

# Product datasheet

Specifications



## TeSys F contactor - 3P(3 NO) - AC-3 - <= 440 V 800 A - without coil

LC1F800

⚠ To be discontinued on: Dec 31, 2023

⚠ To be discontinued

### Main

Range	TeSys
Product Name	TeSys F
Product Or Component Type	Contactors
Device Short Name	LC1F
Contactors Application	Motor control Resistive load
Utilisation Category	AC-3 AC-1 AC-4
Poles Description	3P
Power Pole Contact Composition	3 NO
[Ue] Rated Operational Voltage	<= 1000 V AC 50/60 Hz <= 460 V DC
[Ie] Rated Operational Current	1000 A (at <40 °C) at <= 440 V AC AC-1 800 A (at <55 °C) at <= 440 V AC AC-3
Motor Power Kw	450 kW at 1000 V AC 50/60 Hz (AC-3) 450 kW at 500 V AC 50/60 Hz (AC-3) 475 kW at 660...690 V AC 50/60 Hz (AC-3) 110 kW at 400 V AC 50/60 Hz (AC-4) 450 kW at 380...400 V AC 50/60 Hz (AC-3) 450 kW at 415 V AC 50/60 Hz (AC-3) 450 kW at 440 V AC 50/60 Hz (AC-3) 250 kW at 220...240 V AC 50/60 Hz (AC-3)

### Complementary

[Uc] Control Circuit Voltage	110...400 V AC 40...400 Hz with LX1/LX9 coil 110...400 V DC with LX4 coil 100...250 V AC 50/60 Hz with LXE coil 100...380 V DC with LXE coil
[Uimp] Rated Impulse Withstand Voltage	8 kV
Overvoltage Category	III
[Ith] Conventional Free Air Thermal Current	1000 A (at 40 °C)
Irms Rated Making Capacity	8000 A AC conforming to IEC 60947-4-1
Rated Breaking Capacity	6400 A conforming to IEC 60947-4-1
[Icw] Rated Short-Time Withstand Current	2600 A 40 °C - 3 min 5500 A 40 °C - 10 s 4600 A 40 °C - 30 s 3600 A 40 °C - 1 min 1700 A 40 °C - 10 min

<b>Associated Fuse Rating</b>	1000 A gG at ≤ 440 V 800 A aM at ≤ 440 V
<b>Average Impedance</b>	0.12 mOhm - lth 1000 A 50 Hz
<b>[U<sub>i</sub>] Rated Insulation Voltage</b>	1000 V conforming to IEC 60947-4-1 1500 V conforming to VDE 0110 group C
<b>Power Dissipation Per Pole</b>	120 W AC-1 77 W AC-3
<b>Control Circuit Voltage Limits</b>	Operational: 0.85...1.1 U <sub>c</sub> AC 40...400 Hz with LX1/LX9 coil Drop-out: 0.3...0.5 U <sub>c</sub> AC 40...400 Hz with LX1/LX9 coil Operational: 0.85...1.1 U <sub>c</sub> DC with LX4 coil Drop-out: 0.3...0.5 U <sub>c</sub> DC with LX4 coil Operational: 85...275 V AC 50/60 Hz with LXE coil Drop-out: 0...60 V AC 50/60 Hz with LXE coil Operational: 85...418 V DC with LXE coil Drop-out: 0...45 V DC with LXE coil
<b>Heat Dissipation</b>	25 W 2.2...5.5 W
<b>Operating Time</b>	60...80 ms closing for with LX1/LX9 coil 160...180 ms opening for with LX1/LX9 coil 60...80 ms closing for with LX4 coil 40...50 ms opening for with LX4 coil 40...80 ms closing for with LXE coil 6...54 ms opening for with LXE coil
<b>Mounting Support</b>	Plate
<b>Standards</b>	IEC 60947-1 JIS C8201-4-1 EN 60947-1 IEC 60947-4-1 EN 60947-4-1
<b>Product Certifications</b>	CB CSA LROS (Lloyds register of shipping) ABS CCC UL UKCA
<b>Connections - Terminals</b>	Power circuit: bar 2 cable(s) - busbar cross section: 60 x 5 mm Power circuit: bolted connection Control circuit: screw clamp terminals 1 cable(s) 1...4 mm <sup>2</sup> flexible without cable end Control circuit: screw clamp terminals 2 cable(s) 1...4 mm <sup>2</sup> flexible with cable end Control circuit: screw clamp terminals 1 cable(s) 1...4 mm <sup>2</sup> flexible with cable end Control circuit: screw clamp terminals 2 cable(s) 1...2.5 mm <sup>2</sup> solid without cable end Control circuit: screw clamp terminals 1 cable(s) 1...4 mm <sup>2</sup> Control circuit: screw clamp terminals 2 cable(s) 1...4 mm <sup>2</sup>
<b>Tightening Torque</b>	Power circuit: 58 N.m Control circuit: 1.2 N.m
<b>Mechanical Durability</b>	5 Mcycles
<b>Inrush Power In Va</b>	1700 VA, 40...400 Hz cos phi 0.9 (at 20 °C)with LX1/LX9 coil 1900 VA (at 20 °C)with LX4 coil 460...730 VA, 50/60 Hz cos phi 0.5 (at 20 °C)with LXE coil 500...680 VA cos phi 0.5 (at 20 °C)with LXE coil
<b>Hold-In Power Consumption In Va</b>	12 VA, 40...400 Hz cos phi 0.9 (at 20 °C)with LX1/LX9 coil 12 VA (at 20 °C)with LX4 coil 7...10 VA, 50/60 Hz cos phi 0.5 (at 20 °C)with LXE coil 4.0...5.5 VA cos phi 0.5 (at 20 °C)with LXE coil
<b>Maximum Operating Rate</b>	600 cyc/h 55 °C
<b>Compatibility Code</b>	LC1F

## Environment

<b>Ip Degree Of Protection</b>	IP20 front face with shrouds conforming to IEC 60529 IP20 front face with shrouds conforming to VDE 0106
--------------------------------	---

<b>Protective Treatment</b>	TH
<b>Ambient Air Temperature For Operation</b>	-5...55 °C
<b>Ambient Air Temperature For Storage</b>	-60...80 °C
<b>Permissible Ambient Air Temperature Around The Device</b>	-5...55 °C
<b>Operating Altitude</b>	3000 m without derating
<b>Mechanical Robustness</b>	Vibrations contactor open: 2 Gn, 5...300 Hz Vibrations contactor closed: 4 Gn, 5...300 Hz Shocks contactor open: 6 Gn for 1/2 sine wave (11 ms) Shocks contactor closed: 15 Gn for 1/2 sine wave (11 ms)
<b>Height</b>	304 mm
<b>Width</b>	309 mm
<b>Depth</b>	255 mm
<b>Net Weight</b>	18.75 kg

## Packing Units

<b>Unit Type Of Package 1</b>	PCE
<b>Number Of Units In Package 1</b>	1
<b>Package 1 Height</b>	33.500 cm
<b>Package 1 Width</b>	33.500 cm
<b>Package 1 Length</b>	44.500 cm
<b>Package 1 Weight</b>	17.195 kg
<b>Unit Type Of Package 2</b>	P06
<b>Number Of Units In Package 2</b>	4
<b>Package 2 Height</b>	75.000 cm
<b>Package 2 Width</b>	60.000 cm
<b>Package 2 Length</b>	80.000 cm
<b>Package 2 Weight</b>	77.280 kg

## Contractual warranty

<b>Warranty</b>	12 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 >](#)



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](#)  
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](#)