

AC Components

MCB/MCCB/SPD/Fuse/RCBO/LW/ATS/OUA



Lifetime
Technical Support



Short-circuit protection,
overload protection,
isolation circuit,
Smart Protection



Durable and sturdy
UL94 V-0
flame retardant,
corrosion resistant



OEM/ODM Free
Customization
for DC/AC Products



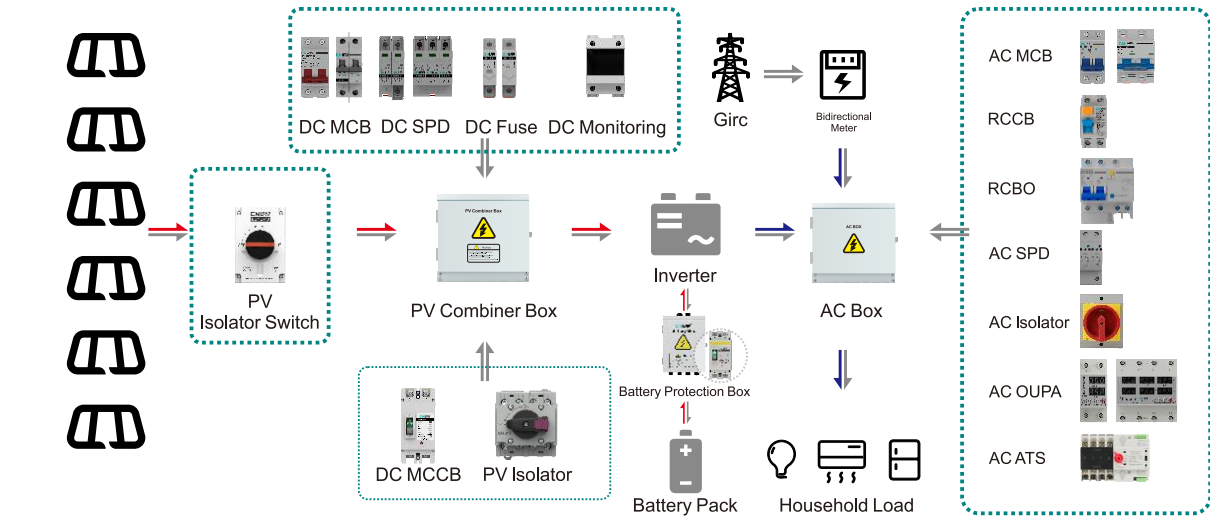
E-mail:sales@cnlonq.com

Company Profile

Wenzhou Longqi New Energy Co., Ltd. (Brand: CNLONQ)

Founded In 2010 And Headquartered In Yueqing, Wenzhou—China'S Electrical Capital—Wenzhou Longqi New Energy Co., Ltd. Is A Leading Innovator In Photovoltaic System Components And Electrical Protection Equipment. We Specialize In Designing, Manufacturing, And Globally Distributing High-Performance Products Essential For Efficient, Safe Solar Power Generation Systems.

The Company'S Main Factory Covers **10,000m²** With An Additional **2,500m²** Of Warehouse Space. We Support Oem/Odm And Custom Junction Box Solutions, Holding Over **100 Project Certifications And Patents With A Team Of More Than 50 Technical Personnel**. Driven By Innovation And Stringent Quality Control, We Welcome Your Partnership In Building A Cleaner Energy Future Together.



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LQB1-63C



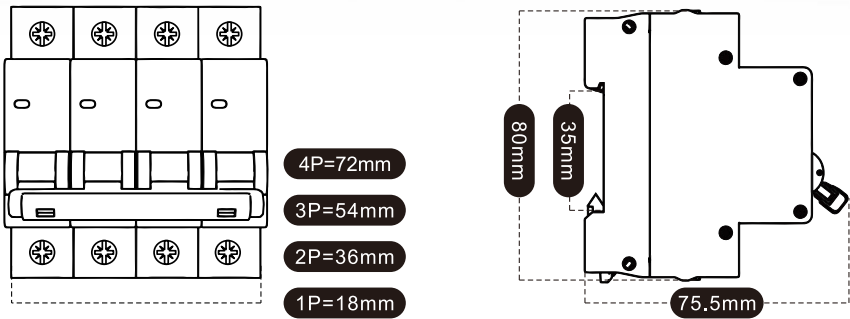
Miniature Circuit Breaker(MCB)

AC 230/400V 6~63A



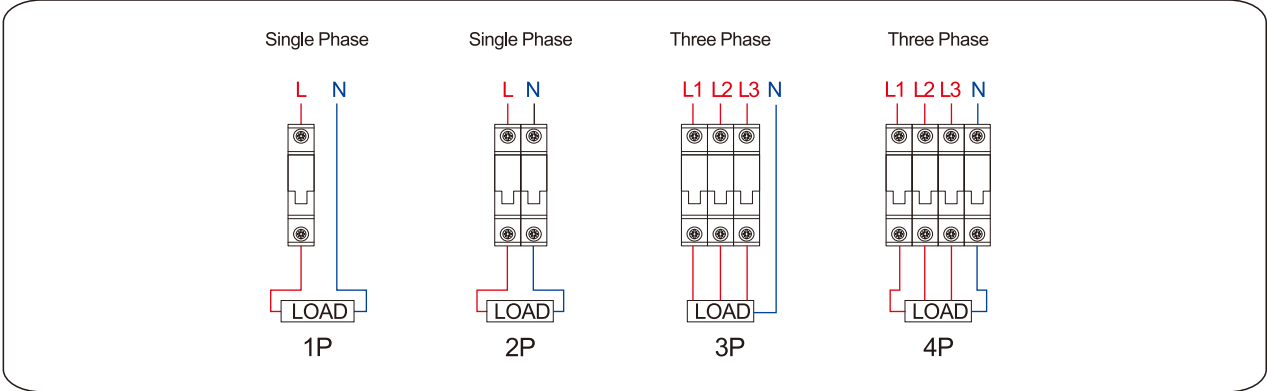
- Overload Protection
- Short-Circuit Protection
- Flame-Retardant Material
- Customizable logo And Other Parameters

Product Dimension Drawing (mm)



Technical data	
Model	LQB1-63C
Feature	Short-circuit protection, overload protection
Pole	1P/2P/3P/4P
Rated Working Voltage Ue (V)	230 V~ (1P, 2P) / 400 V~ (3P, 4P)
Frame degree rated current (A)	63
Rated current In(A)	6/10/16/20/25/32/40/50/63
Rated Frequency (Hz)	50/60
Rated Insulation Voltage Ui (V)	690 V
Rated Impulse Withstand Uimp(kV)	4
Trip Characteristics	B, C, D
Rated Short-circuit Breaking Capacity (Icn)	4.5 kA (for 50A,63A, type D), 6 kA (for 1~40A, type B/C)
Standard	IEC 60898-1
Levels of Protection	IP20
Quality Certificate	CE,ISO9001,IEC
Mechanical life (Maxtimes)	10000
Electrical life (Maxtimes)	4000
Operating Temperature	-20°C to +70°C
Humidity	≤95%
Altitude	2000m
Installation	35mm DIN Rail
Wiring capacity (mm²)	In ≤ 32A, 1~25mm², In ≥ 40A, 10~35mm²
Product Size L*W*H(mm)	75.5*18*80/75.5*36*80/75.5*54*80/75.5*72*80

Wiring diagrams



LQB1-125C



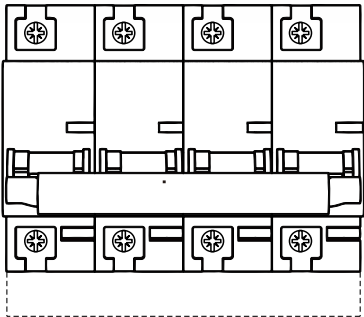
Miniature Circuit Breaker(MCB)

AC 230/400V 80~125A

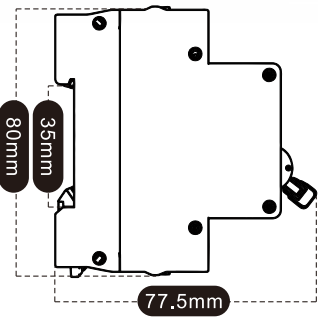


- Overload Protection
- Short-Circuit Protection
- Flame-Retardant Material
- Customizable logo And Other Parameters

Product Dimension Drawing (mm)



