

GreenPower

High Voltage Switchgear
Components and Accessories

LIGHTS UP THE WAY
TO THE FUTURE



GreenPower

**LIGHTS UP THE WAY
TO THE FUTURE**



- *Environment Friendly*
- *Save Energy and Resource*
- *One-Stop Solutions Concept*
- *Customer Value Increasing*

About Us

GreenPower promotes environmental awareness, and aims to create unprecedented happiness and wealth for our investors, employees, clients and partners. By focusing in the mid-to-high voltage and low voltage eld, and professionally working on R&D, manufacturing, marketing and service of high-end green intelligent switchgears, equipments and products.GreenPower sets to become a well-respected global company in the power industry.

GreenPower, is jointly established by a number of state-owned excellent industrial electrical professional manufacturers, we committed to meet the procurement needs of clients. It is a professional procurement service provider with entity of industrial electrical.

GreenPower provides ONE-STOP solutions service for all customers in the International area. It is located in the time-honored electrical industrial city, a collection of worldclass brand of industrial electrical products,excellent brand of domestic electrical products as the basis.

Innovative business philosophy, strong professional supply team, expert technical guidance, advanced Information network management platform, fast logistics, which makes GreenPower as your procurement expert by your side.

GreenPower adheres to its own brand and multi-brand integration, marketing dierentiated development strategy. The products involving low voltage, medium voltage and high voltage transmission and distribution products and industrial automation products.

It covering all aspects of distribution, logistics, warehousing, professional and technical engineering services, systems integration and complete sets of manufacturing. Stable business foundation for cooperation with customers and suppliers, and has established a good reputation to maintain its leading position in the market competition.

Human quests for transcendence, with transcendence we make progress, when the pursuit of unlimited become a belief, our dream began to realize.

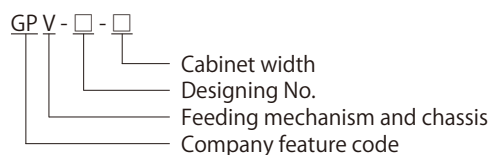
Hard-working, dedicated GreenPower people, will be adhering to its past glory, beginners mind, let go sailing, to face the fierce competition in the future, and always help customers make the best choice, and strive to become the best and most reliable procurement service provider in the eld of industrial electrical.

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Type and model meaning

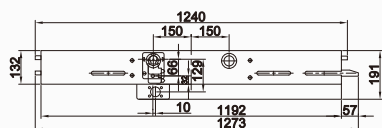


Usage

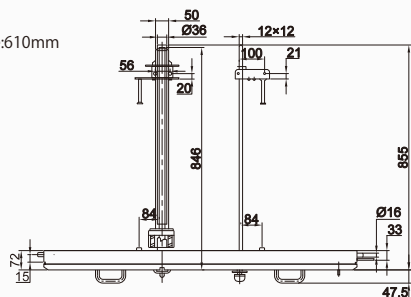
This feeding mechanism is the accessories for 40.5 switchgear, for feeding the movable parts of 40.5 series circuit breaker, isolation handcarts and trolleys.

GPV-1-1400 Feeding mechanism (For GPVN-40.5)

130001

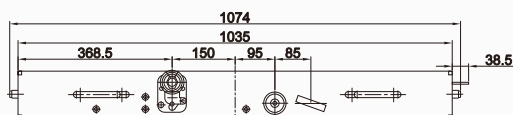
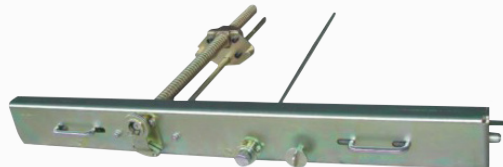


Stroke:610mm

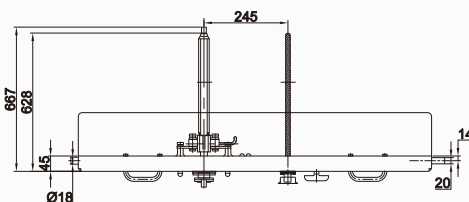


GPV-2-1200 Feeding mechanism (For GPVN-40.5A)

130002



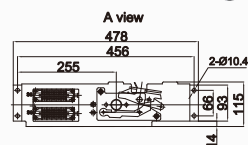
Stroke:510mm



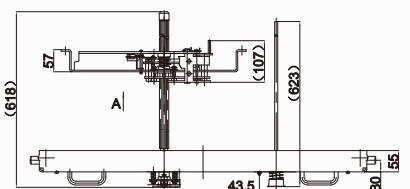
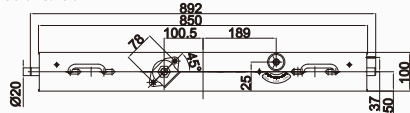
GPV-3-1200 feeding mechanism (For VD4-40.5 similar type trolley)

130003

130004



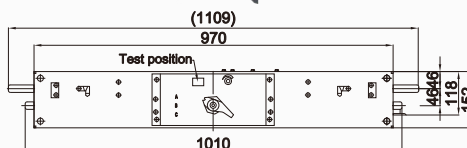
Stroke:450mm



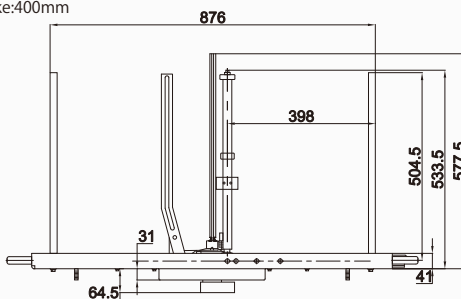
Product code	Key selection
130003	
130004	

GPV-4-1400 feeding mechanism (For GPVN-40.5B)

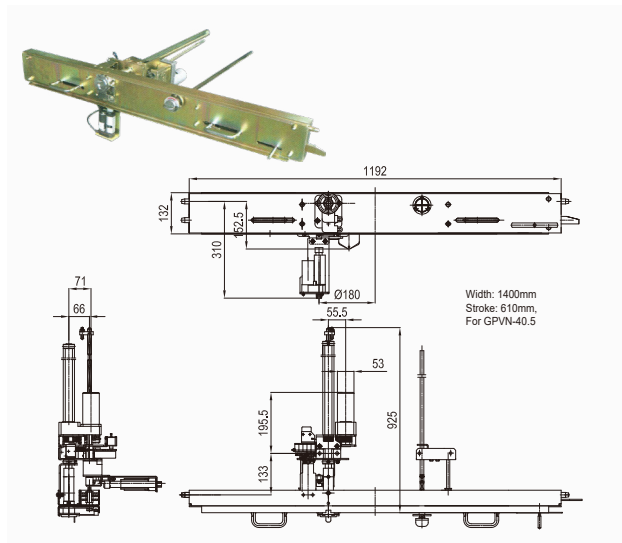
130006



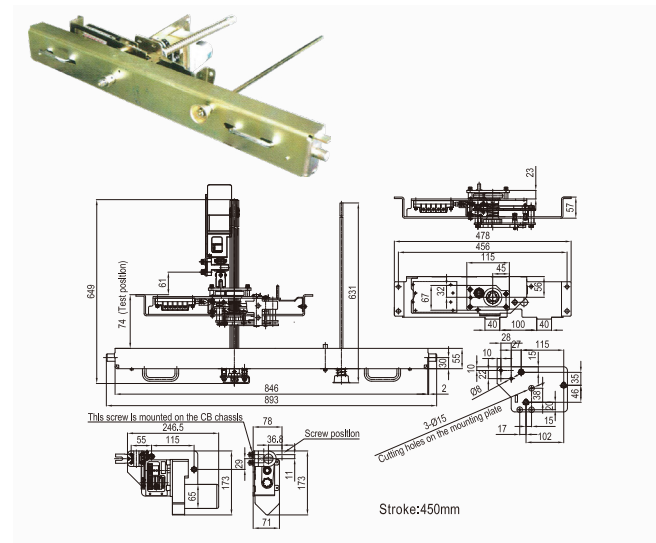
Stroke:400mm



● GPV-1D-1400 Motorized feeding mechanism(3VA3 mechanism)



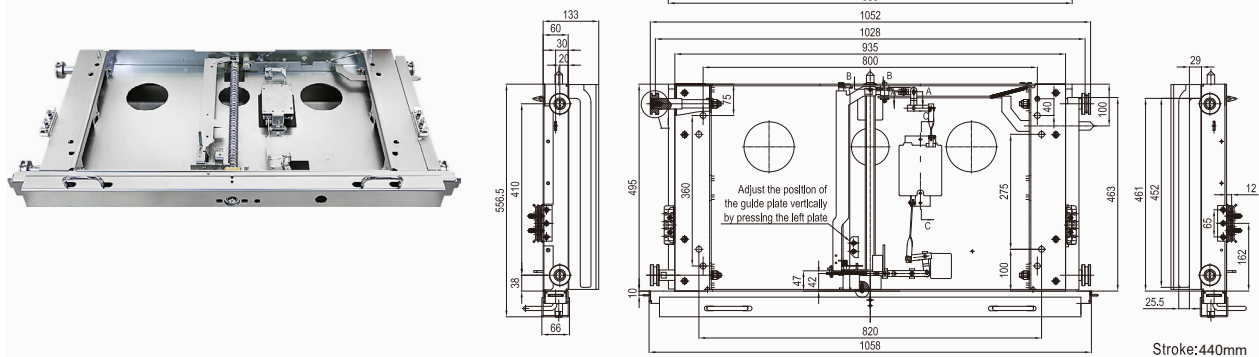
● GPV-3D-1200 Motorized feeding mechanism(VD4 type)



● GPV-40.5-1200 VCB chassis (middle-placed type)

131081 Stroke: 440mm

130107 Stroke: 400mm

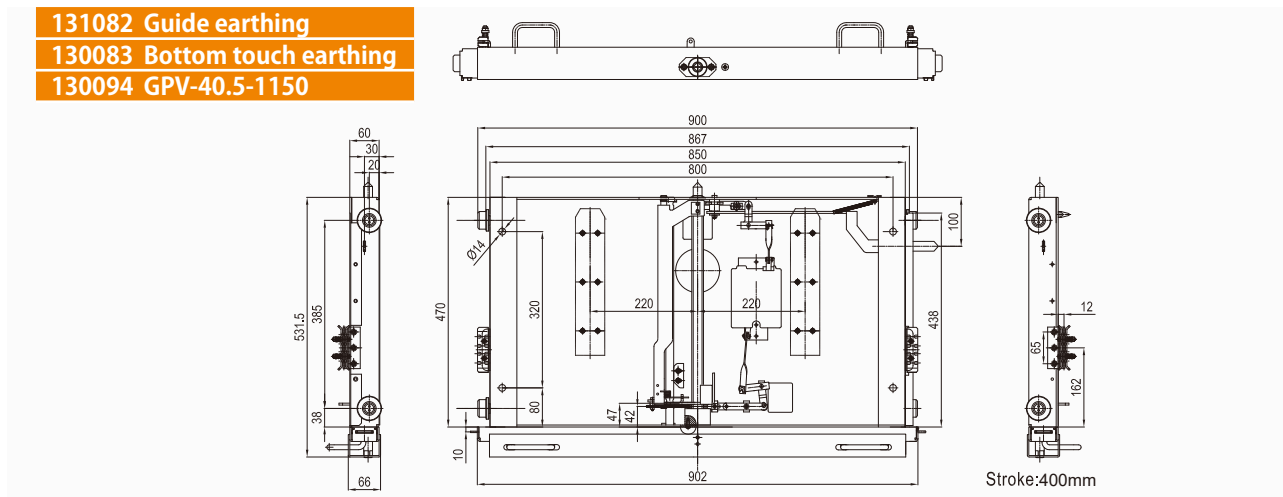


● GPV-40.5-1200-X400S VCB Chassis (middle-placed type)

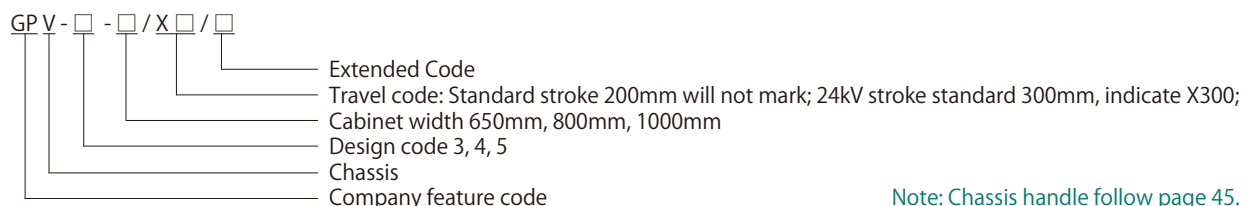
131082 Guide earthing

130083 Bottom touch earthing

130094 GPV-40.5-1150



GPV Chassis model and meaning



Note: Chassis handle follow page 45.

Usage and function

The chassis is mainly for withdrawable switchgear equipment as installing the circuit breakers, transformers and other components, to pushed in and withdraw, as auxiliary operations of components connected with the bus. When the internal structure of chassis and circuit breakers working together with other interlocks of the cabinet to meet IEC62271-100/GB3906 "Five Safety" interlock requirements, specific functions are as follows:

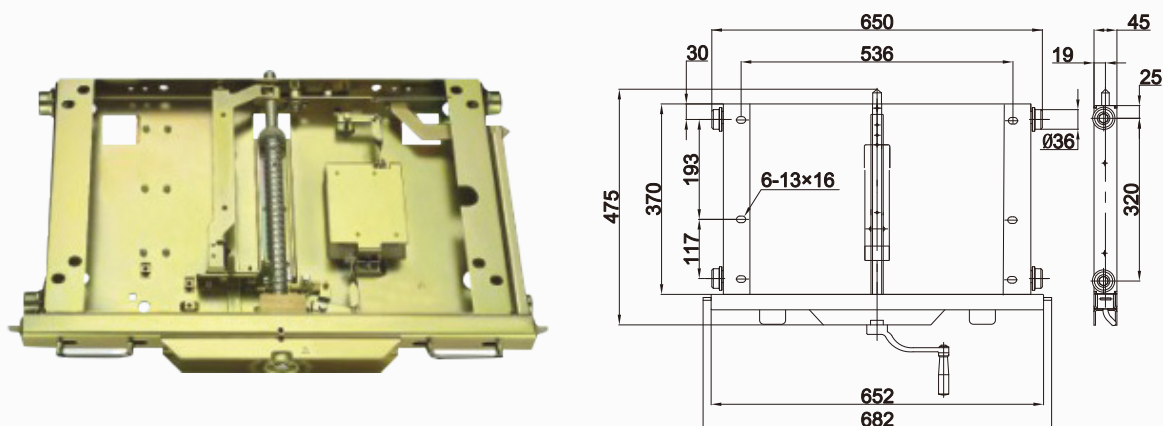
1. Handcart only in test / disconnected or working position, the circuit breaker can switch on, and after the circuit breaker switches on, the handcart cannot move, so as to prevent the situation of misconnection the isolating contacts when on load.
2. The handcart in the working position or leave the test / disconnected position about 10mm, earthing switch cannot switch on, to prevent misconnection the earthing switch when on live.
3. When the earthing switch is closed, the handcart cannot move from the test / isolated position to the working position, to prevent the earthing switch in the closing position to closing the circuit breaker.
4. After the chassis into the cabinet, once it leave the test / isolated position, the handcart cannot be withdrawn from the cabinet.

Locking plate arranged for chassis

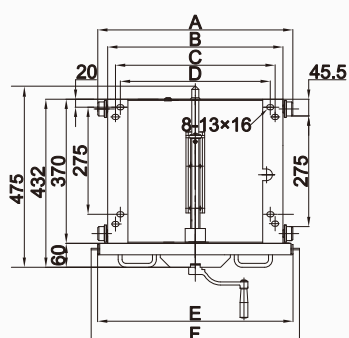
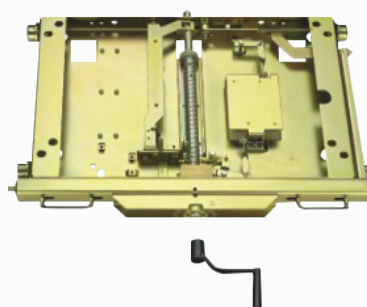
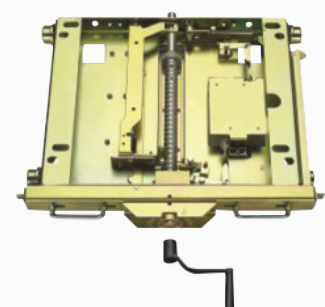


Note: GPV chassis has more than 6 kinds of locking plate for option, Standard with 8GP.141.012.2, if need other kinds of locking plate, please specify when ordering.

GPV-3-800 Chassis outline and installation dimension

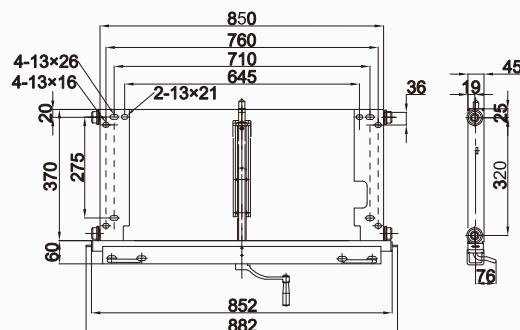
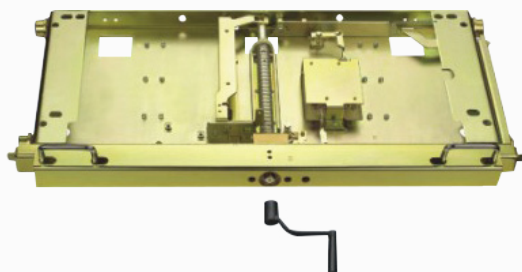


● GPV-4- □ Chassis outline and installation dimension

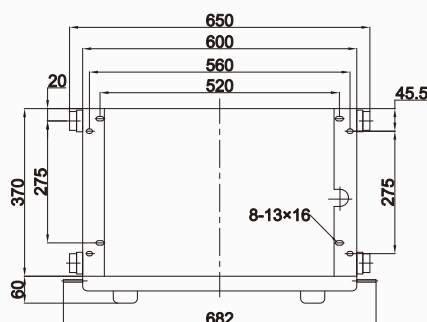
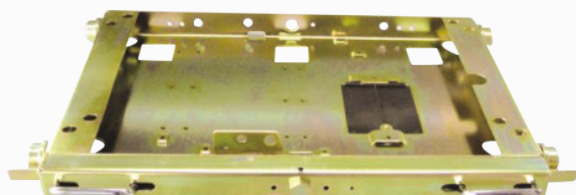


Model	A	B	C	D	E	F
GPV-4-650	500	450	410	385 (Installation hole 13x30)	502	532
GPV-4-750	601	550	510	470	602	632
GPV-4-800	650	600	560	520	652	682
GPV-4-840	690	640	600	560	692	722
GPV-4-900	750	700	660	620	752	782
GPV-4-1000	850	800	760	720	852	882
GPV-4-1200	1050	1000	960	920	1052	1082

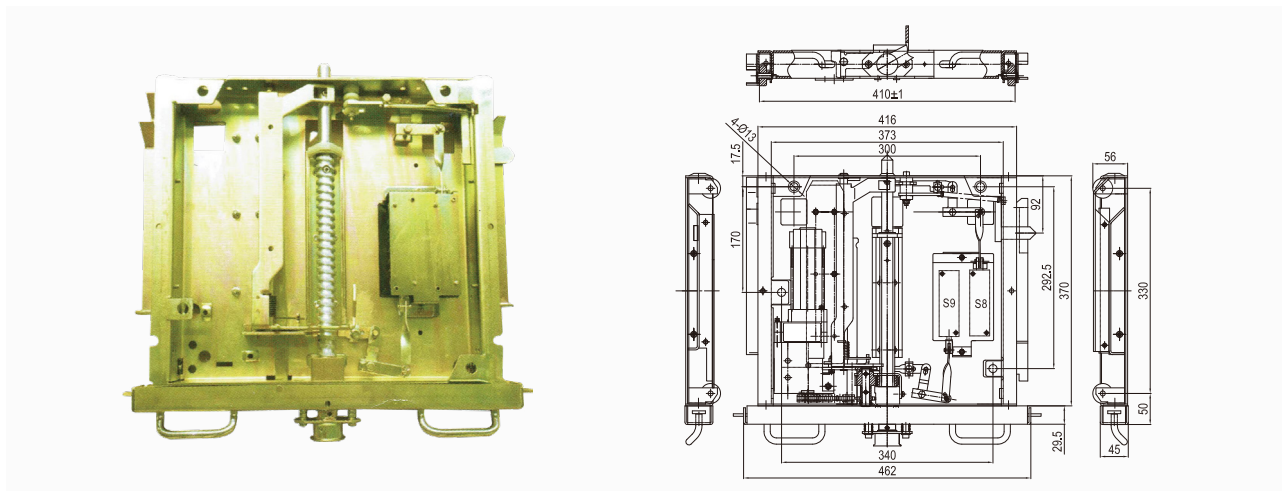
● GPV-4-1000/T Chassis outline and installation dimension



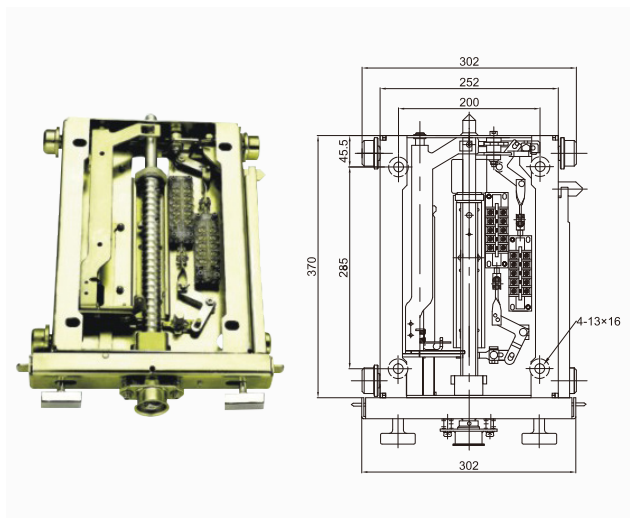
● GPV-4-800/XC2 Chassis (For down layer use) outline and installation dimension



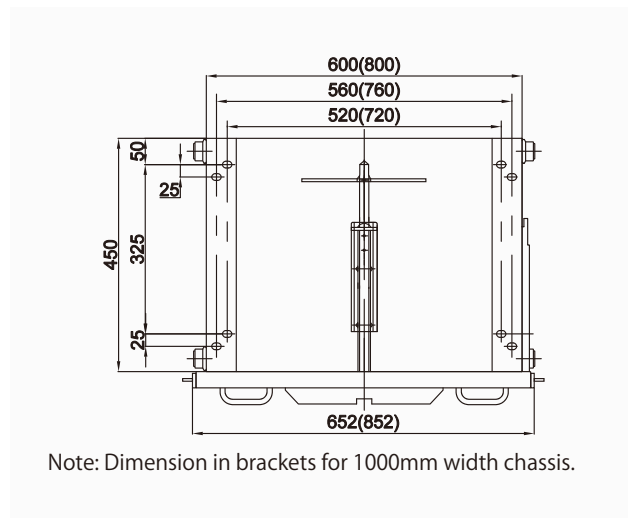
● GPV-max-550 Chassis and GPV-max-550/DD3 Motorized Chassis



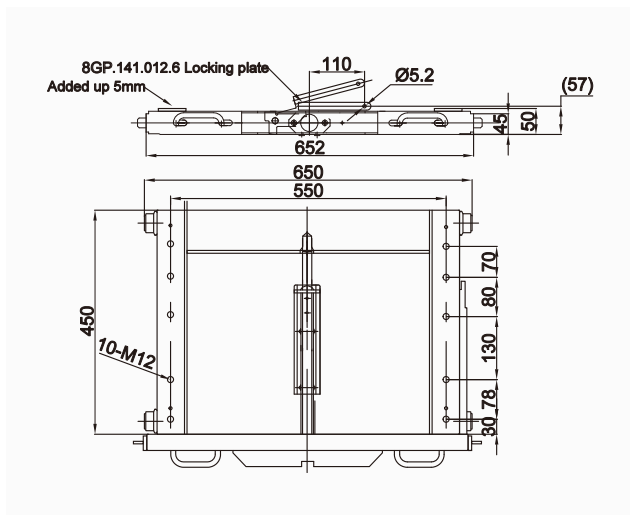
● GPV-4-450 Chassis



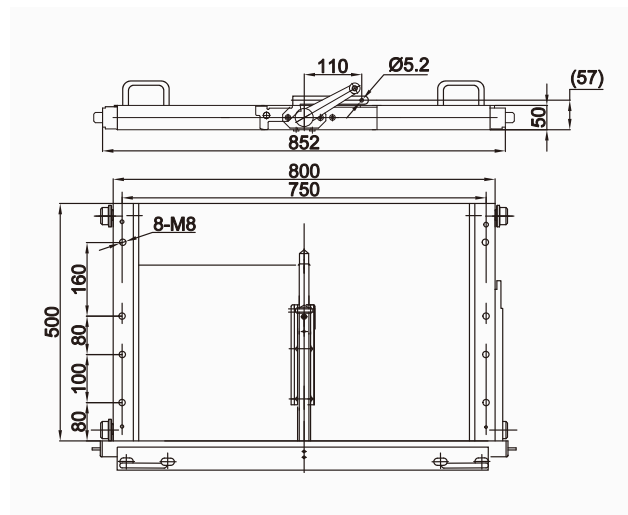
● GPV-4-⁸⁰⁰/₁₀₀₀ /YDF Deepened chassis



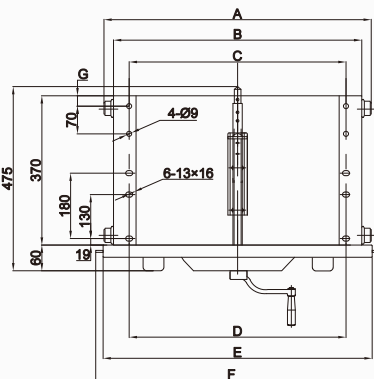
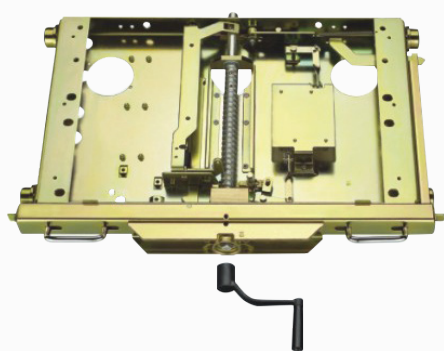
● GPV-4-800/YH3 Deepened chassis



● GPV-4-1000/YH3 Deepened chassis



● GPV-5- □ Chassis (For VBI mechanism)



Model	A	B	c	D	E	F	G
GPV-5-800	650	600	520	520	652	682	25
GPV-5-1000	850	800	720	700	852	882	45

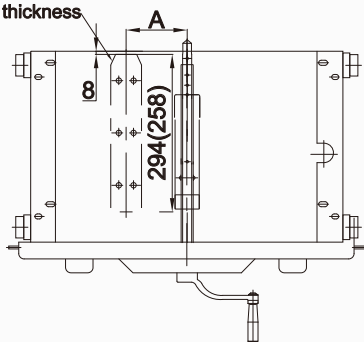
Note:

1. Above deepened chassis can match with 3AH, VN12, VN28, VN65 etc. fixed circuit breaker modifying to handcart type.
2. GPV-4-⁸⁰⁰/₁₀₀₀/YH3 with locking plate 8GP.141.012.6 if need other locking plate, please specify when ordering.

● Earthing way selection

Earthing bus

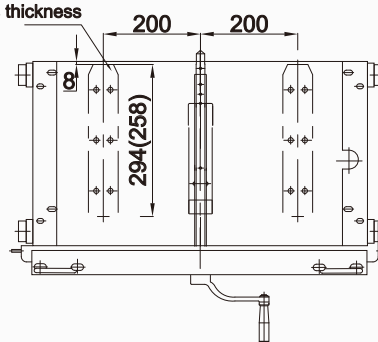
Earthing bus thickness



Model	A	Busbar selection
GPV- □ -650	100	Big size 294×58×4
GPV- □ -800	160	Small size 258×48×3

Earthing bus GPV- □ -1000

Earthing bus thickness

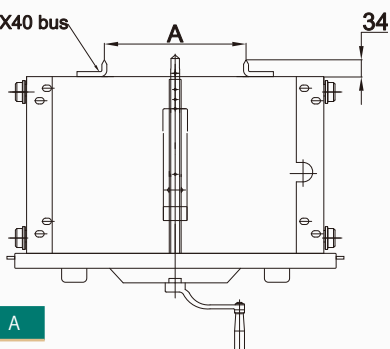


Note: Dimensions in brackets for 24kV chassis.

Earthing contact installation dimension

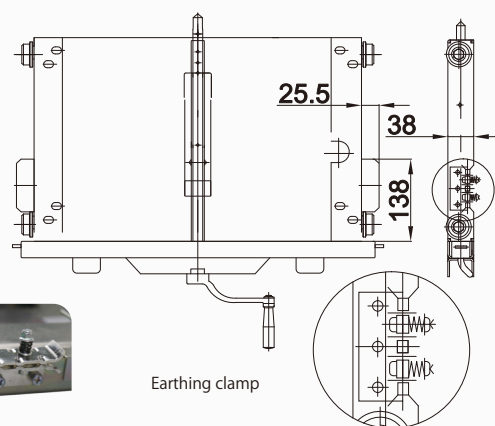
Earthing contact

Earthing contact 4X40 bus



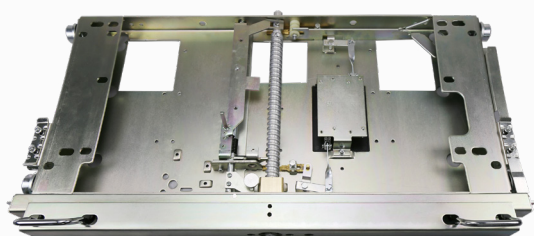
Model	A
GPV- □ -650	180
GPV- □ -800	296
GPV- □ -1000	496

Earthing clamp



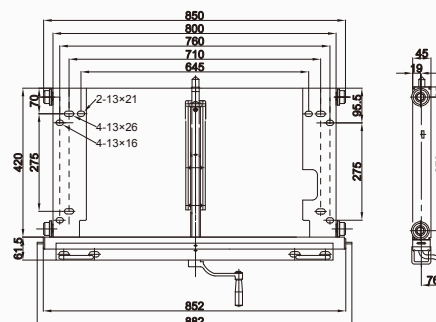
Earthing clamp

● GPV-4-1000/24 deepened type 24kV chassis



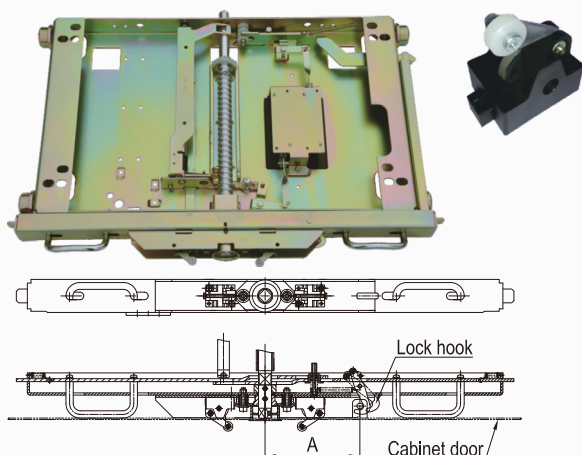
GPV-4-1000/24 deepened type 24kV chassis

Only change the stroke of the original standard 24kV chassis to 300mm, after it changed to 300mm, the screw guide of original 300 chassis cannot be installed, only deepened the frame deepened 50mm for installation.
24kV deepened chassis is not only improve the performance of itself, it is also plays a significant role on the stability of center of gravity of the circuit breaker.



GPV-4-1000/24 deepened 24kV chassis installation dimension.

