Product datasheet

Specifications

High power contactor, TeSys Giga, 4 pole (4NO), AC-1 <=440V 305A, standard version, 100…250V wide band AC/DC coil

LC1G1854KUEN

Main

Range	TeSys
Range of product	TeSys Giga
Product or component type	Contactor
Device short name	LC1G
Contactor application	Power switching
Utilisation category	AC-3 AC-3e AC-1 AC-5a AC-5b AC-6a AC-6b DC-1 DC-3 DC-5
Poles description	4P
[Ue] rated operational voltage	<= 1000 V AC 50/60 Hz <= 460 V DC
[Ie] rated operational current	185 A (at <60 °C) at <= 440 V AC-3 305 A (at <40 °C) at <= 1000 V AC-1
[Uc] control circuit voltage	100...250 V AC 50/60 Hz 100...250 V DC
Control circuit voltage limits	Operational: 0.8 Uc Min...1.1 Uc Max (at <60 °C) Drop-out: 0.1 Uc Max...0.45 Uc Min (at <60 °C)

Complementary

[Uimp] rated impulse withstand voltage	8 kV
Overvoltage category	III
[Ith] conventional free air thermal current	305 A (at 40 °C)
Rated breaking capacity	1610 A at 440 V
[Icw] rated short-time withstand current	1.5 kA - 10 s 0.92 kA - 30 s 0.74 kA - 1 min 0.5 kA - 3 min 0.4 kA - 10 min
Associated fuse rating	200 A aM at <= 440 V for motor 160 A aM at <= 690 V for motor 315 A gG at <= 690 V
Average impedance	0.00017 Ohm
[Ui] rated insulation voltage	1000 V

Power dissipation per pole	20 W AC-1 - Ith 305 A 6 W AC-3 - Ith 185 A
Compatibility code	LC1G
Pole contact composition	4 NO
Auxiliary contact composition	1 NO + 1 NC
Irms rated making capacity	2310 A at 440 V
Coil technology	Built-in bidirectional peak limiting
Safety reliability level	B10d = 400000 cycles contactor with nominal load conforming to EN/ISO 13849-1 B10d = 3000000 cycles contactor with mechanical load conforming to EN/ISO 13849-1
Mechanical durability	8 Mcycles
inrush power in VA (50/60 Hz, AC)	540 VA
inrush power in W (DC)	380 W
hold-in power consumption in VA (50/60 Hz, AC)	12.4 VA
hold-in power consumption in W (DC)	7.8 W
Operating time	40...70 ms closing 15...50 ms opening
Maximum operating rate	600 cyc/h AC-3 600 cyc/h AC-3e 300 cyc/h AC-1
Connections - terminals	Power circuit: bar 2 - busbar cross section: 25 x 6 mm Power circuit: lugs-ring terminals 1 185 mm² Control circuit: push-in 1 0.2…2.5 mm² - cable stiffness: solid stranded without cable end Control circuit: push-in 1 0.25…2.5 mm² - cable stiffness: flexible with cable end Control circuit: push-in 2 0.5…1.0 mm² with cable end Control circuit: push-in 0.75…2.5 mm² - cable stiffness: solid stranded without cable end Control circuit: push-in 0.75…2.5 mm² - cable stiffness: flexible with cable end
Connection pitch	35 mm
Mounting support	Plate
Standards	EN/IEC 60947-4-1 EN/IEC 60947-5-1 UL 60947-4-1 CSA C22.2 No 60947-4-1 JIS C8201-4-1 JIS C8201-5-1 UL 60335-1 UL 60335-2-40:Annex JJ
Product certifications	CB Scheme CCC cULus EAC CE UKCA EU-RO-MR by DNV-GL
Tightening torque	18 N.m
Height	193 mm
Width	143 mm
Depth	193 mm
Net weight	4.2 kg

Environment

IP degree of protection	IP2X front face with shrouds conforming to IEC 60529 IP2X front face with shrouds conforming to VDE 0106
Ambient air temperature for operation	-25…60 °C
Ambient air temperature for storage	-60…80 °C
Mechanical robustness	Vibrations 5…300 Hz 2 gn contactor open Vibrations 5…300 Hz 4 gn contactor closed Shocks 10 gn 11 ms contactor open Shocks 15 gn 11 ms contactor closed
Colour	Dark grey
Protective treatment	TH
Permissible ambient air temperature around the device	-40…70 °C at Uc

Packing Units

Unit Type of Package 1	PCE
Number of Units in Package 1	1
Package 1 Height	26.000 cm
Package 1 Width	21.000 cm
Package 1 Length	32.000 cm
Package 1 Weight	5.496 kg
Unit Type of Package 2	S06
Number of Units in Package 2	10
Package 2 Height	75.000 cm
Package 2 Width	60.000 cm
Package 2 Length	80.000 cm
Package 2 Weight	68.960 kg

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

Carbon footprint (kg.eq.CO2 per CR, Total Life cycle)	**1962**
Environmental Disclosure	**Product Environmental Profile**

Use Better

Materials and Substances

Packaging made with recycled cardboard	**Yes**
Packaging without single use plastic	**No**
EU RoHS Directive	**Compliant with Exemptions**
SCIP Number	**6fbdad13-bb7c-47d4-a6d6-d82dd6f54349**
REACh Regulation	**REACh Declaration**
Halogen content performance	**Halogen free plastic parts product**
PVC free	**Yes**

Use Again

Repack and remanufacture

Circularity Profile	**End of Life Information**
Take-back	**No**

Installation

Installation Videos

TeSys Giga - How to install the auxiliary contact block
TeSys Giga - How to install and remove remote wear diagnosis module
TeSys Giga - How to install mechanical interlock kit
TeSys Giga - How to install cable memory kit
TeSys Giga - How to replace control module
TeSys Giga - How to replace switching modules
TeSys Giga - How to assemble change-over solution