

LC1G630EHEA

High power contactor, TeSys Giga, 3 pole (3NO), AC-3 $\leq 440\text{V}$ 630A, advanced version, 48...130V wide band AC/DC coil



Main

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|--------------------------------|--|
| Range | TeSys |
| Range of product | TeSys Giga |
| Product or component type | Contacteur |
| Device short name | LC1G |
| Contactor application | Power switching Motor control |
| Utilisation category | AC-1 AC-3 AC-3e AC-4 AC-5a AC-5b AC-6a AC-6b AC-8b AC-8a DC-1 DC-3 DC-5 |
| Poles description | 3P |
| [Ue] rated operational voltage | $\leq 1000\text{ V AC } 50/60\text{ Hz}$ $\leq 460\text{ V DC}$ |
| [Ie] rated operational current | 1050 A (at $\leq 40\text{ °C}$) at $\leq 1000\text{ V AC-1}$ 630 A (at $\leq 60\text{ °C}$) at $\leq 440\text{ V AC-3}$ |
| [Uc] control circuit voltage | 48...130 V AC 50/60 Hz 48...130 V DC |
| Control circuit voltage limits | Operational: 0.8 Uc Min...1.1 Uc Max (at $\leq 60\text{ °C}$) Drop-out: 0.1 Uc Max...0.45 Uc Min (at $\leq 60\text{ °C}$) |

Complementary

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| [Uimp] rated impulse withstand voltage | 8 kV |
| Overtoltage category | III |
| [Ith] conventional free air thermal current | 1050 A (at 40 °C) |
| Rated breaking capacity | 5550 A at 440 V |
| [Icw] rated short-time withstand current | 5.05 KA - 10 s 4.4 KA - 30 s 3.4 KA - 1 min 2.2 KA - 3 min 1.6 kA - 10 min |
| Associated fuse rating | 630 A aM at $\leq 440\text{ V}$ for motor 500 A aM at $\leq 690\text{ V}$ for motor 1250 A gG at $\leq 690\text{ V}$ |
| Average impedance | 0.000065 Ohm |
| [Ui] rated insulation voltage | 1000 V |
| Power dissipation per pole | 70 W AC-1 - Ith 1050 A 26 W AC-3 - Ith 630 A |
| Compatibility code | LC1G |
| Pole contact composition | 3 NO |
| Auxiliary contact composition | 1 NO + 1 NC |

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| Motor power kW | 180 KW at 230 V AC 50/60 Hz (AC-3e) 315 KW at 400 V AC 50/60 Hz (AC-3e) 335 KW at 415 V AC 50/60 Hz (AC-3e) 355 KW at 440 V AC 50/60 Hz (AC-3e) 375 KW at 500 V AC 50/60 Hz (AC-3e) 500 KW at 690 V AC 50/60 Hz (AC-3e) 450 KW at 1000 V AC 50/60 Hz (AC-3e) 200 KW at 230 V AC 50/60 Hz (AC-3) 335 KW at 400 V AC 50/60 Hz (AC-3) 375 KW at 415 V AC 50/60 Hz (AC-3) 400 KW at 440 V AC 50/60 Hz (AC-3) 400 KW at 500 V AC 50/60 Hz (AC-3) 500 KW at 690 V AC 50/60 Hz (AC-3) 450 KW at 1000 V AC 50/60 Hz (AC-3) 180 KW at 230 V AC 50/60 Hz (AC-4) 315 KW at 400 V AC 50/60 Hz (AC-4) 335 KW at 415 V AC 50/60 Hz (AC-4) 355 KW at 440 V AC 50/60 Hz (AC-4) 375 KW at 500 V AC 50/60 Hz (AC-4) 450 KW at 690 V AC 50/60 Hz (AC-4) 355 kW at 1000 V AC 50/60 Hz (AC-4) |
| Motor power hp | 250 Hp at 200/208 V 60 Hz 300 Hp at 230/240 V 60 Hz 600 Hp at 460/480 V 60 Hz 700 hp at 575/600 V 60 Hz |
| Irms rated making capacity | 7220 A at 440 V |
| Coil technology | Built-in bidirectional peak limiting |
| Mechanical durability | 5 Mcycles |
| Inrush power in VA (50/60 Hz, AC) | 560 VA |
| Inrush power in W (DC) | 440 W |
| Hold-in power consumption in VA (50/60 Hz, AC) | 12 VA |
| Hold-in power consumption in W (DC) | 8.8 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-1 150 cyc/h AC-4 |
| Connections - terminals | Power circuit: bar 2 - busbar cross section: 52 x 20 mm Power circuit: lugs-ring terminals 1 185 mm ² Power circuit: bolted connection Control circuit: push-in 1 0.2...2.5 mm ² - cable stiffness: solid stranded without cable end Control circuit: push-in 1 0.25...2.5 mm ² - cable stiffness: flexible with cable end Control circuit: push-in 2 0.5...1.0 mm ² with cable end Control circuit: push-in 0.75...2.5 mm ² - cable stiffness: solid stranded without cable end Control circuit: push-in 0.75...2.5 mm ² - cable stiffness: flexible with cable end |
| Connection pitch | 70 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 |
| Product certifications | CB Scheme[RETURN]CCC[RETURN]cULus[RETURN]EAC[RETURN]CE[RETURN]UKCA[RETURN] RO-MR by DNV-GL |
| Tightening torque | 58 N.m |
| Height | 388.5 mm |
| Width | 211 mm |
| Depth | 266 mm |
| Net weight | 17.3 kg |

Environment

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| 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

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| Unit Type of Package 1 | PCE |
| Number of Units in Package 1 | 1 |
| Package 1 Height | 34.000 cm |
| Package 1 Width | 31.000 cm |
| Package 1 Length | 51.000 cm |
| Package 1 Weight | 19.469 kg |
| Unit Type of Package 2 | S06 |
| Number of Units in Package 2 | 2 |
| Package 2 Height | 75.000 cm |
| Package 2 Width | 60.000 cm |
| Package 2 Length | 80.000 cm |
| Package 2 Weight | 52.800 kg |

Offer Sustainability

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|-----------------------------|---|
| Sustainable offer status | Green Premium product |
| REACH Regulation | REACH Declaration |
| EU RoHS Directive | Compliant with Exemptions |
| Mercury free | Yes |
| China RoHS Regulation | China RoHS Declaration |
| RoHS exemption information | Yes |
| Environmental Disclosure | Product Environmental Profile |
| Circularity Profile | End Of Life Information |
| PVC free | Yes |
| Halogen content performance | Halogen free plastic parts product |

