

## LC1D40A6M7

IEC contactor, TeSys Deca, nonreversing,  
40A, 30HP at 480VAC, 3 phase, 3 pole, 3 NO,  
220VAC 50/60Hz coil, open style





## Main

|                                             |                                                                                                                                                                                                                                                                                                                                                                                                                                 |
|---------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Range                                       | TeSys<br>TeSys Deca                                                                                                                                                                                                                                                                                                                                                                                                             |
| Product name                                | TeSys D<br>TeSys Deca                                                                                                                                                                                                                                                                                                                                                                                                           |
| Product or Component Type                   | Contacteur                                                                                                                                                                                                                                                                                                                                                                                                                      |
| Device short name                           | LC1D                                                                                                                                                                                                                                                                                                                                                                                                                            |
| Contacteur application                      | Resistive load<br>Motor control                                                                                                                                                                                                                                                                                                                                                                                                 |
| Utilisation category                        | AC-4<br>AC-1<br>AC-3<br>AC-3e                                                                                                                                                                                                                                                                                                                                                                                                   |
| Poles description                           | 3P                                                                                                                                                                                                                                                                                                                                                                                                                              |
| Power pole contact composition              | 3 NO                                                                                                                                                                                                                                                                                                                                                                                                                            |
| [Ue] rated operational voltage              | Power circuit ≤ 690 V AC 25...400 Hz<br>Power circuit ≤ 300 V DC                                                                                                                                                                                                                                                                                                                                                                |
| [Ie] rated operational current              | 60 A 140 °F (60 °C)) ≤ 440 V AC AC-1 power circuit<br>40 A 140 °F (60 °C)) ≤ 440 V AC AC-3 power circuit<br>40 A 140 °F (60 °C)) ≤ 440 V AC AC-3e power circuit                                                                                                                                                                                                                                                                 |
| Motor power kW                              | 18.5 kW 380...400 V AC 50/60 Hz AC-3)<br>11 kW 220...230 V AC 50/60 Hz AC-3)<br>22 kW 415...440 V AC 50/60 Hz AC-3)<br>22 kW 500 V AC 50/60 Hz AC-3)<br>30 kW 660...690 V AC 50/60 Hz AC-3)<br>9 kW 400 V AC 50/60 Hz AC-4)<br>18.5 kW 380...400 V AC 50/60 Hz AC-3e)<br>11 kW 220...230 V AC 50/60 Hz AC-3e)<br>22 kW 415...440 V AC 50/60 Hz AC-3e)<br>22 kW 500 V AC 50/60 Hz AC-3e)<br>30 kW 660...690 V AC 50/60 Hz AC-3e) |
| Motor power HP (UL / CSA)                   | 5 Hp 230/240 V at AC 50/60 Hz for 1 phase<br>10 Hp 230/240 V at AC 50/60 Hz for 3 phase<br>30 Hp 575/600 V at AC 50/60 Hz for 3 phase<br>10 Hp 200/208 V at AC 50/60 Hz for 3 phase<br>3 Hp 115 V at AC 50/60 Hz for 1 phase<br>30 hp 460/480 V at AC 50/60 Hz for 3 phase                                                                                                                                                      |
| Control circuit type                        | AC 50/60 Hz                                                                                                                                                                                                                                                                                                                                                                                                                     |
| [Uc] control circuit voltage                | 220 V AC 50/60 Hz                                                                                                                                                                                                                                                                                                                                                                                                               |
| 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 140 °F (60 °C) signalling circuit<br>60 A 140 °F (60 °C) power circuit                                                                                                                                                                                                                                                                                                                                                     |
| Irms rated making capacity                  | 140 A AC signalling circuit IEC 60947-5-1<br>250 A DC signalling circuit IEC 60947-5-1<br>800 A 440 V power circuit IEC 60947                                                                                                                                                                                                                                                                                                   |
| Rated breaking capacity                     | 800 A 440 V power circuit IEC 60947                                                                                                                                                                                                                                                                                                                                                                                             |
| [Icw] rated short-time withstand current    | 320 A 104 °F (40 °C) - 10 s power circuit<br>720 A 104 °F (40 °C) - 1 s power circuit<br>72 A 104 °F (40 °C) - 10 min power circuit<br>165 A 104 °F (40 °C) - 1 min power circuit<br>100 A - 1 s signalling circuit<br>120 A - 500 ms signalling circuit<br>140 A - 100 ms signalling circuit                                                                                                                                   |
| Associated fuse rating                      | 10 A gG signalling circuit IEC 60947-5-1<br>80 A gG ≤ 690 V type 1 power circuit<br>80 A gG ≤ 690 V type 2 power circuit                                                                                                                                                                                                                                                                                                        |
| Average impedance                           | 1.5 mOhm - Ith 60 A 50 Hz power circuit                                                                                                                                                                                                                                                                                                                                                                                         |