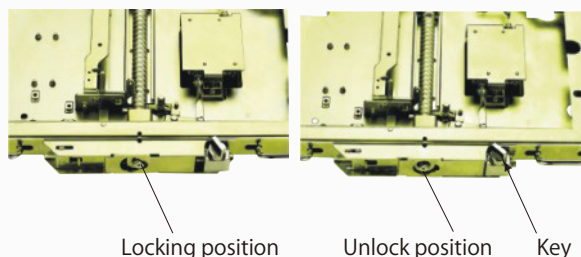
● Special function chassis: GPV-□□ - □ /G5 /S5 chassis(12/24kV)



1. GPV-□ - □□ /G5 Chassis
This model of chassis only increased the function of closing door operation, that is, when the door open, you cannot plug the handle into chassis and shake it, only shake when close the door. This interlock function without changes on the cabinet door.
2. GPV-□ - □ /S5 Chassis
This model of chassis added a key lock function on the basis of a, that is, when the handcart leave the test position, the cabinet door is locked, you cannot open, only return to the test position, the door could be open, this interlock function needs changes on cabinet door.

Model	A
GPV-□ -650/S5	101
GPV-□ -800/S5	130
GPV-□ -1000/S5	130

● Special function chassis GPV-□ - □ /2+1 with 2-in 1-out interlock device(12/24kV)



General
The interlock device is mainly used to prevent two handcars into the working position in the same time. The main interlock function is: two chassis controlled by a key, any one chassis in the working position, the key cannot be pulled out, the other chassis would not have the key to unlock, the handle cannot be plugged in, chassis cannot shaking, so as to achieve the purpose of preventing it enter the working position.
Ordering notice:
Need this interlock device please add /2+1 after the model, 1 set includes 2 chassis with 1 key.

GPV-□ - □ Chassis ordering notice:

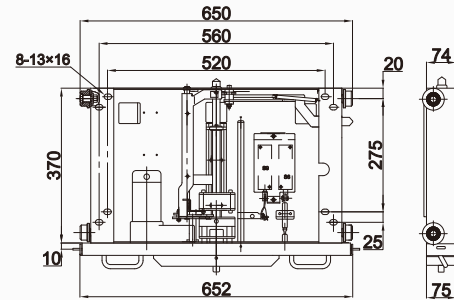
1. Indicating the chassis model, lock plate code, auxiliary switch specifications, grounding methods.
2. Auxiliary switch specification means auxiliary switch specification itself (means specification still not installed on the chassis). Generally has 5 groups, 6 groups' contacts, also available in 10 groups (by 2 auxiliary switch in series connection).
3. 24kV chassis only modify the stroke from 200mm to 300mm, others remain, add /X300 on original model.
4. Any special requirements, please consultation with GreenPower.

Special function chassis

- A. Chassis with voice alerts
Enter into test, working position voice reminder.
Prevent incorrect operation voice reminder.
- B. Chassis with micro-switch
Test, working position plugged in handle, micro-switch transfers.

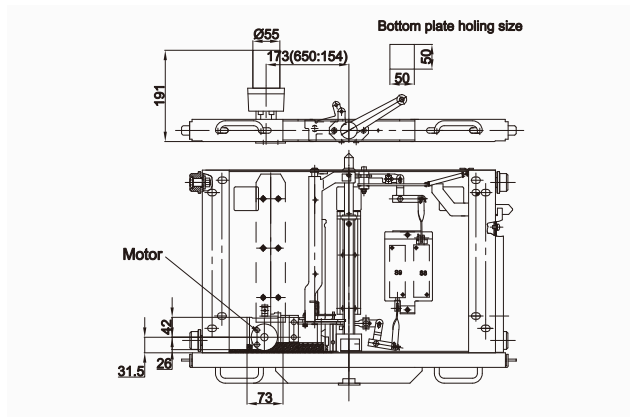
● Special function chassis: motorized operation function.

Chassis increased motorized operating functions, which is the necessary hardware infrastructure to realize the intelligent switchgear, procedures, remote control, etc. Electric mechanism by motor vehicle chassis installation is divided into vertical and horizontal structures, both of which are installed in the original chassis manually, without changing the shape of the original manual chassis dimensions, interlock function, manual / electric are facilitate to change. GPV-□ / DD2 electric mechanism because the motor is vertical, shall be inserted into the circuit breaker mechanism box, versatility is not strong, but a wide range of motor selection, low prices, and the motor replacement is also convenient. Motor GPV-□ / DD3 electric mechanism for the special micro-motors, use the extra space to install the chassis, do not change the original chassis dimensions, it has strong versatility.

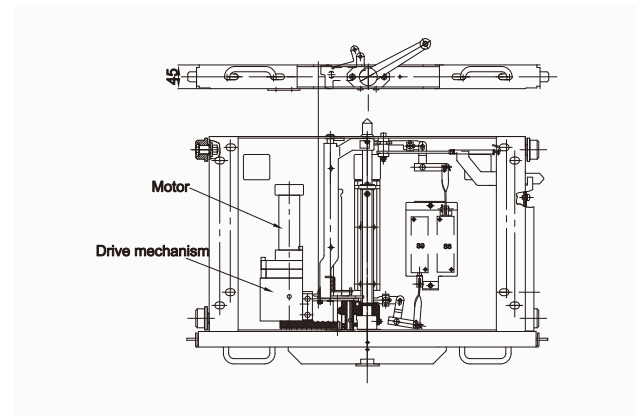


Manual, Electric automatic change
Test, working position with clutch, idling when reach the place.

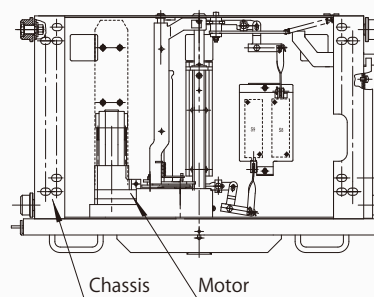
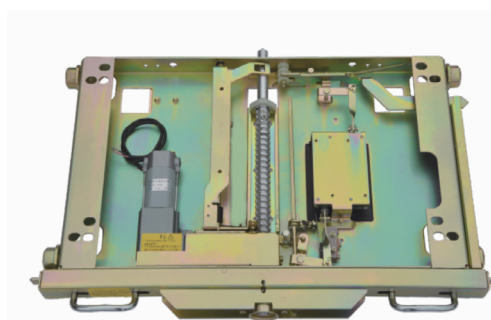
GPV-□ / DD2 electric mechanism chassis



GPV-□ / DD3 electric mechanism chassis

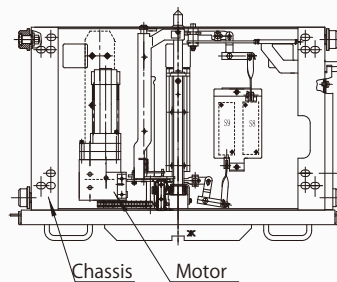
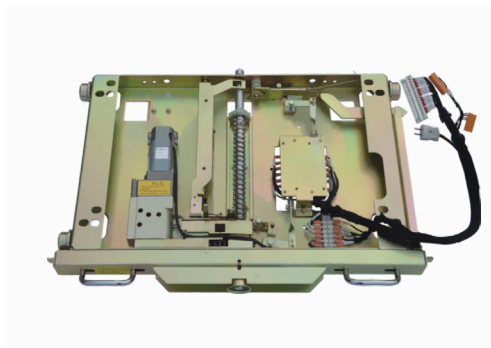


● Electric chassis manual priority S



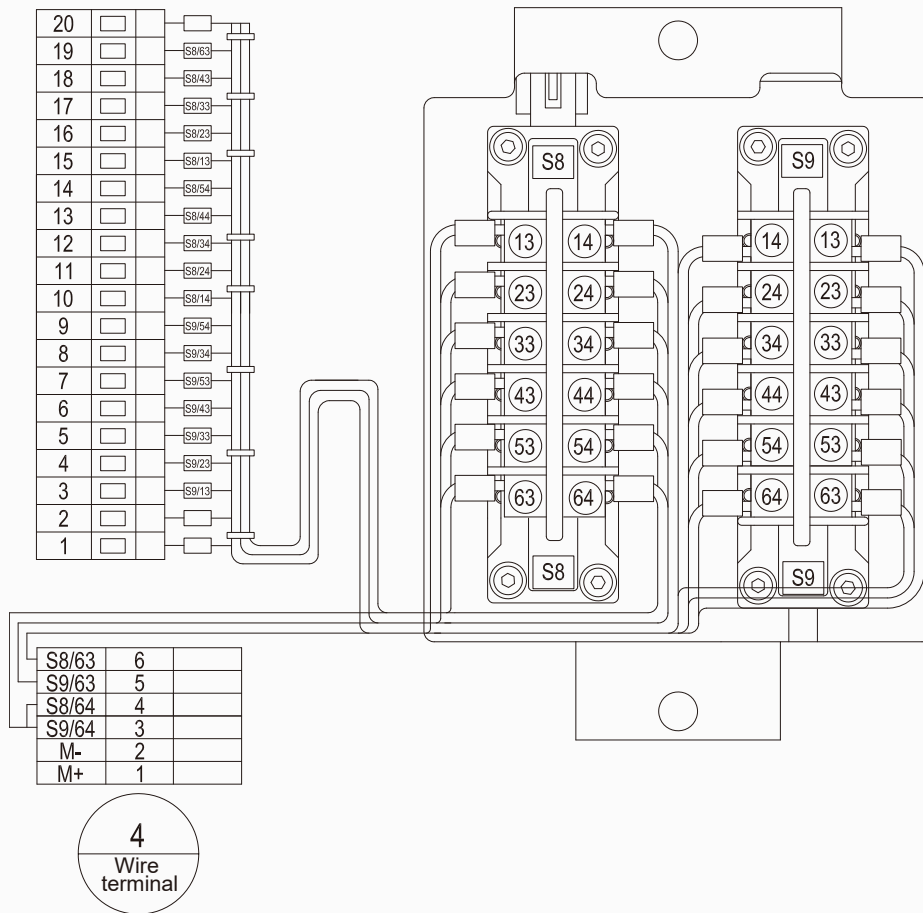
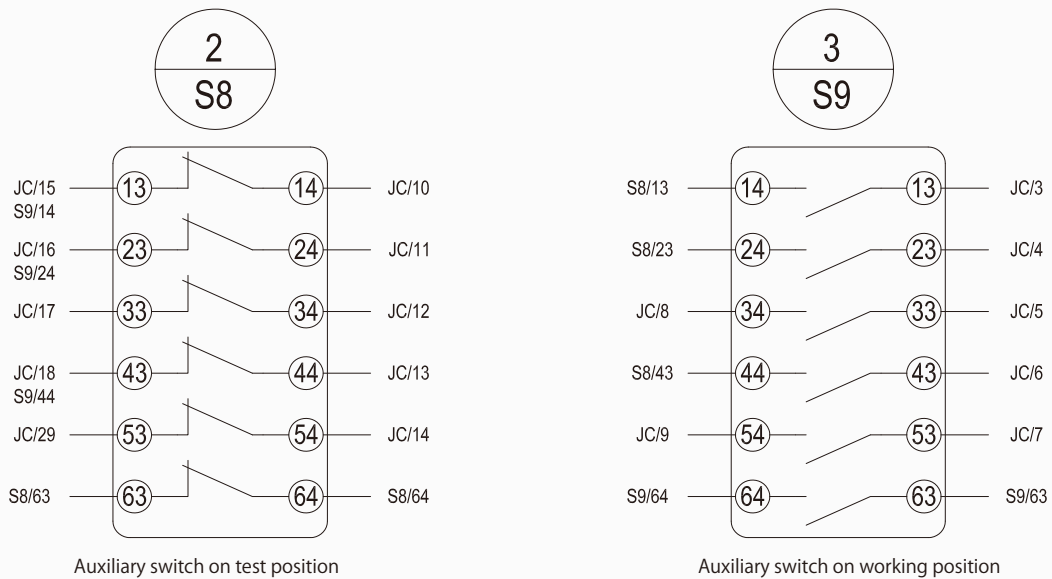
Overview: The manual priority of the electric chassis is to increase the manual priority function based on the original electric chassis. The chassis car adds a micro switch. Associated with the crank operation hole, when the chassis has a manual priority function, the joystick is inserted and the controller button cannot be operated (see Control Circuit for details). When it is necessary to install, add S: GPV-DD4S to the original electric chassis GPV-DD4.

● Electric chassis wiring



Overview: The model is suitable for the GPV/DD3 (JX) wiring diagram. When the chassis is in the test position, the conventional auxiliary switch (6060) is configured. The reserved length of the wiring is 400mm, the wire is 1mm², and the terminal block is connected with a red pin terminal. Use a black cable tie, the direction of the number tube should be the same, and the wire is wrapped with a winding tube.

● Motorized chassis wiring



● Matching DD-3A/3B/3C electric trolley control module

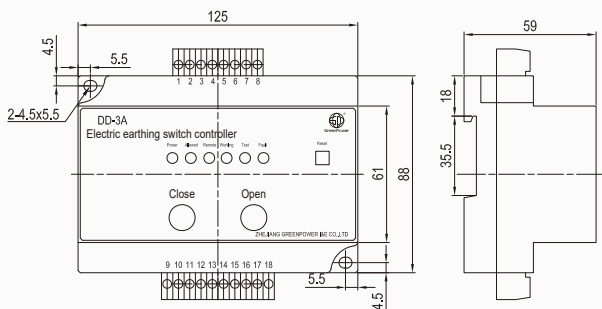
Motorized chassis is to provide a drive scheme, and how to control and protect the electric chassis is required with the corresponding control module to realize and meets the requirements, the control module has the following features:

1. Meet the basic control requirements of chassis racking in and shake out, as well as interlock requirement of the circuit breaker, earthing switches, etc.
2. Motor over-current protection, over-current can be adjusted.
3. Overcurrent return function, when the motor is overcurrent, can return to test position, can also choose a half circle return.
4. Overtime protection function, the control module will stop automatically if the chassis into position signal not be detected within a setting time.

Sr. No.	Model	Installed location	Control
1	DD-3A	Installed in DIN Rail/Surface installation for option	Earthing switch
2	DD-3B	Panel surface installation/DIN Rail for option	VCB chassis
3	DD-3C	Panel surface installation/DIN Rail for option	Earthing switch and VCB chassis 2 in 1

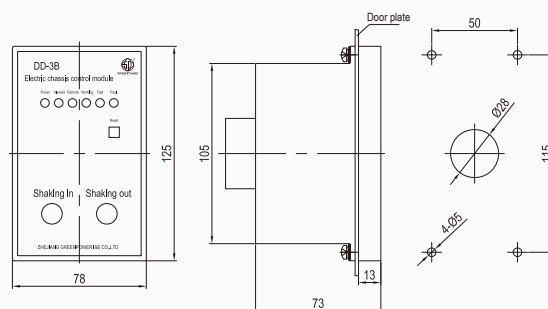
● DD-3A Electric Earthing Switch Controller

100001

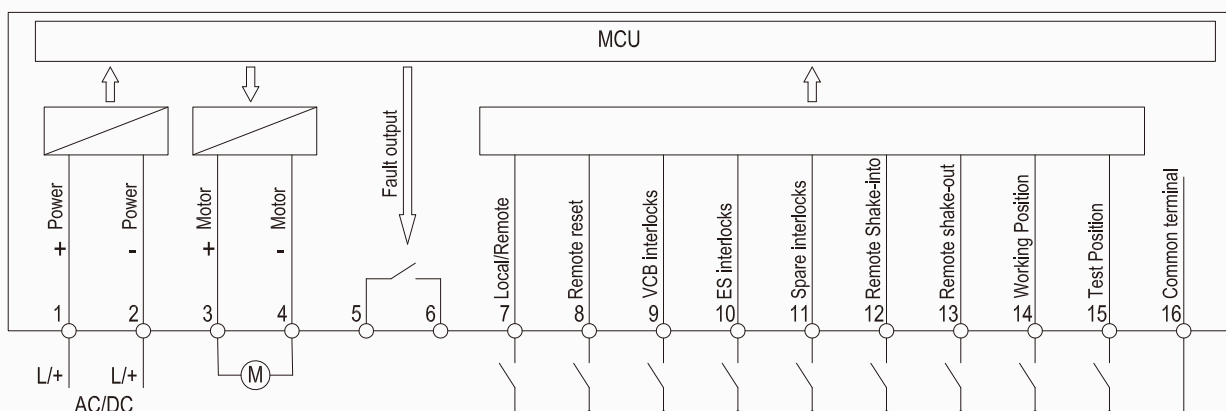


● DD-3B Electric VCB Chassis Controller

100002

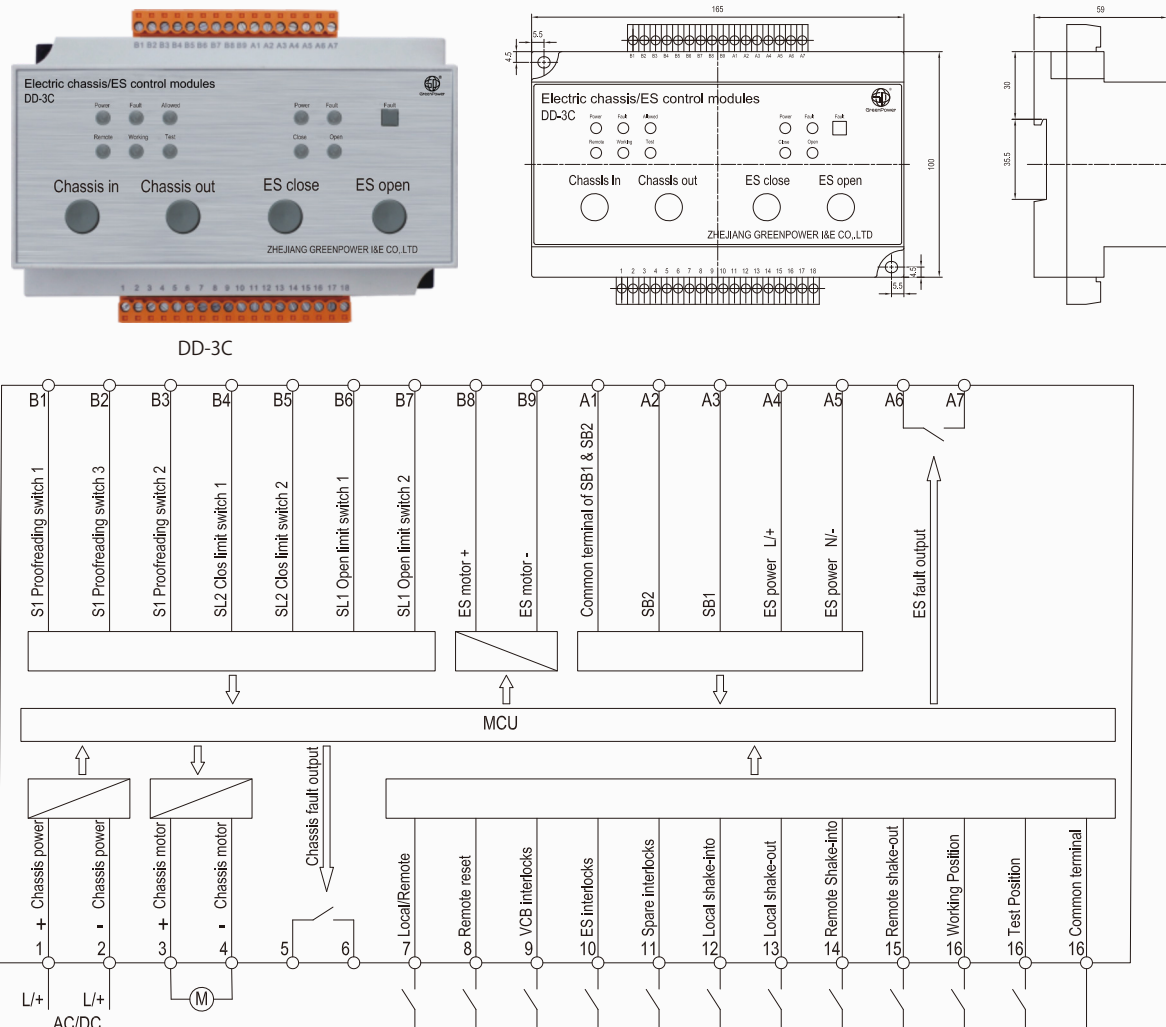


Wiring diagram for DD-3A and DD-3B

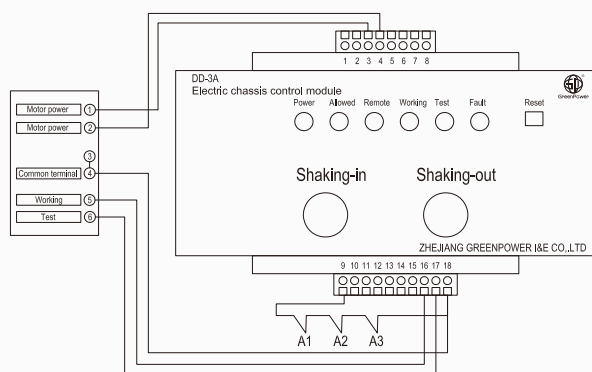


● DD-3C Earthing switch and VCB chassis 2 in 1 Controller

100003



Wiring diagram for DD-3A

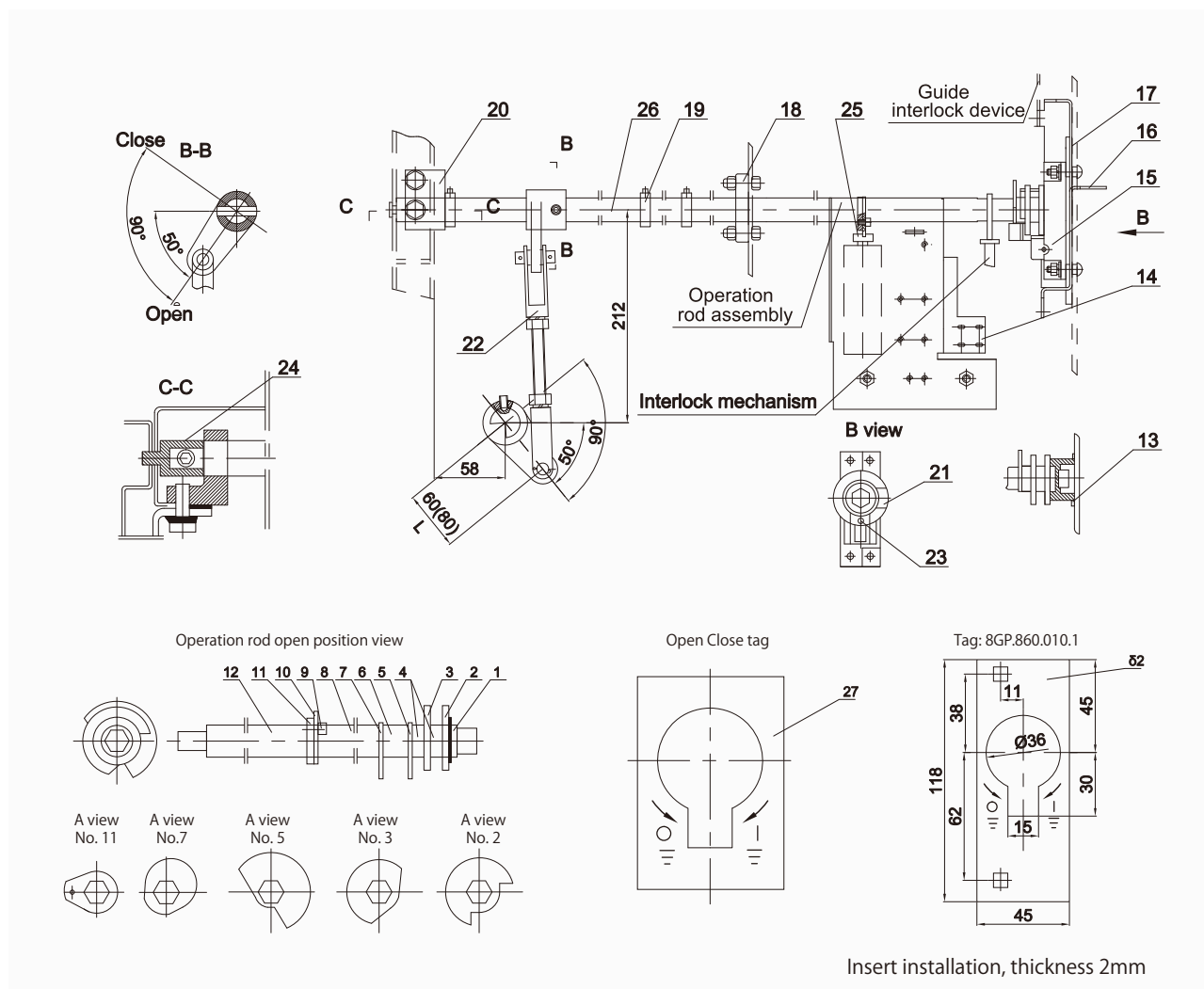


In addition to satisfying the circuit breaker interlocking condition and the alternate interlocking condition when operating the handcart, the earthing switch must be in the opening position; in addition to meeting the interlocking signal input condition when operating the earthing switch, the standby interlocking condition of the handcart part must be satisfied at the same time. . Another: local/remote Remote Reset INPUT applies to the earthing switch part at the same time.

Ordering notice

1. Firstly, you must first clear the specification and model of the original manual chassis.
2. Select the motor-drive mechanism, and add / DD2 or / DD3 after the original model.
3. Specify the control voltage AC / DC 220 or AC / DC110.
4. If you have special requirements, please consultation with GreenPower.

● Installation view of earthing switch operation mechanism interlock device (For connection arm drive operation) 5GP.363.010



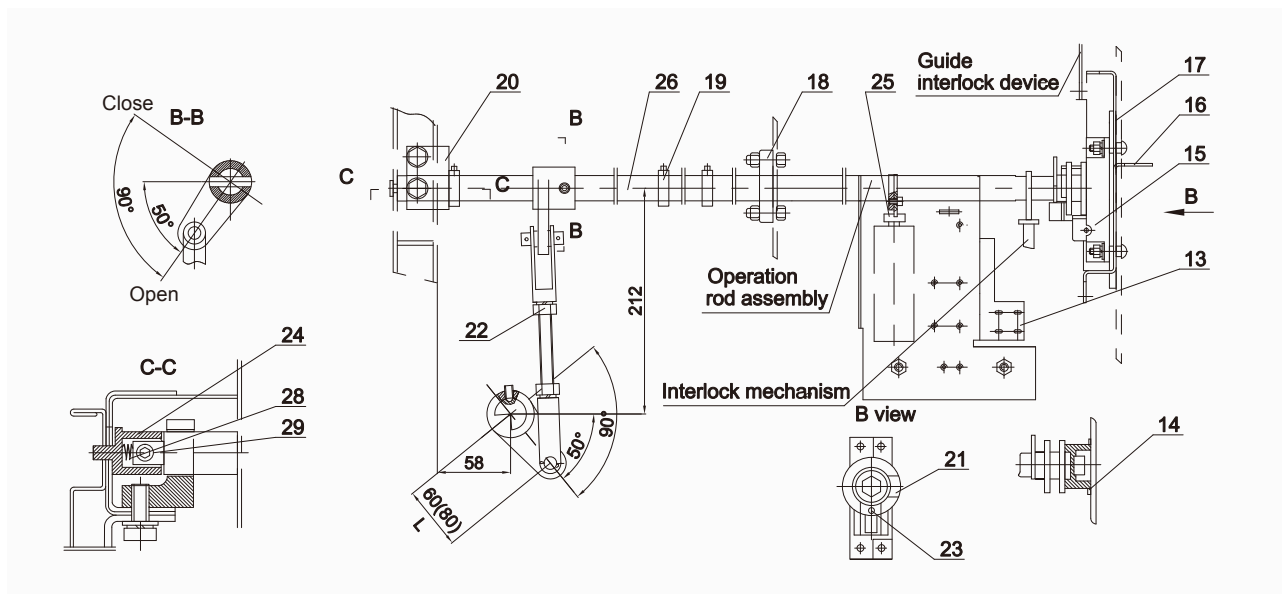
Arrangement list of earthing switch operation mechanism interlock device (For connection arm drive operation) 5GP.363.010

No.	Name	Drawing no.	Qty. (pc/set)
1	Bearing	8GP.263.011	1
2	Sector	8GP.192.010	1
3	Sector	8GP.192.011	1
4	Axis sleeve	8GP.021.014.1	2
5	Sector	8GP.151.041	1
6	Axis sleeve	8GP.211.061	1
7	Sector	8GP.151.039	1
8	Axis sleeve	8GP.211.062	1
9	Bolt M5 × 12	GB70-85	1
10	Sector	8GP.151.042	1
11	Sector	8GP.151.043	1
12	Operation rod	8GP.200.010.1	1
		8GP.200.010.4(Earthing switch be installed in the middle of cabinet) (Long 1432 for cabinet 1500 depth cabinet)	
		8GP.200.010.2	
12	Operation rod	8GP.200.010.5(Earthing switch be installed in the middle of cabinet) (Long 1592 for cabinet depth 1660)	1
		8GP.200.010.5	
13	Cover	8GP.017.011.1	1

No.	Name	Drawing no.	Qty. (pc/set)
14	Supporting plate	8GP.161.058	1
		8GP.161.058.1(For option)	1
15	Bracket	5GP.043.022	1
16	Supporting plate	8GP.161.059	2
17	Slider	8GP.143.010	2
18	Axis sleeve	8GP.211.058	1
19	Stopper sleeve	8GP.221.057	3
20	Support base	8GP.043.019	1
21	Close indicating	8GP.886.010	1
22	Connection rod assembly	8GP.233.030.1	1
		8GP.233.030.3(For option)	1
23	Open indicating	8GP.866.011	1
24	Axis sleeve	8GP.211.059	1
25	Tooth plug plate	8GP.151.044	1
26	Axis sleeve	8GP.211.060	2
27	ES marks	8GP.860.010	1

Note: The connection rod in No. 22 connection rod assembly has two size: Standard is 60mm center distance, if user need 80mm center distance, please check page 17 the connection arm assembly instruction, and specify when ordering.

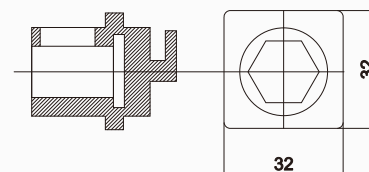
● Earthing switch operation mechanism interlock device (For connection arm drive operation) 5GP.363.010.1 assembly diagram



Instruction of interlock device:

The interlock device is added the reverse interlock with the rear door which designed on the basis of original 5GP.363.010 earthing switch operation mechanism interlock device. That is, after the earthing switch is closed and open the rear door (sealing plate), the original interlock could still operating the earthing switch, but this interlock could not. You must first shut the rear door (sealing plate) in order to operate the earthing switch.

The working principles of the interlock device is changed the No. 24 locking sleeve to what showed on right and added spring on the basis of the original 5GP.363.010. When the rear door (sealing plate) open, the lock sleeve enter into the square hole of the cabinet (recommended size 35X35), earthing switch cannot be operated.