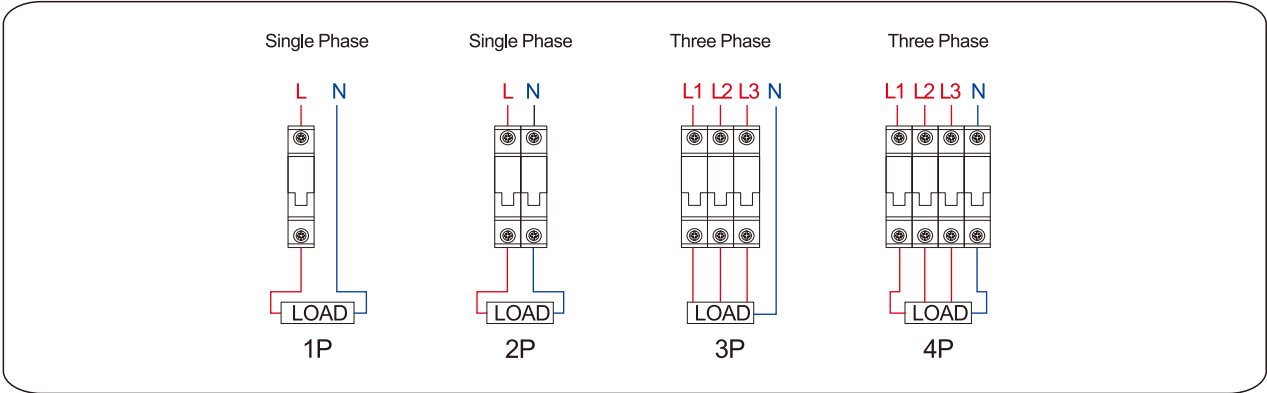
- 4P=108mm
- 3P=81mm
- 2P=54mm
- 1P=27mm



Technical data	
Model	LQB1-125C
Feature	Short-circuit protection, overload protection
Pole	1P/2P/3P/4P
Rated Working Voltage Ue (V)	230 V~ (1P, 2P) / 400 V~ (3P, 4P)
Frame degree rated current (A)	125
Rated current In(A)	80/100/125
Rated Frequency (Hz)	50/60
Rated Insulation Voltage Ui (V)	690 V
Rated Impulse Withstand Uimp(kV)	4
Trip Characteristics	B, C, D
Rated Short-circuit Breaking Capacity (Icn)	6kA
Standard	IEC 60898-1
Levels of Protection	IP20
Quality Certificate	CE,ISO9001,IEC
Mechanical life (Maxtimes)	10000
Electrical life (Maxtimes)	4000
Operating Temperature	-20°C to +70°C
Humidity	≤95%
Altitude	2000m
Installation	35mm DIN Rail
Wiring capacity (mm²)	In ≤ 32A, 1~25mm², In ≥ 40A, 10~35mm²
Product Size L*W*H(mm)	81*27*77.5/81*54*77.5/81*81*77.5/81*108*77.5

Wiring diagrams

— L — N



LQM1-125C

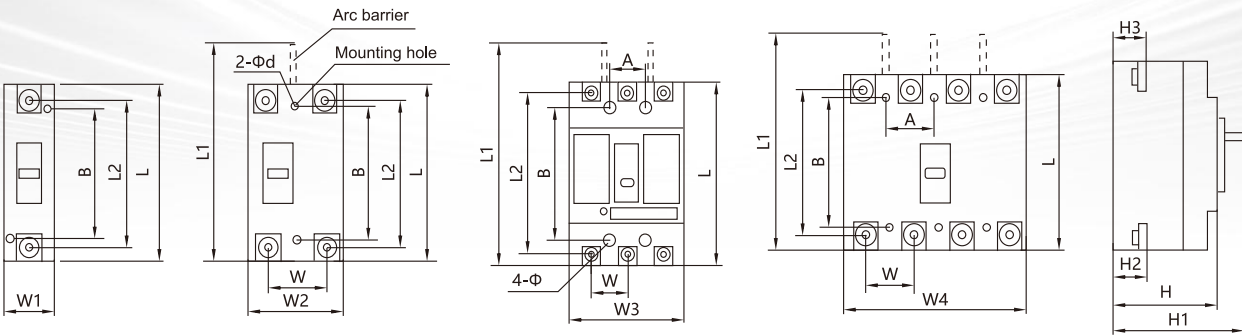


Moulded Case Circuit Breaker(MCCB) AC 230/400V 63~125A



- Completely disconnect
The Circuit
- Overload
Protection
- Short-Circuit
Protection
- Flame-Retardant
Material

Product Dimension Drawing (mm)

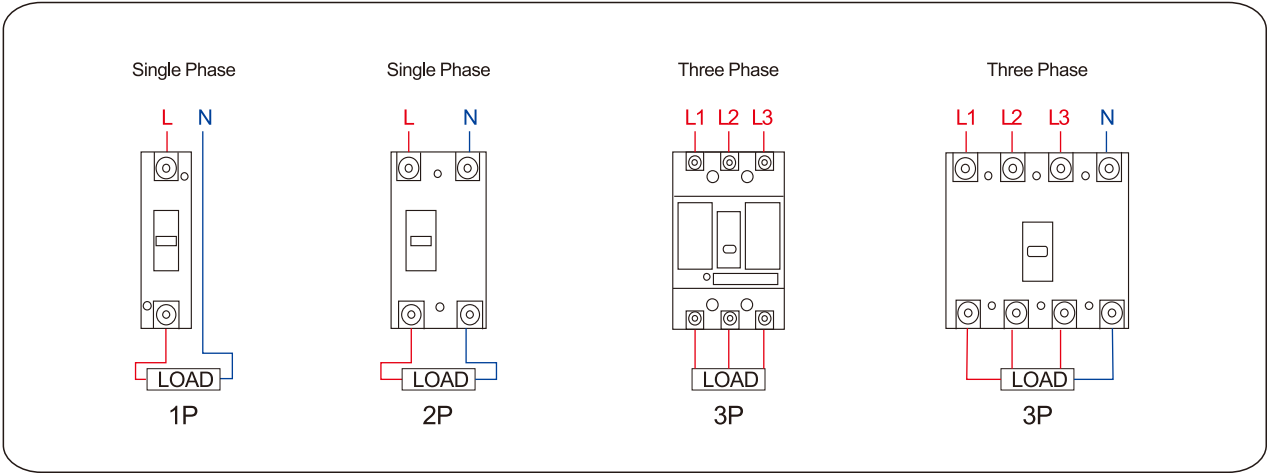


Model	External Dimensions(mm)													Installation Dimensions (mm)		
	Front panel connections															
	W1	W2	W3	W4	W5	L	H	W	L1	H1	H2	H3	L2	A	B	Φd
LQM1-125	38	65	92	120	23	150	86	30	200	104	24	24	132	30	129	4.5

Technical data				
Model	LQM1-125C			
Feature	Short-circuit protection, overload protection, Circuit isolation			
Pole	1P	2P	3P	4P
Rated voltage Ue (DC V)	DC 250/500/750/1000			
Rated voltage Ue (AC V)	12~690			
Rated Insulation Voltage Ui (V)	1600			
Rated Current In (A)	63/80/100/125			
Frame Degree Rated Current (A)	125			
Rated Frequency (Hz)	50/60			
Rated Impulse Withstand Voltage Uimp (kV)	8			
Breaking Capacity Icu (kA)	20			
Operating BreakingCapacity Ics (kA)	15			
Trip Type	Thermal-magnetic			
Standard	IEC60947-2/GB14048.2			
Mechanical Life (times)	20000			
Electrical Life (times)	3000			
Housing Material	Bakelite			
Conductor Material	Copper			
Quality Certificate	CE ISO9001 ROHS			
Operating Temperature	-35°C to +70°C			
Humidity	≤95%			
Altitude	≤2000m			
Installation	Fixed,plug			
Accessory Function	alarm contacts, shunt release, undervoltage release			
Product Size L*W*H mm	150*38*88	150*65*88	150*91*88	150*121*88

