

Data Sheet for Article: LTD13215--

Contactor 15kW/400V, 1 NO, coil 24VDC

Size 1



Technical Data

Standards	EN 60947-4-1, EN 60947-5-1, IEC 60947-4-1, IEC 60947-5-1, UL 508
Lifespan, mechanical DC operated	10000000 Operations
Operating frequency, mechanical DC operated	5000 Operations/h
Climatic proofing	Damp heat, constant, to IEC 60068-2-78 Damp heat, cyclic, to IEC 60068-2-30
Ambient temperature Open (°C)	-25 / +60
Ambient temperature Enclosed (°C)	-25 / + 40
Ambient temperature Storage (°C)	-40 / +80
Mech. shock resistance Half-sinusoidal shock 10ms	-
Main contacts NO contact (g)	10
Auxiliary contacts NO contact (g)	7
Auxiliary contacts NC contact (g)	5
Mech. shock resist. Half-sinusoidal shock horizon.	-
Main contacts N/O contact (g)	6,9
Auxiliary contacts N/O contact (g)	5,3
Auxiliary contacts N/C contact (g)	3,5
IP Rating	IP00
Protection against direct contact	-

Technical Data - continued

When actuated from front (EN 50274)	Finger and back-of-hand proof
Weight (kg)	-
DC operated	0,53
Terminal cross-section main contact (mm ²)	-
Solid [main cable] (mm ²)	1 x (0,75 - 16) 2 x (0,75 - 10)
Flexible with ferrule [main cable] (mm ²)	1 x (0,75 - 16) 2 x (0,75 - 10)
Stranded [main cable] (mm ²)	1 x 16
Solid or stranded [main cable] (AWG)	single 18 - 6, double 18 - 8
Stripping length [main cable] (mm)	10
Terminal screw [main cable]	M5
Tightening torque [main contact] (Nm)	3,2
Tools [main cable]	-
Philips/Pozidriv screwdriver [main cable]	PZ 2
Standard screwdriver [main cable] (mm)	0,8 x 5,5 1 x 6
Terminal capacity auxiliary contact (mm ²)	-
Solid [auxiliary cables] (mm ²)	1 x (0,75 - 4) 2 x (0,75 - 2,5)
Flexible with ferrule [auxiliary cables] (mm ²)	1 x (0,75 - 2,5) 2 x (0,75 - 2,5)
Solid or stranded [auxiliary cables] (AWG)	18 - 14
Stripping length [auxiliary cables] (mm)	10
Terminal screw [auxiliary cables]	M3,5
Tightening torque [auxiliary contact] (Nm)	1,20
Tools [auxiliary cables]	-
Philips/Pozidriv screwdriver [auxiliary cables]	PZ 2
Standard screwdriver [auxiliary cables]	0,8 x 5,5 1 x 6
Rated impulse withstand voltage [U _{imp}] (V)	8000
Overvoltage category/pollution degree	III/3
Rated insulation voltage [U _i] (V)	690
Rated operational voltage (V)	690
Safe isolation to EN 61140	-
Between coil and contacts (VAC)	440
Between the contacts (VAC)	440
Making capacity p.f. to IEC/EN 60947 up to 690 V (A)	384
Breaking capacity	-
220 V 230 V (A)	320
380 V 400 V (A)	320
500 V (A)	320
660 V 690 V (A)	180
Short circuit withstand (kA)	-
Short-circuit protection maximum fuse	-
Type „2“ coordination 400 V [gG/gL 500 V] (A)	63
Type „2“ coordination 690 V [gG/gL 690 V] (A)	35