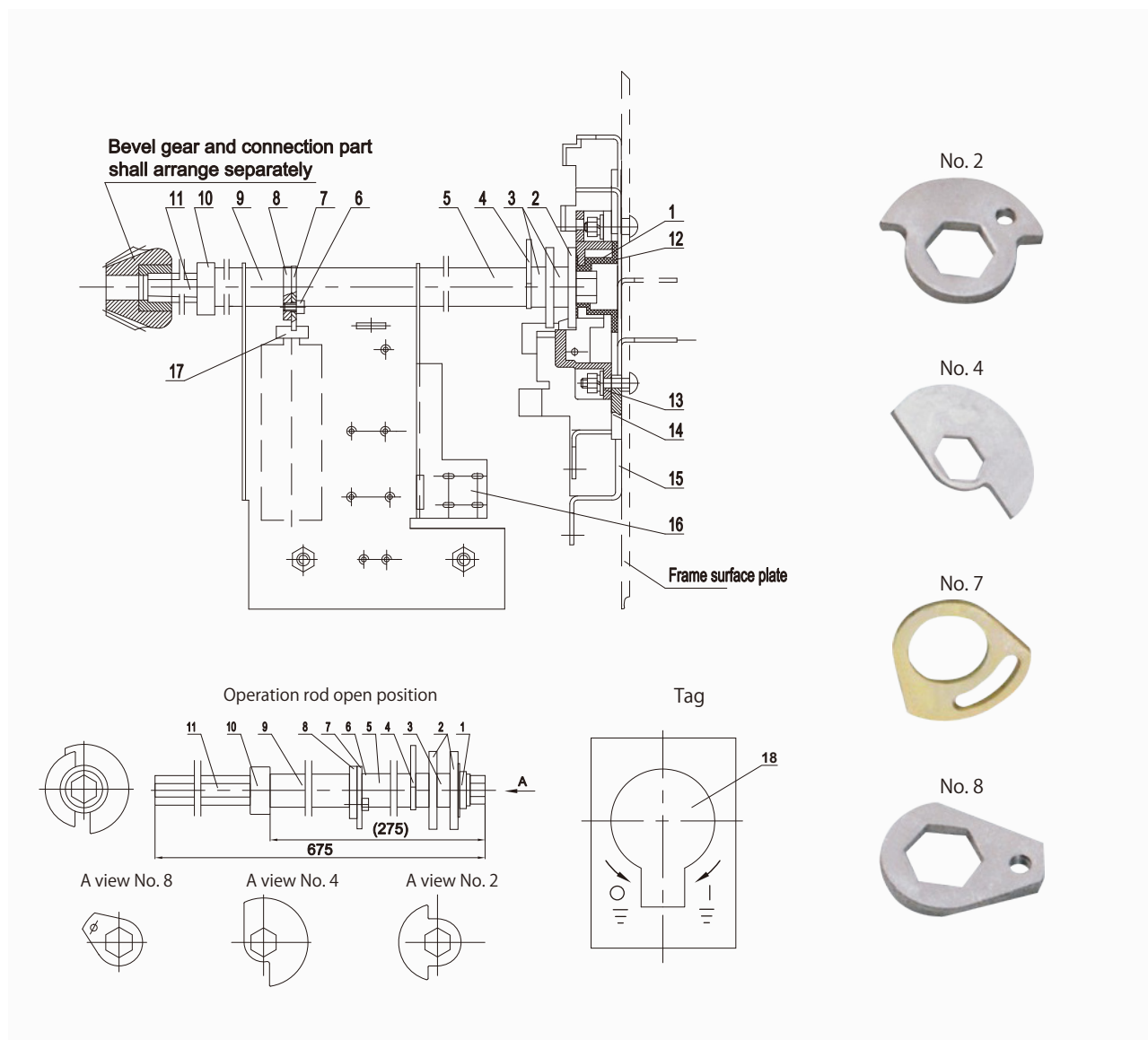
Earthing switch operation mechanism interlock device (For connection arm drive operation) 5GP.363.010.1 arrangement list.

No.	Name	Drawing no.	Qty. (pc/set)	No.	Name	Drawing no.	Qty. (pc/set)
1	Bearing	8GP.263.011	1	14	Cover	8GP.017.011.1	1
2	Sector	8GP.192.010	1	15	Bracket	5GP.043.022	1
3	Sector	8GP.192.011	1	16	Supporting plate	8GP.161.059	1
4	Axis sleeve	8GP.210.014.1	2	17	Slider	8GP.143.010	2
5	Sector	8GP.151.041	1	18	Axis sleeve	8GP.211.058	1
6	Axis sleeve	8GP.211.061	1	19	Stopper sleeve	8GP.211.057	3
7	Sector	8GP.151.039	1	20	Support base	8GP.043.019	1
8	Axis sleeve	8GP.211.062	1	21	Close indicating	8GP.866.010	1
9	Bolt M5 × 12	GB70-85	1	22	Connection rod assembly	5GP.233.030.1	1
10	Sector	8GP.151.042	1			5GP.233.030.3(For option)	1
11	Sector	8GP.151.043	1	23	Open indicating	8GP.866.011	1
12	Operation rod	8GP.200.013.1 (Long 1432 for cabinet depth 1500 depth)	1	24	Locking sleeve	8GP.211.201	1
		8GP.200.013.2 (Long 1590 for cabinet depth 1660)	1	25	Tooth plug plate	8GP.151.044	1
13	Supporting plate	8GP.161.058	1	26	Axis sleeve	8GP.211.060	2
		8GP.161.058.1(For option)	1	27	Tag	8GP.860.010	1
				28	Pressure spring	8GP.282.201	1
				29	Locking sleeve fixing Bolt	8GP.920.002	1

Note:

- No. 1~12 see the previous page.
- No. 22 Connection rod assembly, the connection arm has two size: Cabinet center distance 60mm in common. If need 80mm center distance please check page 17 the connection arm assembly instruction, and specify when ordering.

● Earthing switch operation mechanism interlock device (For bevel gear drive operation) 5GP.577.1001

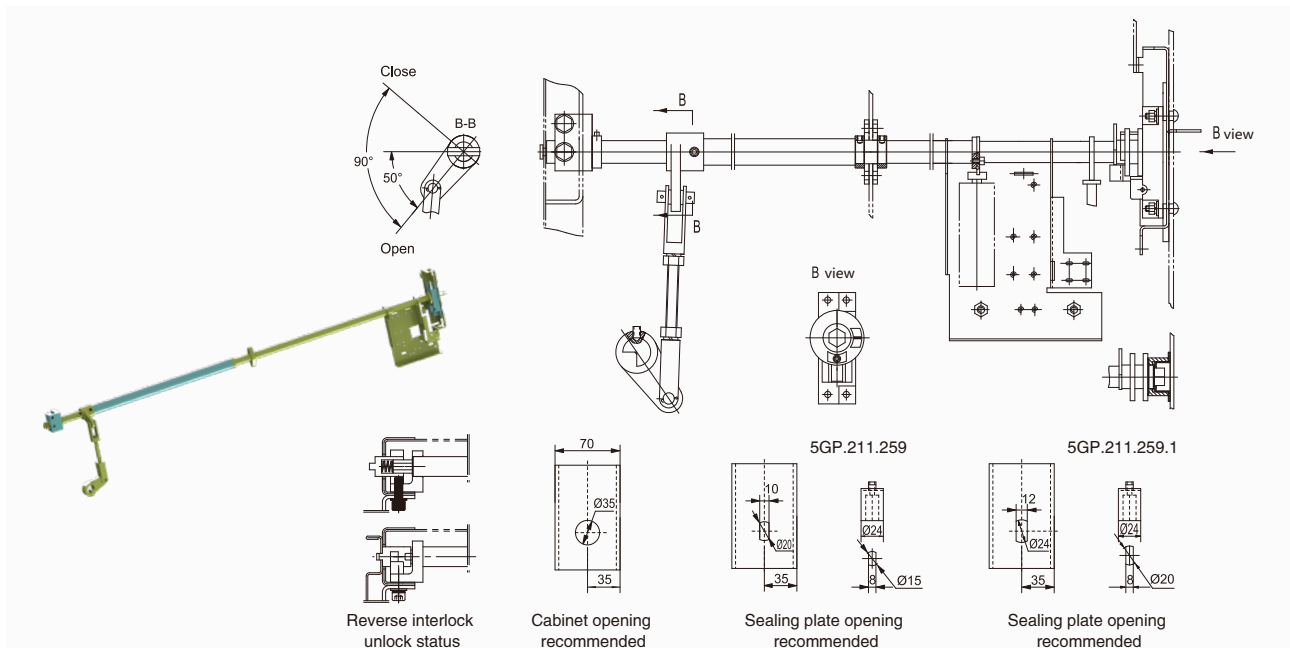


Earthing switch operation mechanism interlock device (For bevel gear drive operation) 5GP.577.1001 arrangement list

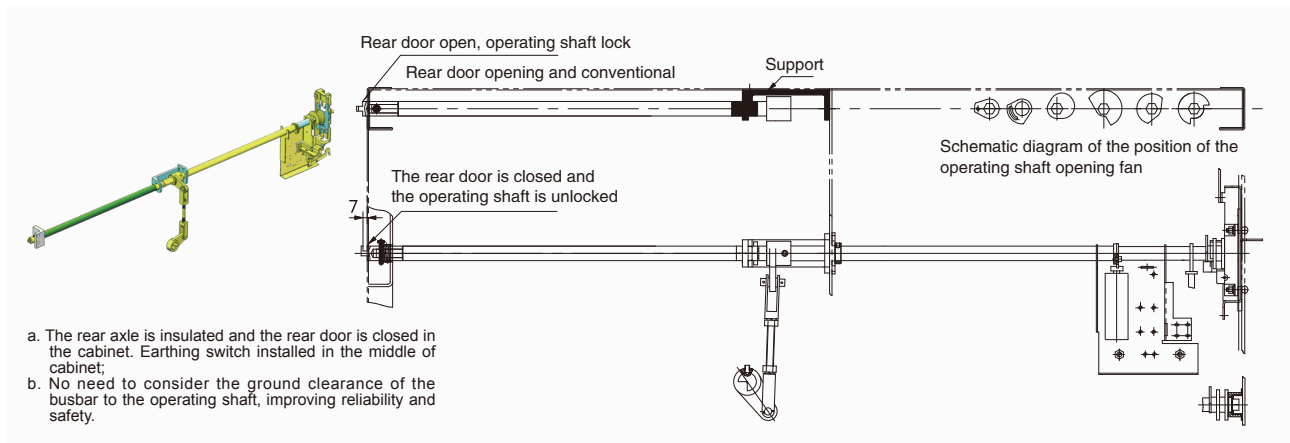
No.	Name	Drawing no.	Qty. (pc/set)	No.	Name	Drawing no.	Qty. (pc/set)
1	Bearing	8GP.263.011	1	10	Stopper sleeve	8GP.210.322	1
2	Stopper plate	8GP.151.084	2	11	Operation rod	8GP.174.214	1
3	Axis sleeve	8GP.210.014.1	2	12	Cover	8GP.017.011.2	1
4	Sector	8GP.151.041	1	13	Support base	5GP.043.022	1
5	Axis sleeve	8GP.210.014.2	1	14	Slider	8GP.143.010	2
6	Bolt M 5X12	GB70-85	1	15	Supporting plate	8GP.161.059	1
7	Sector	8GP.151.042	1	16	Supporting plate	8GP.161.058	1
8	Sector	8GP.151.043	1	17	Tooth plug plate	8GP.151.044	1
9	Axis sleeve	8GP.210.014.3	1	18	Tag	8GP.860.010	1

Note: 1. This mechanism need interlocked with down door, please specify when ordering.

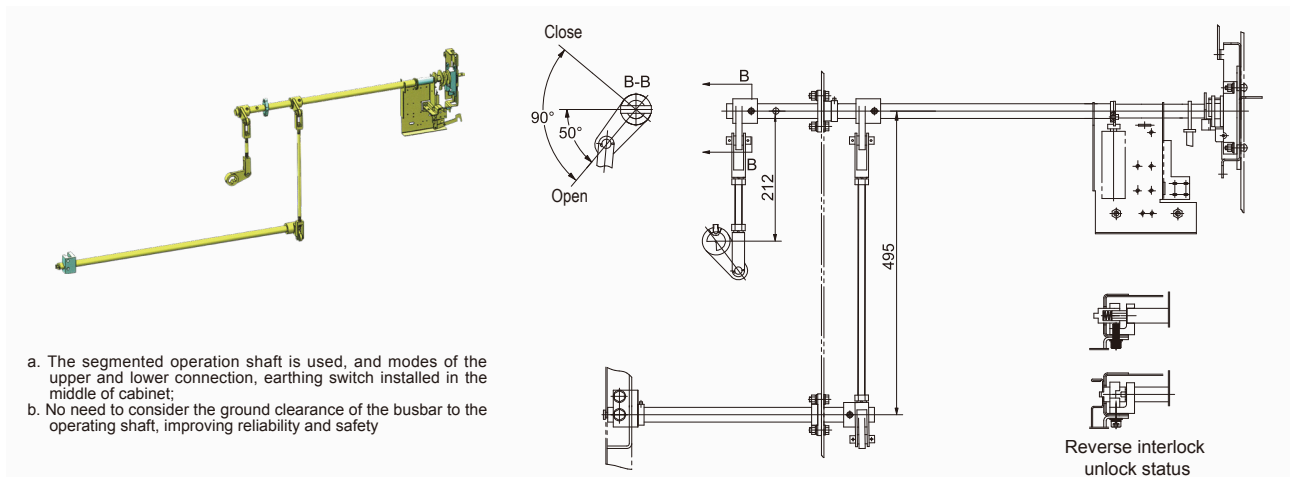
● Earthing switch operation mechanism(For connection arm drive) 5GP.363.010.3



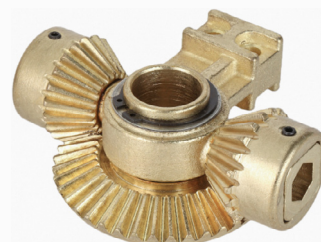
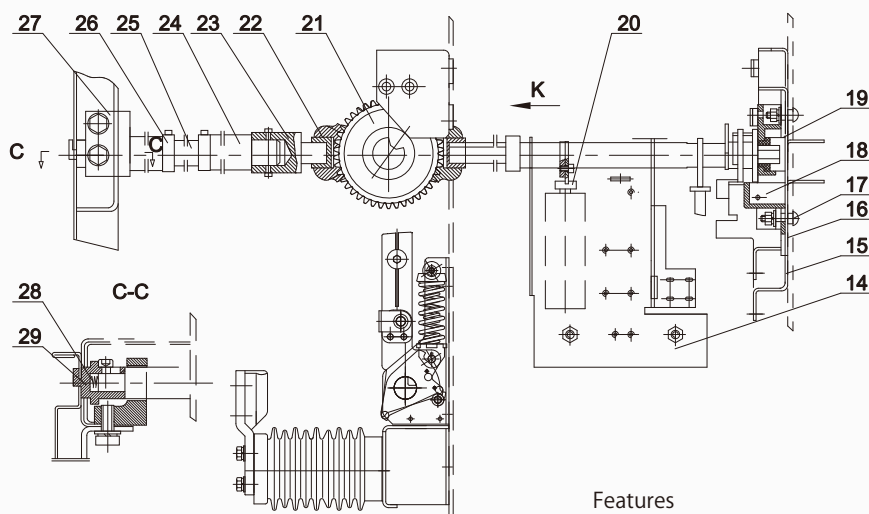
● Earthing switch operation mechanism(type of insulating rod) 5GP.363.010.3/JY



● Earthing switch operation mechanism(type of Split) 5GP.363.010.3/FT

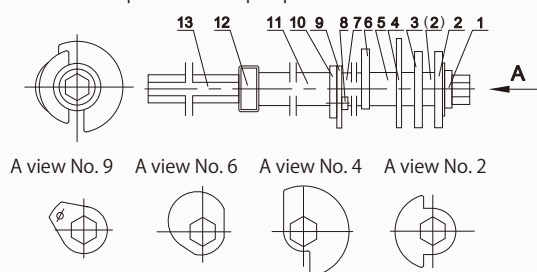


● Earthing switch operation mechanism interlock device(For two-way bevel gear drive operation)
5GP.577.1002/ 5GP.577.1002.1



5GP.245.002.1

Operation rod open position view



Features

Two-way (full gear) bevel gear, to achieve the back door (sealing plate) interlocked, and there are two forms:

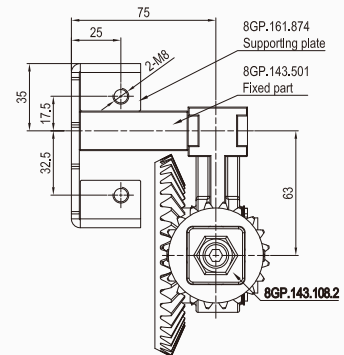
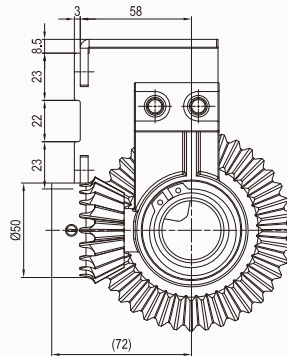
- 5GP.577.1002 is one-way interlock, after earthing switch close then could open the rear door(Sealing plate), then after rear door(sealing plate), could still operating the earthing switch. Its interlock function as 5GP.360.010.
- 5GP.577.1002.1 is two-way interlock, after earthing switch close then could open the rear door, after the rear door open, then could not operate the earthing switch. Its interlock function as 5GP.363.010.1.

Earthing switch operation mechanism interlock device(For two-way bevel gear drive operation)
5GP.577.1002 / 5GP.577.1002.1 arrangement list

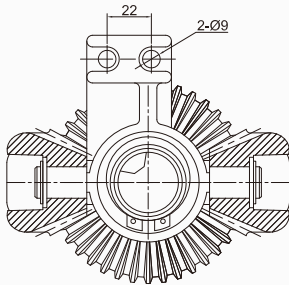
No.	Name	Drawing no.	Qty. (pc/set)
1	Bearing	8GP.263.011	1
2	Stopper plate	8GP.151.084	2
3	Axis sleeve	8GP.210.014.1	2
4	Sector	8GP.151.041	1
5	Axis sleeve	8GP.210.061	1
6	Sector	8GP.151.039	1
7	Axis sleeve	8GP.211.062	1
8	Bolt M5X12	GB70-85	1
9	Sector	8GP.151.042	1
10	Sector	8GP.151.043	1
11	Axis sleeve	8GP.210.014.3	1
12	Stopper sleeve	8GP.210.322	1
13	Operation rod	8GP.174.214	1
14	Supporting plate	8GP.161.058	1
15	Supporting plate	8GP.161.059	1
16	Slider	8GP.143.010	2
17	Bolt M6X25	GB12-88	2
18	Support base	5GP.043.022	1
19	Cover	8GP.017.011.2	1
20	Tooth plug plate	8GP.151.044	1

No.	Name	Drawing no.	Qty. (pc/set)
21	Bevel gear assembly	5GP.245.002.1	1
22	Link part	8GP.143.108.2	1
23	Link sleeve	5GP.259.001.1	1
24	Axis sleeve	8GP.211.060	2
25	Operation rod (Matching 5GP.577.1002)	8GP.200.011.1 For cabinet depth 1500	1
		8GP.200.011.2 For cabinet depth 1660	
		8GP.200.012.1 For cabinet depth 1500	
		8GP.200.012.2 For cabinet depth 1660	
26	Stopper sleeve	8GP.211.057	2
27	Support base	8GP.043.019.7	1
28	Pressure spring	8GP.282.201(For 5GP.577.1002.1)	1
29	Locking sleeve	8GP.211.059(For 5GP.577.1002) 8GP.211.201(For 5GP.577.1002.1)	1
30	Supporting plate	8GP.161.874	1
31	Fixed part	8GP.143.501	1
32	Tag	8GP.860.010	1

Bevel gear assembly model and installation dimension

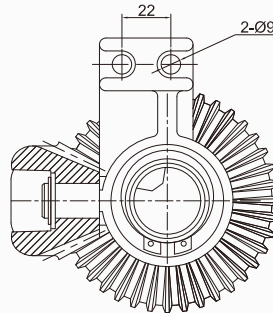


Note: a. When ordering please specify the model of bevel gear; b. Model 8GP.161.874 Supporting plate and 8GP.143.501 are for option, will not arrange with gear if not special specify when ordering.



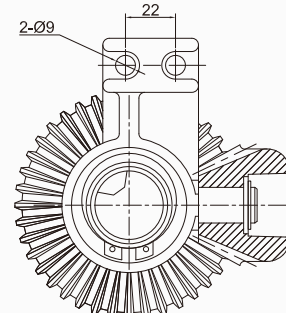
Double way bevel gear assembly 5GP.245.002.1

100055



Single way bevel assembly 5GP.245.001

100063



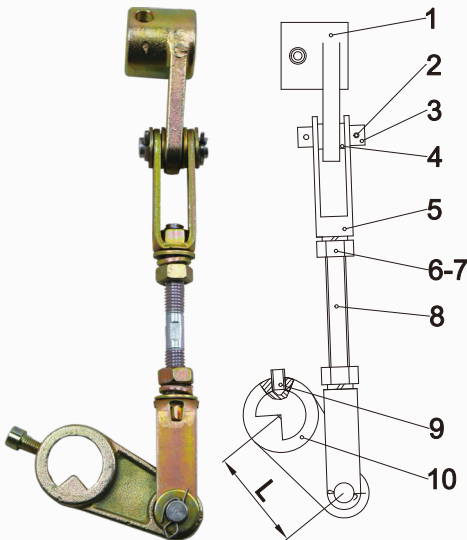
Single way bevel gear assembly(Reverse) 5GP.245.001.5

100566

Connection arm assembly 5GP.233.030

100069: L=60 Standard

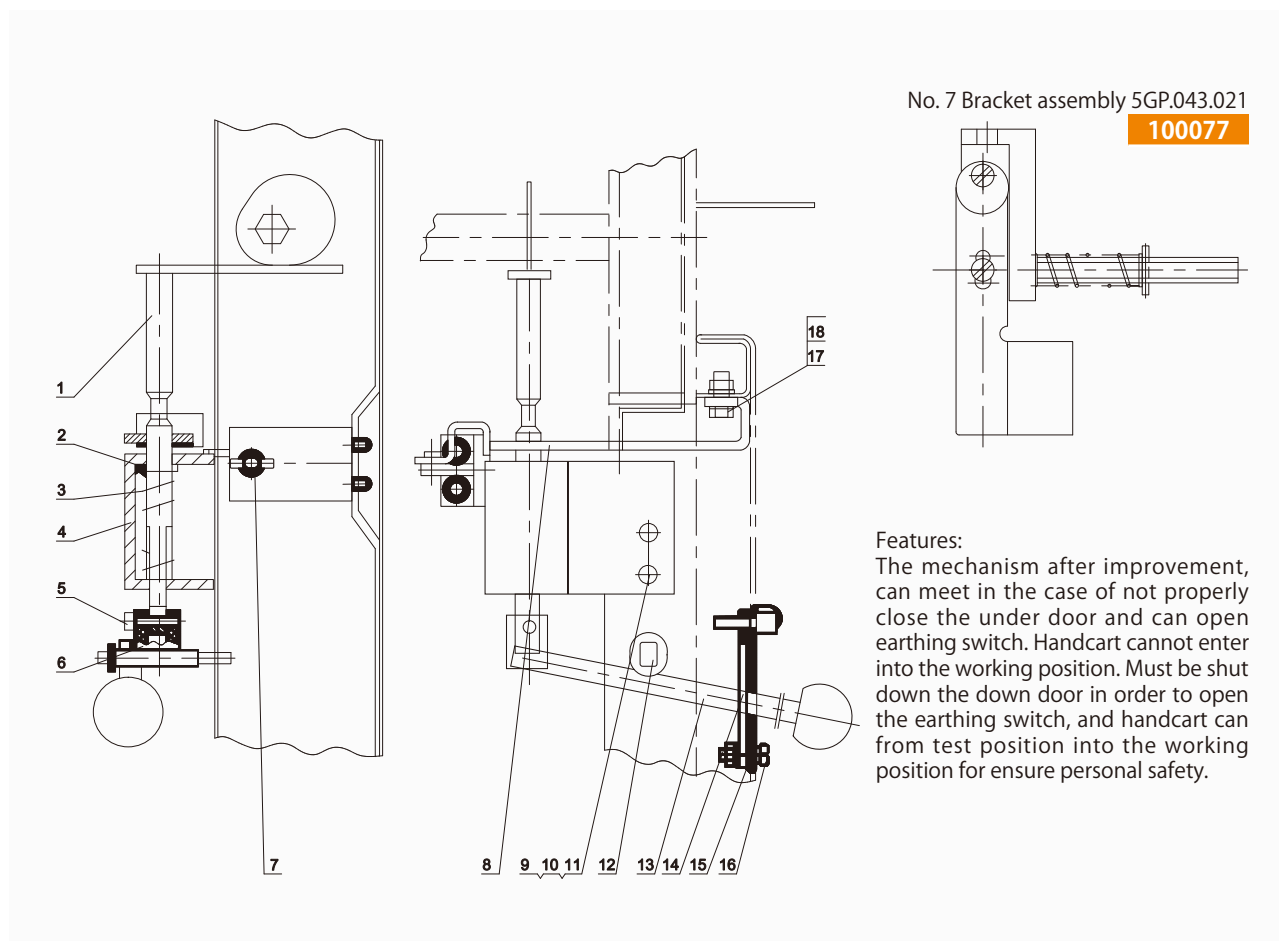
100070: L=80 Optional



No.	Name	Drawing no.	Qty. (pc/set)	L
1	Connection arm	5GP.151.016.1	1	
2	Cotter pin 4X20	GB91-86	4	
3	Pin with hole 12X40	GB880-86	2	
4	Washer	8GP.950.010	4	
5	Clamp fork	8GP.257.010	2	
6	Nut M12	GB6170-86	2	
7	Washer 12	GB93-87	2	
8	Bolt M12X120	GB901-88	1	
9	Bolt M8X16	GB78-85	1	
10	Connection arm	5GP.233.030.1 Connection rod	1	
		For 5GP.151.017	1	60
		5GP.233.030.3 Connection rod	1	
		For 5GP.151.017.1	1	80

Note: Connection arm assembly arranging common connection arm L=60.
If user need connection arm L=80, shall specify when ordering.

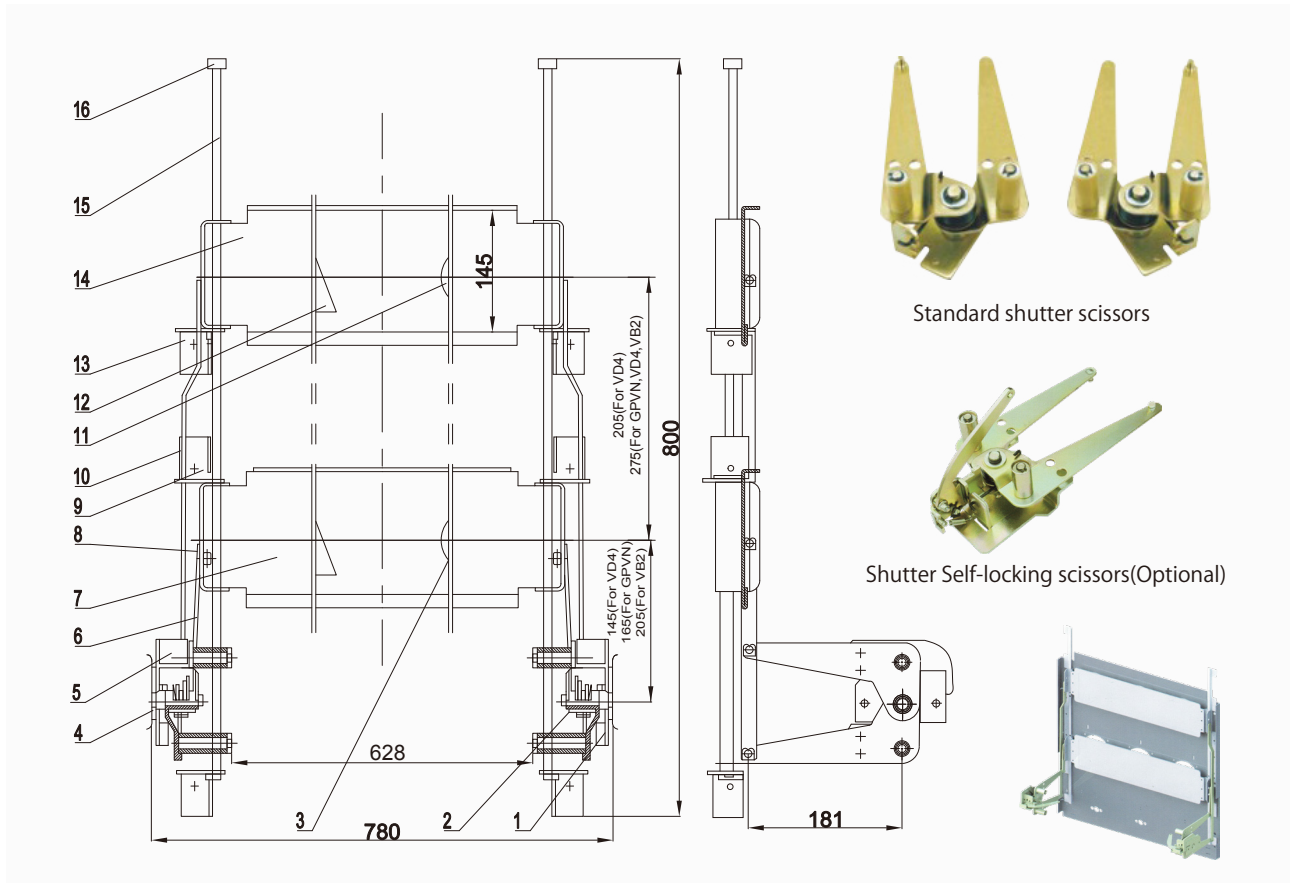
Down door interlock mechanism 5GP.239.010 100076



Down door interlock mechanism 5GP.239.010 arrangement list

No.	Name	Drawing no.	Qty. (pc/set)	No.	Name	Drawing no.	Qty. (pc/set)
1	Pin axis welding	5GP.234.013	1	10	Washer 6	GB93-87	5
2	Pressure spring	8GP.282.021	1	11	Washer 6	GB97.1-85	7
3	Pin3X20	GB879-86	2	12	Pin	8GP.200.015	1
4	Support base	8GP.043.020	1	13	Handle	5GP.253.010	1
5	Bolt M5X12	GB70-85	1	14	Backing plate	8GP.156.011	1
6	End cap	8GP.017.010	1	15	Supporting plate	8GP.161.055	1
7	Bracket assembly	5GP.043.021	1	16	Pin	8GP.993.051	2
8	Locking part	8GP.060.012	1	17	Bolt M6X20	GB5783-85	2
9	Bolt M6X20	GB70-85	3	18	Nut M6	GB6170-86	2

● (800mm width middle-placed switchgear) Shutter assembly 5GP.320.010 installation diagram



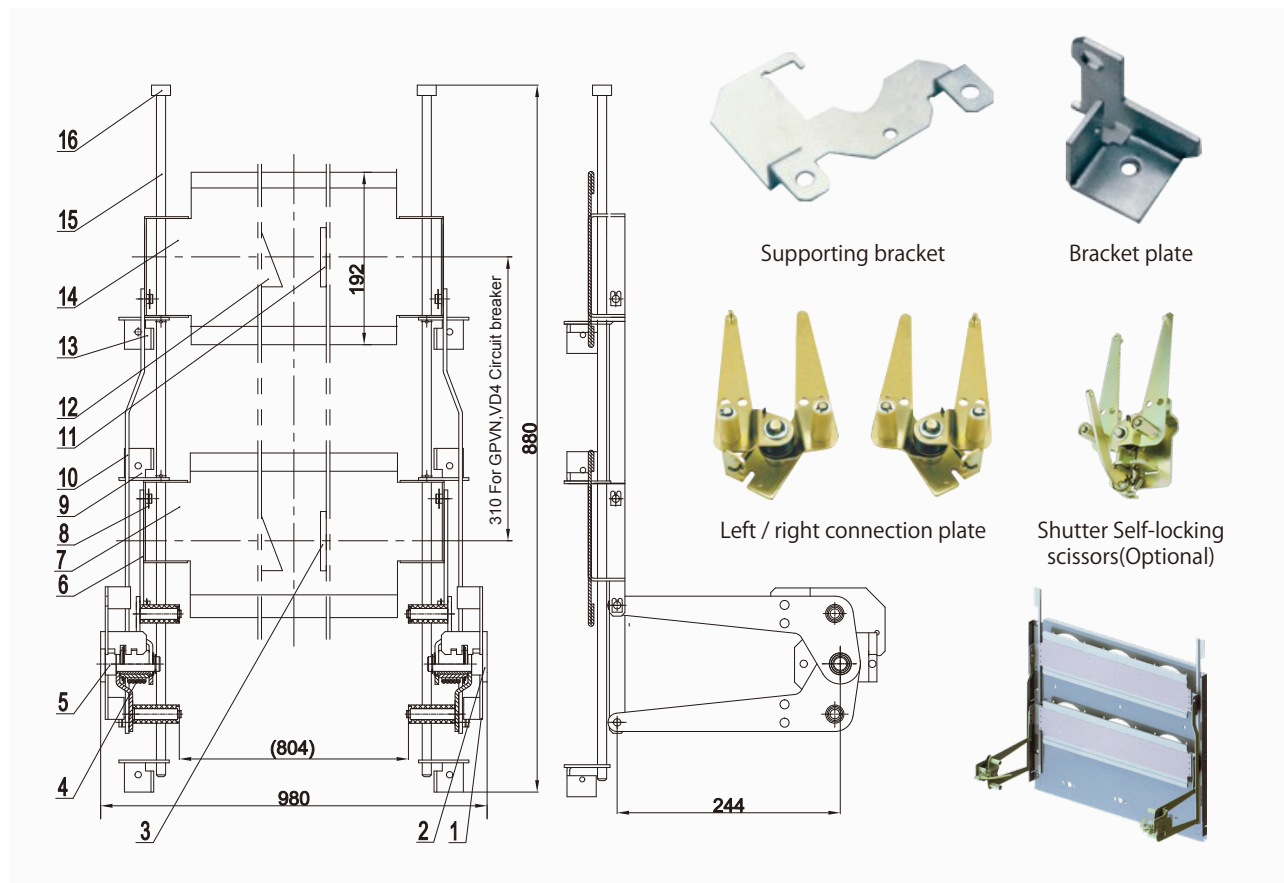
(800mm width middle-placed switchgear) Shutter assembly 5GP.320.010 arrangement list