Wiring diagrams

— L — N



LQB1-ID

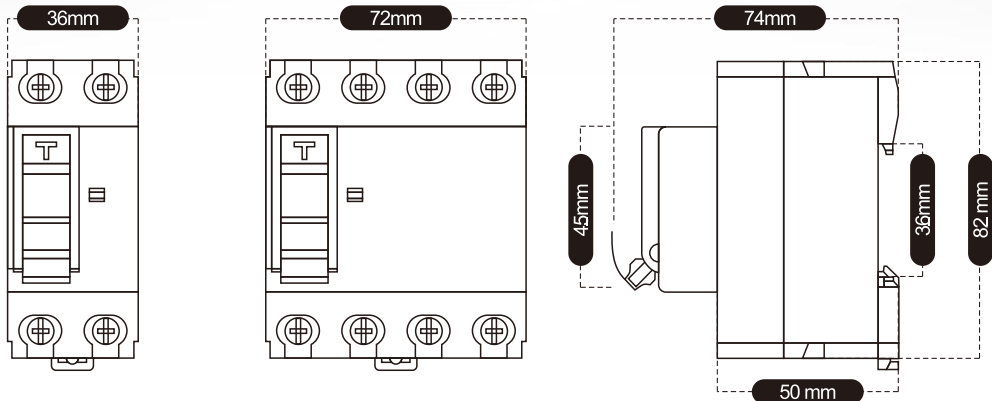


Residual Current Circuit Breaker(RCCB) AC 230/240V 400/415V 16-125A



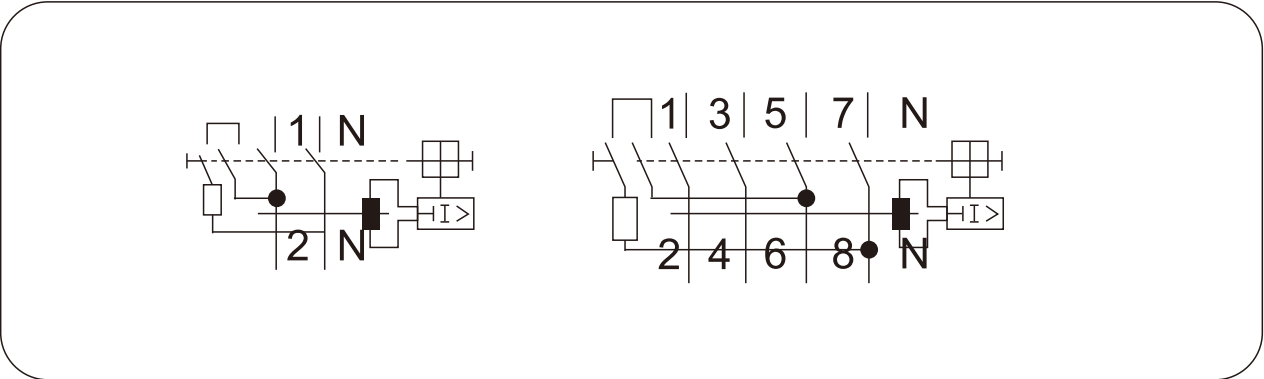
-  Earth Leakage Protection
-  Completely Disconnect The Circuit
-  Flame-Retardant Material
-  Customizable logo And Other Parameters

Product Dimension Drawing (mm)



Technical data	
Model	LQB1-ID
Feature	Ground fault protection
Rated Current(In)	16A,20A,25A,32A,40A,63A,80A,100A,125A
Number Of Pole	1P+N (2P),3P+N(4P)
Rated Residual Currents(IΔn)	30mA,100mA,300mA
Sensitivity To Residual Current	AC, A, S
Rated Short Circuit Lcn(Ka)	6kA
Rated Working Voltage(Ue)	230V/240V AC, 400V/415V AC
Rated Frequency	50/60Hz
Rated insulated Voltage(Ui)	500VAC
Rated Impulse Withstand Voltage(Uimp)	6kV
Electrical Life(t)	4000
Mechanical Life(t)	10000
Back-up fuse for overload	In=16A-40A 25A gG, In=63A 40A gG
Back-up fuse for short circuit	In=16A-40A 63A gG, In=63A 63A gG
Protection Degree	IP20
Terminal Tightening Torque(N.M)	2-2.5
Wiring Termination	35mm²
Ambient Temperature(°C)	-25~+55,max.95 % humidity
Altitude Apove Sea	≤2000
Conformed Standards	IEC/EN 61008-1

WIRING DIAGRAM



LQB1LE-63

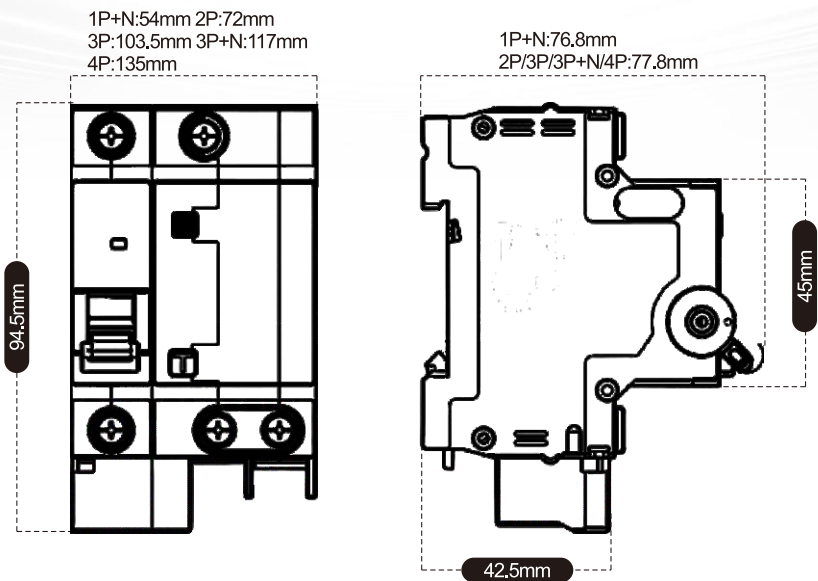


Residual Current Breaker Operator(RCBO) AC 230/400V 6-63A



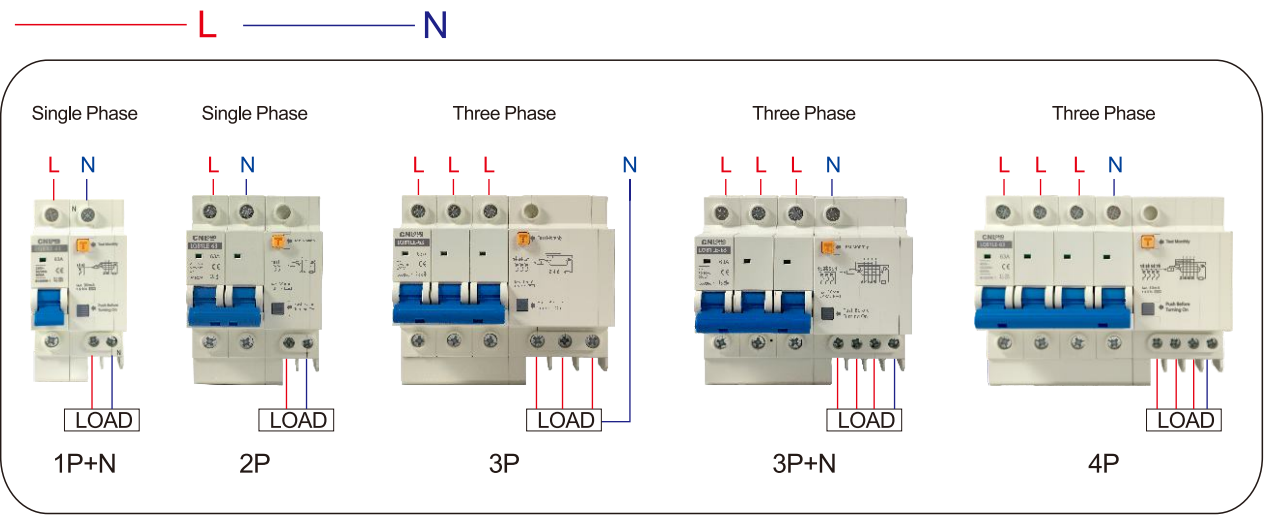
- Earth Leakage Protection
- Short-circuit protection, overload protection,, Isolation circuit
- Flame-Retardant Material
- Customizable logo And Other Parameters

Product Dimension Drawing (mm)