Technical Data - continued

Type „1“ coordination 400 V [gG/gL 500 V] (A)	125
Type „1“ coordination 690 V [gG/gL 690 V] (A)	63
AC-1	-
AC-1 Rated operational current	-
Conventional free air therm. current 3pole 50-60Hz	-
Open at 40 °C [I _{th} =I _e] (A)	45
Open at 50 °C [I _{th} =I _e] (A)	43
Open at 55 °C [I _{th} =I _e] (A)	42
Open at 60 °C [I _{th} =I _e] (A)	40
Enclosed [I _{th}] (A)	36
Convent. free air thermal cur. 1 pole Open [I _{th}] (A)	100
Convent. free air thermal cur. 1 pole Enclosed [I _{th}] (A)	90
AC-3	-
AC-3 Rated operational current	-
AC-3 Open, 3-pole: 50 – 60 Hz 220 V 230 V [I _e] (A)	32
AC-3 Open, 3-pole: 50 – 60 Hz 240 V [I _e] (A)	32
AC-3 Open, 3-pole: 50 – 60 Hz 380 V 400 V [I _e] (A)	32
AC-3 Open, 3-pole: 50 – 60 Hz 415 V [I _e] (A)	32
AC-3 Open, 3-pole: 50 – 60 Hz 440 V [I _e] (A)	32
AC-3 Open, 3-pole: 50 – 60 Hz 500 V [I _e] (A)	32
AC-3 Open, 3-pole: 50 – 60 Hz 660 V 690 V [I _e] (A)	18
AC-3 Motor rating	-
AC-3 220 V 230 V [P] (kW)	10
AC-3 240V [P] (kW)	11
AC-3 380 V 400 V [P] (kW)	15
AC-3 415 V [P] (kW)	19
AC-3 440 V [P] (kW)	20
AC-3 500 V [P] (kW)	23
AC-3 660 V 690 V [P] (kW)	17
AC-4	-
AC-4 Rated operational current	-
AC-4 Open, 3-pole, 50 – 60 Hz 220 V 230 V [I _e] (A)	15
AC-4 Open, 3-pole, 50 – 60 Hz 240 V [I _e] (A)	15
AC-4 Open, 3-pole, 50 – 60 Hz 380 V 400 V [I _e] (A)	15
AC-4 Open, 3-pole, 50 – 60 Hz 415 V [I _e] (A)	15
AC-4 Open, 3-pole, 50 – 60 Hz 440 V [I _e] (A)	15
AC-4 Open, 3-pole, 50 – 60 Hz 500 V [I _e] (A)	15
AC-4 Open, 3-pole, 50 – 60 Hz 660 V 690 V [I _e] (A)	12
AC-4 Motor rating	-
AC-4 220 V 230 V [P] (kW)	4
AC-4 240 V [P] (kW)	4,5
AC-4 380 V 400 V [P] (kW)	7
AC-4 415 V [P] (kW)	7,5

Technical Data - continued

AC-4 440 V [P] (kW)	8
AC-4 500 V [P] (kW)	9
AC-4 660 V 690 V [P] (kW)	10
DC-1	-
DC-1 Rated operational current	-
DC-1 Open	-
60 V [Ie] (A)	40
110 V [Ie] (A)	40
220 V [Ie] (A)	40
Current heat loss	-
3-polig, bei Ith [60°] (W)	10,3
Bei Ie nach AC-3/400 V (W)	6,6
Impedance per pole (mΩ)	2,7
Magnet systems	-
Voltage tolerance DC operated [Pick-up] (x Uc)	0,7 - 1,2
DC operated [Pick-up] Note	RDC 24 (Umin 24 V DC/Umax 27 V DC) Example: US = 0.7 x Umin - 1.2 x Umax / US = 0.7 x 24V - 1.2 x 27V DC
Voltage tolerance DC operated [Drop-out] (x Uc)	0,15
DC operated [Drop-out] Note	At least smoothed two-phase bridge rectifier or three-phase rectifier
Power consumption	-
of the coil in a cold state and 1.0 x Us	-
DC operated [Pick-up] (W)	12
DC operated [Sealing] (W)	0,90
Duty factor (% DF)	100
Changeover time at 100 % Us (Recommended value)	-
Main contacts	-
DC operated closing delay (ms)	47
DC operated opening delay (ms)	30
Arcing time (ms)	10
EMC Emitted interference	according to EN 60947-1
EMC Interference immunity	according to EN 60947-1
Rating data for approved types	-
Rated breaking capacity (kA)	-
Maximum motor rating Three-phase	-
Three-phase 200 V 208 V (HP)	10
Three-phase 230 V 240 V (HP)	10
Three-phase 460 V 480 V (HP)	20
Three-phase 575 V 600 V (HP)	25
Maximum motor rating Single-phase	-
Single-phase 115 V 120 V (HP)	2
Single-phase 230 V 240 V (HP)	5
Maximum motor rating General use (A)	40
Auxiliary contacts	-