No.	Name	Drawing no.	Qty. (pc/set)	No.	Name	Drawing no.	Qty. (pc/set)
1	Right supporting bracket	8GP.123.011	1	10	Connection welding	5GP.174.017.1(For VD4, 40kA)	2
2	Right connection plate	5GP.235.011	1			5GP.174.017.2(For VD4, 31.5kA)	
3	Indicating tag	8GP.866.014	1			5GP.174.017.3(For GPN)	
4	Left connection	5GP.235.010	1			5GP.174.017.4(For VB2)	
5	Left supporting bracket	8GP.123.010	1	11	Indicating tag	8GP.866.012	1
6	Connection welding	5GP.174.016.1(For VD4)	2	12	Indicating tag	8GP.866.013	2
		5GP.174.016.2(For GPN)		13	Bracket plate	8GP.123.012	3
		5GP.174.016.3(For VB2)		14	Upper shutter	8GP.320.011	1
7	Down shutter gate	8GP.320.010	1	15	Guide rod	8GP.234.011(For VD4, GPN)	2
8	Block jammed 8	DK-8	8			8GP.234.011.1(For VB2)	
9	Bracket plate	8GP.123.013	3	16	Stopper sleeve	8GP.210.011	2

Other specification shutter arrangement list

Code	5GP.320.010.1	5GP.320.010.2	5GP.320.010.3	5GP.320.010.4	5GP.320.010.5
Cabinet width	650mm	700mm	840mm	900mm	1000mm
Upper gate	8GP.320.011.1	8GP.320.011.2	8GP.320.011.3	8GP.320.011.4	8GP.320.011.5
Down gate	8GP.320.010.1	8GP.320.010.2	8GP.320.010.3	8GP.320.010.4	8GP.320.010.5

● (1000mm width middle-placed switchgear) Shutter assembly 5GP.320.011



(1000mm width middle-placed switchgear) Shutter mechanism device 5GP.320.011 arrangement list

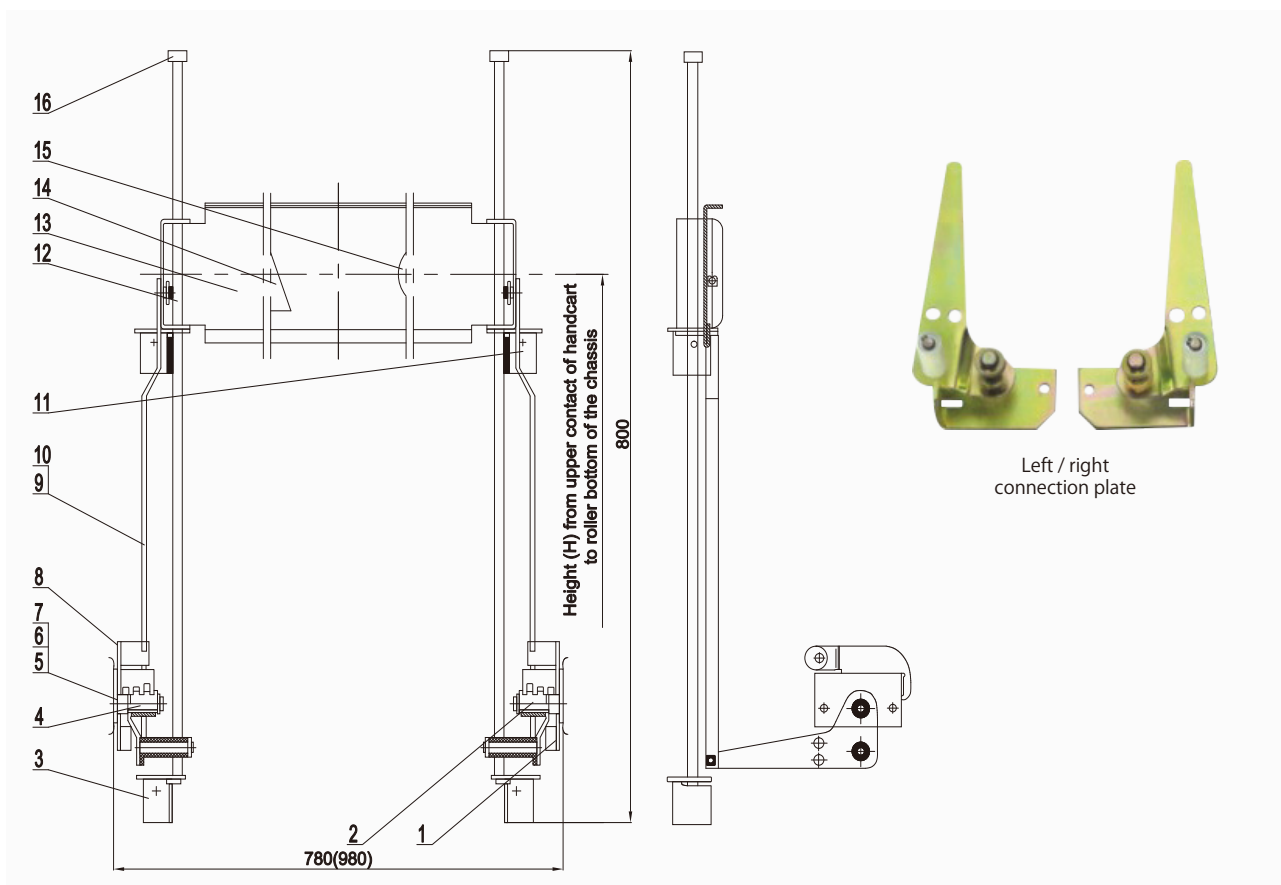
No.	Name	Drawing no.	Qty. (pc/set)	No.	Name	Drawing no.	Qty. (pc/set)
1	Right supporting bracket	8GP.123.276	1	9	Bracket plate	8GP.123.278	3
2	Right connection plate	5GP.235.012	1	10	Connection welding joint	5GP.174.282	2
3	Indicating tag	8GP.866.014	1	11	Indicating tag	8GP.866.012	1
4	Left connection plate	5GP.235.013	1	12	Indicating tag	8GP.866.013	2
5	Left supporting bracket	8GP.123.275	1	13	Bracket plate	8GP.123.277	3
6	Connection weld assembly	5GP.174.281	2	14	Upper shutter	8GP.320.274	1
7	Down shutter	8GP.320.273	1	15	Guide rod	8GP.234.272	2
8	Block jammed 10	DK-10	8	16	Stopper sleeve	8GP.210.011	2

Other specification shutter arrangement list

Code	5GP.320.011.1	5GP.320.011/JY	5GP.320.011.2	5GP.320.011.3
Cabinet width	800mm	1000mm(Insulating)	1100mm	1200mm
Upper gate	8GP.320.274.1	5GP.320.275	8GP.320.274.2	8GP.320.274.3
Down gate	8GP.320.273.1	5GP.320.275.1	8GP.320.273.2	8GP.320.273.3

Note: 5GP.320.275 is for insulating shutter by SMC plate in middle and both end by steel plate, other shutter assembly if need insulating gate please specify.

800mm / 1000mm Width middle-placed switchgear) upper gate shutter assembly device 5GP.320.012 / 5GP.320.012.1



800mm / 1000mm Width middle-placed switchgear) shutter assembly device 5GP.320.012 / 5GP.320.012.1 arrangement list

No.	Name	Drawing no.	Qty. (pc/set)
1	Right supporting bracket	8GP.123.011	1
2	Down connection plate assembly (right)	5GP.174.004	1
3	Bracket plate	8GP.123.012	2
4	Down connection assembly (Left)	5GP.174.003	1
5	Washer 6	GB97.1-85	14
6	Washer 6	GB93-87	8
7	Bolt M6X12	GB5783-86	8
8	Left supporting bracket	8GP.123.010	1
9	Block jammed 8	DK-8	4

No.	Name	Drawing no.	Qty. (pc/set)
10	Connection welding joint	5GP.174.015.1 (H=535, as VD4, 40kA) 5GP.174.015.2 (H=465, as VD4, 31.5kA) 5GP.174.015.3 (H=555, as GPVN)	2
11	Bracket plate	8GP.123.013	2
12	Guide rod	8GP.234.011	2
13	Upper shutter	8GP.320.011 (For cabinet width 800mm) 8GP.320.011.5 (For cabinet width 1000mm)	1
14	Indicating tag	8GP.866.013	1
15	Indicating tag	8GP.866.012	1
16	Stopper sleeve	8GP.210.011	2

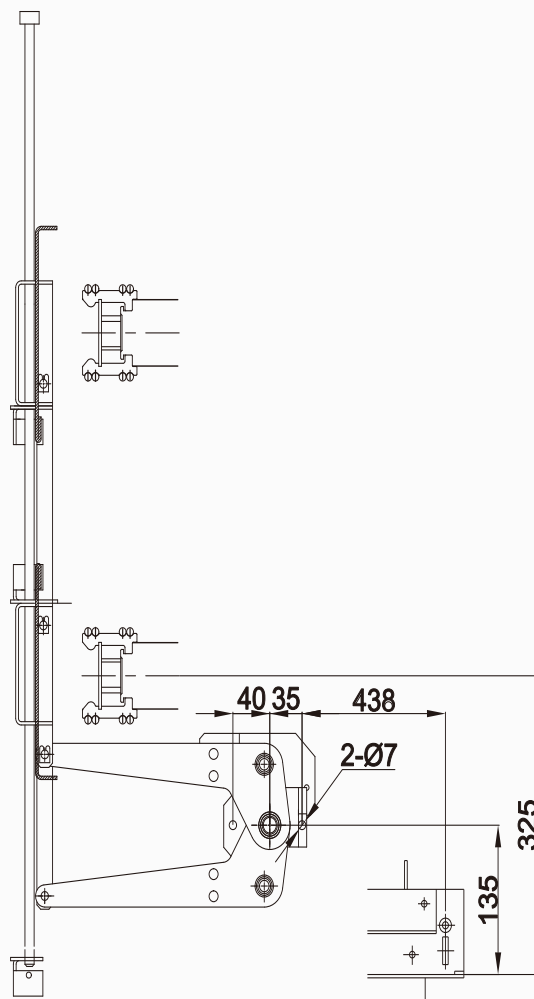
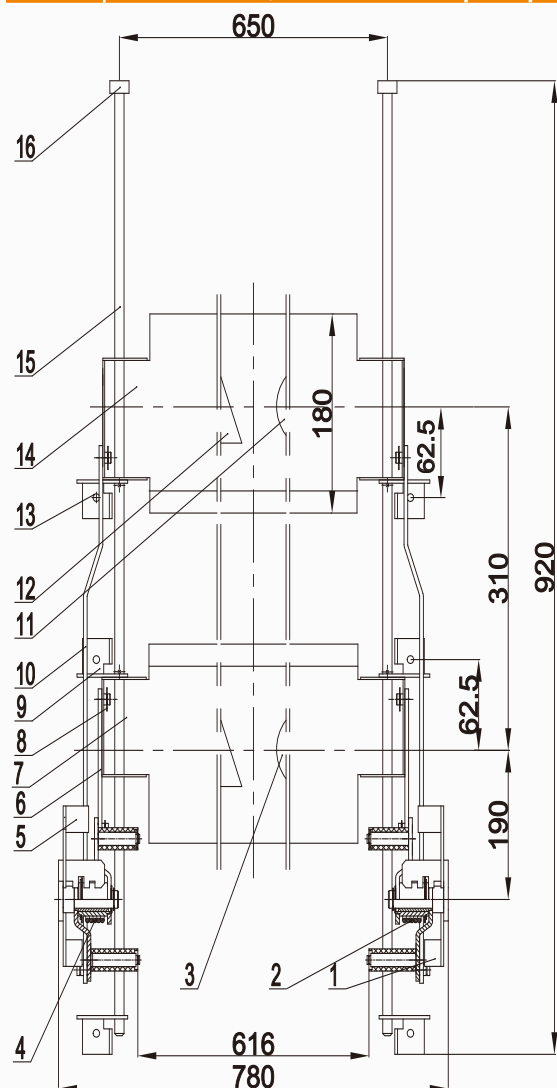
800(1000)mm width middle placed switchgear down gate shutter assembly device 5GP.320.014/5GP.320.014.1

No.	Name	Drawing no.	Qty. (pc/set)
1	Right supporting bracket	8GP.123.011	1
2	Right connection plate	5GP.235.011.2	1
3	Bracket plate	8GP.123.012	2
4	Left connection plate	5GP.235.010.2	1
5	Left supporting bracket	8GP.123.010	1
6	Block jammed 8	DK-8	4
7	Connection welding joint	5GP.174.016.305	2

No.	Name	Drawing no.	Qty. (pc/set)
8	Indicating tag	8GP.866.012	1
9	Indicating tag	8GP.866.013	1
10	Down shutter gate	8GP.320.010(800mm) 8GP.320.011.5(1000mm)	1
11	Guide rail	8GP.234.047.560	2
12	Limit sleeve	8GP.210.011	2
13	Bracket plate	8GP.123.013	2

● Shutter assembly 5GP.320.010/24(800 width 24kV middle-placed switchgear)

800W	100155: 630A, Copper guide plan
	100683: 630A, Aluminum guide plan
	100599: 630A, PT truck middle-place plan



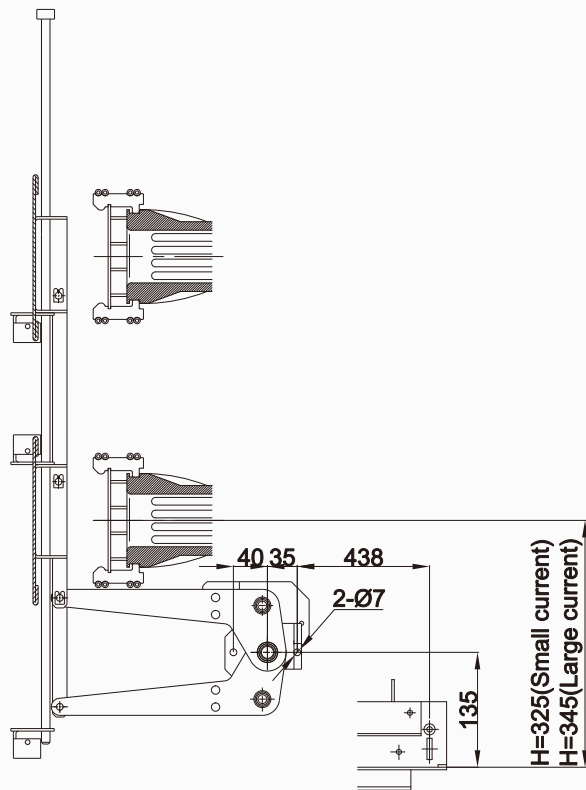
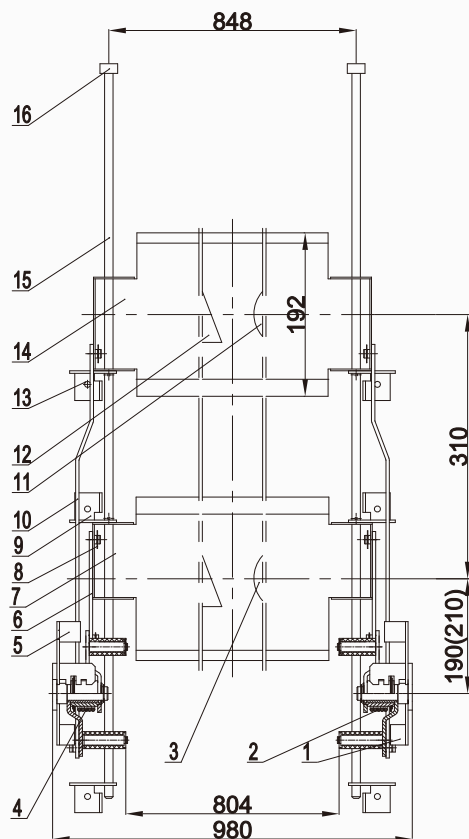
(800 Width, 24kV middle-placed switchgear shutter assembly 5GP.320.010/24 arrangement list

No.	Name	Drawing no.	Qty. (pc/set)
1	Right support frame	8GP.123.011.2	1
2	Left side connection plate	8GP.235.011.7	1
3	Indicating tag	8GP.866.014	1
4	Left side connection plate	8GP.235.010.7	1
5	Left support plate	8GP.123.010.2	1
6	Connection welding joint	5GP.174.016.145	2
7	Down gate	8GP.320.010.37	1
8	Block jammed 8	DK-8	8

No.	Name	Drawing no.	Qty. (pc/set)
9	Supporting frame	8GP.123.013	3
10	Connection welding joint	5GP.174.015.588	2
11	Indicating tag	8GP.866.012	1
12	Indicating tag	8GP.866.013	2
13	Supporting tag	8GP.123.012	3
14	Upper gate	8GP.320.011.37	1
15	Guide rod	8GP.234.011.880	2
16	Stopper sleeve	8GP.210.011	2

● Shutter assembly 5GP.320.011/24(1000mm width 24KV middle-placed switchgear)

1000W	100167: Large current 345	100598: Small current, PT down placed plan
	100710: Small current 325	100597: Small current, PT middle placed plan



(1000mm width, 24kV middle-placed switchgear) Shutter assembly 5GP.320.011/24 arrangement list

No.	Name	Drawing no.	Qty. (pc/set)
1	Right support frame	8GP.123.276.1	1
2	Left side connection plate	5GP.235.012.10	1
3	Indicating tag	8GP.866.014	1
4	Left side connection plate	5GP.235.013.10	1
5	Left support plate	8GP.123.275.1	1
6	Connection welding joint	5GP.174.281.150 (For small current) 5GP.174.281.170 (For large current)	2
7	Down shutter	8GP.320.273	1
8	Block jammed 10	DK-10	8

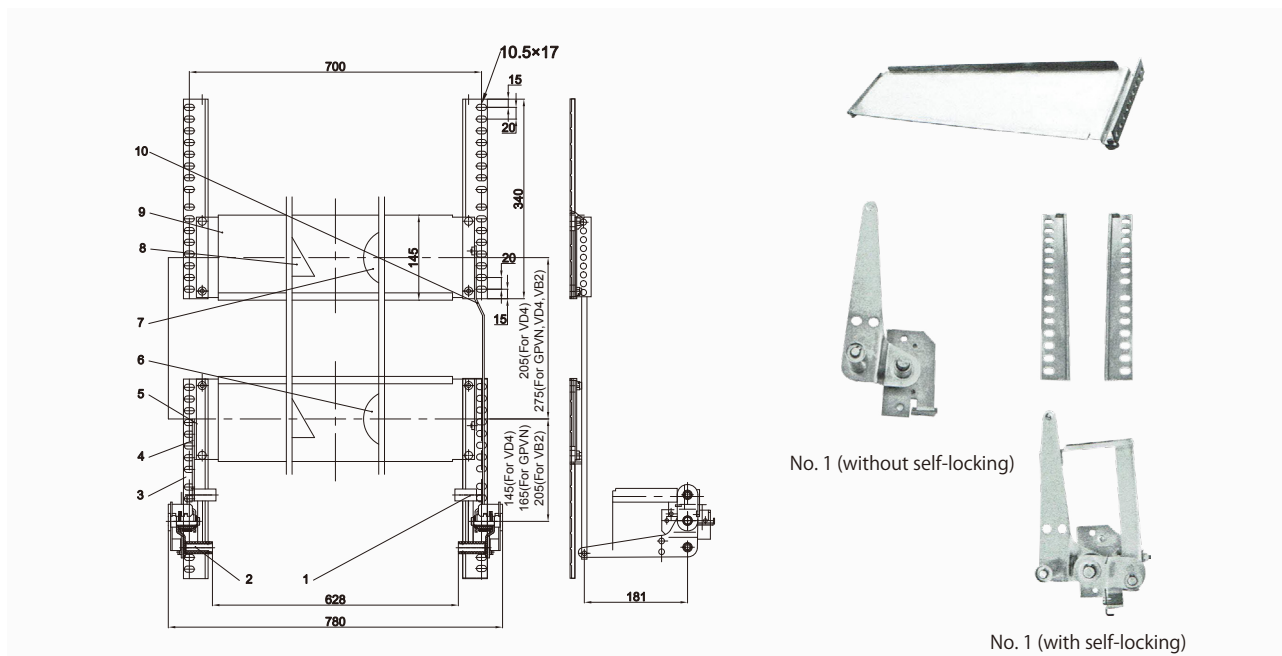
No.	Name	Drawing no.	Qty. (pc/set)
9	Bracket plate	8GP.123.278	3
10	Connection welding joint	5GP.174.282.585 (For small current) 5GP.174.282.605 (For large current)	2
11	Indicating tag	8GP.866.012	1
12	Indicating tag	8GP.866.013	2
13	bracket plate	8GP.123.277	3
14	Upper shutter	8GP.320.274	1
15	Guide rod	8GP.234.272/24	2
16	Stopper sleeve	8GP.210.011	2

Ordering notice: Generally, $\leq 1250A$ is small current, $H=325$, $\geq 1600A$ is large current, $H=345$,
But GPVN-1600A, H has 325 and 345 for option, if $H=325$ will as small current, $H=345$ is as large current.
(please specify the height when ordering)

One-side drive shutter assembly

GPN1-12/24kV exists 5GP.320.010 / 011 shutter assembly has the issues of not feeding synchronized and inconsistent, shutter is easy to tilt that cannot normally open or closed. To solve this problem, this shutter assembly is use of one side drive structure, equipped with roller bearings on the shutter gate, the track also adopted one side structure, which can adjust the gap between the rollers, so that when the shutter up and down movement is flexible, reliable, and not tilted. It is also take advantage of the vacant position after one side drive to increase the use of self-locking function valve for option, when the circuit breaker drawn-out, shutter gate cannot move and more safe.

One-side drive shutter assembly: 5GP.320.030 (self-locking) installation diagram.

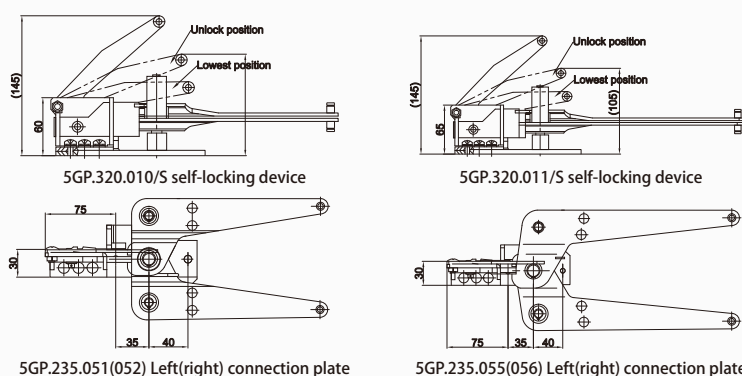


One-side drive shutter assembly: 5GP.320.030 (with self-locking), 5GP.320.032 (without self-locking) arrangement

No.	Name	Drawing no.	Qty. (pc/set)	No.	Name	Drawing no.	Qty. (pc/set)
1	Right connection plate	5GP. 235. 044 (Match with 5GP. 320. 030) 5GP. 174.004 (Match with 5GP. 320. 032)	1	5	Block jammed	DK-8	4
2	Left connection plate	5GP. 235. 043 (Match with 5GP. 320. 030) 5GP. 174. 076 (Match with 5GP. 320. 032)	1	6	Indicating tag	8GP. 866.014	1
3	Single guide	8GP. 260. 030	4	7	Indicating tag	8GP. 866.012	1
4	Connection plate welding	5GP.174.016.1~2	1	8	Indicating tag	8GP.866.013	2
				9	Match with shutter gate assembly	5GP.320. 033	2
				10	Connection welding joint	5GP. 174.015.1~3	1

Shutter assembly self-interlock device

The previous 5GP.320.010 / 011 shutter assembly when the breaker is withdrawn, could move up and down the shutter gate which is unsafe. Now added self-locking device on the previous left and right connection plate, to meet the requirement of not directly move the shutter gate after the breaker is draw-out. The needs of the self-locking device, please add S in the original model.

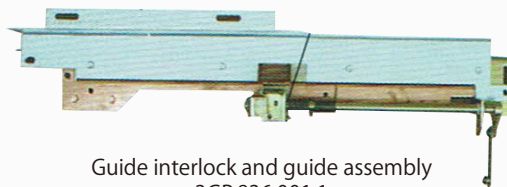


● 12kV Copper guide rail For earthing clamp

100578 <Left and right as one set>

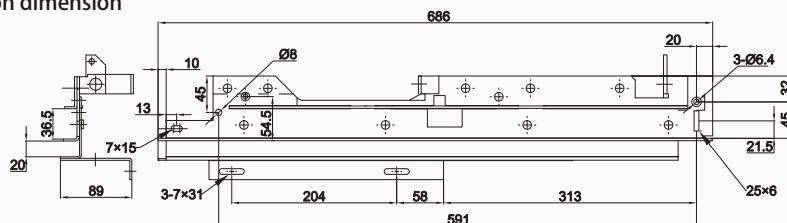


Left guide 5GP.260.011.20/BJK



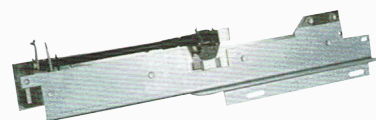
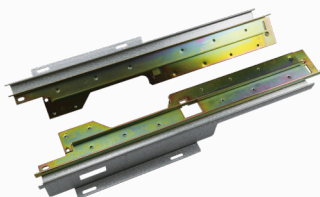
Guide interlock and guide assembly
3GP.836.001.1

Outline and installation dimension



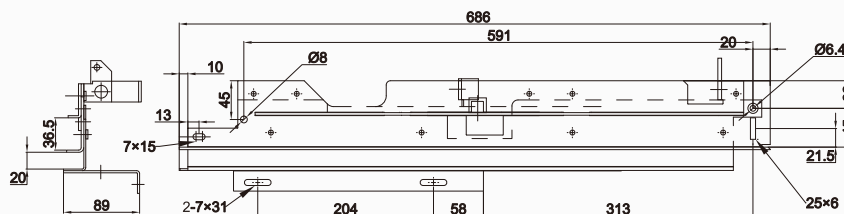
● 12kv Metal guide rail

100579 <Left and right as one set>

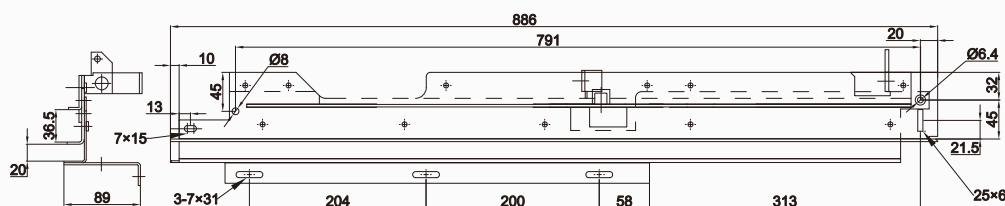


Guide interlock and guide assembly 3GP.836.001

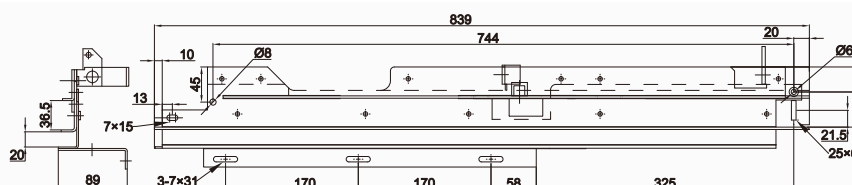
● Guide rail 5GP.260.⁰¹⁰₀₁₁ (Standard type)



● Guide rail 5GP.260.⁰¹⁰₀₁₁.3 (Extend type) Extend 200, for modified withdrawable VCB of 3AH, VN12, VN28, VN65)

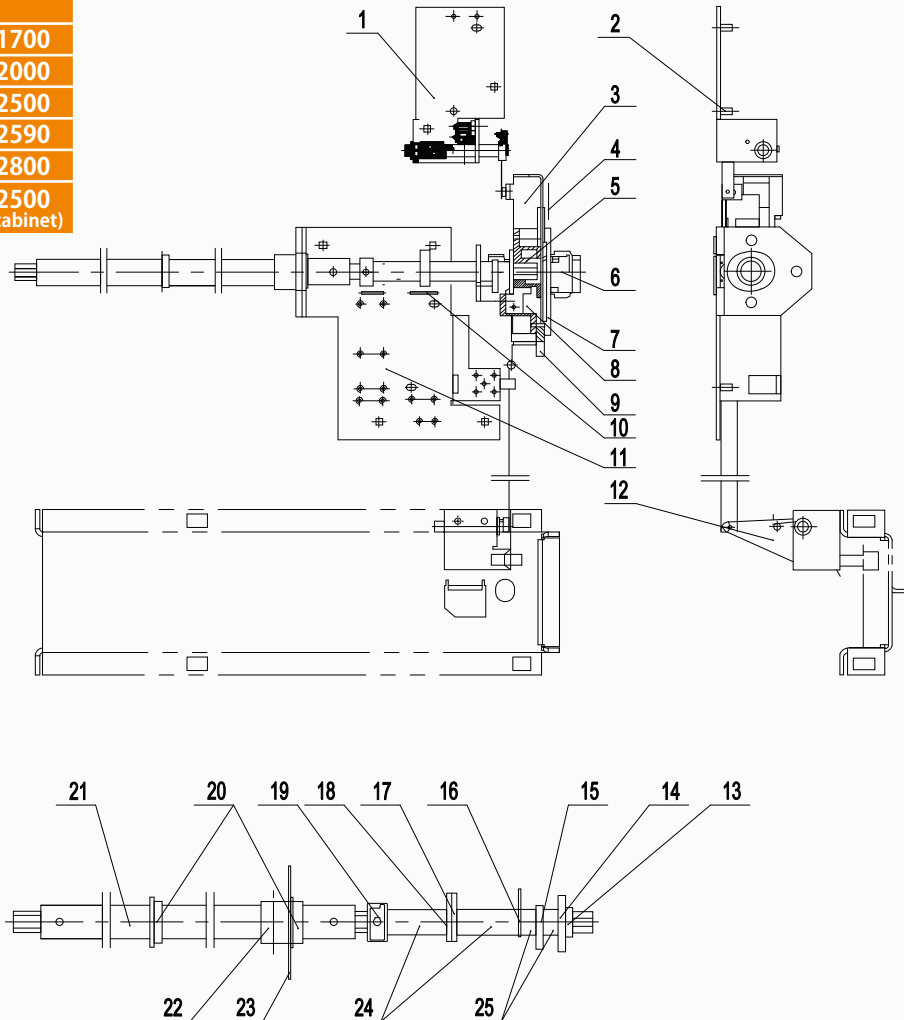


● Guide rail 5GP.260.⁰¹⁰₀₁₁.10 (Extend type: extend 153. For VB2 etc.)



