Product datasheet

Specifications

TeSys F contactor - 4P (4 NO) - AC-1 - <= 440 V 275 A - coil 380 V AC

LC1F1854Q7

Discontinued on: 30 Jun 2024

Discontinued

Main

Range	TeSys
Range of product	TeSys F
Product or component type	Contactor
Device short name	LC1F
Contactor application	Resistive load
Utilisation category	AC-1
Poles description	4P
[Ue] rated operational voltage	<= 460 V DC <= 690 V AC 50/60 Hz
[Uc] control circuit voltage	380 V AC 40...400 Hz
[Ie] rated operational current	275 A (at <40 °C) at <= 440 V AC-1

Complementary

[Uimp] rated impulse withstand voltage	8 kV
[Ith] conventional free air thermal current	275 A (at 40 °C)
Rated breaking capacity	1480 A conforming to IEC 60947-4-1
[Icw] rated short-time withstand current	1500 A 40 °C - 10 s 920 A 40 °C - 30 s 740 A 40 °C - 1 min 500 A 40 °C - 3 min 400 A 40 °C - 10 min
Associated fuse rating	200 A aM at <= 440 V 315 A gG at <= 440 V
Average impedance	0.33 mOhm - Ith 275 A 50 Hz
[Ui] rated insulation voltage	1000 V conforming to IEC 60947-4-1 1500 V conforming to VDE 0110 group C
Power dissipation per pole	12 W AC-3 25 W AC-1
Overvoltage category	III
power pole contact composition	4 NO
Control circuit voltage limits	Operational: 0.85...1.1 Uc 40...400 Hz (at 55 °C) Drop-out: 0.2...0.55 Uc 40...400 Hz (at 55 °C)
Mechanical durability	10 Mcycles
Inrush power in VA	1070 VA, 40...400 Hz cos phi 0.9 (at 20 °C)
Hold-in power consumption in VA	9.9 VA, 40...400 Hz cos phi 0.9 (at 20 °C)

Excluding VAT and subject to change. Please check with your local distributor through "Where to buy"

Maximum operating rate	2400 cyc/h 55 °C
Operating time	35 ms closing (at Uc) 130 ms opening (at Uc)
Connections - terminals	Control circuit: screw clamp terminals 1 cable(s) 1…4 mm²flexible without cable end Control circuit: screw clamp terminals 2 cable(s) 1…4 mm²flexible without cable end Control circuit: screw clamp terminals 1 cable(s) 1…4 mm²flexible with cable end Control circuit: screw clamp terminals 2 cable(s) 1…2.5 mm²flexible with cable end Control circuit: screw clamp terminals 1 cable(s) 1…4 mm²solid without cable end Control circuit: screw clamp terminals 2 cable(s) 1…4 mm²solid without cable end Power circuit: bar 2 cable(s) - busbar cross section: 25 x 3 mm Power circuit: lugs-ring terminals 1 cable(s) 150 mm² Power circuit: connector 1 cable(s) 150 mm² Power circuit: bolted connection
Tightening torque	Control circuit: 1.2 N.m Power circuit: 18 N.m
Mounting support	Plate
Heat dissipation	8…9.8 W
Standards	IEC 60947-4-1 EN 60947-4-1 IEC 60947-1 EN 60947-1 JIS C8201-4-1
Product certifications	CB BV RMRoS DNV RINA CCC LROS (Lloyds register of shipping) ABS UL UKCA
Compatibility code	LC1F
Control circuit type	AC at 40...400 Hz

Environment

IP degree of protection	IP2X front face with shrouds conforming to IEC 60529 IP2X front face with shrouds conforming to VDE 0106
Protective treatment	TH
Ambient air temperature for operation	-5…55 °C
Ambient air temperature for storage	-60…80 °C
Permissible ambient air temperature around the device	-40…70 °C
Height	174 mm
Width	208.5 mm
Depth	181 mm
Operating altitude	3000 m without derating
Net weight	5.45 kg

Packing Units

Unit Type of Package 1	PCE
Number of Units in Package 1	1
Package 1 Height	21.000 cm
Package 1 Width	22.500 cm

Package 1 Length	23.000 cm
Package 1 Weight	5.670 kg
Unit Type of Package 2	S04
Number of Units in Package 2	3
Package 2 Height	30 cm
Package 2 Width	40 cm
Package 2 Length	60 cm
Package 2 Weight	17.660 kg
Unit Type of Package 3	P06
Number of Units in Package 3	12
Package 3 Height	75.000 cm
Package 3 Width	80.000 cm
Package 3 Length	60.000 cm
Package 3 Weight	78.640 kg

Contractual warranty

Warranty (in months)	18

Environmental Data

Schneider Electric aims to achieve Net Zero status by 2050 through supply chain partnerships, lower impact materials, and circularity via our ongoing “Use Better, Use Longer, Use Again” campaign to extend product lifetimes and recyclability.

Environmental Data explained >

How we assess product sustainability >

Environmental footprint

Total lifecycle Carbon footprint	**1 369 kg CO2 eq.**
Environmental Disclosure	**Product Environmental Profile**
Carbon footprint of the manufacturing phase [A1 to A3]	**108 kg CO2 eq.**
Carbon footprint of the distribution phase [A4]	**1 kg CO2 eq.**
Carbon footprint of the installation phase [A5]	**0.5 kg CO2 eq.**
Carbon footprint of the use phase [B2, B3, B4, B6]	**1 249 kg CO2 eq.**
Carbon footprint of the end-of-life phase [C1 to C4]	**10 kg CO2 eq.**

Use Better

Materials and Substances

EU RoHS Directive	**Compliant with Exemptions**
SCIP Number	**B2d4179a-eb65-40a3-a1ef-d9a33060486f**
REACh Regulation	**REACh Declaration**
PVC free	**Yes**

Use Longer

Lifetime extension

Repair	**No**

Use Again

Repack and remanufacture

Recyclability potential, in %	**91**
Take-back	**No**
WEEE Label	**The product must be disposed on European Union markets following specific waste collection and never end up in rubbish bins**