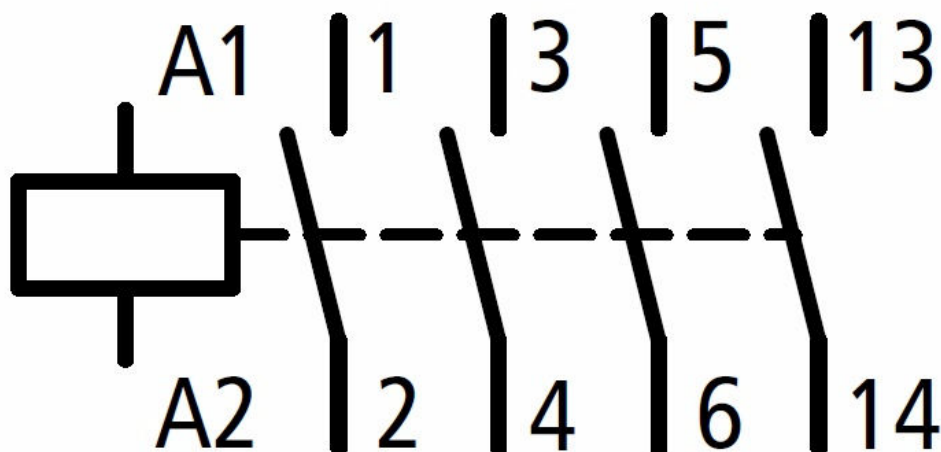
Technical Data - continued

Pilot Duty AC operated	A600
Pilot Duty DC operated	P300
General Use AC (V)	600
General Use AC (A)	10
General Use DC (V)	250
General Use DC (A)	1
Short Circuit Current Rating	-
Basic Rating SCCR (kA)	5
Basic Rating max. Fuse (A)	125
Basic Rating max. CB (A)	125
480 V High Fault SCCR (fuse) (kA)	10/100
480 V High Fault max. Fuse (A)	125/70 Class J
480 V High Fault SCCR (CB) (kA)	10/65
480 V High Fault max. CB (A)	50/32
600 V High Fault SCCR (fuse) (kA)	10/100
600 V High Fault max. Fuse (A)	125/125 Class J
600 V High Fault SCCR (CB) (kA)	10/22
600 V High Fault max. CB (A)	50/32
Special Purpose Ratings	-
Elec. Discharge Lamps (Ballast) 480V 60Hz 3phase (A)	40
Elec. Discharge Lamps (Ballast) 277V 60Hz 1phase (A)	40
Elec. Discharge Lamps (Ballast) 600V 60Hz 3phase (A)	40
Elec. Discharge Lamps (Ballast) 347V 60Hz 1phase (A)	40
Incandescent Lamps (Tungsten) 480V 60Hz 3phase (A)	40
Incandescent Lamps (Tungsten) 277V 60Hz 1phase (A)	40
Incandescent Lamps (Tungsten) 600V 60Hz 3phase (A)	40
Incandescent Lamps (Tungsten) 347V 60Hz 1phase (A)	40
Resistance Air Heating 480V 60Hz 3phase (A)	40
Resistance Air Heating 277V 60Hz 1phase (A)	40
Resistance Air Heating 600V 60Hz 3phase (A)	40
Resistance Air Heating 347V 60Hz 1phase (A)	40
Refrig. Control (CSA only) LRA 480V 60Hz 3phase (A)	240
Refrig. Control (CSA only) FLA 480V 60Hz 3phase (A)	40
Refrig. Control (CSA only) LRA 600V 60Hz 3phase (A)	180
Refrig. Control (CSA only) FLA 600V 60Hz 3phase (A)	30
Def. Purpose Ratings(100,000 cycles acc.to UL1995)	-
LRA 480V 60Hz 3phase (A)	192
FLA 480V 60Hz 3phase (A)	32
Elevator Control 200V 60Hz 3phase (HP)	7,50
Elevator Control 200V 60Hz 3phase (A)	25,30
Elevator Control 240V 60Hz 3phase (HP)	7,50
Elevator Control 240V 60Hz 3phase (A)	22
Elevator Control 480V 60Hz 3phase (HP)	20

