



## Main

Range	TeSys
Product or component type	Contactor
Product name	TeSys K
Device short name	LC1K
Device application	Control
Contactor application	Motor control

## Complementary

Utilisation category	AC-4 AC-3
Poles description	3P
Power pole contact composition	3 NO
[Ue] rated operational voltage	Power circuit 690 V AC 50/60 Hz Signalling circuit <= 690 V AC 50/60 Hz
[Ie] rated operational current	6 A <= 440 V AC AC-3 power circuit
Control circuit type	AC 50/60 Hz
[Uc] control circuit voltage	12 V AC 50/60 Hz
Motor power kW	1.5 kW 220...230 V AC 50/60 Hz AC-3 2.2 kW 380...415 V AC 50/60 Hz AC-3 3 kW 440 V AC 50/60 Hz AC-3 3 kW 480 V AC 50/60 Hz AC-3 3 kW 500...600 V AC 50/60 Hz AC-3 3 kW 660...690 V AC 50/60 Hz AC-3 1.5 kW 400 V AC 50/60 Hz AC-4
Auxiliary contact composition	1 NO
[Uimp] rated impulse withstand voltage	8 kV
Overvoltage category	III
[Ith] conventional free air thermal current	20 A 122 °F (50 °C) power circuit 10 A 122 °F (50 °C) signalling circuit
Irms rated making capacity	110 A AC power circuit NF C 63-110 110 A AC power circuit IEC 60947 110 A AC signalling circuit IEC 60947
Rated breaking capacity	110 A 415 V IEC 60947 110 A 440 V IEC 60947 80 A 500 V IEC 60947 110 A 220...230 V IEC 60947 110 A 380...400 V IEC 60947 70 A 660...690 V IEC 60947
[Icw] rated short-time withstand current	90 A 122 °F (50 °C) - 1 s power circuit 85 A 122 °F (50 °C) - 5 s power circuit 80 A 122 °F (50 °C) - 10 s power circuit 60 A 122 °F (50 °C) - 30 s power circuit 45 A 122 °F (50 °C) - 1 min power circuit 40 A 122 °F (50 °C) - 3 min power circuit 20 A 122 °F (50 °C) - >= 15 min power circuit 80 A - 1 s signalling circuit 90 A - 500 ms signalling circuit 110 A - 100 ms signalling circuit