|                               |                                                                                                                                                                                                                                                                                                                                                                                                              |
|-------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| [Ui] rated insulation voltage | 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<br>Power circuit 690 V IEC 60947-4-1                                                                                                                                                                                                                |
| Electrical durability         | 1.4 Mcycles 60 A AC-1 ≤ 440 V<br>1.5 Mcycles 40 A AC-3 ≤ 440 V<br>1.5 Mcycles 40 A AC-3e ≤ 440 V                                                                                                                                                                                                                                                                                                             |
| Power dissipation per pole    | 2.4 W AC-3<br>5.4 W AC-1<br>2.4 W AC-3e                                                                                                                                                                                                                                                                                                                                                                      |
| Front cover                   | With                                                                                                                                                                                                                                                                                                                                                                                                         |
| Mounting Support              | Plate<br>Rail                                                                                                                                                                                                                                                                                                                                                                                                |
| Standards                     | 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 508<br>IEC 60335-1                                                                                                                                                                                                                                                                                                   |
| Product certifications        | CSA<br>UL<br>GOST<br>CCC                                                                                                                                                                                                                                                                                                                                                                                     |
| Connections - terminals       | Control circuit lugs-ring terminals 0.31 in (8 mm))<br>Power circuit lugs-ring terminals 0.65 in (16.5 mm))                                                                                                                                                                                                                                                                                                  |
| Tightening torque             | Control circuit 15.05 lbf.in (1.7 N.m) lugs-ring terminals flat Ø 6 mm M3.5<br>Control circuit 15.05 lbf.in (1.7 N.m) lugs-ring terminals Philips No 2 M3.5<br>Power circuit 53.10 lbf.in (6 N.m) lugs-ring terminals hexagonal 0.39 in (10 mm) M6<br>Control circuit 15.05 lbf.in (1.7 N.m) screw clamp terminals pozidriv No 2<br>Power circuit 22.13 lbf.in (2.5 N.m) screw clamp terminals pozidriv No 2 |
| Operating time                | 4...19 ms opening<br>12...26 ms closing                                                                                                                                                                                                                                                                                                                                                                      |
| Safety reliability level      | B10d = 1369863 cycles contactor with nominal load EN/ISO 13849-1<br>B10d = 20000000 cycles contactor with mechanical load EN/ISO 13849-1                                                                                                                                                                                                                                                                     |
| Mechanical durability         | 6 Mcycles                                                                                                                                                                                                                                                                                                                                                                                                    |
| Maximum operating rate        | 3600 cyc/h 140 °F (60 °C)                                                                                                                                                                                                                                                                                                                                                                                    |

## Complementary

|                                 |                                                                                                                                                                                                                                                               |
|---------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Coil technology                 | Without built-in suppressor module                                                                                                                                                                                                                            |
| Control circuit voltage limits  | 0.3...0.6 Uc -40...158 °F (-40...70 °C) drop-out AC 50/60 Hz<br>0.8...1.1 Uc -40...140 °F (-40...60 °C) operational AC 50 Hz<br>0.85...1.1 Uc -40...140 °F (-40...60 °C) operational AC 60 Hz<br>1...1.1 Uc 140...158 °F (60...70 °C) operational AC 50/60 Hz |
| Inrush power in VA              | 140 VA 60 Hz 0.75 68 °F (20 °C))<br>160 VA 50 Hz 0.75 68 °F (20 °C))                                                                                                                                                                                          |
| Hold-in power consumption in VA | 13 VA 60 Hz 0.3 68 °F (20 °C))<br>15 VA 50 Hz 0.3 68 °F (20 °C))                                                                                                                                                                                              |
| Heat dissipation                | 4...5 W 50/60 Hz                                                                                                                                                                                                                                              |
| Auxiliary contacts type         | Mechanically linked 1 NO + 1 NC IEC 60947-5-1<br>Mirror contact 1 NC IEC 60947-4-1                                                                                                                                                                            |
| Signalling circuit frequency    | 25...400 Hz                                                                                                                                                                                                                                                   |
| Minimum switching current       | 5 mA signalling circuit                                                                                                                                                                                                                                       |
| Minimum switching voltage       | 17 V signalling circuit                                                                                                                                                                                                                                       |
| Non-overlap time                | 1.5 Ms on de-energisation between NC and NO contact<br>1.5 ms on energisation between NC and NO contact                                                                                                                                                       |
| Insulation resistance           | > 10 MOhm signalling circuit                                                                                                                                                                                                                                  |