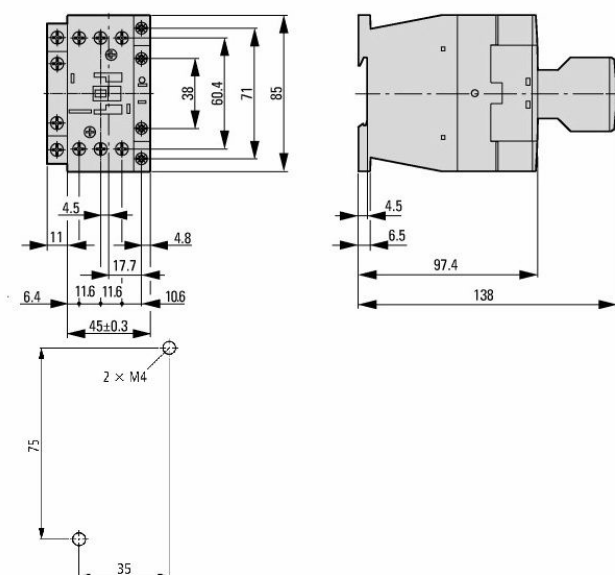
Technical Data - continued

Elevator Control 480V 60Hz 3phase (A)	27
Elevator Control 600V 60Hz 3phase (HP)	20
Elevator Control 600V 60Hz 3phase (A)	22

