# Product datasheet

Specifications

## TeSys D control relay - 5 NO - <= 690 V - 110 V AC standard coil

CAD50F7

**EAN Code: 3389110402940**

## Main

| | |
|---|---|
| **Range** | TeSys<br>TeSys Deca |
| **Product Name** | TeSys CAD |
| **Product Or Component Type** | Control relay |
| **Device Short Name** | CAD |
| **Contactor Application** | Control circuit |

## Complementary

| | |
|---|---|
| **Utilisation Category** | DC-13<br>AC-15<br>AC-14 |
| **Pole Contact Composition** | 5 NO |
| **[Ue] Rated Operational Voltage** | <= 690 V AC 25...400 Hz |
| **Control Circuit Type** | AC at 50/60 Hz |
| **[Uc] Control Circuit Voltage** | 110 V AC 50/60 Hz |
| **[Uimp] Rated Impulse Withstand Voltage** | 6 kV conforming to IEC 60947 |
| **[Ith] Conventional Free Air Thermal Current** | 10 A (at 60 °C) |
| **Irms Rated Making Capacity** | 140 A AC conforming to IEC 60947-5-1<br>250 A DC conforming to IEC 60947-5-1 |
| **[Icw] Rated Short-Time Withstand Current** | 100 A - 1 s<br>120 A - 500 ms<br>140 A - 100 ms |
| **Associated Fuse Rating** | 10 A gG conforming to IEC 60947-5-1 |
| **[Ui] Rated Insulation Voltage** | 600 V UL certified<br>600 V CSA certified<br>690 V conforming to IEC 60947-5-1 |
| **Mounting Support** | Rail<br>Plate |
| **Connections - Terminals** | Screw clamp terminals 1 cable(s) 1…4 mm²flexible without cable end<br>Screw clamp terminals 2 cable(s) 1…4 mm²flexible without cable end<br>Screw clamp terminals 1 cable(s) 1…4 mm²flexible with cable end<br>Screw clamp terminals 2 cable(s) 1…2.5 mm²flexible with cable end<br>Screw clamp terminals 1 cable(s) 1…4 mm²solid without cable end<br>Screw clamp terminals 2 cable(s) 1…4 mm²solid without cable end |
| **Tightening Torque** | 1.2 N.m - on screw clamp terminals - with screwdriver Philips No 2<br>1.2 N.m - on screw clamp terminals - with screwdriver flat Ø 6 mm<br>1.2 N.m - on screw clamp terminals - with screwdriver pozidriv No 2 |

Disclaimer: This documentation is not intended as a substitute for and is not to be used for determining suitability or reliability of these products for specific user applications

| | |
|---|---|
| **Control Circuit Voltage Limits** | 0.3...0.6 Uc (-40…70 °C):drop-out AC 50/60 Hz<br>0.8...1.1 Uc (-40…60 °C):operational AC 50 Hz<br>0.85...1.1 Uc (-40…60 °C):operational AC 60 Hz<br>1...1.1 Uc (60…70 °C):operational AC 50/60 Hz |
| **Operating Time** | 12...22 ms coil energisation and NO closing<br>4...12 ms coil de-energisation and NO opening |
| **Mechanical Durability** | 30 Mcycles |
| **Maximum Operating Rate** | 180 cyc/mn |
| **Inrush Power In Va** | 70 VA 50 Hz (at 20 °C) |
| **Hold-In Power Consumption In Va** | 8 VA 50 Hz (at 20 °C) |
| **Minimum Switching Voltage** | 17 V |
| **Minimum Switching Current** | 5 mA |
| **Non-Overlap Time** | 1.5 ms on energisation between NC and NO contact<br>1.5 ms on de-energisation between NC and NO contact |
| **Insulation Resistance** | > 10 MOhm |
| **Mechanical Robustness** | Shocks control relay open: 10 Gn for 11 ms conforming to IEC 60068-2-27<br>Shocks control relay closed: 15 Gn for 11 ms conforming to IEC 60068-2-27<br>Vibrations control relay open: 2 Gn, 5...300 Hz conforming to IEC 60068-2-6<br>Vibrations control relay closed: 4 Gn, 5...300 Hz conforming to IEC 60068-2-6 |
| **Height** | 77 mm |
| **Width** | 45 mm |
| **Depth** | 84 mm |
| **Net Weight** | 0.58 kg |

## Environment

| | |
|---|---|
| **Standards** | EN/IEC 60947-5-1<br>GB/T 14048.5<br>UL 60947-5-1<br>CSA C22.2 No 60947-5-1<br>JIS C8201-5-1 |
| **Product Certifications** | CB<br>CCC<br>UL<br>CSA<br>EAC<br>CE<br>UKCA |
| **Ip Degree Of Protection** | IP2X front face conforming to VDE 0106 |
| **Protective Treatment** | TH conforming to IEC 60068 |
| **Ambient Air Temperature For Operation** | -40…60 °C<br>60…70 °C with derating |
| **Ambient Air Temperature For Storage** | -60…80 °C |
| **Operating Altitude** | 0...3000 m |

## Packing Units

| | |
|---|---|
| **Unit Type Of Package 1** | PCE |
| **Number Of Units In Package 1** | 1 |
| **Package 1 Height** | 5.000 cm |
| **Package 1 Width** | 9.200 cm |
| **Package 1 Length** | 11.200 cm |

| | |
|---|---|
| **Package 1 Weight** | 356.000 g |
| **Unit Type Of Package 2** | S02 |
| **Number Of Units In Package 2** | 20 |
| **Package 2 Height** | 15.000 cm |
| **Package 2 Width** | 30.000 cm |
| **Package 2 Length** | 40.000 cm |
| **Package 2 Weight** | 7.428 kg |

## Contractual warranty

| | |
|---|---|
| **Warranty** | 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-$CO_2$ 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 |

## Certifications & Standards

| | |
|---|---|
| **Reach Regulation** | REACh Declaration |
| **Eu Rohs Directive** | Compliant with Exemptions |
| **China Rohs Regulation** | China RoHS declaration<br>Product out of China RoHS scope. Substance declaration for your information |
| **Environmental Disclosure** | Product Environmental Profile |
| **Weee** | The product must be disposed on European Union markets following specific waste collection and never end up in rubbish bins |
| **Circularity Profile** | End of Life Information |