## Environment

|                                       |                                                                                                                                                                            |
|---------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| IP degree of protection               | IP20 front face IEC 60529                                                                                                                                                  |
| Protective treatment                  | TH IEC 60068-2-30                                                                                                                                                          |
| Pollution degree                      | 3                                                                                                                                                                          |
| Ambient air temperature for operation | -40...140 °F (-40...60 °C)<br>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                                                                                                                                             |
| Mechanical robustness                 | Vibrations contactor open2 Gn, 5...300 Hz<br>Vibrations contactor closed4 Gn, 5...300 Hz<br>Shocks contactor closed15 Gn for 11 ms<br>Shocks contactor open10 Gn for 11 ms |
| Height                                | 4.80 in (122 mm)                                                                                                                                                           |
| Width                                 | 2.17 in (55 mm)                                                                                                                                                            |
| Depth                                 | 4.72 in (120 mm)                                                                                                                                                           |
| Net Weight                            | 1.87 lb(US) (0.85 kg)                                                                                                                                                      |

## Ordering and shipping details

|                       |                                     |
|-----------------------|-------------------------------------|
| Category              | 22357-CTR, TESYS D, OPEN, 40-65A AC |
| Discount Schedule     | I12                                 |
| GTIN                  | 3389119401456                       |
| Nbr. of units in pkg. | 1                                   |
| Package weight(Lbs)   | 29.56 oz (838 g)                    |
| Returnability         | No                                  |
| Country of origin     | FR                                  |

## Packing Units

|                              |                           |
|------------------------------|---------------------------|
| Unit Type of Package 1       | PCE                       |
| Package 1 Height             | 2.44 in (6.2 cm)          |
| Package 1 width              | 5.39 in (13.7 cm)         |
| Package 1 Length             | 5.98 in (15.2 cm)         |
| Unit Type of Package 2       | S02                       |
| Number of Units in Package 2 | 10                        |
| Package 2 Weight             | 19.32 lb(US) (8.765 kg)   |
| Package 2 Height             | 5.91 in (15 cm)           |
| Package 2 width              | 11.81 in (30 cm)          |
| Package 2 Length             | 15.75 in (40 cm)          |
| Unit Type of Package 3       | P06                       |
| Number of Units in Package 3 | 160                       |
| Package 3 Weight             | 327.92 lb(US) (148.74 kg) |
| Package 3 Height             | 30.31 in (77 cm)          |
| Package 3 width              | 31.50 in (80 cm)          |
| Package 3 Length             | 23.62 in (60 cm)          |

## Offer Sustainability

|                           |                                                                                                                                                                                                                                                           |
|---------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Sustainable offer status  | Green Premium product                                                                                                                                                                                                                                     |
| 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> |
| REACH Regulation          |  <a href="#">REACH Declaration</a>                                                                                                                                     |
| REACH free of SVHC        | Yes                                                                                                                                                                                                                                                       |
| EU RoHS Directive         | Compliant  <a href="#">EU RoHS Declaration</a>                                                                                                                         |
| Toxic heavy metal free    | Yes                                                                                                                                                                                                                                                       |
| Mercury free              | Yes                                                                                                                                                                                                                                                       |

|                            |                                                                                                                                 |
|----------------------------|---------------------------------------------------------------------------------------------------------------------------------|
| RoHS exemption information |  <a href="#">Yes</a>                            |
| China RoHS Regulation      |  <a href="#">China RoHS Declaration</a>        |
| Environmental Disclosure   |  <a href="#">Product Environmental Profile</a> |
| Circularity Profile        |  <a href="#">End Of Life Information</a>       |
| WEEE                       | The product must be disposed on European Union markets following specific waste collection and never end up in rubbish bins.    |
| PVC free                   | Yes                                                                                                                             |

### Contractual warranty

|          |           |
|----------|-----------|
| Warranty | 18 months |
|----------|-----------|