Circuit diagram: Contactor 15kW/400V, 1 NO, coil 24VDC



Dimensioned drawing: Contactor 15kW/400V, 1 NO, coil 24VDC



Dimensioned drawing: Contactor 15kW/400V, 1 NO, coil 24VDC

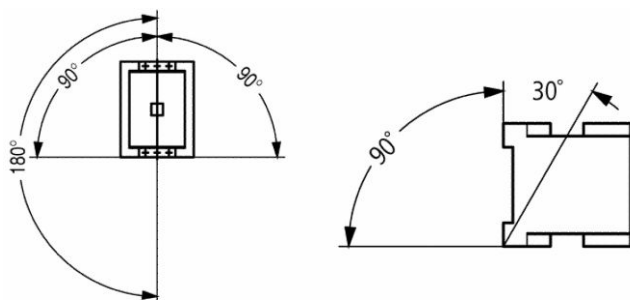


Diagram: Contactor 15kW/400V, 1 NO, coil 24VDC

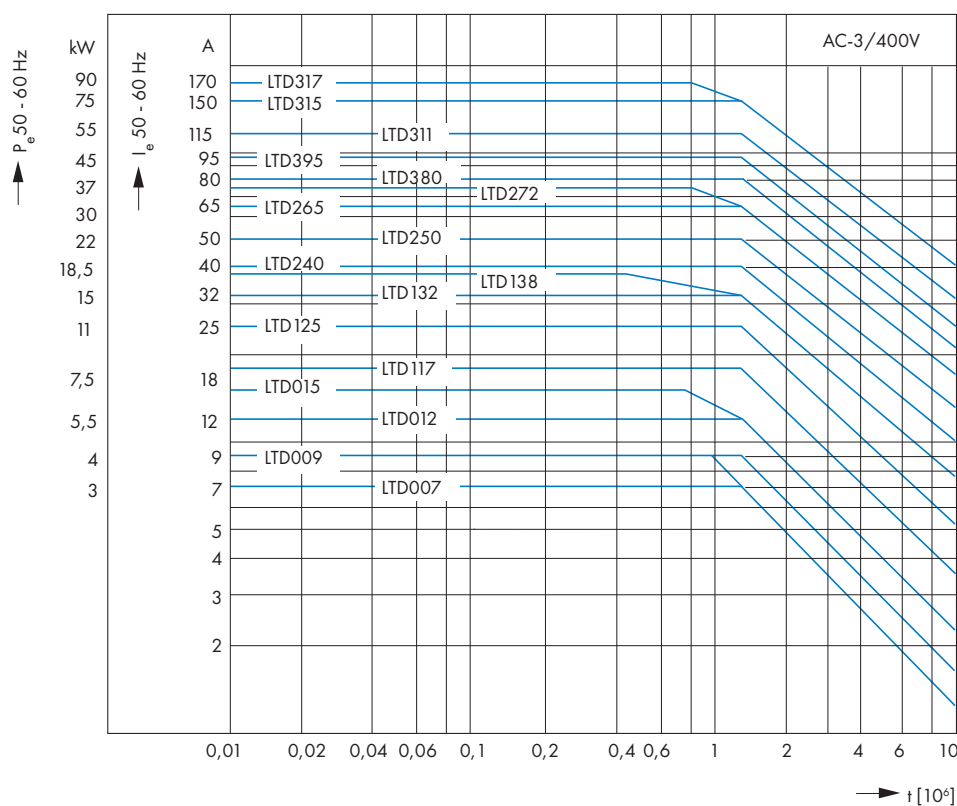


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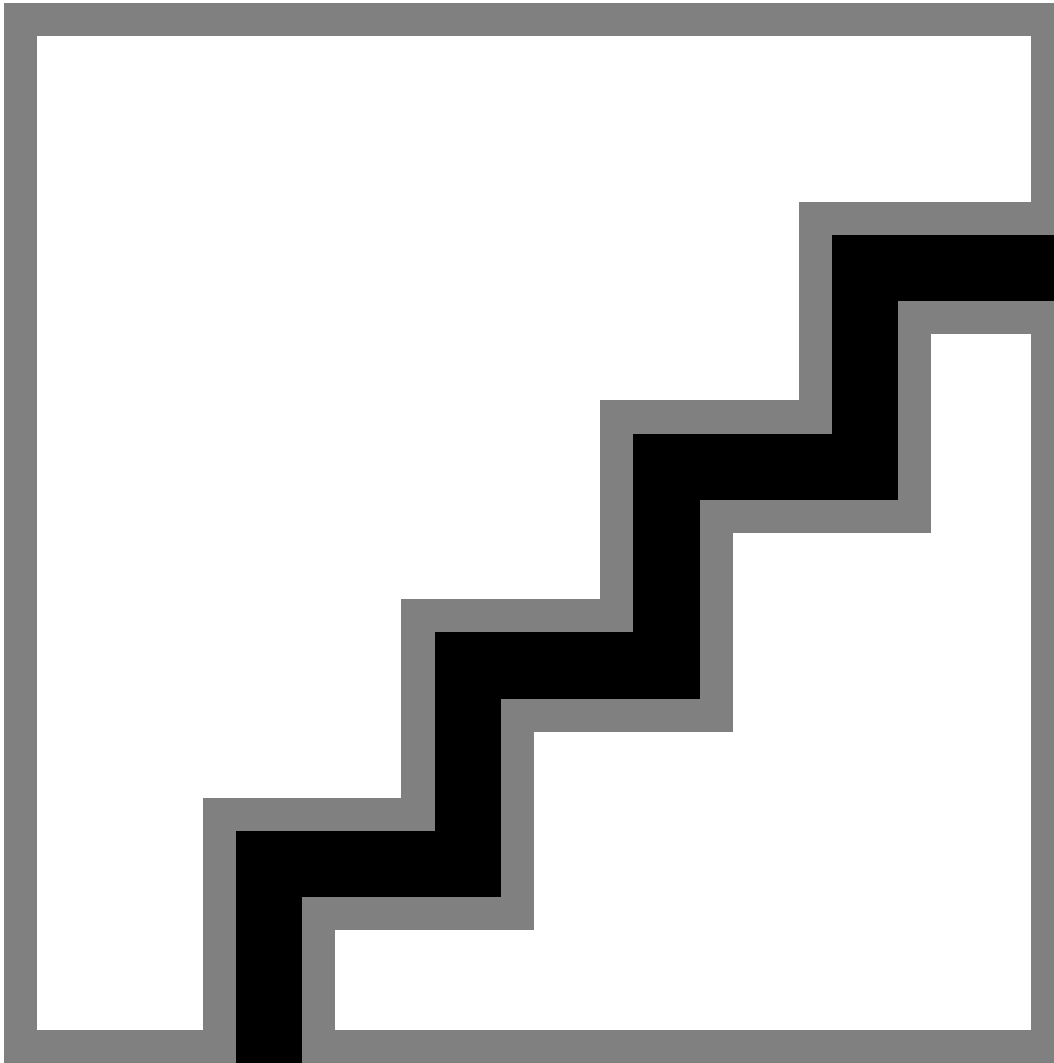
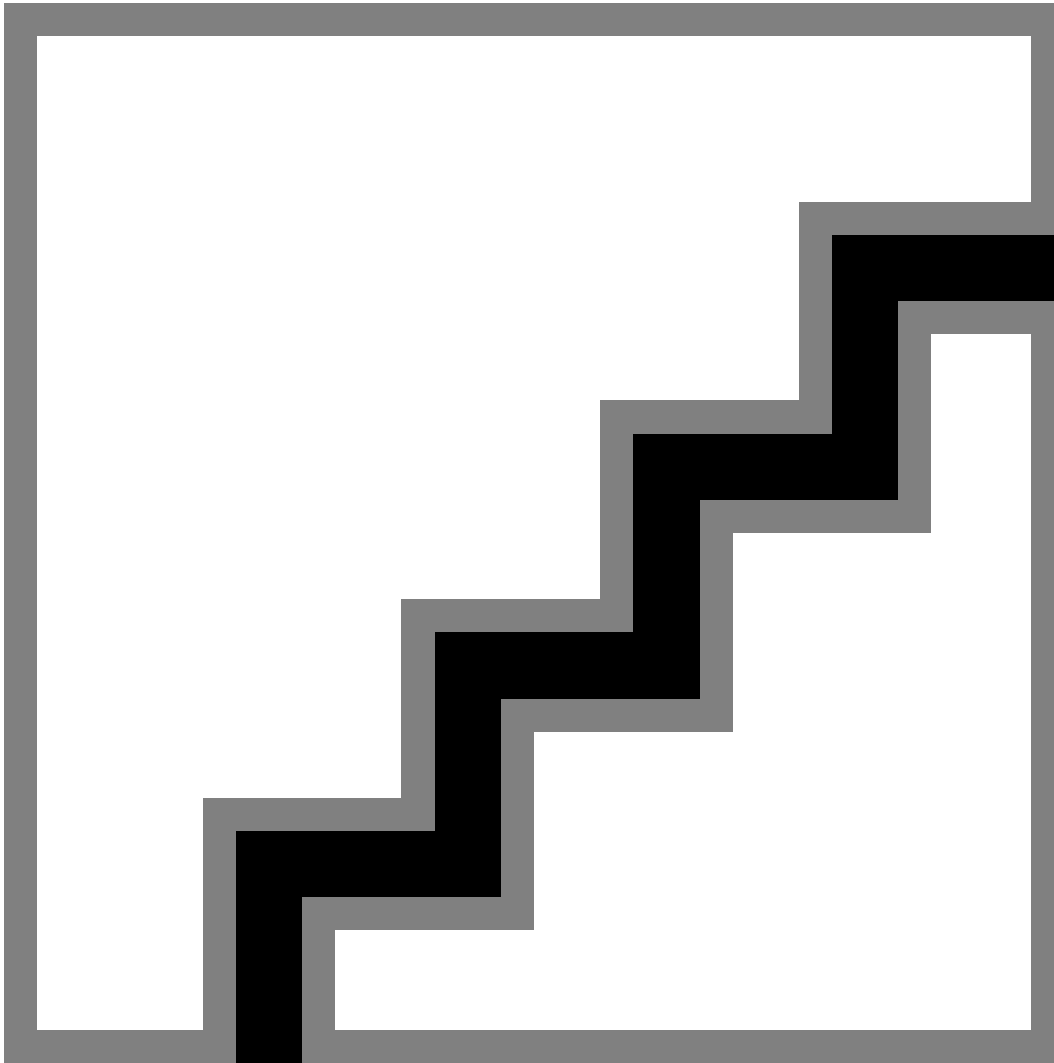