● 36KV (40.5kV) Earthing switch operation mechanism interlock device 5GP.362.011

100215: D=2600
(For VD4)
100663: D=1700
100559: D=2000
100558: D=2500
100790: D=2590
100548: D=2800
100560: D=2500
(ES in middle of cabinet)



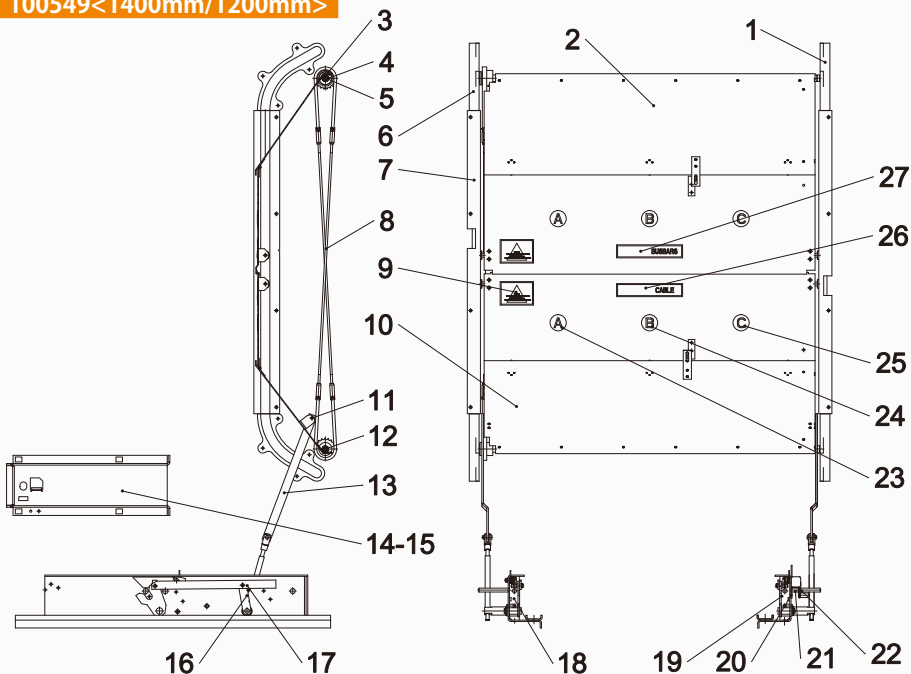
Arrangement list of 36kV earthing switch operation mechanism interlock device 5GP.362.011

No.	Name	Drawing no.	Qty. (pc/set)	No.	Name	Drawing no.	Qty. (pc/set)
1	Earthing switch stroke device	5GP.362.013	1	14	Stopper plate	8GP. 151.084	1
2	Sleeve	8GP. 211.101	4	15	Sector	8GP. 192. 012	1
3	Supporting plate	8GP. 161.059	1	16	Sector	8GP. 192.013	1
4	Tag	8GP. 867. 029	1	17	Sector	8GP. 151.043	1
5	Cover plate	8GP. 017.011.2	1	18	Sector	8GP. 151.042	1
6	Locking plate assembly	5GP. 141.001	1	19	Stopper sleeve	8GP.210.322	2
7	Plate	8GP. 150. 078	1	20	axis sleeve	8GP. 211.099	2
8	Branch base	5GP. 043. 022	1	21	Operation rod	5GP. 200. 087	1
9	Slider	8GP. 143.010	2	22	Sleeve	8GP.211. 122	1
10	Tooth plug plate	8GP. 151.044	1	23	Pressure plate	8GP. 128.051	1
11	Supporting plate	8GP. 161.076	1	24	Sleeve	8GP. 210.014. 10/HL	2
12	Grounding and chassis interlock device	5GP.362.012	1	25	Sleeve	8GP. 210. 014. 9/HL	2
13	Bearing	8GP. 263.011	1				

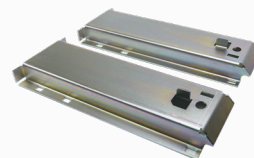
36KV (40.5kV) Guide shutter mechanism device 5GP.320.031 (Cabinet width 1200mm/1400mm)

100231<1200mm/1200mm>

100549<1400mm/1200mm>



No.1, No.6



No.14, No.15



No.18, No.19

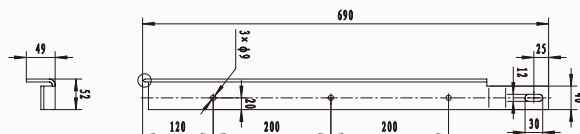
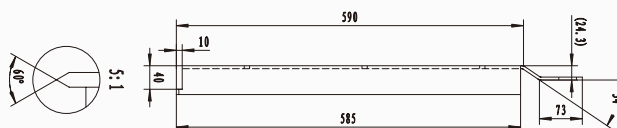
Arrangement list of 36kv guide shutter mechanism assembly 5GP.320.031

No.	Name	Drawing no.	Qty. (pc/set)
1	Guide slot	8GP. 357. 001	2
2	Upper shutter gate assembly	5GP. 320. 275. 18	1
3	Axis sleeve	8GP. 211.095	3
4	Copper sleeve	8GP. 211.096	2
5	Pin	8GP. 993. 080	2
6	Guide slot	8GP. 357. 002	2
7	Guide slot	8GP. 357. 003	2
8	Chain assembly	5GP. 294. 001	1
9	Tag	8GP. 867. 028	2
10	Down shutter assembly	5GP. 320. 275. 19	1
11	Pin	8GP. 993. 082	2
12	Pin	8GP. 993.081	2
13	Connection rod	8GP. 174.041	2
14	Positioning plate	8GP. 271.046	1

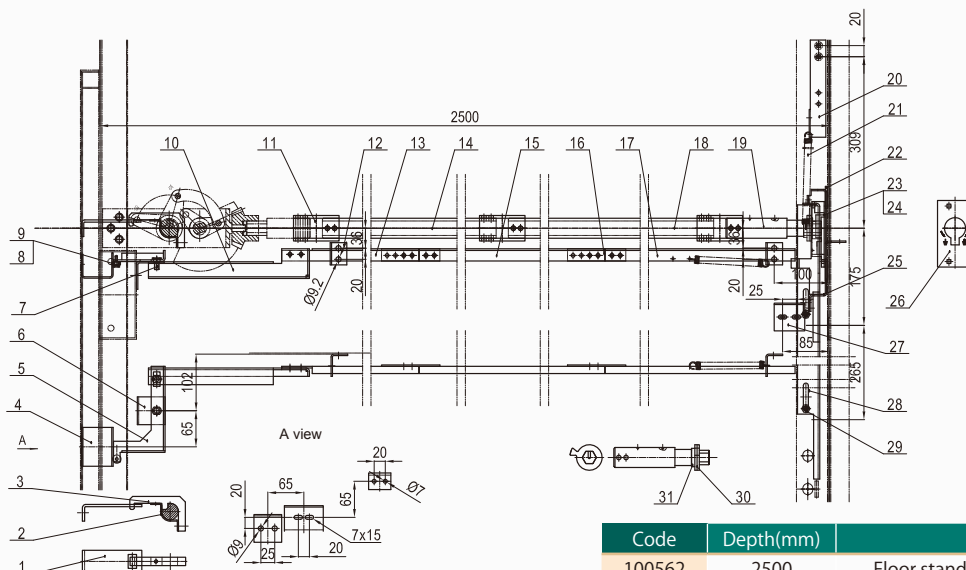
No.	Name	Drawing no.	Qty. (pc/set)
15	Positioning plate	8GP. 271.049	1
16	Sleeve	8GP. 211.098	1
17	Nut	8GP. 950.044	2
18	Left guide assembly	5GP. 260.014	1
19	Right guide assembly	5GP. 260. 015	1
20	Locking plate	8GP. 141.047	1
21	Sleeve	8GP. 211.097	1
22	Connection rod	8GP. 174.036	1
23	Tag	8GP. 867. 025	2
24	Tag	8GP. 867. 026	2
25	Tag	8GP. 867. 027	2
26	Tag	8GP. 867. 023	1
27	Tag	8GP. 867. 024	1

Earthing Busbar / 8GP.588.006

120162



● 36KV (40.5kV) Earthing switch operation mechanism interlock device 5GP.362.012



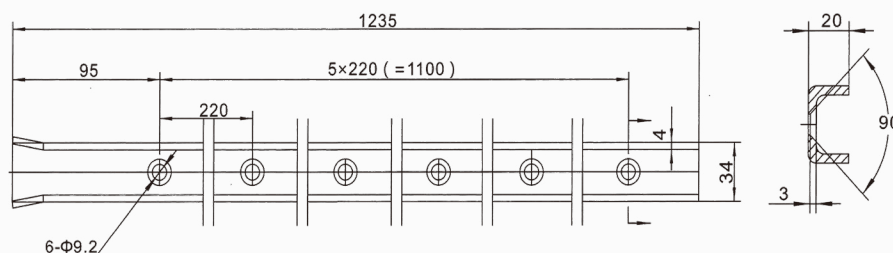
Code	Depth(mm)	Type
100562	2500	Floor stand, Type II, Right operation
100601	2500	Middle placed VCB, Type I, Left operation
100634	2600	Floor stand, Type I, Left operation

● Earthing switch operation mechanism device 5GP.363.021

No.	Description	Drawing no.	Qty. /Set
1	Rear door interlock plate	8GP.264.1510	1
2	Rear door interlock plate	8GP.264.1512	1
3	Lock hook	8GP.264.1511	1
4	Bolt	8GP.200.1533	1
5	Bracket	8GP.038.1533	1
6	Interlocking plate	8GP.264.1508	1
7	Interlocking plate	8GP.264.1509	2
8	Bolt	8GP.900.033	1
9	Washer	8GP.210.3142.2	1
10	Slot plate	8GP.623.1512	1
11	Axis sleeve	8GP.210.1527	3
12	Bracket	8GP.038.1534	1
13	Bending support	8GP.623.1516	1
14	ES operation rod	8GP.200.1511	1
15	Bending plate	8GP.623.1515	1
16	Connecting plate	8GP.264.1507	2

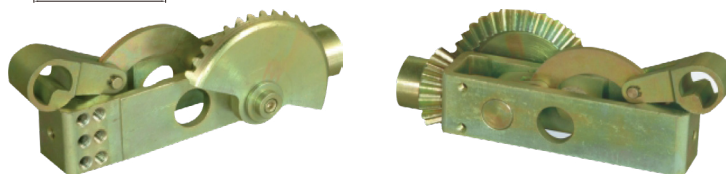
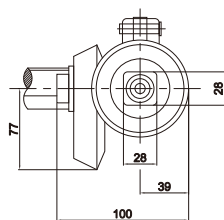
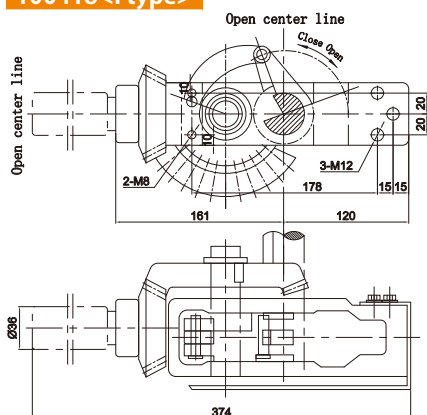
No.	Description	Drawing no.	Qty. /Set
17	Bending plate	8GP.623.1514	1
18	ES operation rod	8GP.200.1512	1
19	ES operation rod	8GP.200.1513	1
20	Hanging spring bracket	8GP.038.1536	1
21	Spring	8GP.282.016	3
22	Sliding plate	8GP.143.1529	2
23	Base	8GP.200.1529	1
24	Bottom plate	8GP.143.1530	1
25	Bending plate	8GP.628.1525	1
26	ES open close marking	8GP.200.1530	1
27	Blocking Magnetic Support plate	8GP.038.1549	3
28	Connecting rod	8GP.200.1514	1
29	Nut	8GP.940.1500	2
30	Sector	8GP.192.1510	2
31	Washer	8GP.950.1522	1

● 40.5kV Metal Limited Guide Rails 8GP.201.1502



Bevel gear operation mechanism

100418<I type>

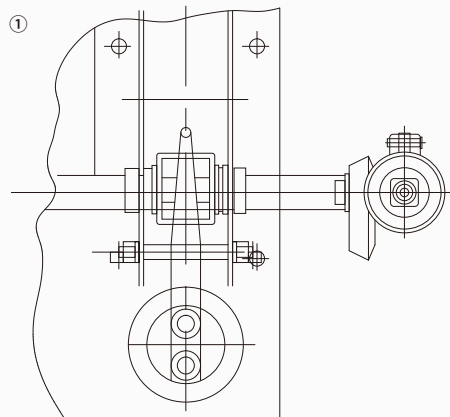


Mechanism ordering notice

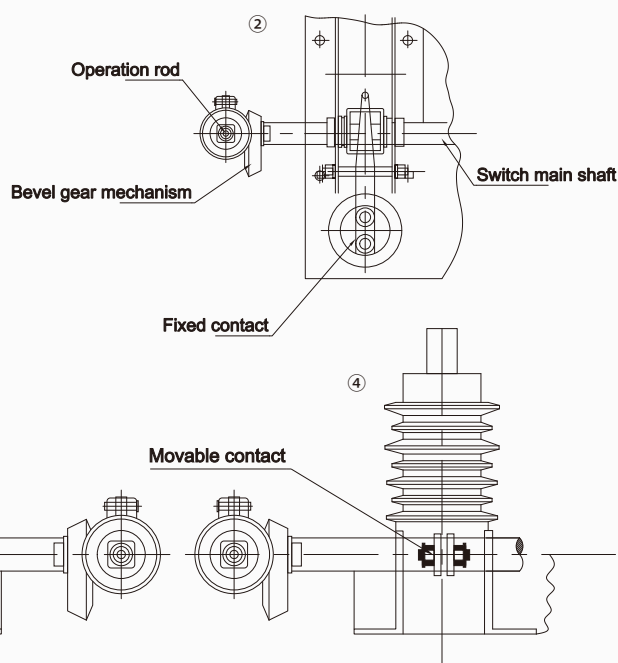
Specify the shaft operation way of mechanism operation and operation direction of left or right operation.
If any special requirements, please contact with GreenPower to develop detailed specifications.

Manual instruction

1. The GPL-40.5 bevel gear mechanism is for manual operation of GPJN22-40.5/31.5 Indoor High Voltage Earthing Switch, applicable for GPN1-40.5 switchgear and other similar equipment.
2. The rotation angle of operation shaft is $270^\circ : 90^\circ$ (Open-Close).
3. The operation mechanism as the picture showed is right operation of the close center line as operation mechanism's axis line, left operation will reverse assembly in factory. Users can assembly it on the left side as picture showing.
4. The V shape axis hole in the mechanism installed earthing switch main axis. Draw attention when mechanism fixed with cabinet.
 - a) In the operating rotation axis line device, small bevel gear should be engaged at large bevel gear teeth on the No. 3-4 position. Otherwise it will cause not reach the requirement of rotating corner.
 - b) The square core connection rod matching with the user's connection sleeve with holes drill 2- $\Phi 8$, front cabinet operating handle selected the best position for well operation.
 - c) Suggest to select $\Phi 16 \times 700$ single rod operation handle with suitable operation force.
5. Earthing switch can match a 1NO 1NC or 2NO 2NC micro-switch (Common type without micro-switch) for the open-close status indicating and electric control.

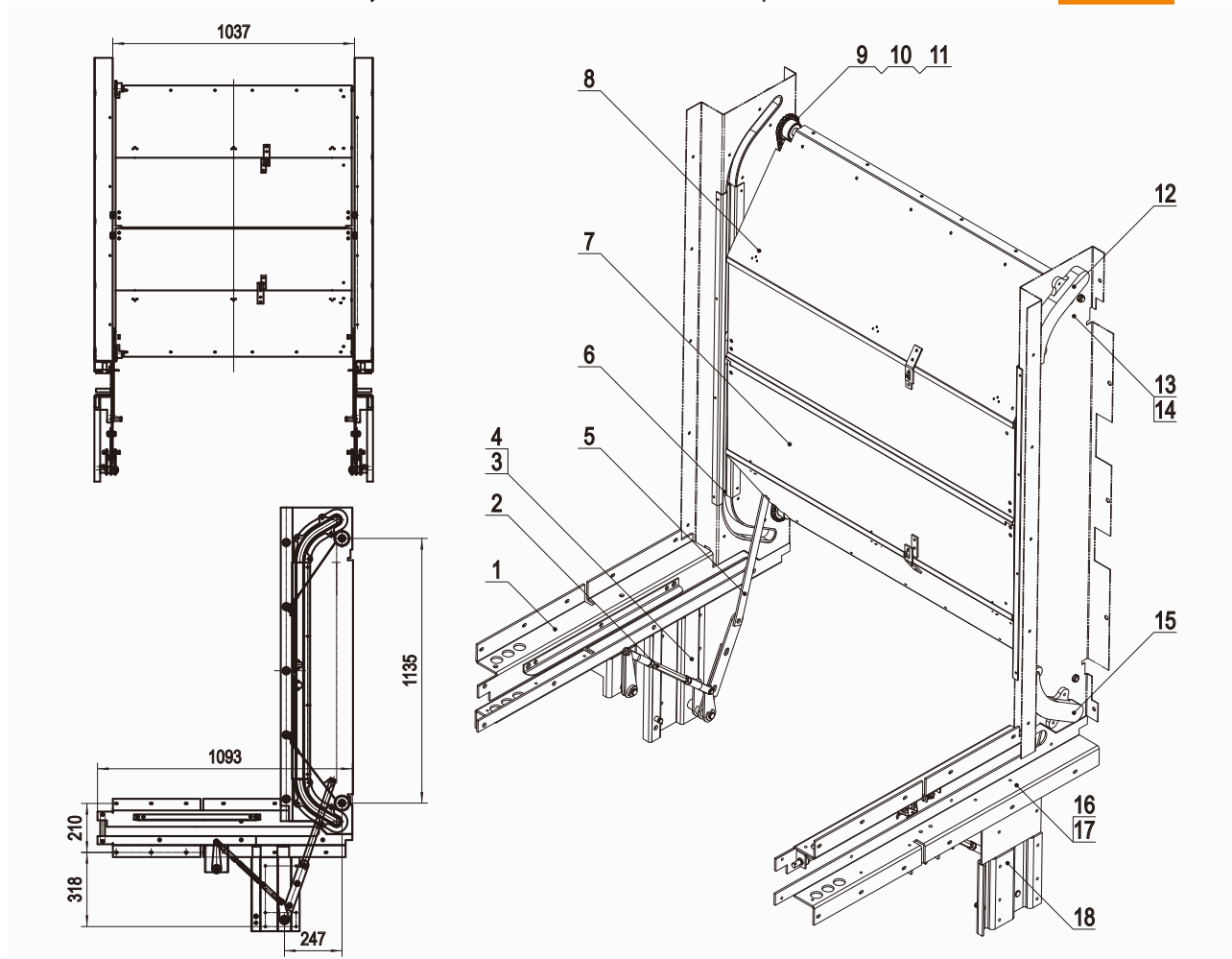


Fixed contact bus joint surface installed to the front of cabinet (Switch on the close status)
Movable contact installed to the front of cabinet (The switch on open status)



Operation way category	Operation mechanism rotating axis start position	Mechanism installed in main shaft position
1	Close position	Right operation
2	Close position	Left operation
3	Open position	Right operation
4	Open position	Left operation

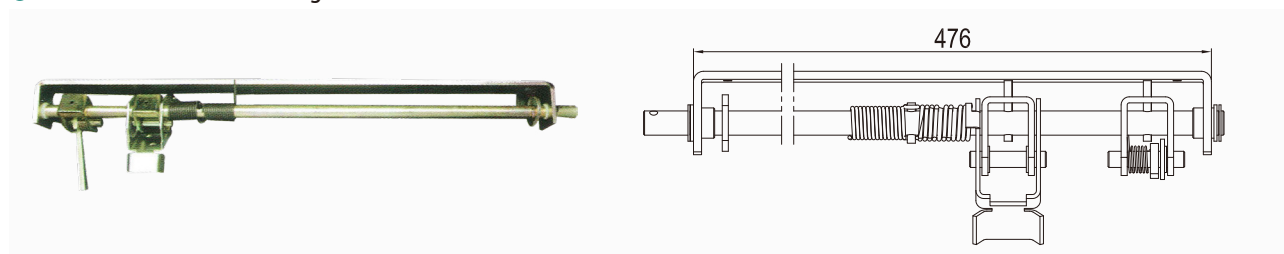
● 36kV(40.5kV) Guide shutter assembly mechanism device 5GP.320.036 (middle-plated cabinet width 1200mm) **100561**



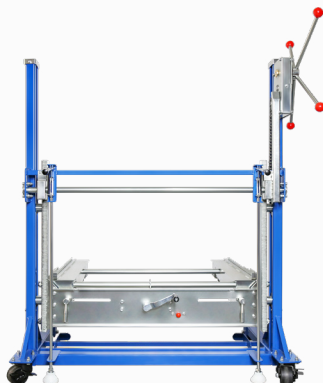
Middle-placed guide rail and shutter assembly 5GP.320.036(for Cabinet width 1200mm Width)

No.	Description	Drawing no.	Qty. /Set	No.	Description	Drawing no.	Qty. /Set
1	Left guide rail assembly	8GP.260.026	1	10	Axle sleeve	8GP.211.095	2
2	Drive rod assembly	5GP.174.107	2	11	Pin	8GP.993.081	2
3	Left connection rod assembly	5GP.238.025	1	12	Guide slot	8GP.357.001	2
4	Spring	8GP.288.059	2	13	Copper sleeve	8GP.211.096	2
5	Connection rod welded	5GP.174.109	2	14	Pin	8GP.993.080	2
6	Guide slot	8GP.357.003.2	2	15	Guide slot	8GP.357.002	2
7	Down shutter assembly	5GP.320.040	1	16	Right guide rail assembly	5GP.260.027	1
8	Upper shutter assembly	5GP.320.039	1	17	Guide rail spacer	8GP.193.015	2
9	Chain assembly	5GP.294.001	1	18	Right connection rod assembly	5GP.238.026	1

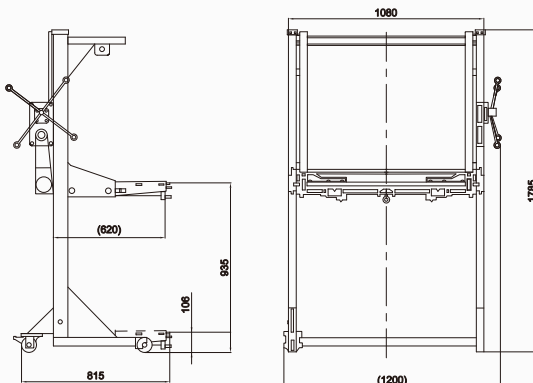
● 40.5kV Guide Rail Interlocking 5GP.363.019



● GPC-1 Multi-functional transfer trolley



Holding weight: 300kg



Note:

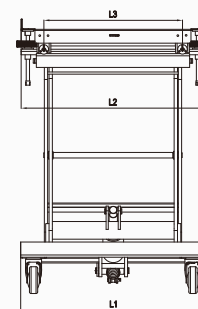
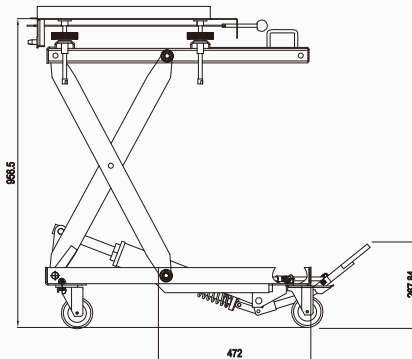
1. Designed hanging device, can hanging vacuum circuit breaker handcart, easy on-site maintenance.
2. The bracket can be adjusted, cabinet width 650, 800, 1000mm can apply.
3. Height of bottom only 11cm, basically the same tray. Easy to move from the tray to trolley.
4. Gravity setting reasonable, compared with ordinary transport vehicle to move smoothly.

100205<650mm>

100206<800mm>

100207<1000mm>

● GPC-2 Hydraulic lift transfer trolley



Holding weight: 400kg Lifting height: 940mm Folded height: 350mm

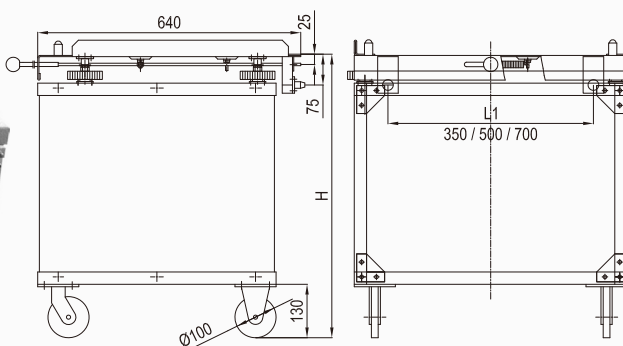
Note: This type suit for 12kV / 24 kV use, and cabinet width 650mm, 800mm, 1000mm.

Code	Model	L1	L2	L3
100208	GPC-2-650	520	515	350
100209	GPC-2-800	670	665	500
100210	GPC-2-1000	870	865	700
100211	GPC-2-1200	870	1075	700

● GPC-3 Simply type transfer trolley



Holding weight: 300kg

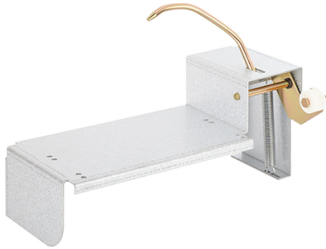


Note: This type suit for 12kV / 24 kV use, and cabinet width 650mm, 800mm, 1000mm.

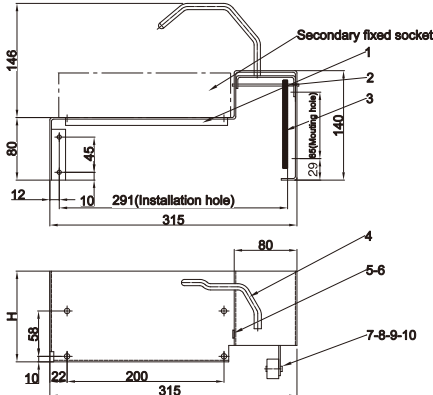
Code	Model
100212	GPC-3-650(800)
100591	GPC-3-650(900)
100640	GPC-3-650F(900)
100585	GPC-3-650(1000)
100213	GPC-3-800(700)
100589	GPC-3-800(800)
100590	GPC-3-800(900)
100584	GPC-3-800(1000)
100214	GPC-3-1000(700)
100588	GPC-3-1000(800)

Note: Numbers in () for height.

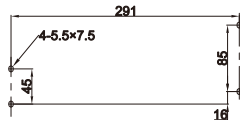
● Secondary socket interlock mechanism 5GP.043.017



Outline and installation dimension



Holing dimension



100310<H=136>
100311<H=116>
100312<H=126>
100313<H=80>
100314<H=100>

Arrangement list of secondary socket interlock mechanism 5GP.043.017

No.	Name	Drawing no.	Qty. (pc/set)
1	Bracket	8GP.043.017.1-4	1
2	Roller	8GP.224.021	1
3	Extension spring	8GP.288.015	1
4	Connection rod welding joint	5GP.174.017	1
5	Axis	8GP.200.020	1
6	Open ring 6	GB896-88	2
7	Bolt	8GP.900.010	1
8	Nut M5	GB6170-86	1
9	Washer 5	GB93-87	1
10	Washer 5	GB97.1-85	1

Selection table of secondary socket interlock mechanism 5GP.043.017 middle bracket 8GP.043.017.1-4

Name	Code	H(mm)	Remark
Bracket	8GP.043.017.1	136	For 1250A VD4 circuit breaker and other same size handcart
	8GP.043.017.2	116	For GPNV Circuit breaker handcart
	8GP.043.017.3	126	For 1600-2500A VD4 circuit breaker handcart and other same size handcart
	8GP.043.017.4	80	For 3150A VD4 circuit breaker handcart and other same size handcart
	8GP.043.017.14	100	For special

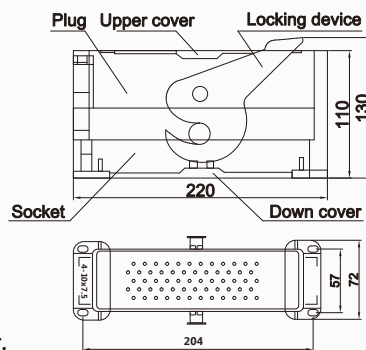
Note: please specify the bracket code when ordering.

● GPZD-58 secondary plugin

100329<Gray>
100629<Dark Gray>
100715< for PT truck>



Can customize with different color.



Usage

GPZD-58 secondary plugin base is for secondary connection of GPN1 (for GPNV, VD4) series middle-placed high voltage switchgear

Basic data

Rated voltage: AC 380V, DC 220V; Rated current: AC 16A, DC 10A; Mechanical life: 2000 times.

Note: The wiring holes of the arrange pins (with jammed spring), plug holes(with jammed spring) arranged for socket is for 1.5mm² and smaller wire, if need 2.5mm², 4mm², please specify separately.

