling circuit |
|------------------------------|----------------------------------|

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| <b>Non-overlap time</b> | 1.5 ms on de-energisation between NC and NO contact<br>1.5 ms on energisation between NC and NO contact |
|-------------------------|---|

|                         |               |
|-------------------------|---------------|
| <b>Mounting Support</b> | Plate<br>Rail |
|-------------------------|---------------|

## Environment

|                  |   |
|------------------|---|
| <b>Standards</b> | CSA C22.2 No 14<br>EN 60947-4-1<br>EN 60947-5-1<br>IEC 60947-4-1<br>IEC 60947-5-1<br>UL 60947-4-1<br>IEC 60335-1:Clause 30.2<br>IEC 60335-2-40:Annex JJ<br>UL 60335-2-40:Annex JJ<br>CSA C22.2 No 60947-4-1 |
|------------------|---|

|                               |  |
|-------------------------------|--|
| <b>Product Certifications</b> | UL<br>CCC<br>CSA<br>Marine<br>UKCA<br>EAC<br>CB Scheme |
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|--------------------------------|---------------------------|
| <b>IP degree of protection</b> | IP20 front face IEC 60529 |
|--------------------------------|---------------------------|

|                             |                  |
|-----------------------------|------------------|
| <b>Protective treatment</b> | THIEC 60068-2-30 |
|-----------------------------|------------------|

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| <b>Climatic withstand</b> | IACS E10 exposure to damp heat<br>IEC 60947-1 Annex Q category D exposure to damp heat |
|---------------------------|--|

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| <b>Permissible ambient air temperature around the device</b> | -40.0000000000...140.0000000000 °F (-40...60 °C)<br>140.0000000000...158.0000000000 °F (60...70 °C) with derating   |
| <b>Operating altitude</b>                                    | 0...9842.52 ft (0...3000 m)   |
| <b>Fire resistance</b>                                       | 1562.0000000000 °F (850 °C) IEC 60695-2-1   |
| <b>Flame retardance</b>                                      | V1 conforming to UL 94  |
| <b>Mechanical robustness</b>                                 | Vibrations contactor open 2 Gn, 5...300 Hz)<br>Vibrations contactor closed 4 Gn, 5...300 Hz)<br>Shocks contactor closed 15 Gn for 11 ms)<br>Shocks contactor open 8 Gn for 11 ms) |
| <b>Height</b>  | 3.3 in (85 mm)  |
| <b>Width</b>   | 1.8 in (45 mm)  |
| <b>Depth</b>   | 3.6 in (92 mm)  |
| <b>Net Weight</b>  | 0.82 lb(US) (0.37 kg)   |

## Ordering and shipping details

|                          |               |
|--------------------------|---------------|
| <b>Category</b>          | US10I1222354  |
| <b>Discount Schedule</b> | 0I12          |
| <b>GTIN</b>              | 3389110349726 |
| <b>Returnability</b>     | Yes           |
| <b>Country of origin</b> | MX            |

## Packing Units

|                                     |                          |
|-------------------------------------|--------------------------|
| <b>Unit Type of Package 1</b>       | PCE                      |
| <b>Number of Units in Package 1</b> | 1                        |
| <b>Package 1 Height</b>             | 2.2 in (5.6 cm)          |
| <b>Package 1 Width</b>              | 3.7 in (9.4 cm)          |
| <b>Package 1 Length</b>             | 4.7 in (12.0 cm)         |
| <b>Package 1 Weight</b>             | 15.06 oz (427 g)         |
| <b>Unit Type of Package 2</b>       | S02                      |
| <b>Number of Units in Package 2</b> | 20                       |
| <b>Package 2 Height</b>             | 5.9 in (15 cm)           |
| <b>Package 2 Width</b>              | 11.8 in (30 cm)          |
| <b>Package 2 Length</b>             | 15.7 in (40 cm)          |
| <b>Package 2 Weight</b>             | 19.125 lb(US) (8.675 kg) |

## Contractual warranty

|                 |           |
|-----------------|-----------|
| <b>Warranty</b> | 18 months |
|-----------------|-----------|

## Sustainability

**Green Premium™ 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<sub>2</sub> 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 >](#)



Sustainable Packaging Transparency RoHS/REACH

## Resource performance

Sustainable Packaging

## Well-being performance

Rohs Exemption Information Yes

Pvc Free

## Certifications & Standards

|                           |   |
|---------------------------|---|
| Reach Regulation          | <a href="#">REACH Declaration</a>   |
| Eu Rohs Directive         | Compliant<br><a href="#">EU RoHS Declaration</a>  |
| China Rohs Regulation     | <a href="#">China RoHS declaration</a><br>Pro-active China RoHS declaration (out of China RoHS legal scope)   |
| Environmental Disclosure  | <a href="#">Product Environmental Profile</a>   |
| Weee                      | The product must be disposed on European Union markets following specific waste collection and never end up in rubbish bins.  |
| Circularity Profile       | <a href="#">End of Life Information</a>   |
| 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 <a href="http://www.P65Warnings.ca.gov">www.P65Warnings.ca.gov</a> |