Technical data	
Model	LQB1LE-63
Feature	Short-circuit, overload, ground fault protection
Rated Current(In)	6A, 10A, 16A, 20A, 25A, 32A, 40A, 50A, 63A
Pole	1P+N, 2P, 3P, 3P+N, 4P
Rated residual operating current (IΔn)	0.01A(1P+N,2P), 0.03A, 0.05A, 0.075A, 0.1A, 0.3A(AC model); 0.03A□0.1A□0.3A(A model)
Rated operating voltage(Ue)	230 V~ (1P+N, 2P), 400 V~ (3P, 3P+N, 4P)
Rated insulation voltage(Ui)	500 V
Rated Frequency	50/60Hz
nstantaneous trip characteristics	B,C,D
Overvoltage protection range	280±14 V(no A model)
Mechanical life	20000
Electrical life	10000
Breaking capacity(Icn/Ics)	6000/6000
Rated impulse withstand voltage (Uimp)	4kV
Rated residual making and breaking capacity (IΔm)	630A
Installation Method	35mm DIN Rail
Operating Environment	-25~+70,max.95 % humidity
Altitude Apove Sea	≤2000
Standards	IEC/EN 61009-1
Size (mm)	94.5*54*76.8(1P+N), 94.5*72*77.8(2P), 94.5*103.5*77.8(3P) 94.5*117*77.8(3P+N),94.5*135*77.8(4P)

WIRING DIAGRAM



AVP-40/63/80



Adjustable Overvoltage and Undervoltage Current Protector(OUPA) AC80-300V 1~80A



Overvoltage
protection;



Undervoltage
protection;

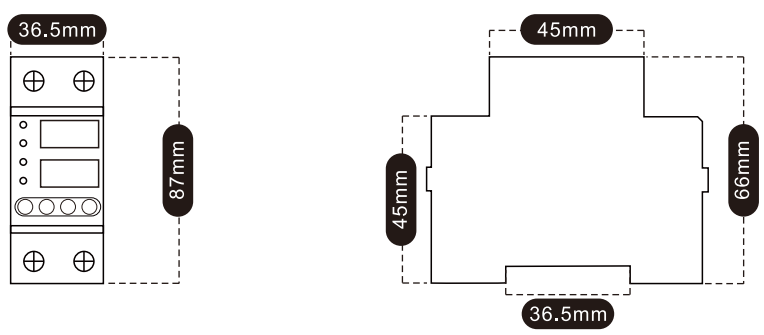


Overcurrent
protection.



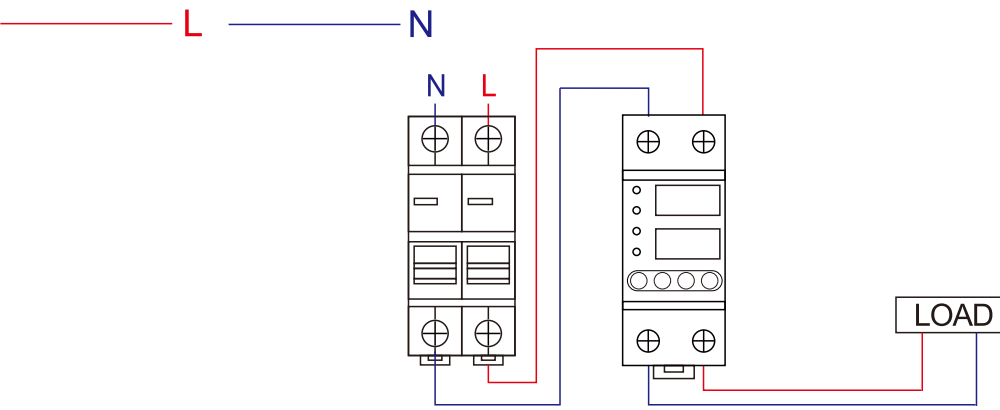
Working under
voltmeter mode;

Product Dimension Drawing (mm)



Technical data	
Model	AVP-40, AVP-63, AVP-80
Feature	Overvoltage, undervoltage, and overcurrent protection
Supply terminals	N,L
Rated supply voltage	AC80-300V
Rated frequency	50/60Hz
>U setting range	130-300V
<U setting range	80-210V
>A setting range	1~40A/1~63A/1~80A
Voltage hysteresis	5V
Overvoltage trip delay	0.5s
Voltage accuracy	<1%
Max. operating phase voltage	350V
Max. operating current	40A/63A/80A
Altitude	≤2000m
Ambient temperature	-25°C~+50°C
Permissible relative humidity	<50% at 40°C (without condensation)
Storage temperature	-25°C~+55°C
Net weight	146g
Size	87*36*66mm

Wiring diagrams



AVP-63/100/4P



Adjustable Overvoltage and Undervoltage Current Protector(OUPA) AC80-300V 1~100A



Overvoltage
protection;



Undervoltage
protection;

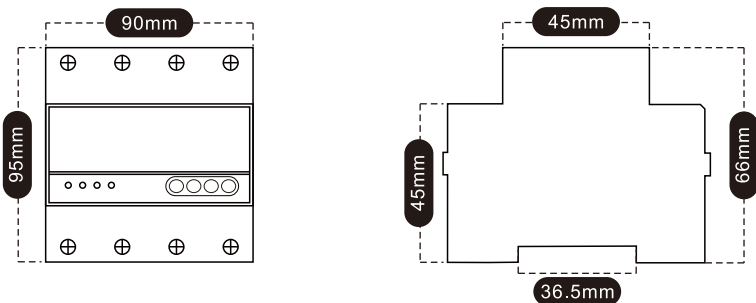


Overcurrent
protection.



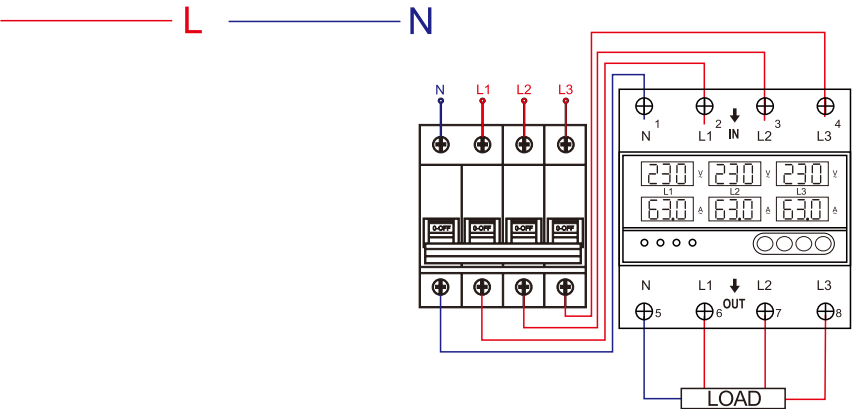
Working under
voltmeter mode;

Product Dimension Drawing (mm)



Technical data	
Model	AVP-63, AVP-100
Feature	Overvoltage, undervoltage, and overcurrent protection
Supply terminals	N,L1,L2,L3
Rated voltage (per phase)	AC80-300V
Rated frequency	50/60Hz
>U setting range	130-300V
<U setting range	80-210V
>A setting range	1~63A/1~100A
Voltage hysteresis	5V
Overvoltage trip delay	0.5s
Voltage accuracy	<1%
Max. operating phase voltage	350V
Max. operating current	63A/80A
Altitude	≤2000m
Ambient temperature	-25°C~+50°C
Permissible relative humidity	<50% at 40°C (without condensation)
Storage temperature	-25°C~+55°C
Net weight	340g
Size	95*90*66mm

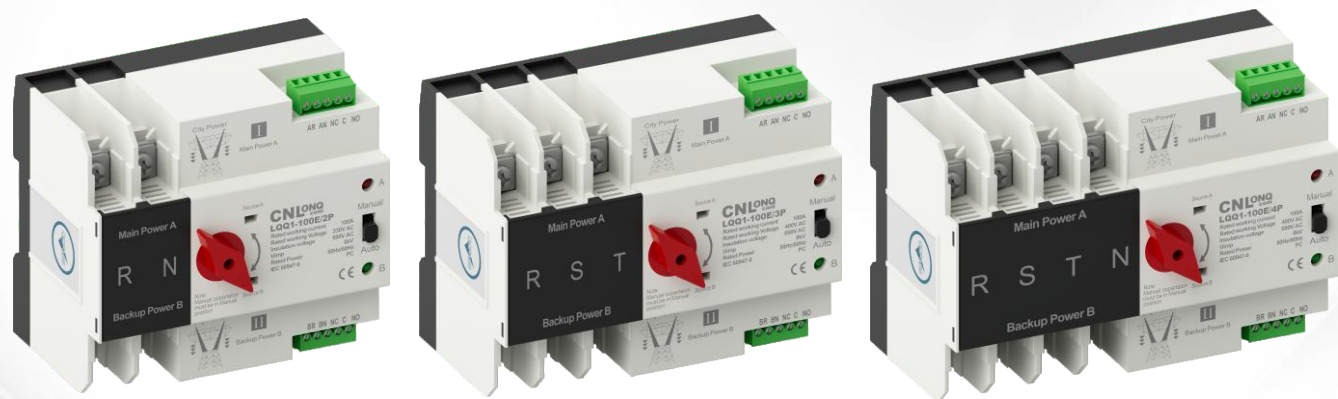
Wiring diagrams



LQQ1-100E(Mains to mains or generator)