Diagram: Contactor 15kW/400V, 1 NO, coil 24VDC



Article Table

DESCRIPTION	Order No.
Contactator 15kW/400V, 1 NO, coil 24VDC Size 1	LTD13215
Optional Accessories	
RC-suppressor for contactors size 0, 110-240VAC Size 0	LTZ00001
Connector for contactors BG0 and MSS BE5 Size 0	LTZ00005
Varistor-suppressor for contactors size 0, 24-48VAC Size 0	LTZ00002
Varistor-suppressor for contactors size 0, 130-240VAC Size 0	LTZ00004
Mechanical interlock for contactors size 1 Size 1	LTZ1W001
Reversing wiring set for contactors size 1 Size 1	LTZ1W002
Connector for contactors size 0-2 Size 1	LTZ10005
Auxiliary contact for contactor size 0-1, 1 NO 1 NC Size 0	LTZ0D311
Auxiliary contact for contactor size 0-1, 2 NC Size 0	LTZ0D302
Auxiliary contact for contactor size 0-1, 2 NO 2 NC Size 0	LTZ0D222
Auxiliary contact for contactor size 0-1, 3 NO 1 NC Size 0	LTZ0D231
Connector for contactors size 1 and MSS BE5 Size 1	LTZ10006
RC-suppressor for contactors size 1, 110-240VAC Size 1	LTZ10001
Varistor-suppressor for contactors size 1, 130-240VAC Size 1	LTZ10004
	LTZ100033
Varistor-suppressor for contactors size 1, 24-48VAC Size 1	LTZ10002