● Flexible tube

100714<0.6meter>
100335<1.2 meter>
100336<2 meter>



● Connection End for Secondary plugin

100499 100713



● Rewinding pen

100630

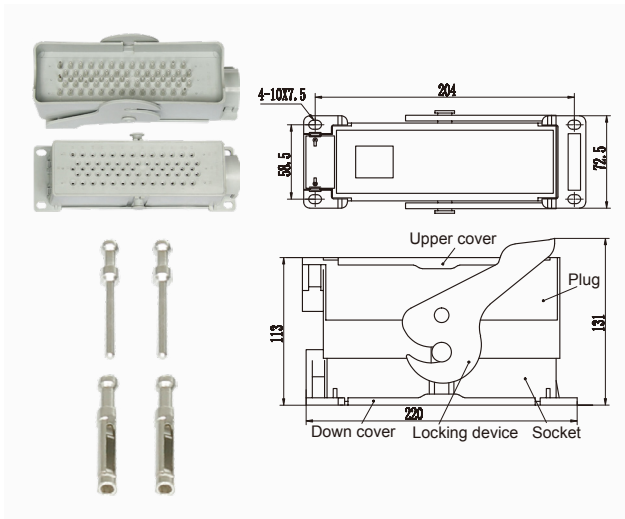


● Pins

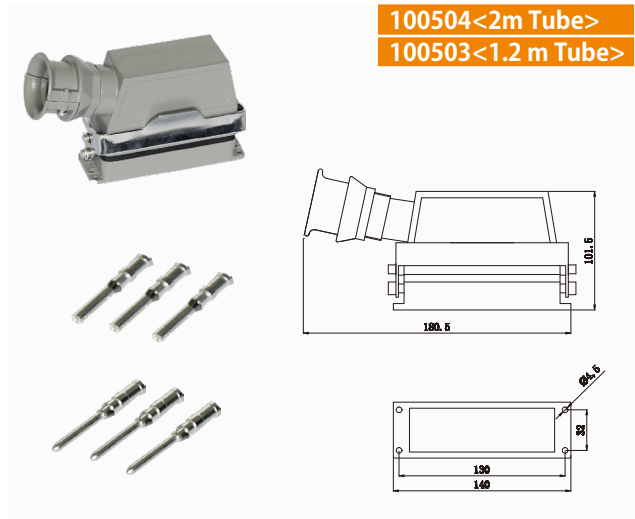


Code	Specification
100332	10A,1.5mm ² pins
100333	10A,1.5mm ² sockets
201374	10A,2.5mm ² pins
201375	10A,2.5mm ² sockets

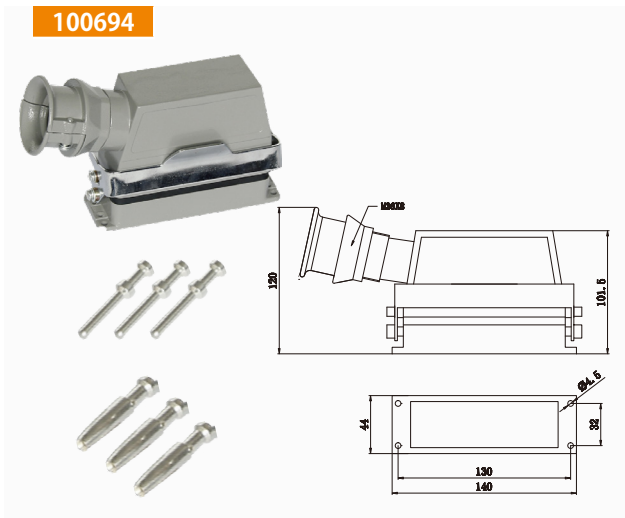
GPJZ-64 Core secondary plugin



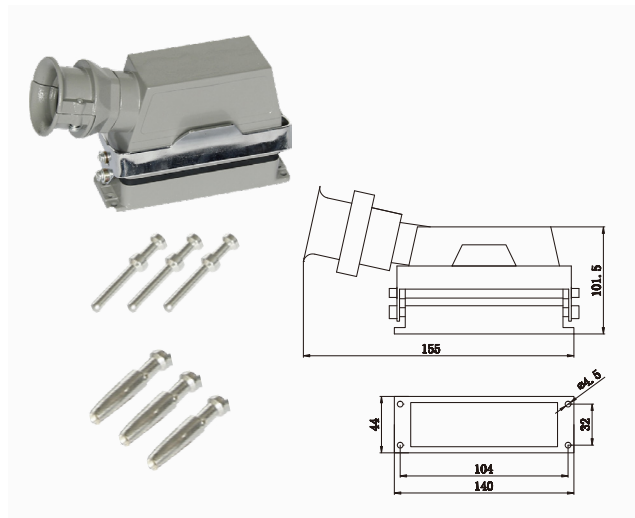
GPCD-64 core secondary plugin



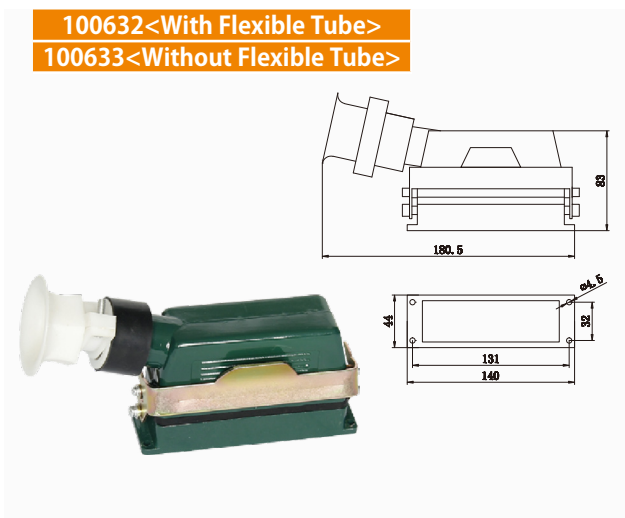
GPCD-46 core secondary plugin



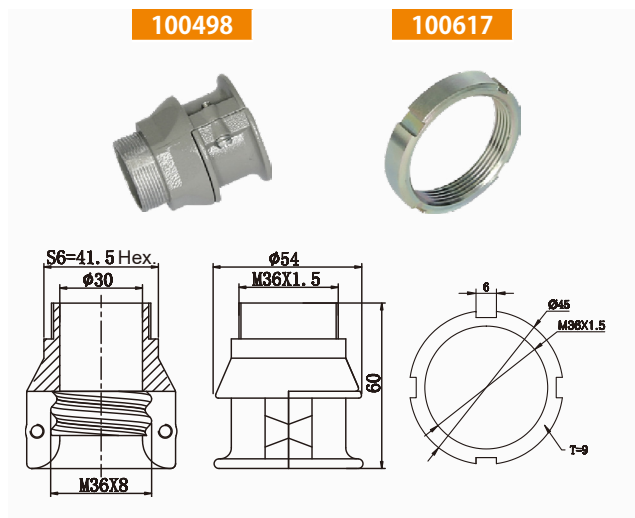
GPCD-32 core secondary plugin



GPYN-24 core secondary plugin



Accessories(100497)

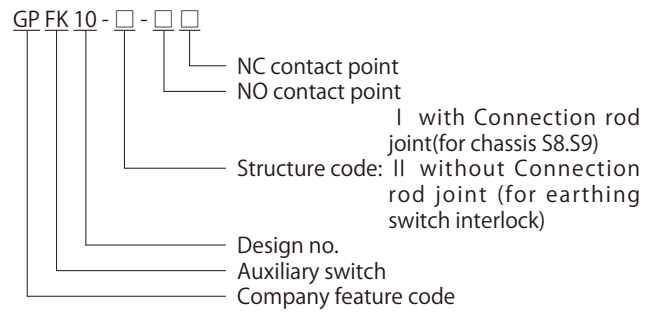


Auxiliary switch



GPFK10- I - □□ Auxiliary switch GPFK10- II - □□ Auxiliary switch

Model and meaning

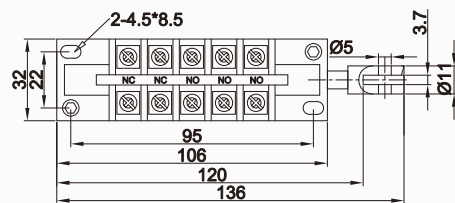


Main technical parameter

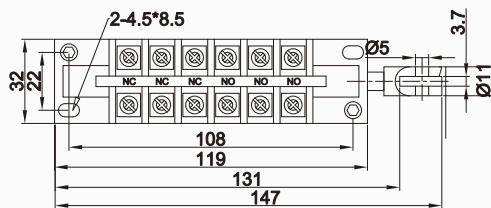
Rated voltage: AC 660V Rated frequency: 50Hz, 60Hz, Rated current: 10A

GPFK10-I- □□ outline installation dimension

5 groups contacts

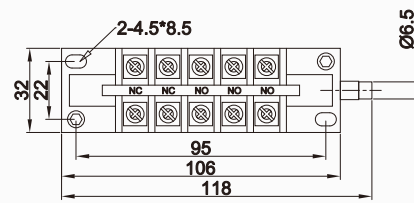


6 groups contacts

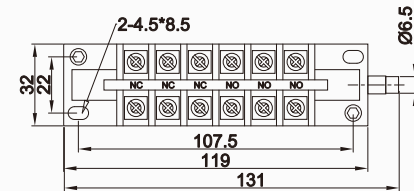


GPFK10-II- □□ outline installation dimension

5 groups contacts

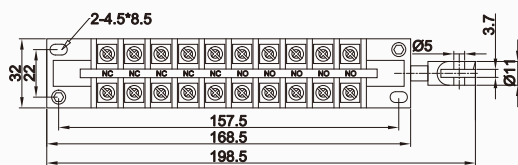


6 groups contacts



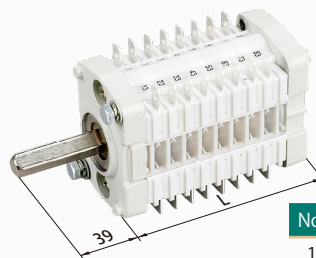
Note: This products provides 5NO(50), 5NC(05), 4NO 1NC(41), 1NO4NC(14), 3NO2NC(32), 2NO3NC(23), 6NO(60), 6NC(06), 5NO1NC(51), 1NO5NC(15), 4NO2NC(42), 2NO4NC(24), 3NO3NC(33) etc. as requirement.

GPFK10-I- □□ auxiliary switch



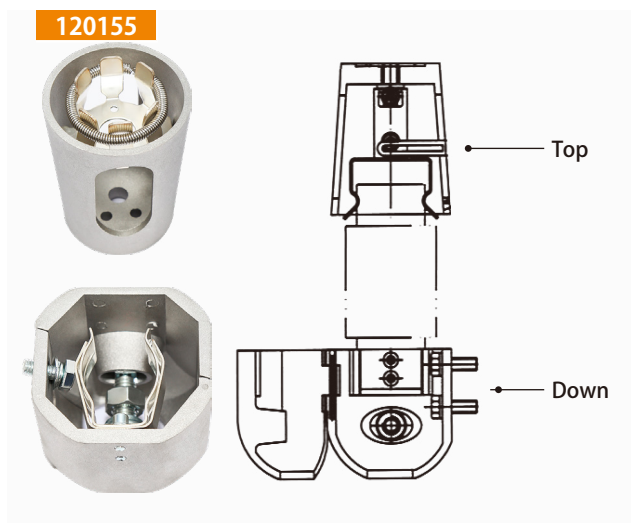
Remarks: Can composed of 10 NO: GPFK10-I-100, 5NO 5NC: GPFK10-I-55, 9NO 1NC: GPFK10-I-91, 8NO 2NC: GPFK10-I-82 etc., please specify when ordering.

GPF10-II/W Series auxiliary switch

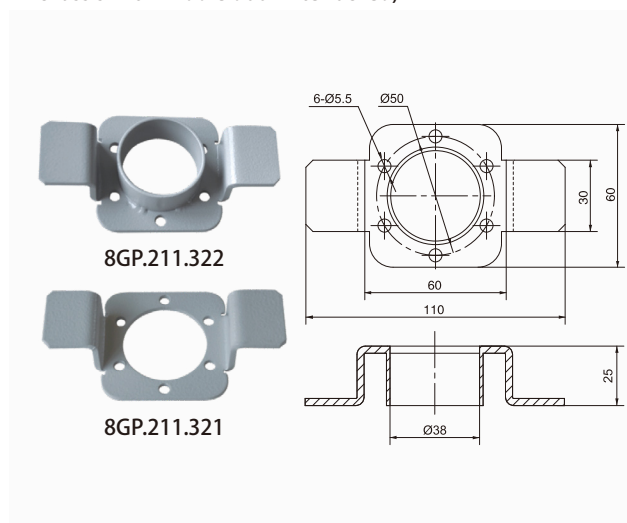


No.	Model	Contacts	L
1	GPF10-4 II/W	2NO 2NC	40
2	GPF10-6 II/W	3NO 3NC	47
3	GPF10-8 II/W	4NO 4NC	54
4	GPF10-10 II/W	5NO 5NC	61
5	GPF10-12 II/W	6NO 6NC	68
6	GPF10-14 II/W	7NO 7NC	75
7	GPF10-16 II/W	8NO 8NC	82
8	GPF10-20 II/W	10NO 10NC	96

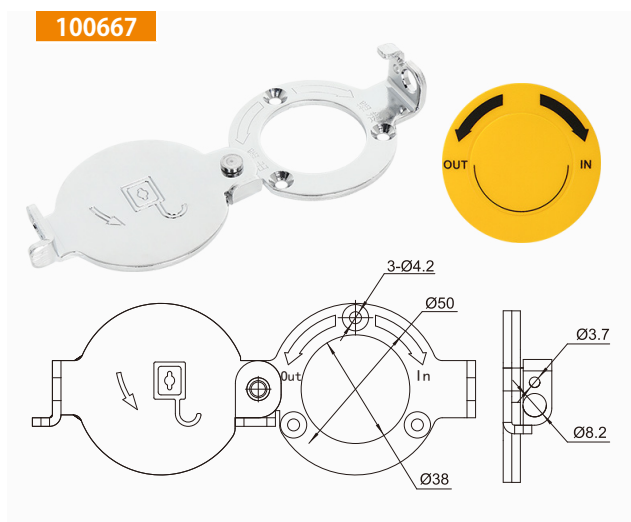
● Fuse clip 5GP.045.005/5GP.104.010.1



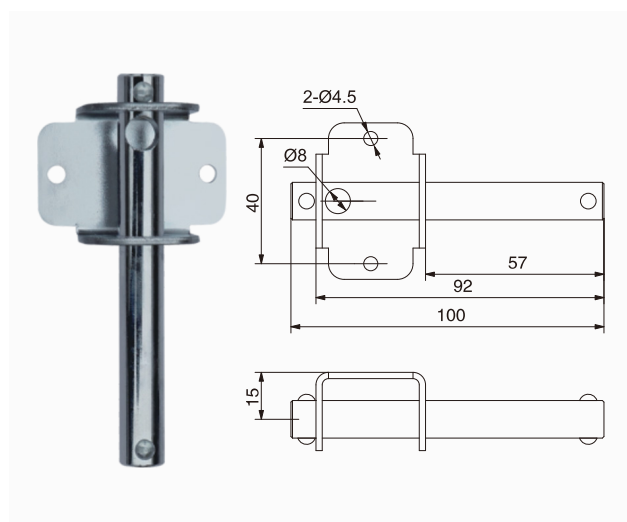
● Cabinet door inner blocking (suit for uneven doors and vcb chassis with middle door interlocked)



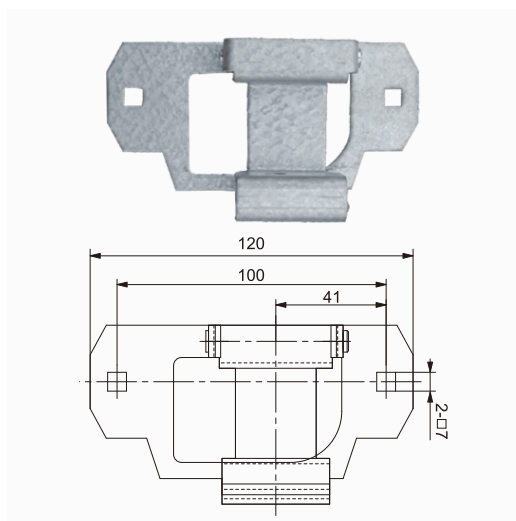
● Middle door padlock holder 5GP.161.022



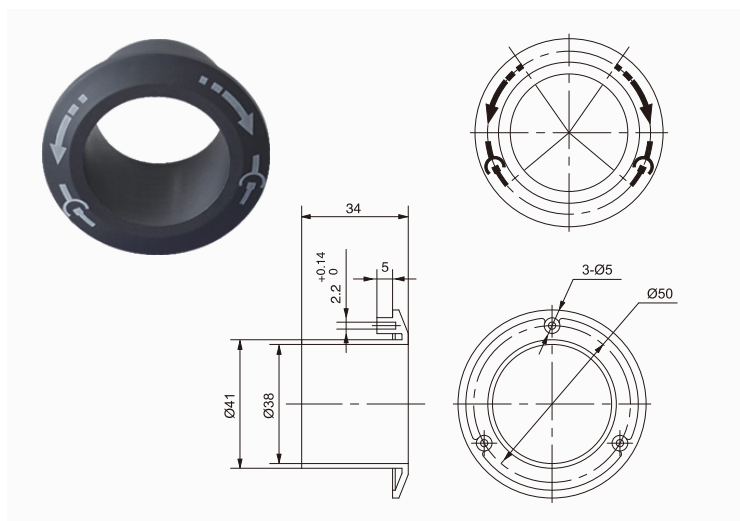
● Padlock piece 5GP.161.018



● Earthing switch padlock piece 5GP.161.010

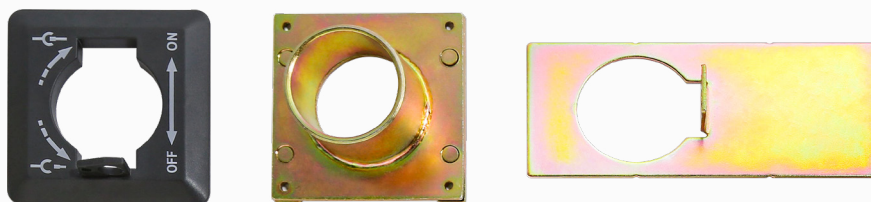


● Chassis in-out marks holder 8GP.869.030



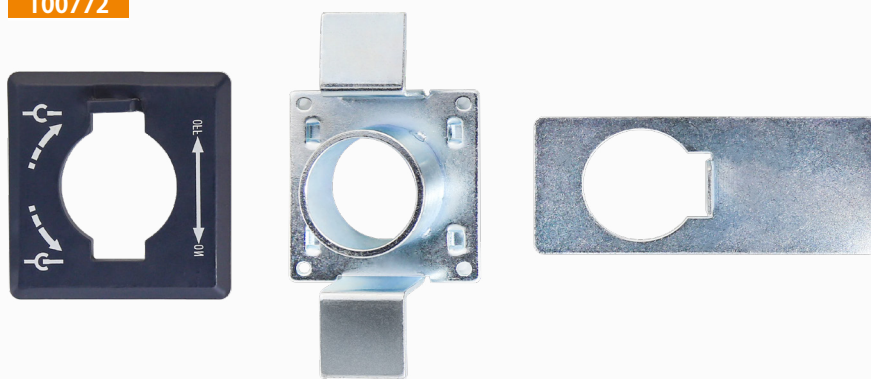
● Middle door padlock holder H-1.1

100758



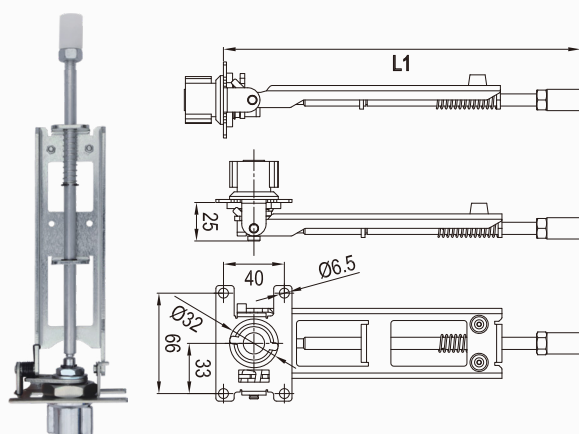
● Middle door padlock holder H-1.2

100772



● 5GP.259.003 Emergency open device

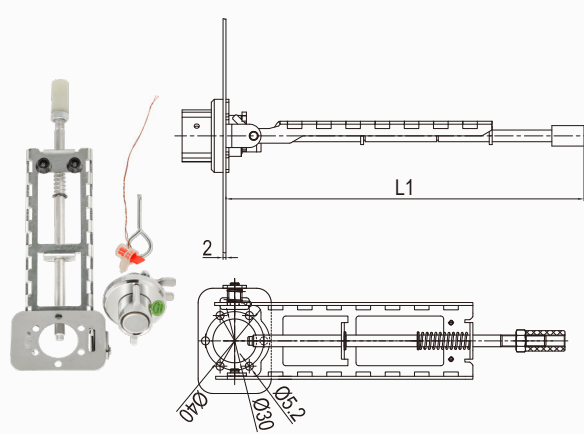
Can customized.



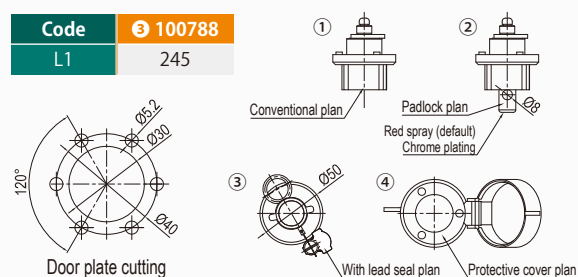
Code	100796	100190	100804	100789
L1	230	255	275	290

● 5GP.259.004 Emergency open device

Can customized.



Code	100788
L1	245

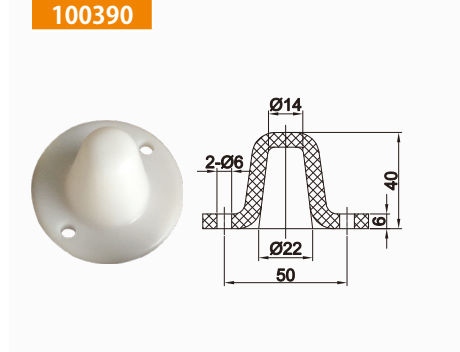


● Other accessories for switchgear

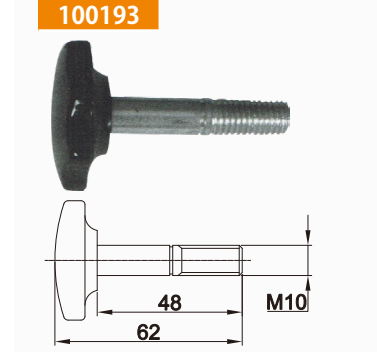
1. Nylon screw(Explosion-proof screws) M6 × 20



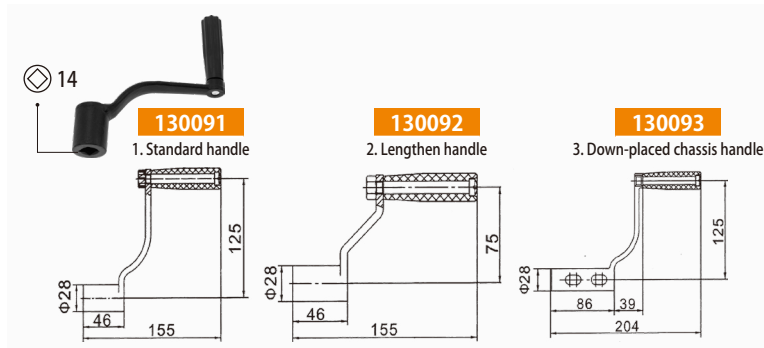
2. 8GP.211.053 Transfer trolley positioning nut



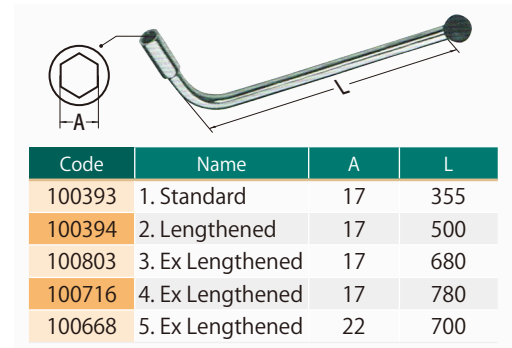
3. 5GP.989.001 Screw handle



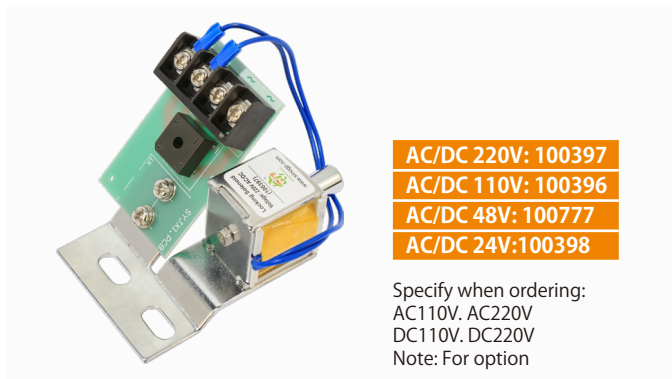
4. Chassis handle



5. Handles for open and close the earthing switch



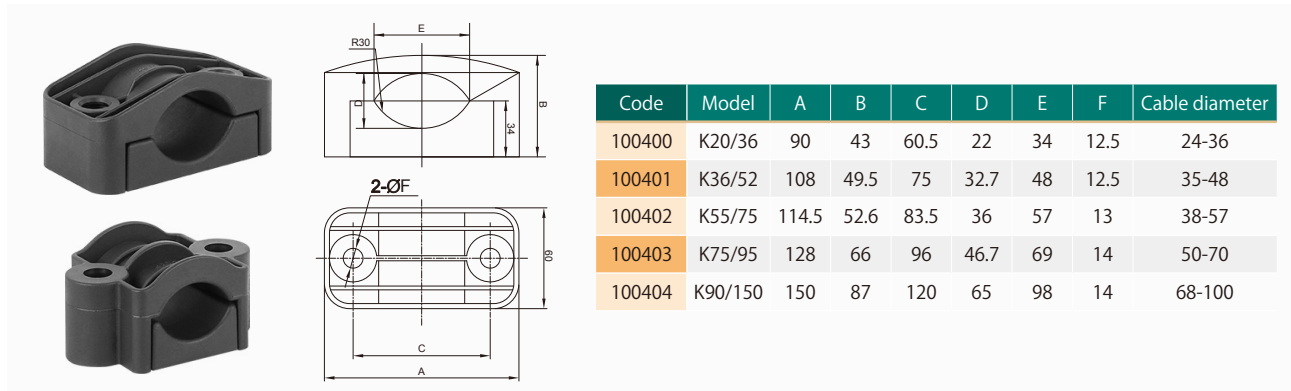
6. Locking solenoid



7. Tower-shape gasket ring Ø110



8. Cable clamp



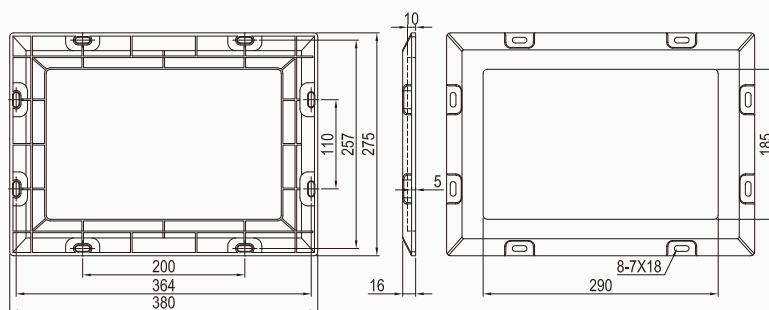
100616



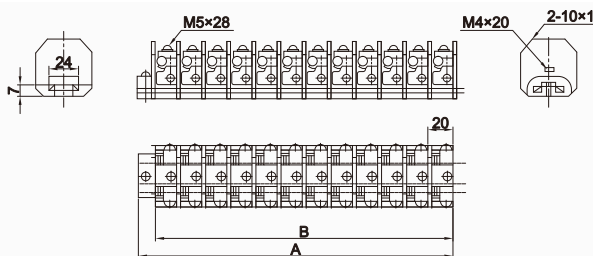
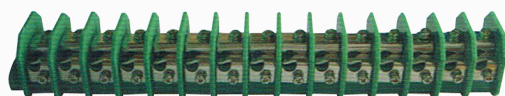
100416

Front

Obverse



● GPJ2- □ small busbar terminal

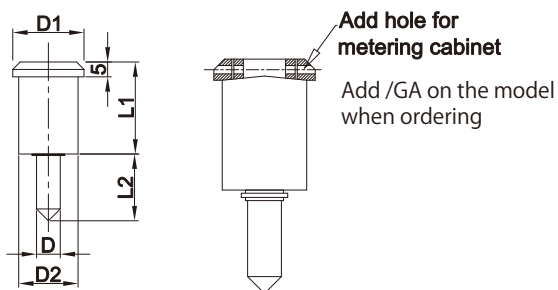


GPJ2 small bus base can be fixed $\Phi 6$, $\Phi 8$ brass line incoming, cabinet connection by 2.5mm² wire, you can assemble sections according to requirements.

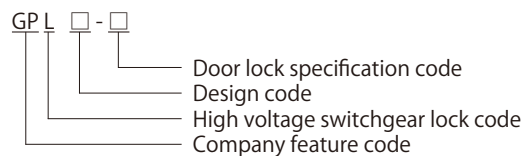
● GPL1 high voltage switchgear door lock



GPL1 installation dimension



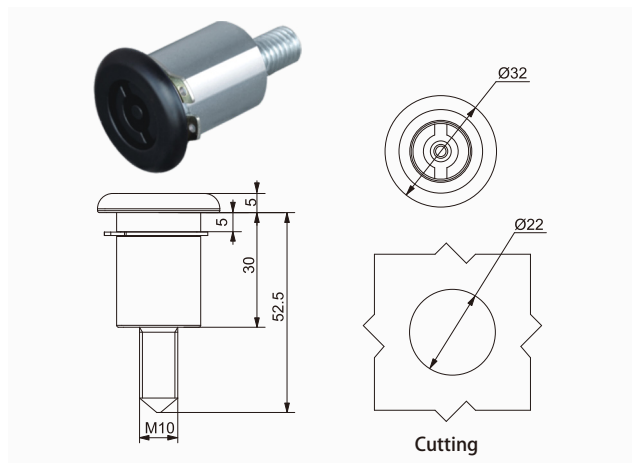
Model and meaning



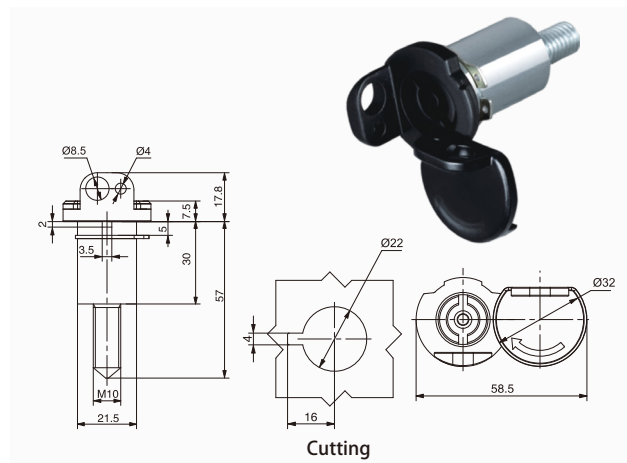
GPL1 high voltage door lock dimension (Unit: mm)

Code	Model	D1	D2	D	L1	L2
100337	GPL1-1	Φ 24	Φ 20	M8	31	22.5
100338	GPL1-2	Φ 30	Φ 22	M10	35	20.5
100339	GPL1-3	Φ 24	Φ 20	M8	31	34.5
100340	GPL1-4	Φ 30	Φ 22	M8	35	20.5
100341	GPL1-5	Φ 30	Φ 22	M10	35	29
100342	GPL1-6	Φ 30	Φ 22	M10	40	20.5
100343	GPL1-7	Φ 30	Φ 22	M8	27	23
100344	GPL1-8	Φ 30	Φ 22	M10	45	20.5
100345	GPL1-9	Φ 30	Φ 22	M8	35	25
100346	GPL1-10	Φ 30	Φ 22	M10	31	24.5

● Door Lock GPL2-2P

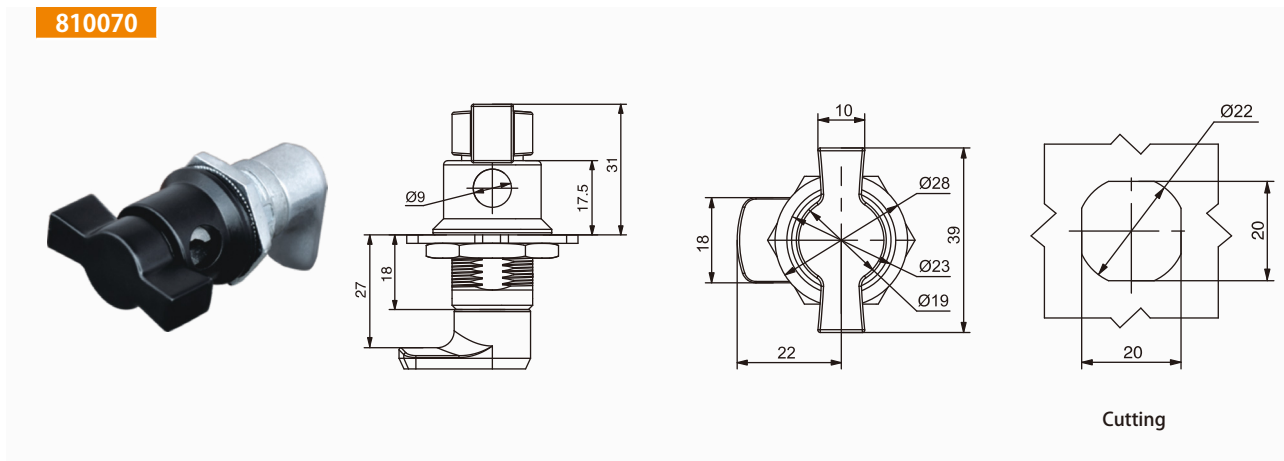


● Door Lock GPL2-1P



● Door Lock GPL3-1P

810070

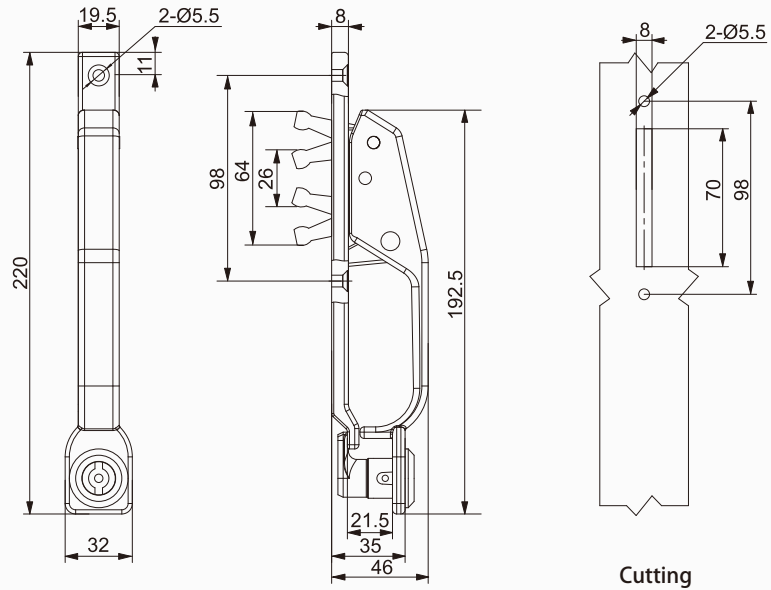


● Cabinet Door Lock GPL4-1P

100621



Key (optional)