Dual Power Automatic Transfer Switch(ATS)

AC120/230/400V 16~100A



Maintain power continuity



Dual Power Supply Automatic Switching

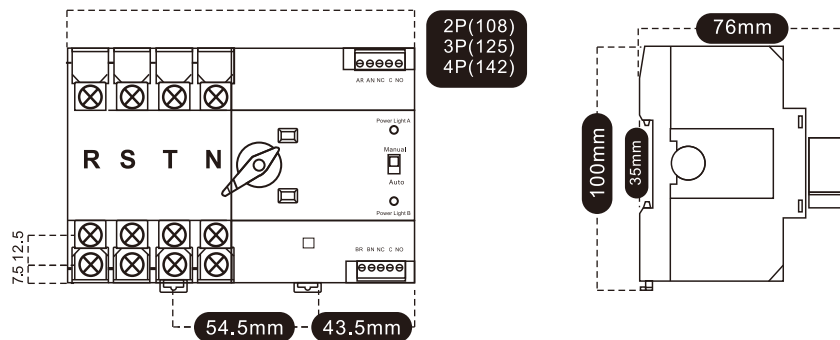


Auto-switching function



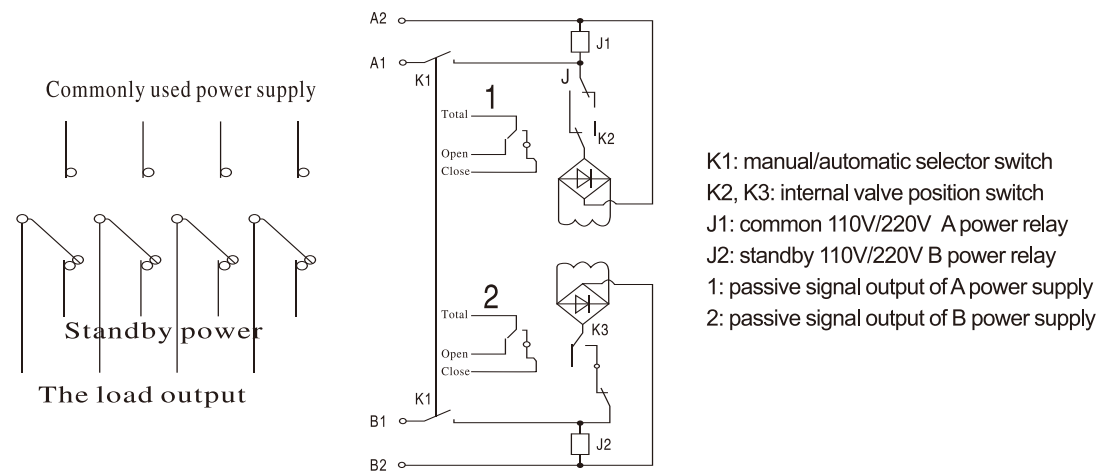
Customizable logo and other parameters

Product Dimension Drawing (mm)



Technical data		
Model	LQQ1-100E	
Feature	Automatic power switching	
Primary and backup power sources	Mains to mains or generator	
Rated current Ie (A)	16, 20, 25, 32, 40, 50, 63, 80, 100	
Insulation voltage Ui	AC690V,50/60Hz	
Rated voltage Ue	AC400V,50/60Hz	
Classification	PC class: can be manufactured and withstood without short-circuit current	
Utilization category	AC-33iB	AC-31B
Pole No.	2P	3P 4P
Electrical	Life: 2000 times; Manual operation: 5000 times	
Rated short circuit current Iq	50kA	
Short circuit protection device (fuse)	RT16-00-63A	
Rated impulse withstand voltage	8kV	
Control circuit	Rated control voltageUs: AC110V/120V, AC220V/240V, 50/60Hz Normal working conditions: 85-110%Us	
Auxiliary circuit	2 relays, each with two sets of contact converter capacity capacity: AC110V/120V, AC220V/240V, 50HZ Ie = 5y	
Conversion time of contactor	<50ms	
Operation concersion time	<50ms	
Returnconversion time	<50ms	
Power off time	<50ms	
Standard	IEC 60947-6	

Internal wiring diagram



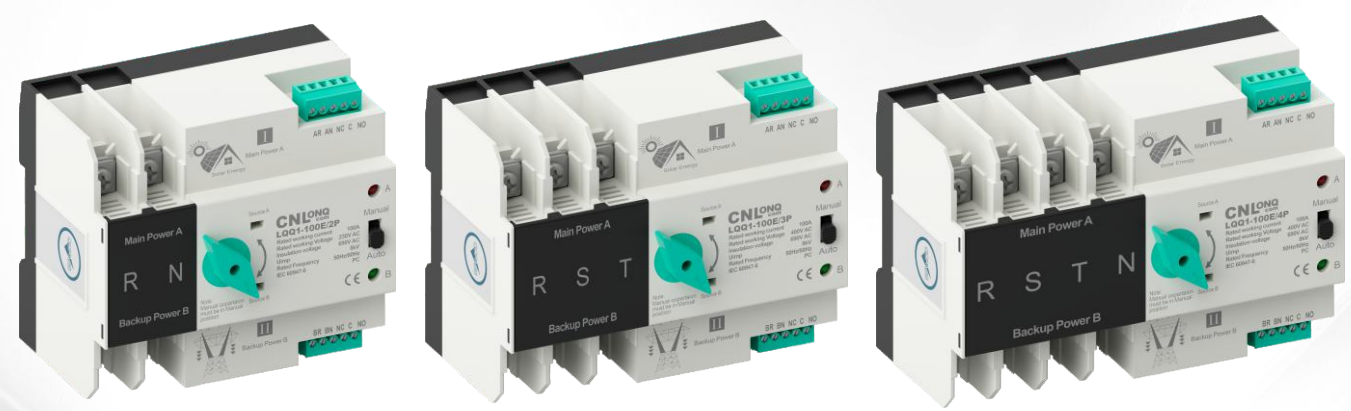
LQQ1-100E(Solar to mains)

CEIEC

CN LONGQ.com

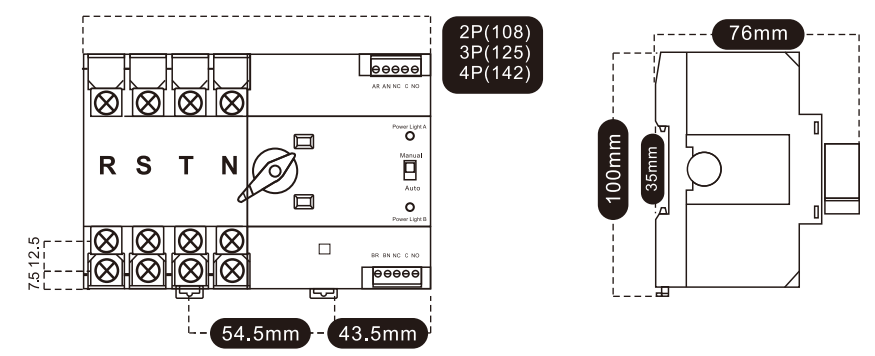
Dual Power Automatic Transfer Switch(ATS)

