

LC1F225E5

TeSys F contactor - 3P (3 NO) - AC-3 - \leq 440 V
225 A - coil 48 V AC



Main

Range	TeSys
Product name	TeSys F
Product or component type	Contacteur
Device short name	LC1F
Contacteur application	Motor control Resistive load
Utilisation category	AC-1 AC-3
Poles description	3P
Pole contact composition	3 NO
[Ue] rated operational voltage	\leq 1000 V AC 50/60 Hz \leq 460 V DC
[Ie] rated operational current	315 A (\leq 40 °C) at \leq 440 V AC AC-1 225 A (\leq 55 °C) at \leq 440 V AC AC-3
Motor power kW	100 kW at 1000 V AC 50/60 Hz 110 kW at 380...400 V AC 50/60 Hz 110 kW at 415 V AC 50/60 Hz 110 kW at 440 V AC 50/60 Hz 129 kW at 500 V AC 50/60 Hz 63 kW at 220...230 V AC 50/60 Hz 129 kW at 660...690 V AC 50/60 Hz
Control circuit type	AC 50 Hz
Control circuit voltage	48 V AC 50 Hz
[Uimp] rated impulse withstand voltage	8 kV
Overvoltage category	III
[Ith] conventional free air thermal current	315 A at \leq 40 °C
Irms rated making capacity	2250 A AC conforming to IEC 60947-4-1
Rated breaking capacity	1800 kA conforming to IEC 60947-4-1
[Icw] rated short-time withstand current	1800 A \leq 40 °C 10 s 1000 A \leq 40 °C 30 s 850 A \leq 40 °C 1 min 560 A \leq 40 °C 3 min 440 A \leq 40 °C 10 min
Associated fuse rating	315 A gG at \leq 440 V 250 A aM at \leq 440 V
Average impedance	0.32 mOhm at 50 Hz - Ith 315 A
[Ui] rated insulation voltage	1000 V conforming to IEC 60947-4-1 1500 V conforming to VDE 0110 group C
Power dissipation per pole	16 W AC-3 32 W AC-1
Mounting support	Plate
Standards	EN 60947-1 EN 60947-4-1 IEC 60947-1 IEC 60947-4-1 JEM 1038
Product certifications	BV CCC CSA DNV GL RINA RMRoS

The information provided in this documentation contains general descriptions and/or technical characteristics of the products contained herein. 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. It is the duty of any such user or integrator to perform the appropriate and complete risk analysis, evaluation and testing of the products with respect to the relevant specific application or use thereof. Neither Schneider Electric Industries SAS nor any of its affiliates or subsidiaries shall be responsible or liable for misuse of the information contained herein.

UL
LROS

Connections - terminals	Control circuit : screw clamp terminals 2 cable(s) 1...2.5 mm ² - cable stiffness: flexible - with cable end Power circuit : connector 1 cable(s) 185 mm ² Control circuit : screw clamp terminals 1 cable(s) 1...4 mm ² - cable stiffness: flexible - without cable end Control circuit : screw clamp terminals 2 cable(s) 1...4 mm ² - cable stiffness: flexible - without cable end Control circuit : screw clamp terminals 1 cable(s) 1...4 mm ² - cable stiffness: flexible - with cable end Control circuit : screw clamp terminals 1 cable(s) 1...4 mm ² - cable stiffness: solid - without cable end Control circuit : screw clamp terminals 2 cable(s) 1...4 mm ² - cable stiffness: solid - without cable end Power circuit : lugs-ring terminals 1 cable(s) 185 mm ² Power circuit : bar 2 x (32 x 4 mm)
Tightening torque	Power circuit : 35 N.m Control circuit : 1.2 N.m
Operating time	20...35 ms closing 7...15 ms opening
Mechanical durability	10 Mcycles
Operating rate	2400 cyc/h at <= 55 °C

Complementary

Control circuit voltage limits	0.85...1.1 Uc at 55 °C operational 50/60 Hz 0.35...0.55 Uc at 55 °C drop-out 50/60 Hz
Inrush power in VA	805 VA at 20 °C (cos φ 0.3) 50 Hz
Hold-in power consumption in VA	55 VA at 20 °C (cos φ 0.3) 50 Hz
Heat dissipation	18...24 W

Environment

IP degree of protection	IP20 front face with shrouds (ordered separately) conforming to IEC 60529 IP20 front face with shrouds (ordered separately) 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
Operating altitude	3000 m without derating in temperature
Mechanical robustness	Vibrations contactor open 2 Gn, 5...300 Hz Shocks contactor closed 15 Gn for 11 ms Vibrations contactor closed 5 Gn, 5...300 Hz Shocks contactor open 7 Gn for 11 ms
Height	197 mm
Width	168.5 mm
Depth	181 mm
Product weight	4.75 kg

Offer Sustainability

Sustainable offer status	Green Premium product
RoHS	Compliant - since 0843 - Schneider Electric declaration of conformity
REACH	Reference not containing SVHC above the threshold
Product environmental profile	Available
Product end of life instructions	Available