Cutting

● Door lock mechanism type 1

100622



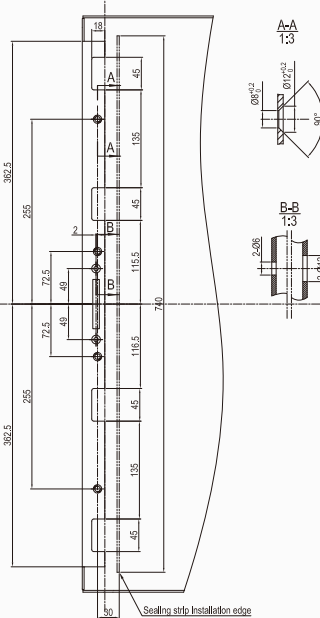
Column square ring screw hole



Square ring screw outline drawing

Square Ring Screw Hole Center Line
Align with the center line of the right door lock

Cabinet door opening

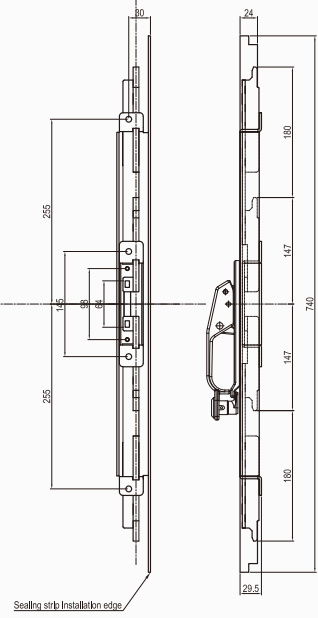


Door plate thickness 2~2.5

Inside of door panel

Door lock center line

door lock shape



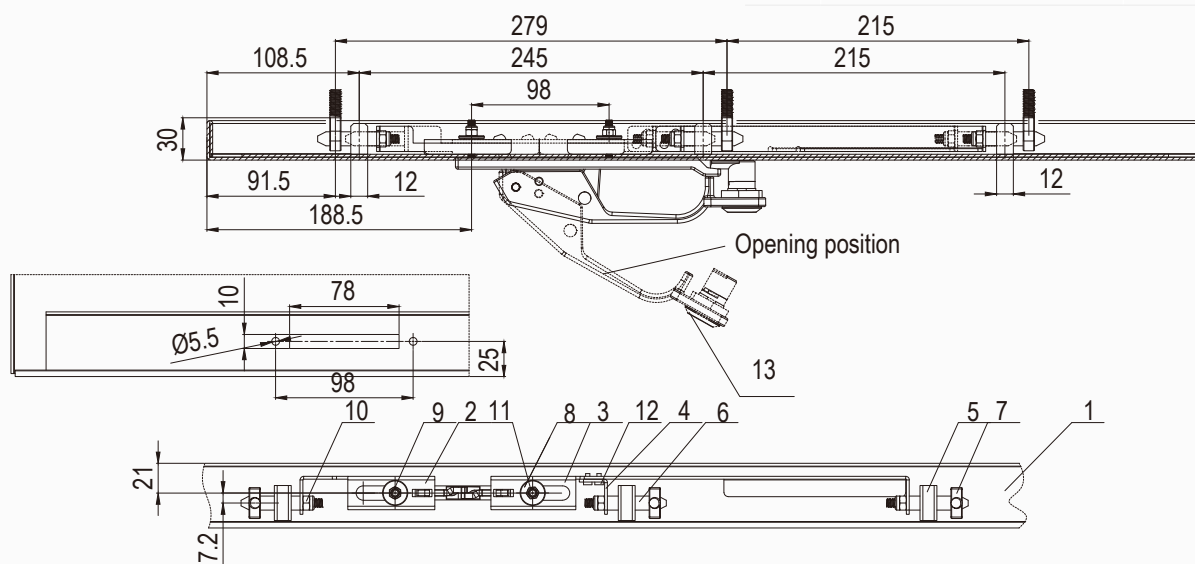
Sealing strip installation edge

Door lock mechanism type 2

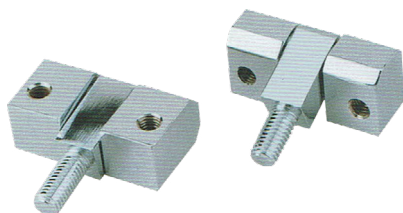
100623



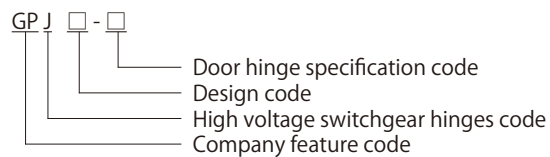
No.	Description	Qty.
1	Door plate	1
2	Bracket 8GP.016.011	1
3	Bracket 8GP.016.012	1
4	Bracket 8GP.016.013	1
5	Sleeve 8GP.016.015	3
6	Bolt 8GP.016.016	3
7	Hook bolt 8GP.016.014	3
8	Axle sleeve 8GP.016.019	2
9	Screw M5x35	2
10	ISO 7040-M6-N	3
11	ISO 7040-M5-N	2
12	Rivet 8GP.016.018	2
13	Door lock GPL4-1P	1



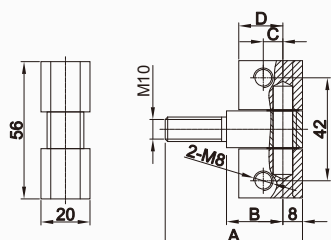
GPJ1- □ high voltage cabinet door hinge



Model and meaning



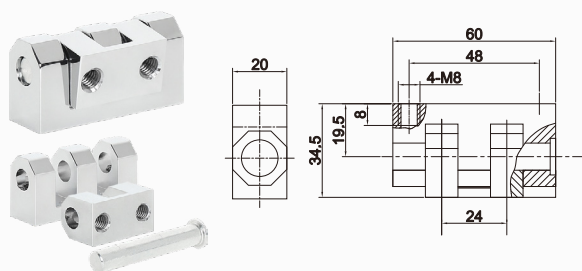
Model and installation dimension of GPJ1- □ high voltage cabinet door hinge



Code	Model	Drawing no.	A	B	C	D	2-M8
100347	GPJ1-1	5GP.872.011	55	23	8	18	through-hole
100348	GPJ1-2	5GP.872.011.1	56	26	12	22	
100349	GPJ1-3	5GP.872.012	55	23	8	18	Blind hole
100350	GPJ1-4	5GP.872.012.1	56	26	12	22	

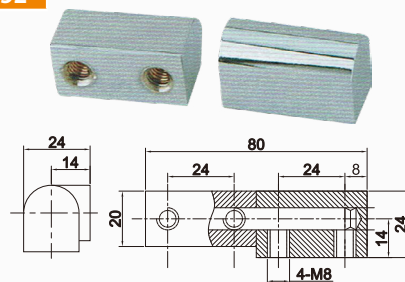
● GPJ2-1 High voltage switchgear door hinges

100351



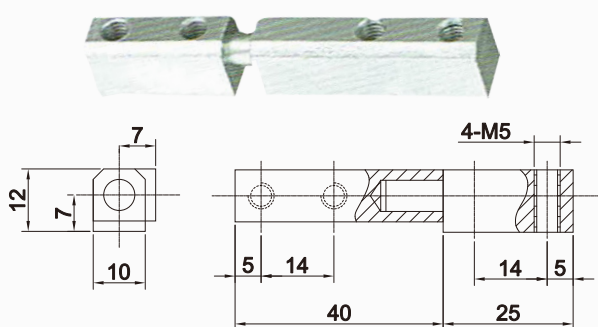
● GPJ3-1 high voltage switchgear door hinge

100352



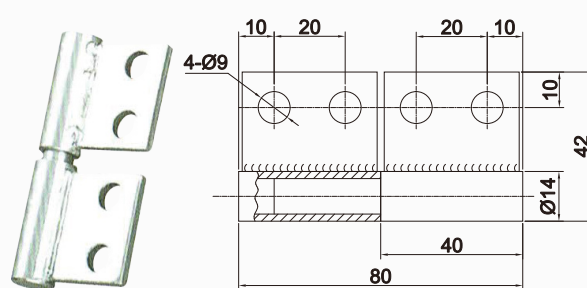
● GPJ4-1 Outline and installation dimension

100353



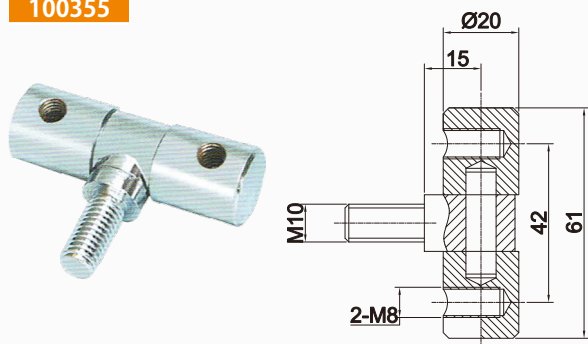
● GPJ5-1 Outline and installation dimension

100354

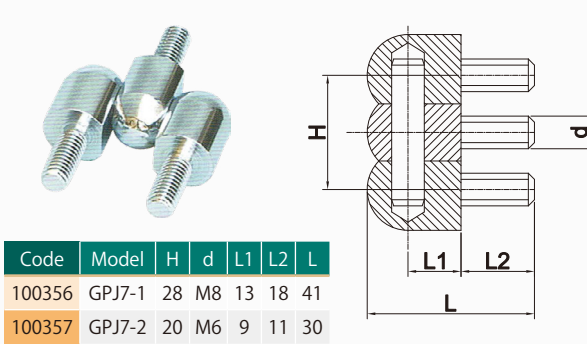


● GPJ6-1 Outline and installation dimension

100355

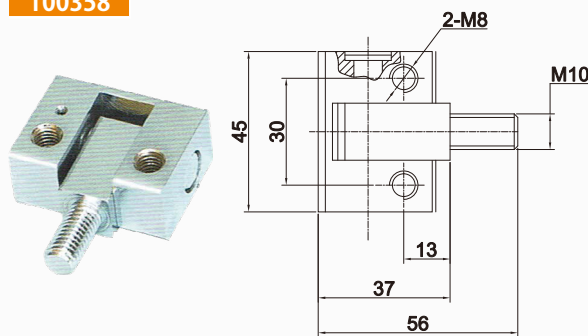


● GPJ7 Outline and installation dimension

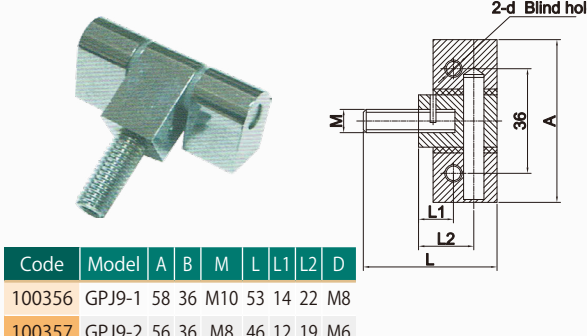


● GPJ8-1 High voltage switchgear hinge

100358

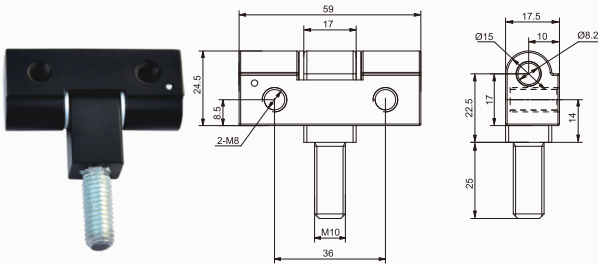


● GPJ9 High voltage switchgear hinge

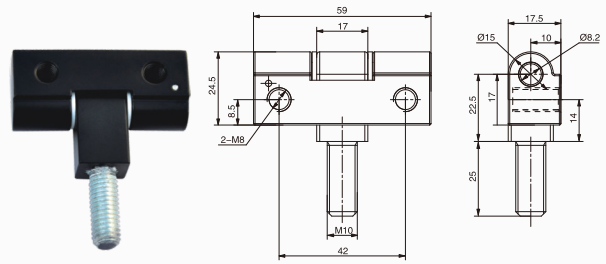


● Hinge GPJL9-1P

810069

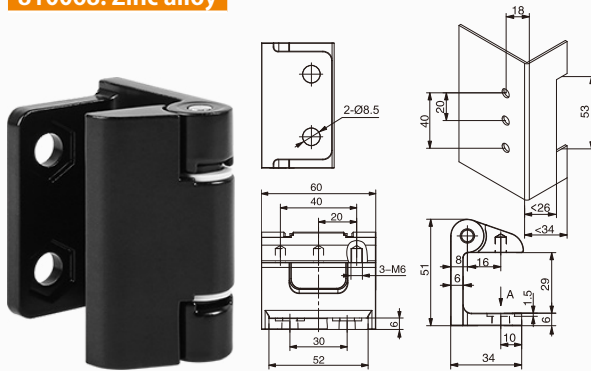


● Hinge GPJL9-3P (Black) / Hinge GPJL9-3 (Bright)

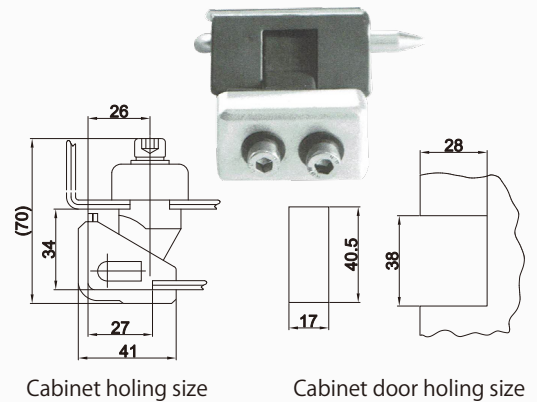


● Hinge GPJL10-2P

810119: Steel
810068: Zinc alloy

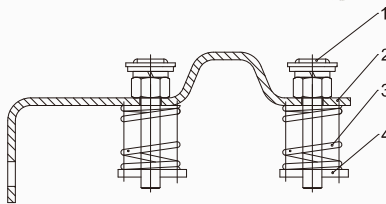


● High voltage switchgear hinge GPJ10-1



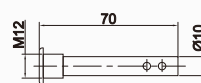
● Earthing bus arrangement parts

Earthing bus assembly: 5GP.588.003 **100372**



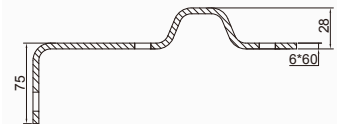
100373

1. Pin: 8GP.993.014



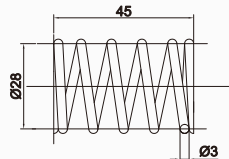
100374

2. Earthing bus: 8GP.588.003



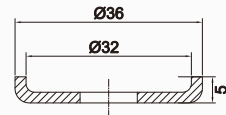
100375

3. Earthing bus pressure spring: 8GP.282.009

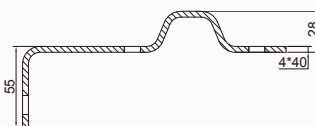


100376

4. Sleeve: 8GP.211.068



Earthing bus assembly(economic type): 5GP.588.013 **100496**



Protected shield U-shape tube heater

The heater is specially designed for all kinds of switchgears or other electrical equipments. It can increase temperature, dispel humidity, keep dryness. If used together with temperature and humidity controller, it can make these functions operate automatically. The heater utilizes high quality tube core, stainless casing and connection terminals. The base of connection terminals is made of refractory ceramics to have strong corrosion resistance. It can prevent the human body from being scalded with the protective casing and have high reliability and longspan life. It is beautiful in design, good in insulation, high in compression strength, easy in installation.

Technical parameters

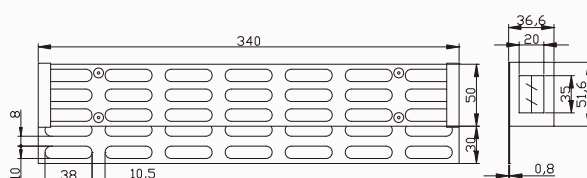
Rated voltage	AC220V
Power frequency withstand voltage	≥ 2kV/1min
Insulation resistance	Cold state: ≥ 100M Ω
	Hot state: ≥ 15M Ω
Shell temperature	≤ 60℃
Environment temperature	-15℃ to +50℃
Protection class	IP20
Working pattern	Long term continuous operation



Optional model

Code	Model	Material	Power
100419	GPR05102S4	Stainless Steel	50W
100420	GPR05102S1	Stainless Steel	100W
100421	GPR05102S2	Stainless Steel	150W
100422	GPR05102S3	Stainless Steel	300W
100423	GPR05102D4	Iron	50W
100424	GPR05102D1	Iron	100W
100425	GPR05102D2	Iron	150W
100426	GPR05102D3	Iron	300W

Outline Dimension



Remark: could design as customer's requested.

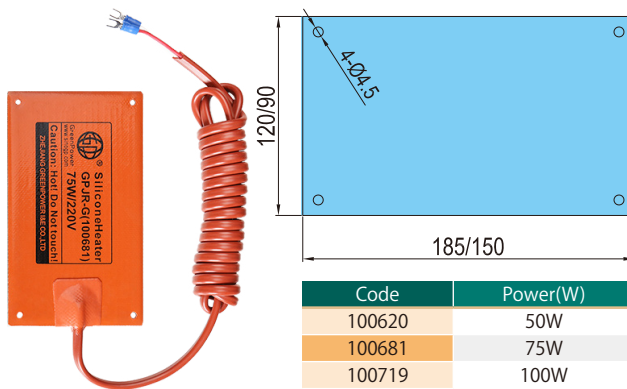
GPJR-G type silicone heater

This silicone heater is a new type of ultra-thin, anti-scalding and waterproof heater. It adopts silica gel molding technology and has the characteristics of small size, long life, uniform heat dissipation, waterproof and anti-scalding. Different power products have uniform appearance and installation size, very convenient to use.

Rated voltage: 220V, 110V

Product specifications: 50W, 100W, 200W

Power(W)	Outline dimension(mm)	Holing distance(mm)
50~100	150x90x2.8	136x76
100~150	185x120x2.8	171x106



Code	Power(W)
100620	50W
100681	75W
100719	100W
100753	150W

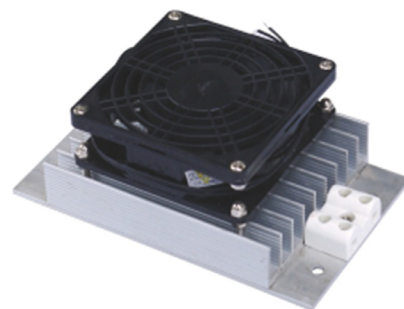
GPJR-F axial fan

Features

The series of fan casings are cylindrical, and the plastic blades are integrated with the motor and installed through flanges. The white fungus has the characteristics of small size, light weight and convenient installation, low noise, low vibration, reliable operation and excellent performance. The fan is mainly used for ground automatic control devices, chassis cabinets, electronic equipment, etc.

Rated voltage: AC 220V, 110V

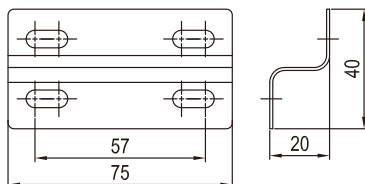
Specification	Power(W)	Air volume	Weight(g)
80x80x25	14	18	210
92x92x25	14	30	250
110x110x25	17	60	320
120x120x25	12	66	350
180x180x60	50	300	950
Φ 220x60	42	380	1500



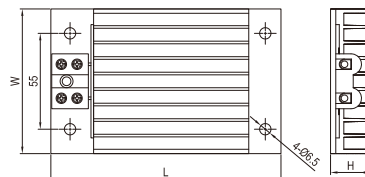
● Space heater
Aluminum Alloy Heater



GPJR heater outline dimension



GPJR heater outline dimension



Features

GPJR series aluminum alloy comb heater is a new electric heater dehumidifier designed for moisture-proof of electrical equipment. The heater compose of a special aluminum heat sink profiles and high quality alloy heating wire. It has a small, beautiful appearance, heat evenly, fast heat conduction, large heat dissipation area and other characteristics, thus ensuring the life of electric heating wire is longer than the average tubular heater, and can working long and reliable. In addition, the heater also has high dielectric strength and simple installation. GPJR series of temperature and humidity control can be achieved moisture-proof, anti-condensation and heating control automation for electric equipment.

GPJR heater outline dimension

Code	Model	Heater power	L	W	H
100377	GPJR-50	50W	132	85	23
100378	GPJR-75	75W	132	85	23
100379	GPJR-100	100W	132	85	23
100380	GPJR-150	150W	132	85	23
100381	GPJR-200	200W	163	100	28
100382	GPJR-250	250W	163	100	28
100383	GPJR-300	300W	163	100	28
100384	GPJR-500	500W	200	104	26

Main technical data

Dielectric strength (wiring off the surface) > 2000V
Insulation resistance: > 10M
Continuous service life: > 5000 hours
Rated power: 50 ~ 500W ± 10%
Operating voltage: AC 380V, AC 220V, DC220V, DC110

Note: if users need mounting bracket, Please specify when ordering.

● GPL7-100 Cable Room lamp

100448

Cable room lamp GPL7 series is alternative solution to the traditional cable room lights. Using LED as a light source, it can achieve the application design of high efficiency, high reliability and usability.

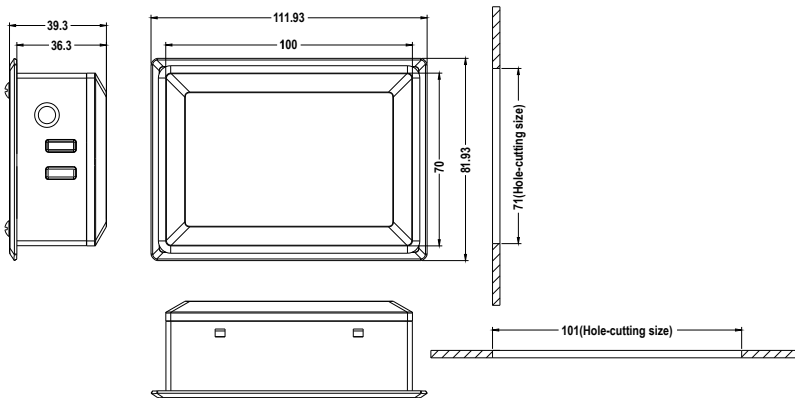
Product features

1. Energy Saving: Consume only 25% of normal lighting equipments with the same luminance.
2. Long Lifetime: 100000hrs, LED use constant current drive, 10 times longer than the traditional ones.
3. Environment Protection: LED is cold light source, there are no ultraviolet ray and infrared ray in the spectrum, so it is a green lighting source without any external radiation heat and harmful substance such as mercury.
4. Design: Using solid metal material shell, It has a very strong property.
5. Flexibility: Using import IC control circuit, it applies to more occasions with wide power supply input.
6. Others: the product is provide with power switch for a easy lighting control.



Technical parameters

Power supply	100V-240V AC/DC
Luminary	Ultra bright LED
Illuminance	≥ 800Lux
Operating temperature	-25°C~+55°C
Lightning Impulse	2kV
Lifetime	>100000hrs
Voltage withstand	2000V/min
Power Consumption	≤ 5W
Hole-cutting size	71 × 101mm
Connecting wire	12~24AWG



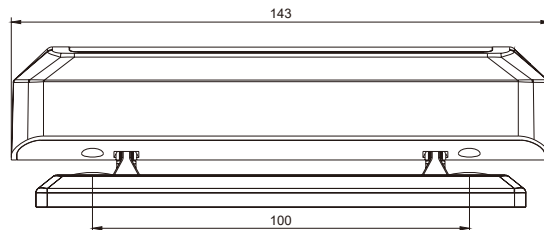
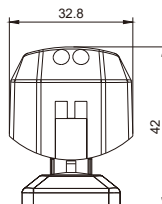
● GPL-10 Lighting

100449

The GPL serial of LED light uses ultra-bright LED as luminary to lighten meter cabinet of all kinds of switchgear. It is a kind of high-class, cost-efficient, energy-efficient and environment-friendly lighting equipment.

Technical Parameters

Voltage	100-240V AC/DC
Luminary	Ultra bright LED
Ambient Temperature	-25°C ~ +55°C
Ambient Humidity	20%RH ~ 90%RH
Lifetime	100000hrs
Lightning Impulse	2KV
Power Consumption	≤ 4W
Mounting Hole	Dia.4.4x2 spacing100 (mm)
Mounting Method	Mounted with M4 screw
Rotation Angle	40 degree (right/left)



Characteristics

1. Energy Saving
Consume only 25% of normal lighting equipments with same luminance.
2. Long Lifetime
10000hrs, LED use constant current drive, 10 times longer than the tradition.
3. Environment Protection
LED is a green luminary containing no hazardous material, like mercury. And without ultraviolet ray and infrared ray in the spectrum as cold light source, radiate no heat outside as well.
4. Design
With special structure to rotate lighting angel on the basis of actual need.
5. Flexibility
Apply to more occasions with wide power supply range design.

Outline dimension

● Lighting for switchgear



100385 GPM-12 (Open, direct buckle installation)

100386 GPM-22 (Open, Bracket bolt installation)

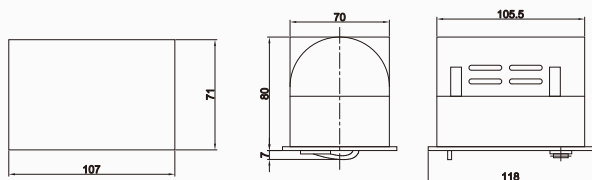
Features

GPM-series cabinet lighting, high strength, thermostability material for the enclosure and shield, has good transparency, small, good safety performance, replace the lamp conveniently. It is good lighting solution for various types of switchgear.

Technical data

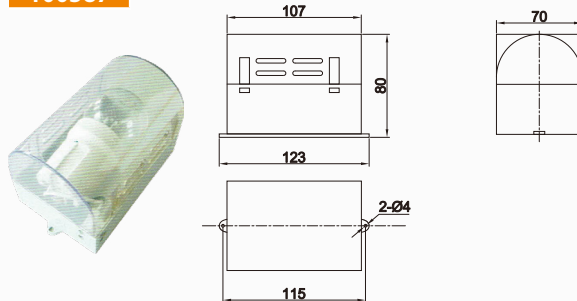
1. Rated voltage: AC220V
2. Rated power: ≤ 25W
3. Lamp end: E27/27 screw end
4. Ambient temperature: -20~60°
5. Altitude: ≤ 2000m

Lighting GPM-12, GPM-22 outline and installation dimension



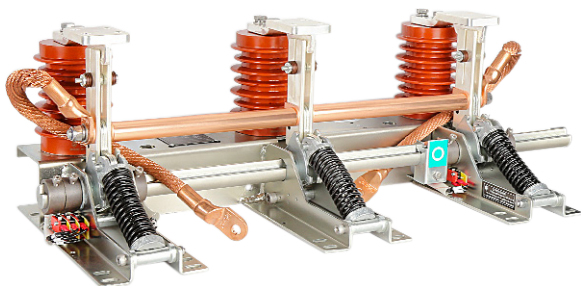
GPM-33 outline and installation dimension

100387



GPM-33 (Open-shield type, Bolt fixed installation)

● GPJN15-12/31.5kA Indoor High Voltage AC Earthing Switch



Products model and meaning

GPJN15-12/31.5-	Pole distance (mm)
GPJN15-12/31.5-	Rated short-time withstand current (kA)
GPJN15-12/31.5-	Rated voltage (kV)
GPJN15-12/31.5-	Design code
GPJN15-12/31.5-	Indoor
GPJN15-12/31.5-	Earthing switch
GPJN15-12/31.5-	Company feature code

Description

GPJN15-12(7.2)/31.5 type indoor high voltage earthing switch is the assembly type products, its performance meet GB1985-2004 High Voltage AC Disconnecter and Earthing Switch and the requirements of standard IEC62271-102:2002. The products suit for power system with 3.6kV-12kV, 3 phase, AC, 50(60)Hz; It has capacity of short-circuit close to protect the electrical equipment from damage, applicable for high voltage switchgear arrangement as the earthing protection when do maintenance.

Standard working condition

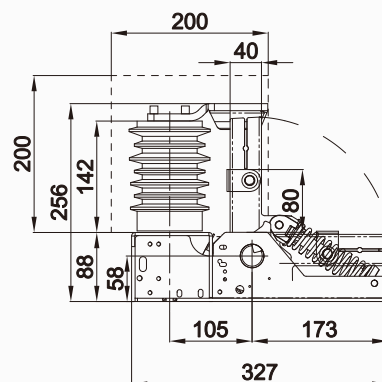
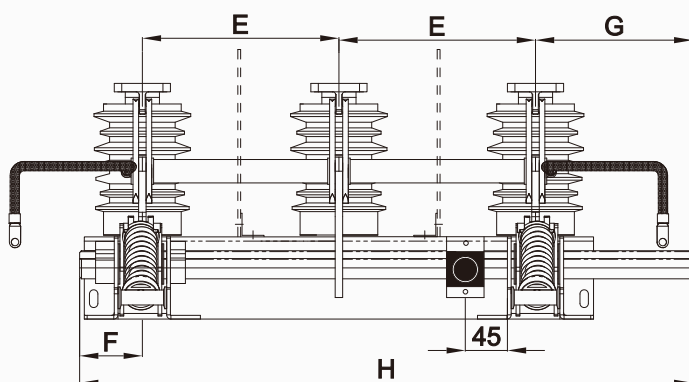
1. Altitude sea level not exceeding 1000m;
2. Ambient air temperature: +45°C, -25°C ;
3. Seismic intensity not exceeding 8 degree;
4. Related humidity daily average value not more than 95%, monthly average not more than 90%;
5. Pollution class: II

Special condition: Please specify when ordering.