AC120/230/400V 16~100A



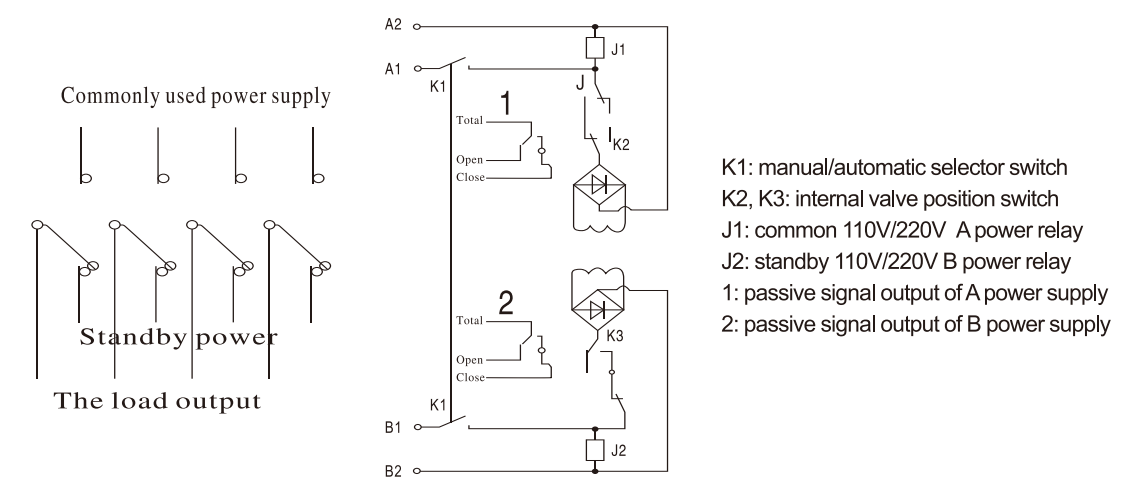
- Maintain power continuity
- Dual Power Supply Automatic Switching
- Auto-switching function
- Customizable logo and other parameters

Product Dimension Drawing (mm)



Technical data		
Model	LQQ1-100E	
Feature	Automatic power switching	
Primary and backup power sources	Solar to mains	
Rated current Ie (A)	16, 20, 25, 32, 40, 50, 63, 80, 100	
Insulation voltage Ui	AC690V,50/60Hz	
Rated voltage Ue	AC400V,50/60Hz	
Classification	PC class: can be manufactured and withstood without short-circuit current	
Utilization category	AC-33iB	AC-31B
Pole No.	2P	3P 4P
Electrical	Life: 2000 times; Manual operation: 5000 times	
Rated short circuit current Iq	50kA	
Short circuit protection device (fuse)	RT16-00-63A	
Rated impulse withstand voltage	8kV	
Control circuit	Rated control voltageUs: AC110V/120V, AC220V/240V, 50/60Hz Normal working conditions: 85-110%Us	
Auxiliary circuit	2 relays, each with two sets of contact converter capacity capacity: AC110V/120V, AC220V/240V, 50HZ Ie = 5y	
Conversion time of contactor	<50ms	
Operation concersion time	<50ms	
Returnconversion time	<50ms	
Power off time	<50ms	
Standard	IEC 60947-6	

Internal wiring diagram



LQQ1(PC-Level)



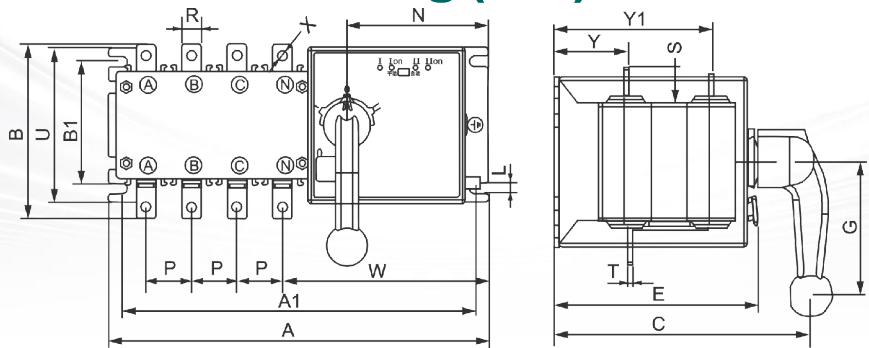
Dual Power Automatic Transfer Switch(ATS)

AC400V 20~1600A



- Maintain power continuity
- Dual Power Supply Automatic Switching
- Auto-switching function
- Customizable logo and other parameters

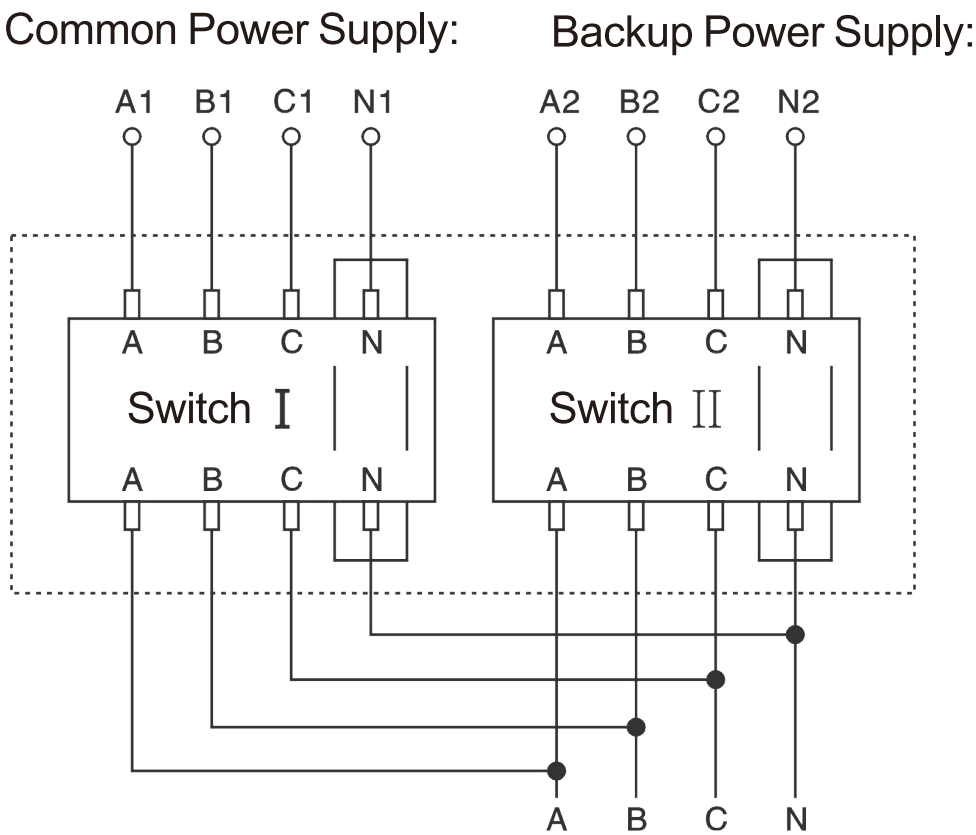
Product Dimension Drawing (mm)



Specifications	Overall Dimensions							Switch Mounting							Terminal Block			
	A	A1	B	B1	C	E	G	L	N	P	R	S	T	U	W	X	Y	Y1
100/4	255	234	115	84	154	122	80	7	85	30	14	18	2.5	102	136	6	45	95
160/4	326	305	140	108	193	150	106	7	102	36	20	25	3	134	176	8	58	119
250/4	386	365	174	108	197	154	106	7	102	50	25	30	3	134	188	10	58	122
400/4	443	420	248	174	272	222	138	9	96	65	32	38	5	199	198	10	78	178
630/4	443	420	268	174	272	222	138	9	96	65	40	38	5	199	198	12	78	178

Technical data																		
Model		LQQ1																
Feature		Automatic power switching																
Rated Current (A)		20	40	63	80	100	125	160	250	400	630	800	1000	1250	1600			
Rated Insulation Voltage Ui (V)		750										1000						
Rated Impulse Withstand Voltage Uimp		8kV										12kV						
Rated Operating Voltage Ue (V)		AC400V																
Rated Operating Current Ie (A)	AC-31A	20	40	63	80	100	125	160	250	400	630	800	1000	1250	1600			
	AC-35A	20	40	63	80	100	125	160	250	400	630	800	1000	1250	1600			
	AC-33A	20	40	63	80	100	125	160	250	400	400	630	800	800	1000			
Rated Making Capacity		10Ie																
Rated Breaking Capacity		8Ie																
Rated Limiting Short-Circuit Current Is		50kA										70kA			100kA		120kA	
Rated Short-Time Withstand Current Is		7kA							9kA			13kA		26kA		50kA		
Conversion Time (I-II or II-I)		0.45s										0.6s		1.2s				
Control Voltage		DC24V, 48V, 110V AC220V																
Rated Power	Start Run	300W							325W		335W		400W		440W			
		55W							62W		74W		90W		98W			
Standard		IEC 60947-6																
Weight (kg)		7.0	7.2	7.2	7.2	7.5	7.5	8.8	9.0	16.5	17	32	36	40	43			