Associated fuse rating	25 A gG <= 440 V power circuit 25 A aM power circuit 10 A gG signalling circuit IEC 60947 10 A gG signalling circuit VDE 0660
Average impedance	3 mOhm - lth 20 A 50 Hz power circuit
[Ui] rated insulation voltage	Power circuit 600 V UL 508 Power circuit: 690 V conforming to IEC 60947-4-1 Signalling circuit 690 V IEC 60947-4-1 Signalling circuit 690 V IEC 60947-5-1 Signalling circuit 600 V UL 508 Power circuit 600 V CSA C22.2 No 14 Signalling circuit 600 V CSA C22.2 No 14
Insulation resistance	> 10 MOhm for signalling circuit
Inrush power in VA	30 VA 68 °F (20 °C))
Hold-in power consumption in VA	4.5 VA 68 °F (20 °C))
Heat dissipation	1.3 W
Control circuit voltage limits	Operational 0.8...1.15 Uc 122 °F (50 °C)) Drop-out 0.2...0.75 Uc 122 °F (50 °C))
Connections - terminals	Screw clamp terminals 1 0.00...0.01 in <sup>2</sup> (1.5...4 mm <sup>2</sup> )solid Screw clamp terminals 1 0.00...0.01 in <sup>2</sup> (0.75...4 mm <sup>2</sup> )flexible without cable end Screw clamp terminals 1 0.00...0.00 in <sup>2</sup> (0.34...2.5 mm <sup>2</sup> )flexible with cable end Screw clamp terminals 2 0.00...0.01 in <sup>2</sup> (1.5...4 mm <sup>2</sup> )solid Screw clamp terminals 2 0.00...0.01 in <sup>2</sup> (0.75...4 mm <sup>2</sup> )flexible without cable end Screw clamp terminals 2 0.00...0.00 in <sup>2</sup> (0.34...1.5 mm <sup>2</sup> )flexible with cable end
Maximum operating rate	3600 cyc/h
Auxiliary contacts type	Instantaneous 1 NO
Signalling circuit frequency	<= 400 Hz
Minimum switching current	5 mA for signalling circuit
Minimum switching voltage	17 V for signalling circuit
Mounting support	Rail Plate
Tightening torque	11.51 Lbf.in (1.3 N.m) screw clamp terminals Philips No 2 11.51 lbf.in (1.3 N.m) screw clamp terminals flat Ø 6 mm
Operating time	10...20 ms coil de-energisation and NO opening 10...20 ms coil energisation and NO closing
Safety reliability level	B10d = 1369863 cycles contactor with nominal load conforming to EN/ISO 13849-1 B10d = 20000000 cycles contactor with mechanical load conforming to EN/ISO 13849-1
Non overlap distance	0.02 in (0.5 mm)
Mechanical durability	10 Mcycles
Electrical durability	1.3 Mcycles 6 A AC-3 <= 440 V
Mechanical robustness	Shocks contactor closed, on X axis10 Gn for 11 ms IEC 60068-2-27 Shocks contactor closed, on Y axis15 Gn for 11 ms IEC 60068-2-27 Shocks contactor closed, on Z axis15 Gn for 11 ms IEC 60068-2-27 Shocks contactor opened, on X axis6 Gn for 11 ms IEC 60068-2-27 Shocks contactor opened, on Y axis10 Gn for 11 ms IEC 60068-2-27 Shocks contactor opened, on Z axis10 Gn for 11 ms IEC 60068-2-27 Vibrations contactor closed4 Gn, 5...300 Hz IEC 60068-2-6 Vibrations contactor opened2 Gn, 5...300 Hz IEC 60068-2-6
Height	2.28 in (58 mm)
Maximum Width	1.77 in (45 mm)
Depth	2.24 in (57 mm)
Net Weight	0.40 lb(US) (0.18 kg)

## Environment

Standards	BS 5424 IEC 60947 NF C 63-110 VDE 0660
Product certifications	CSA UL
IP degree of protection	IP2x VDE 0106
Protective treatment	TC IEC 60068 TC DIN 50016
Ambient air temperature for storage	-58...176 °F (-50...80 °C)

Operating altitude	6561.68 ft (2000 m) without derating
Flame retardance	V1 conforming to UL 94 Requirement 2 NF F 16-101 Requirement 2 NF F 16-102

### Ordering and shipping details

Category	22326 - CTR,K-LINE,AC,OPEN,NONREV
Discount Schedule	I12
GTIN	03389110487619
Nbr. of units in pkg.	1
Package weight(Lbs)	1 lb(US) (0.45 kg)
Returnability	No
Country of origin	FR

### Packing Units

Unit Type of Package 1	PCE
Package 1 Height	2.56 in (6.5 cm)
Package 1 width	2.44 in (6.2 cm)
Package 1 Length	1.89 in (4.8 cm)

### Offer Sustainability

Sustainable offer status	Green Premium product
California proposition 65	WARNING: This product can expose you to chemicals including: Antimony oxide & Antimony trioxide, which is known to the State of California to cause cancer. For more information go to <a href="http://www.P65Warnings.ca.gov">www.P65Warnings.ca.gov</a>
REACH Regulation	<a href="#">REACH Declaration</a>
REACH free of SVHC	Yes
EU RoHS Directive	Compliant <a href="#">EU RoHS Declaration</a>
Toxic heavy metal free	Yes
Mercury free	Yes
RoHS exemption information	<a href="#">Yes</a>
China RoHS Regulation	<a href="#">China RoHS Declaration</a>
Environmental Disclosure	<a href="#">Product Environmental Profile</a>
Circularity Profile	<a href="#">End Of Life Information</a>
WEEE	The product must be disposed on European Union markets following specific waste collection and never end up in rubbish bins.

### Contractual warranty

Warranty	18 months
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