Internal wiring diagram



LQQ3-63



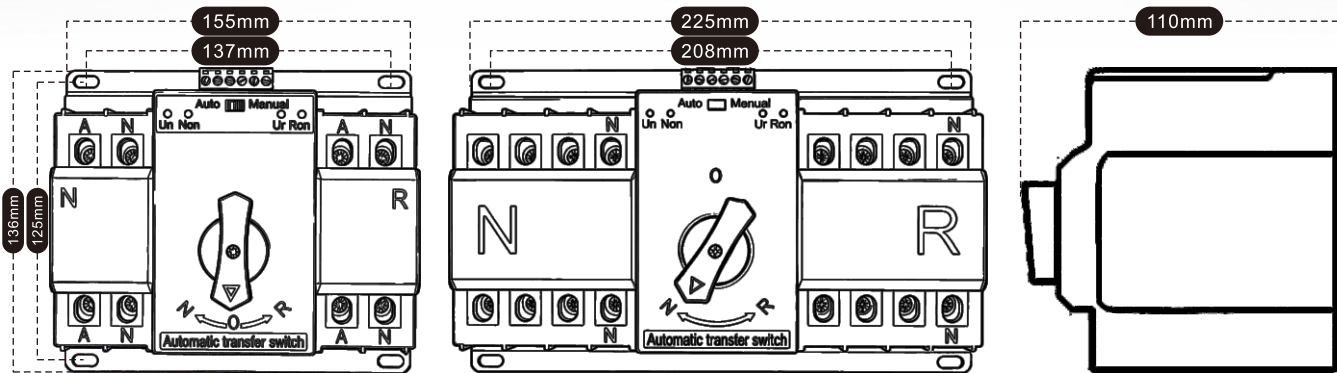
Dual Power Automatic Transfer Switch(ATS)

AC230/400V 63A



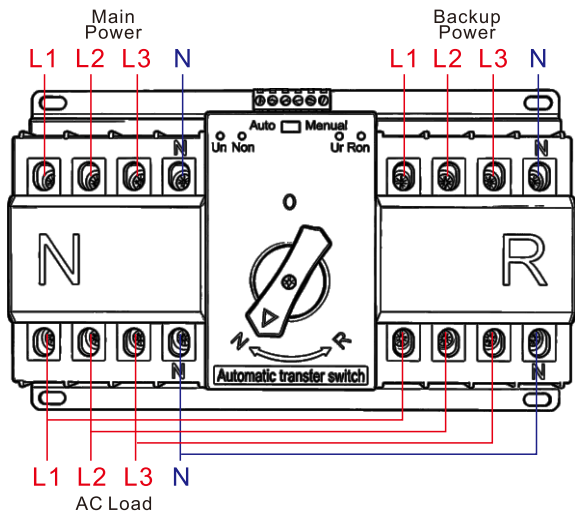
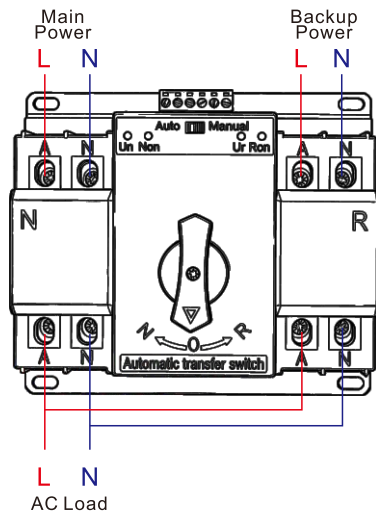
- Maintain power continuity
- Dual Power Supply Automatic Switching
- Auto-switching function
- Customizable logo and other parameters

Product Dimension Drawing (mm)



Technical data	
Model	LQQ3
Feature	Automatic power switching
Frame Rating Current(A)	63
Rated Operating Current In(A)	63
Rated Operating Voltage ue(V)	400
Rated Control Voltage(V)	230
Rated Frequency	50/60Hz
Conversion Action Time	≤2s
Application Category	AC-33iB
Mechanical Life	10,000 times
Electrical Life	2,000 times
Altitude	≤2,000m
Ambient Temperature	-25°C ~ +50°C
Relative Humidity	≤90% at 40°C
Storage Temperature	-35°C ~ +55°C
Standard	IEC60947-6
Dimensions	162×142×123mm

Internal wiring diagram



LQSF-63



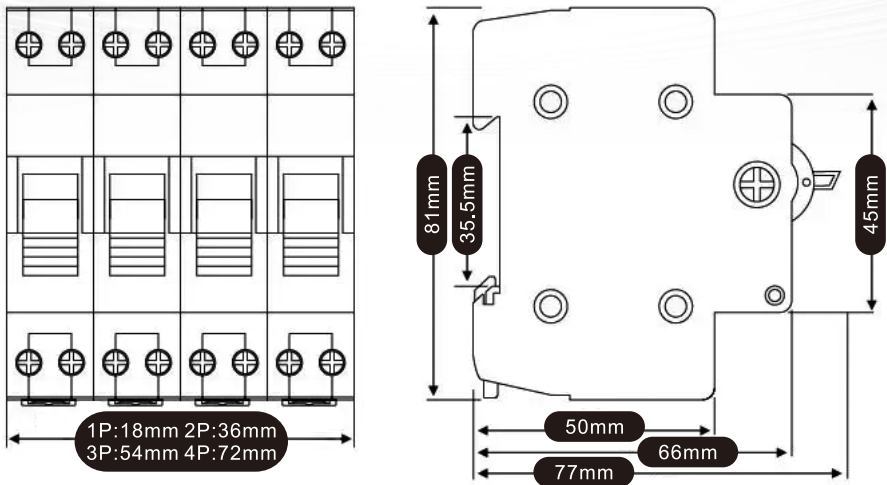
Manual Transfer Switch (MTS)

AC230/400V 16~63A



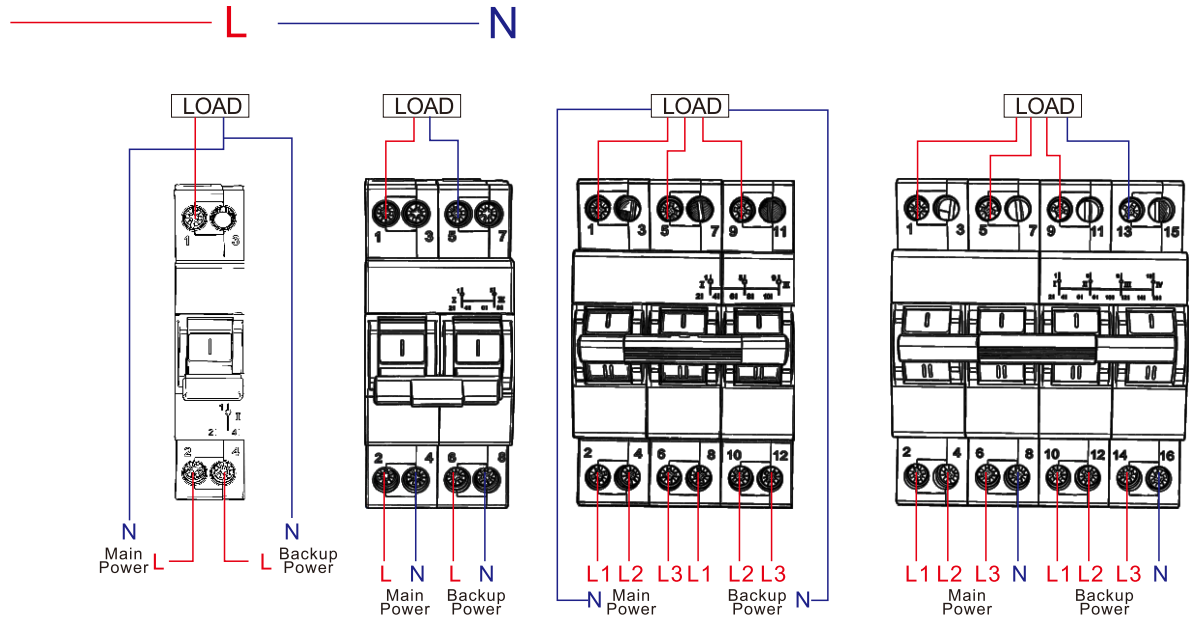
- Maintain power continuity
- Dual Power Supply Automatic Switching
- Auto-switching function
- Customizable logo and other parameters

Product Dimension Drawing (mm)



Technical data	
Model	LQSF
Feature	ON-OFF-ON
Pole	1/2/3/4P
Rated Voltage Ue(V)	230/400
Rated Current In(A)	16,20,32,40,50,63
Rated Insulation Voltage Ui(V)	400
Rated Impulse Withstand Voltage Uimp	4kV
Rated Frequency	AC-22A
Utilization category	50/60Hz
Mechanical Life	20,000 times
Electrical Life	6,000 times
Altitude	≤2,000m
Ambient Temperature	-25°C ~ +50°C
Relative Humidity	≤90% at 40°C
Storage Temperature	-35°C ~ +55°C
Standard	IEC60947-6

Internal wiring diagram



LD1-40



Surge Protection Device(SPD)

AC 275/385/420V



Lightning Protection



Surge Protection

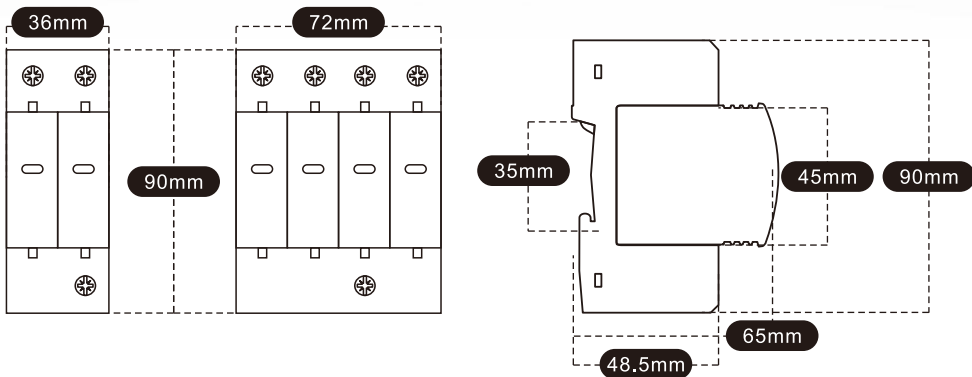


Instruction Window



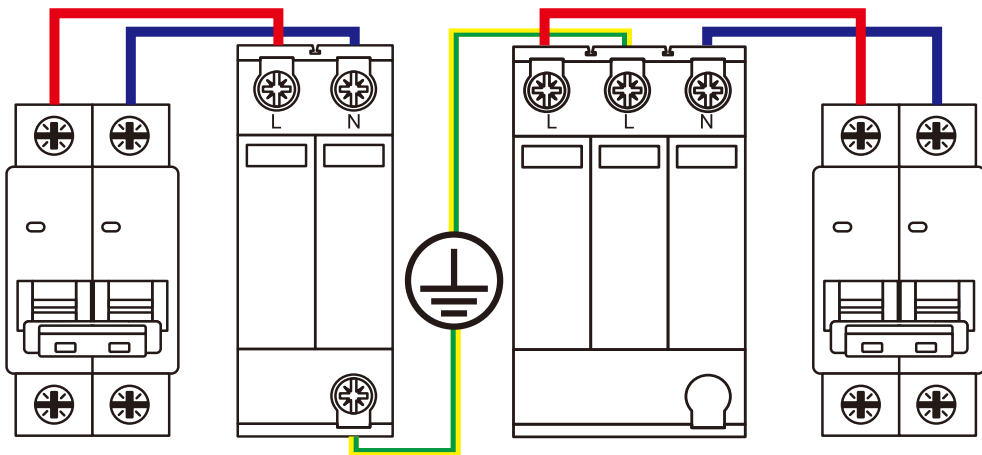
Customizable logo And Other Parameters

Product Dimension Drawing (mm)



Technical data	
Model	LD1-40
Feature	Lightning protection, surge protection
Pole	2P/3P/4P
Rated Working Voltage Ue (V)	AC 275/385/420V
Up(kV)	1.5/1.8/2.0
Classified Test	II
In (8/20)us (kA)	20
I _{max} (8/20)us (kA)	40
Standard	IEC61643-11
lightning Protection	Yes
Operating Temperature	-30°C to +70°C
Humidity	≤95%
Altitude	2000m
Installation	35mm DIN Rail
Product Size (mm)	65*36*90/65*54*90/65*72*90

Wiring diagrams



+, - pole enters from above, 2P earth wire from below, The ground wire for the 3P is in the upper center.

LW-26



Cam Switch

AC 380V 10~315A



Multi-settings
Switching



Thick Copper
Silver Plating



PA
Flame-Retardant
Material

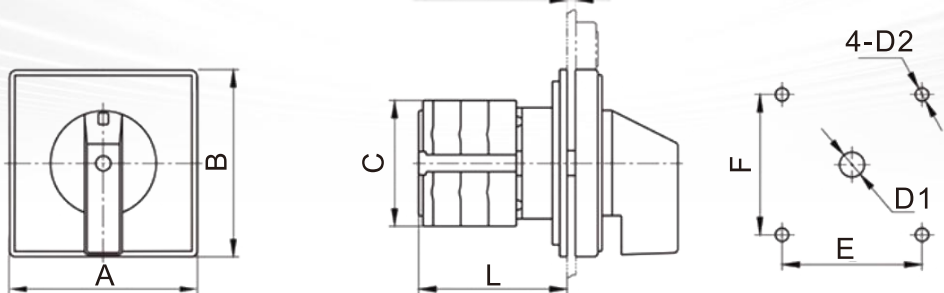


Customizable Panels
And Other Parameters

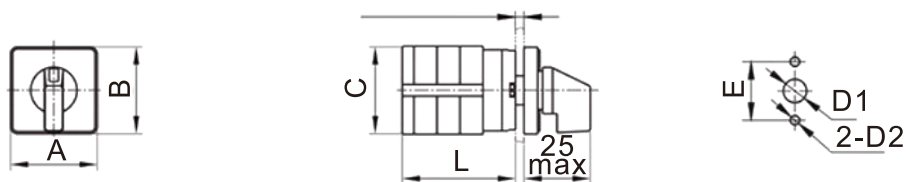
Product Dimension Drawing (mm)

LW26-20-315 dimensions and mounting dimensions

1-5(Panel thickness)



LW26-10/LW26-10G dimensions and mounting dimensions



Model	Panel	Dimensions (mm)				Mounting Dimensions(mm)			
		A	B	C	L	E	F	D1	D2
LW26-10	M0 Square	30	30	30.5	15.5+8n	20	20	Φ8	Φ3.2
LW26-20	M1 Square	48	48	43	22+9.6n	36	36	Φ8.5	Φ4.5
LW26-20	M2 Square	64	64	43	25+9.6n	48	48	Φ10	Φ4.5
LW26-25	M1 Square	48	48	45.2	23+12.8n	36	36	Φ8.5	Φ4.5
LW26-25	M2 Square	64	64	45.2	26.5+12.8n	48	48	Φ10	Φ4.5
LW26-32	M2 Square	64	64	58	29.2+12.8n	48	48	Φ10	Φ4.5
LW26-32	M3 Square	88	88	58	29.2+12.8n	68	68	Φ13	Φ6
LW26-63	M2 Square	64	64	66	29.2+21.5n	48	48	Φ10	Φ4.5
LW26-63	M3 Square	88	88	66	29.2+21.5n	68	68	Φ13	Φ6
LW26-125	M3 Square	88	88	84	35+26.5n	68	68	Φ13	Φ6
LW26-160	M3 Square	88	88	88	35+32.5n	68	68	Φ13	Φ6
LW26-250	M3 Square	88	88	108	35.5+36n	68	68	Φ13	Φ6
LW26-315	M4 Square	130	130	126	39.5+38.5n	104	104	Φ16	Φ7

Technical data

Model	LW-26
Features	Circuit Switching, Isolated Circuit
Rated voltage Ue (V)	AC380
Rated current In (A)	10-315
Conventional heating current Ith (A)	10-315
Operating frequency	50/60 Hz
Rated insulation voltage Ui (V)	690
Rated impulse withstand voltage (Uimp)	8kV
Rating	2-12 positions
Number of poles	1-12 sections
Standard	GB/T 14048.5, IEC 60947-3
Operating mode	Positioning type
Mechanical life	100,000 cycles
Electrical life	30,000 cycles
Operating frequency	120 cycles/hour
Operating temperature	-25°C to +55°C