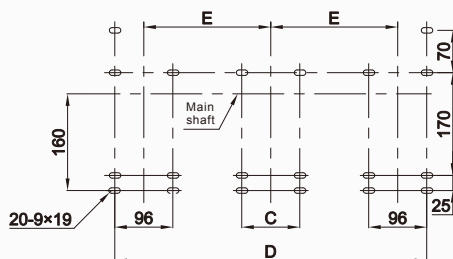
Main technical data

Items	Unit	Data
Rated voltage	kV	12
Rated short-time withstand current	kA	31.5
Rated short-circuit duration	s	4
Rated short-circuit close current	kA	80
Rated peak withstand current	kA	80
Rated short-time power	KV	42
Rated lighting impulse withstand voltage	KV	Phase to earth/ between phase 75
Mechanical endurance	times	2000

GPJN15-12/31.5 Earthing switch outline and installation dimension

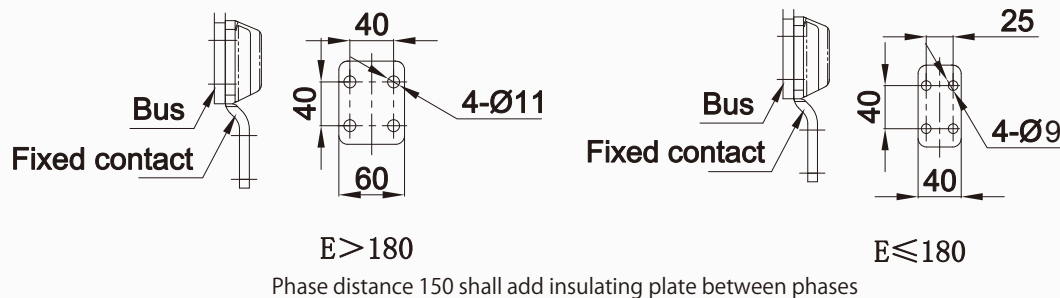


Holing dimension:

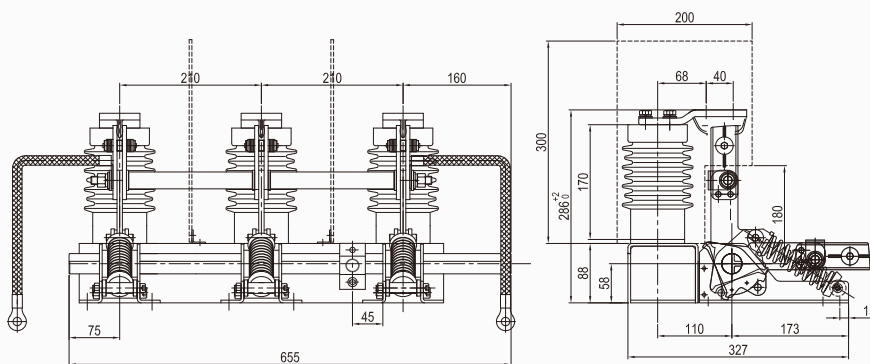


Products model	E	F	G	H	D	C
GPJN15-12/31.5-275	275	75	185	810	646.5	96
GPJN15-12/31.5-250	250	75	160	735	596.5	96
GPJN15-12/31.5-230	230	75	160	695	556.5	96
GPJN15-12/31.5-220	220	75	160	675	536.5	
GPJN15-12/31.5-210	210	75	160	655	516	
GPJN15-12/31.5-200	200	75	160	635	496.5	
GPJN15-12/31.5-180	180	75	160	595	456.5	
GPJN15-12/31.5-165	165	75	160	565	426.5	
GPJN15-12/31.5-150	150	75	140	515	396.5	

Busbar joint surface dimension



GPJN15-17.5/31.5kA Earthing switch outline dimension



Note: other holing and busbar joint surface dimension, please follow the GPJN15-12/31.5kA. Any other special dimension, please consalt with Greenpower.

Ordering notice

1. When ordering earthing switch, shall specify products model, rated voltage, phase distance, thermal stability current, with or without live indicator device. (If necessary, please specify the monitor model).
2. If flexible connection lengths required longer. (Standard arrangement of the soft connection length $L = 240\text{mm}$).
3. Number of the auxiliary switch, terminal needs to lead or not.
4. Specify the operation direction: Left or right.

About the operation direction of left or right, which is the easiest to mistake when ordering, so my company will be as follows:

Stand in the from of the product, insulator in the top face, the movable blade in the bottom, then the main shaft in the left hand is left operating earthing switch, shown in Figure (1).

Stand from of the product, insulator in the top face, the movable blade in the bottom, then the main shaft in the right hand is right operating earthing switch, shown in Figure (2).

Since the earthing switch can be installed in any orientation, you carefully check the required operation direction, According to the above instruction of Figure (1) and (2), to select the required left or right operating earthing switch.

5. If any special requirements, please contact with GreenPower to develop detailed specifications.

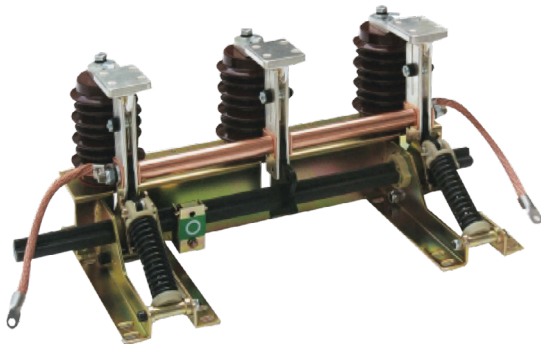


Figure (1) left operating earthing switch

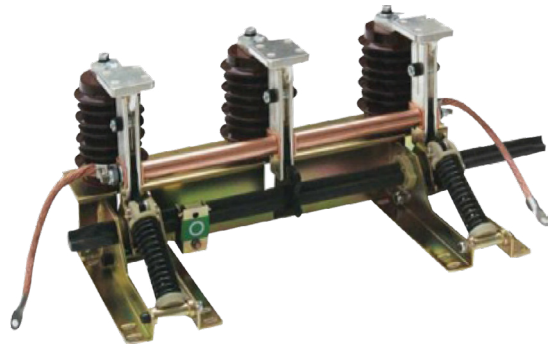
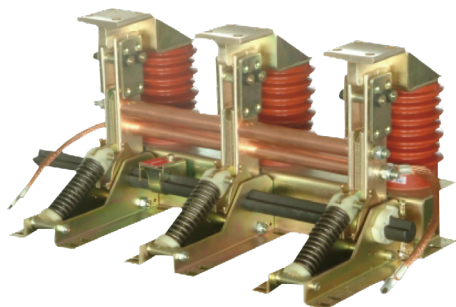
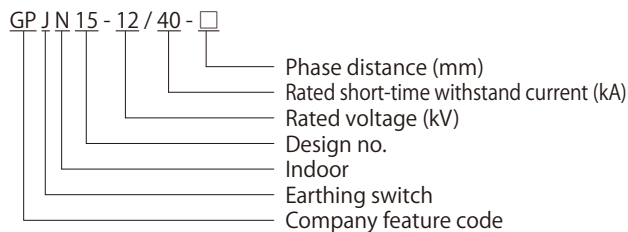


Figure (2) right operating earthing switch

GPJN15-12/40 Indoor High Voltage Earthing Switch



Products model and meaning



General of earthing switch

GPJN15-12(7.2)/40-100 type indoor high voltage earthing switch is the assembly type products, its performance meet GB1985-2004 High Voltage AC Disconnect and Earthing Switch and the requirements of standard IEC62271-102:2002. The products suit for power system with 3-12kV, 3 phase, AC, 50(60) Hz; It has capacity of short-circuit close to protect the electrical equipment from damage, Applicable for high voltage switchgear arrangement as the earthing protection when maintenance.

Standard working condition

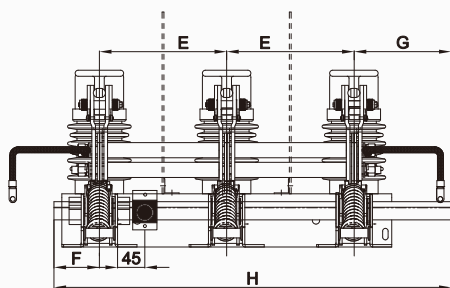
1. Altitude sea level not exceeding 1000m;
2. Ambient air temperature: +45°C, -25°C ;
3. Seismic intensity not exceeding 8 degree;
4. Related humidity daily average value not more than 95%, monthly average not more than 90%;
5. Pollution class: II

Special condition: Please specify when ordering.

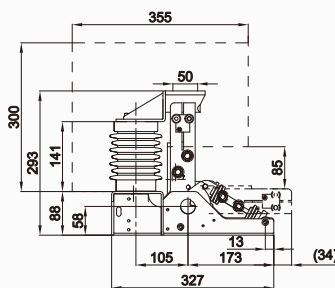
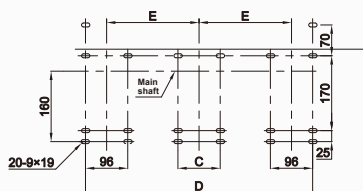
Main technical data

Items		Unit	Data	
Rated voltage		kV	12	
Rated short-time withstand current		kA	40	
Rated short-circuit duration		s	4	
Rated short-circuit close current		kA	100	
Rated peak withstand current		kA	100	
Rated insulation level	Rated short-time power frequency withstand voltage	kV	Phase to earth/ between phase	42
	Rated lightning impulse withstand voltage			75
Mechanical endurance		times	2000	

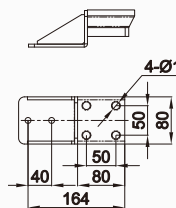
GPJN15-12/40 Earthing switch outline and installation dimension



Holding dimension



Fixed contact outline dimension

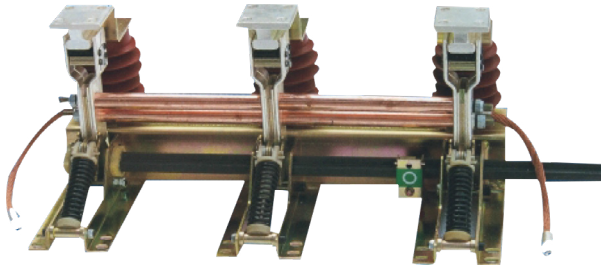


Products model	E	F	G	H	D	C
GPJN15-12/40-275	275	75	185	810	646.5	96
GPJN15-12/40-250	250	75	160	735	596.5	96
GPJN15-12/40-230	230	75	160	695	556.5	
GPJN15-12/40-220	220	75	160	675	536.5	
GPJN15-12/40-210	210	75	160	655	516	
GPJN15-12/40-150	150	75	140	515	396.5	

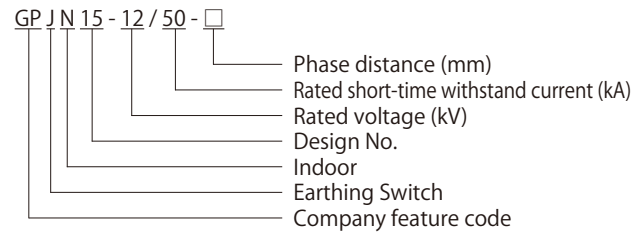
Ordering notice

1. When ordering earthing switch, please specify product model, right or left operation, phase distance, with or without live indicator device (specify the indicator model).
2. Flexible connect length need extend or not (Standard L=240mm).
3. If any special requirements, please contact with GreenPower to develop detailed specifications.

GPJN15-12/50 Indoor High Voltage Earthing Switch



Products model and meaning



General of earthing switch

GPJN15-12/50 type indoor high voltage earthing switch is the assembly type products, its performance meet GB1985-2004 High Voltage AC Disconnecter and Earthing Switch and the requirements of standard IEC62271-102:2002. The products suit for power system with 3-12kV, 3 phase, AC, 50(60) Hz, large capacity and high breaking performance; It has capacity of short-circuit close to protect the electrical equipment from damage, Applicable for high voltage switchgear arrangement as the earthing protection when maintenance.

Standard working condition

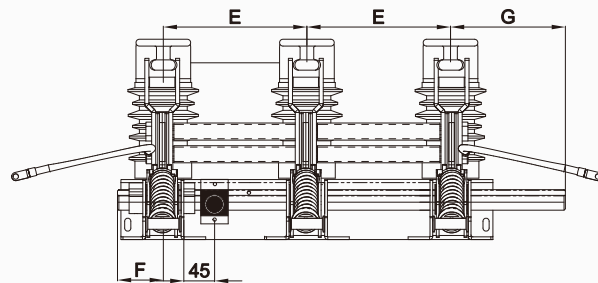
1. Altitude sea level not exceeding 1000m;
2. Ambient air temperature: +45°C , -25°C ;
3. Seismic intensity not exceeding 8 degree;
4. Related humidity daily average value not more than 95%, monthly average not more than 90%;
5. Pollution class: II

Special condition: Please specify when ordering.

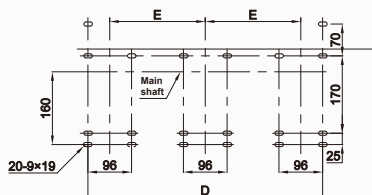
Main technical data

Items	Unit	Data
Rated voltage	kV	12
Rated short-time withstand current(Thermal stability)	kA	50
Rated short-time duration	s	3
Rated peak withstand current(Movable stability)	kA	125
Rated short-circuit close current	kA	125
Phase distance	mm	210/230/250/275
Rated insulation level	1min Power frequency withstand voltage	42
	Lighting impulse withstand voltage	75
Mechanical endurance	times	2000

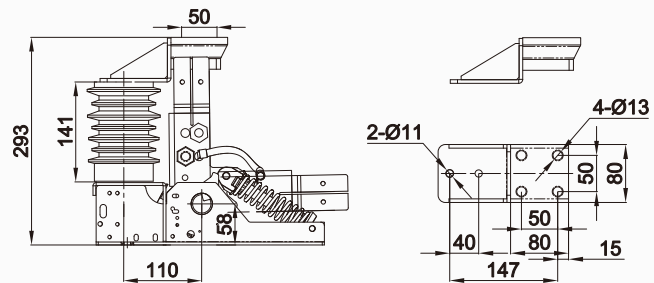
Outline and installation dimension



Holing dimension



Fixed contact outline dimension

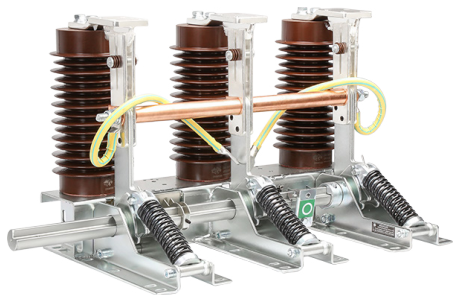


Products model	E	F	G	H	D
GPJN15-12/50-275	275	75	185	810	646
GPJN15-12/50-250	250	75	160	735	596
GPJN15-12/50-230	230	75	160	695	556
GPJN15-12/50-210	210	75	160	695	516
GPJN15-12/50-150	150	75	160	535	396

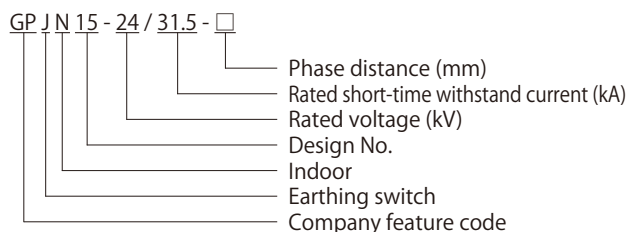
Ordering notice

1. When ordering earthing switch, please specify product model, right or left operation, phase distance, with or without live indicator device (specify the indicator model).
2. Flexible connect length need extend or not (Standard L=500mm).
3. If any special requirements, please contact with GreenPower to develop detailed specifications.

● GPJN15-24/31.5 Indoor High Voltage Earthing Switch



Products model and its meaning



General of earthing switch

GPJN15-24/31.5 type indoor high voltage earthing switch is the assembly type products, its performance meet GB1985-2004 High Voltage AC Disconnecter and Earthing Switch and the requirements of standard IEC62271-102:2002. The products suit for power system with 24kV, 3 phase, AC, 50(60) Hz; It has capacity of short-circuit close to protect the electrical equipment from damage, Applicable for high voltage switchgear arrangement as the earthing protection when maintenance.

Standard working condition

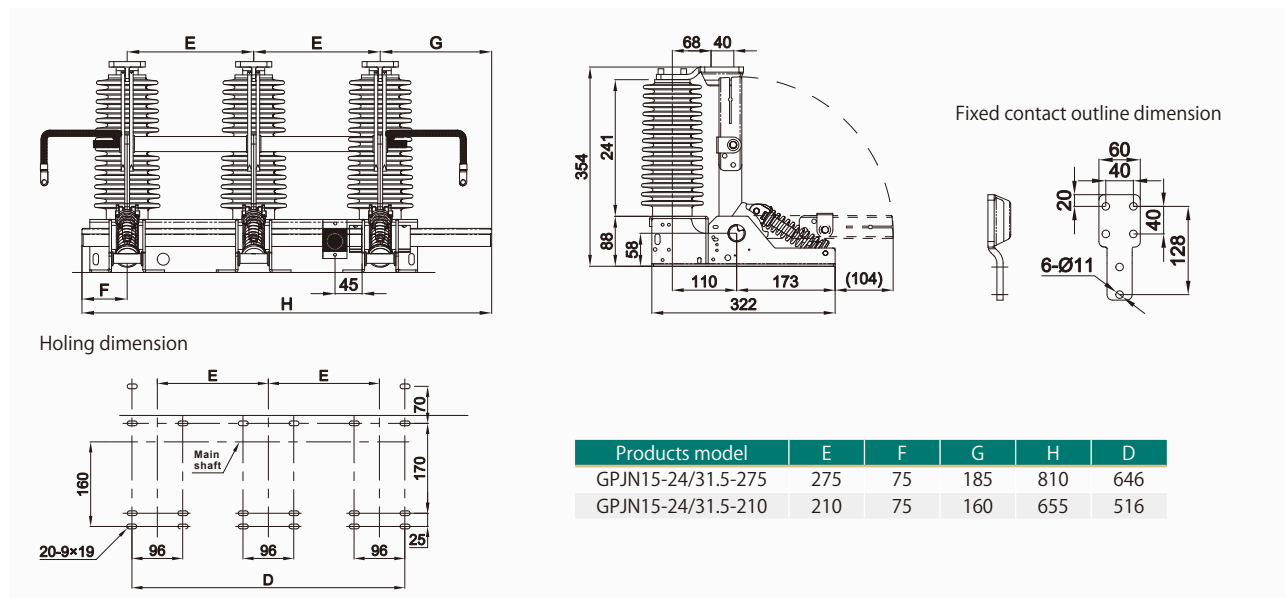
1. Altitude sea level not exceeding 1000m;
2. Ambient air temperature: +45℃, -25℃ ;
3. Seismic intensity not exceeding 8 degree;
4. Related humidity daily average value not more than 95%, monthly average not more than 90%;
5. Pollution class: II

Special condition: Please specify when ordering.

Main technical data

Items		Unit	Data	
Rated voltage		kV	24	
Rated short-time withstand current		kA	31.5	
Rated short-circuit close current		kA	80	
Rated peak withstand current		kA	80	
Rated short-circuit duration		s	4	
Rated insulation level	1min Power frequency withstand voltage	kV	Phase to earth/ between phase	65
	Lighting impulse withstand voltage			125
Mechanical endurance		times	2000	

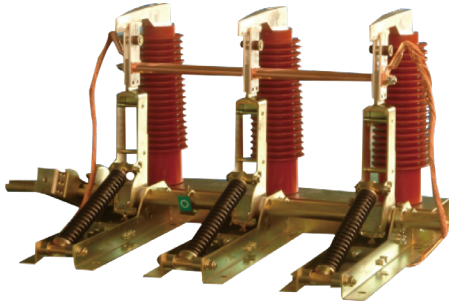
GPJN15-24/31.5 Earthing switch outline and installation dimension



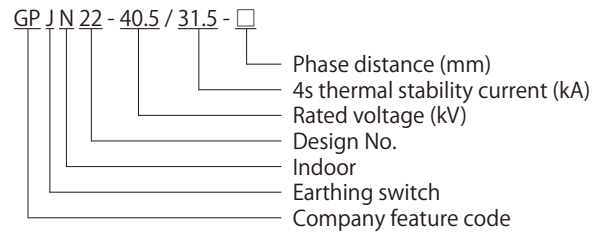
Ordering notice

1. When ordering earthing switch, please specify product model, right or left operation, phase distance, with or without live indicator device (specify the indicator model).
2. Flexible connect length need extend or not (Standard L=400mm).
3. If any special requirements, please contact with GreenPower to develop detailed specifications.

GPJN22-40.5/31.5 Indoor High Voltage Earthing Switch



Products model and its meaning



General of earthing switch

GPJN22-40.5/31.5 type indoor high voltage earthing switch is the assembly type products, its performance meet GB1985-2004 High Voltage AC Disconnecter and Earthing Switch and the requirements of standard IEC62271-102:2002. The products suit for power system with 40.5kV, 3 phase, AC, 50(60) Hz; it can match with GPN1-40.5kV high voltage switchgear or other similar equipment. It is applicable for high voltage switchgear arrangement as the earthing protection when maintenance.

Standard working condition

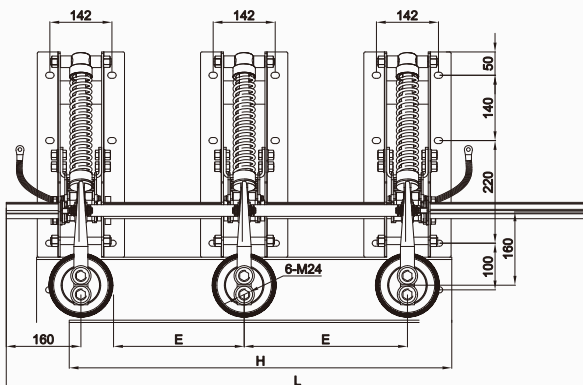
1. Altitude sea level not exceeding 1000m;
2. Ambient air temperature: +45℃, -25℃ ;
3. Seismic intensity not exceeding 8 degree;
4. Related humidity daily average value not more than 95%, monthly average not more than 90%;
5. Pollution class: II

Special condition: Please specify when ordering.

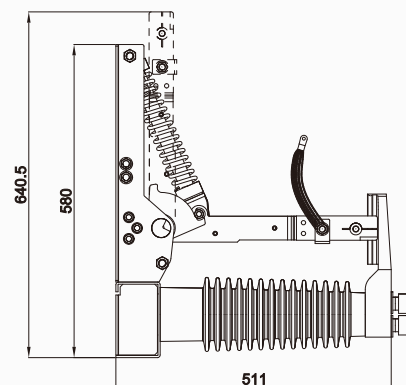
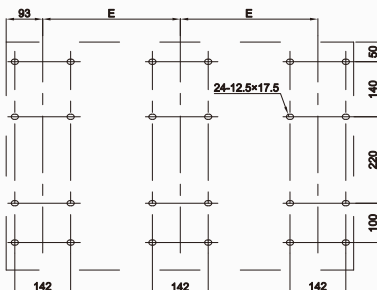
Main technical data

Items		Unit	Data	
Rated voltage		kV	36/ 38/40.5	
Rated short-time withstand current(4s)		kA	31.5	
Rated short-circuit close current		kA	80	
Rated peak withstand current		kA	80	
Phase distance		mm	300, 350, 400	
Rated insulation level	(1min) Power frequency withstand voltage	kV	Phase to earth/ between phase	95
	Lighting impulse withstand voltage			185

Outline and installation dimension



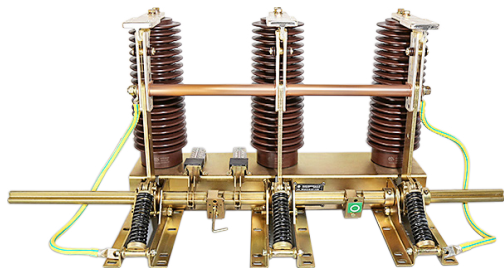
Holing dimension



Products model	E	L	H	A (Slot steel rear installation)
GPJN22-40.5/31.5-300	300	1100	786	3 holes- Φ 14
GPJN22-40.5/31.5-350	350	1200	886	3 holes- Φ 14
GPJN22-40.5/31.5-400	400	1374	986	3 holes- Φ 14

Note: if phase distance 300 need add insulating plate between phases.

● GPJN15-40.5/31.5 Indoor high voltage earthing switch



General of earthing switch

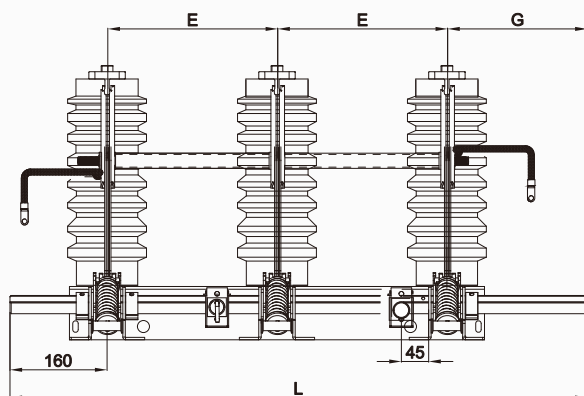
GPJN15-40.5/31.5 type indoor high voltage earthing switch is the assembly type products, its performance meet GB1985-2004 High Voltage AC Disconnecter and Earthing Switch and the requirements of standard IEC62271-102:2002. The products suit for power system with 40.5kV, 3 phase, AC, 50(60) Hz; it can match with GPN1-40.5kV high voltage switchgear or other similar equipment. It is applicable for high voltage switchgear arrangement as the earthing protection when maintenance.

Standard working condition

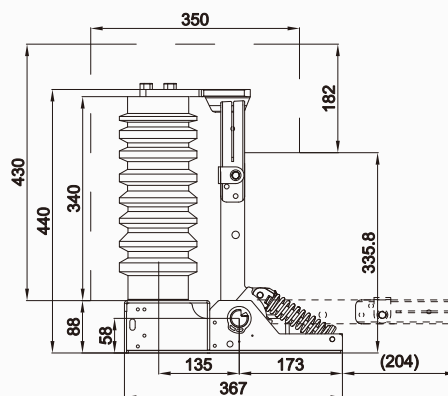
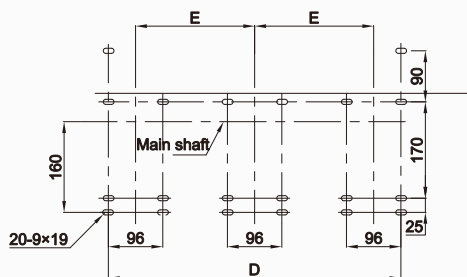
1. Altitude sea level not exceeding 1000m;
2. Ambient air temperature: +45°C, -25°C ;
3. Seismic intensity not exceeding 8 degree;
4. Related humidity daily average value not more than 95%, monthly average not more than 90%;
5. Pollution class: II

Special condition: Please specify when ordering.

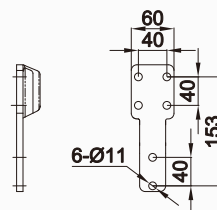
GPJN15-40.5 Outline and installation dimension



Holing dimension



Fixed contact outline dimension



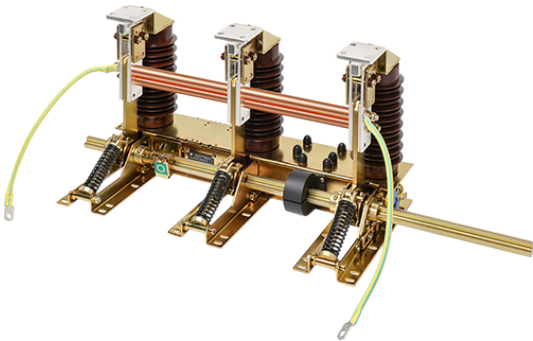
Ordering notice

1. Please specify products model, Rated voltage, Phase distance.
2. If need arrange bevel gear operation mechanism, please specify the operation way of right or left direction (Picture is right operation direction).
3. Flexible connection length need extend or not(Standard L=600mm).
4. With or without live indicator, please specify the model of it.
5. If any special requirements, please contact with GreenPower to develop detailed specifications.

Note: Phase distance less than 360mm need add insulating plate.

Products model	E	G	L	D
GPJN15-40.5/31.5-280	280	290	1010	656
GPJN15-40.5/31.5-300	300	340	1100	696
GPJN15-40.5/31.5-350	350	340	1200	796
GPJN15-40.5/31.5-360	360	320	1200	816
GPJN15-40.5/31.5-400	400	340	1300	896

- GPJN15-12(24)/D31.5
Indoor high voltage motorized earthing switch
GPJN15-12/D40, 50
Indoor high voltage motorized earthing switch
GPJN15-40.5/D31.5
Indoor high voltage motorized earthing switch



GPJN15-12(24)(40.5)kV motorized earthing switch

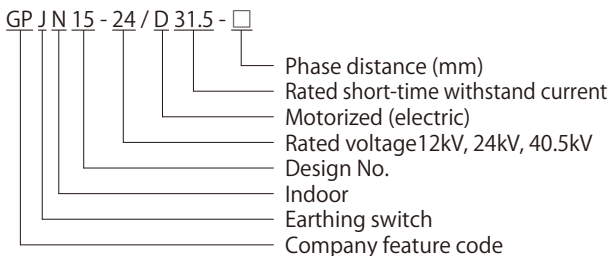
GPJN15-12(24)/D31.5, GPJN15-12/D40, 50, GPJN15-40.5/D31.5 series indoor high voltage motorized earthing switch (short as: motorized earthing switch) is designed for the intelligent switchgear requirement of the electric system. It is suit for 3~40.5KV, 3 phase, AC 50 (60) Hz power system and kinds of high voltage switchgears. It is applicable for high voltage switchgear arrangement as the earthing protection when maintenance. The products' performance meet GB1985-2004 High Voltage AC Disconnecter and Earthing Switch and the requirements of standard as well as IEC62271-102:2002.

Earthing switch structure is simple and compact, light weight, flexible operation, easy installation, dynamic thermal stability, and a reliable electric operation, keep the original interlocks in catching rabbits switchgear chain constant, has been a national patent.

Products summary

Due to the earthing switch is electrically operated, The cabinet manually operated interlocks is still keep the same as original design, but there are some parts have been modified, be sure to use our company's matchable connection rod , otherwise it would be burned the motor of motorized earthing switch.
Since the earthing switch is electrically operated, and therefore the cabinet manually operated chain catching rabbits consistent with the original style, but there are some parts have been modified, be sure to use the matching connection rod of our company, otherwise it would be burned the motor of motorized earthing switch.
If the cabinet back door need interlocking with motorized earthing switch, also be sure to use the company's patented technology to produce backdoor interlock mechanism, and equipped travel switch.
When the back door is not closed, cutting off the operation power of motorized earthing switch to avoid motorized earthing switch of misuse and damage the motor.
When electric interlocking with the motorized earthing switch, be sure to use auxiliary contacts associated with electrical components to disconnect the operation power of the motorized earthing switch to achieve electrical interlock in order to ensure a reliable electrical interlock.

Products model and its meaning



Basic parameters

Products model	GPJN15		
Rated working voltage	12kV	24kV	40.5kV
Rated short-time withstand current (4S)	31.5kA	40kA	50kA
Rated peak withstand current	80kA	100kA	125kA
Rated short-circuit close current	80kA	100kA	125kA
Main circuit withstand voltage(1min)	42kV	65 kV	95kV
Insulating level: Rated lighting impulse withstand voltage	75kV	125 kV	185kV
Across distance after open not less than	125mm	200 mm	300mm
Control voltage	AC220V	DC220V	DC110V

Standard working conditions

Apply to the following conditions:

1. Not more than 1000 meters above sea level;
2. Ambient temperature not higher than + 45°C , not lower than -25°C ;
3. Daily average relative humidity less than 95%, the monthly average of less than 90%;
4. Earthquake intensity does not exceed 8 degrees;

Not available the following locations:

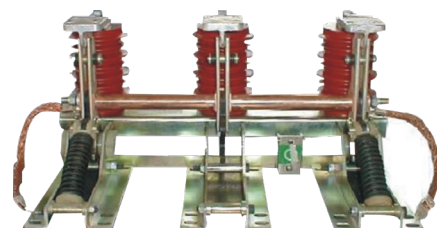
1. Installation site there is a serious grounding switch insulation and conductivity of gases, vapors, chemical precipitation, dust, dirt and smoke explosion aggressive substances;
2. Installation place has frequent violent vibration.

Structure and working principle

1. Main structure

The earthing switch mainly formed by the holder, ground knife assembly, Fixed contact, sensors, shafts, crank arm, spring, conductive sleeve, flexible connection, curved rear bracket by a thin steel plate welded into parts, the rest are assembled components. Its shape, see the following picture:

Figure 1: Outline of the motorized earthing switch



2. Earthing switch works principles (in Figure 2, for example)

When the manually operated earthing switch closed, the torque force to the shaft 5 to overcome the drag torque, driving crank arm 7 rotates in the closing direction, and the operation rod on the earthing knife 9 through pressure spring 8 dead point, spring release energy, the grounding switch rapidly closing, on the closing position, earthing knife of earthing knife components 9 through the butterfly spring and knife mouth of fixed contact 6 to earthing firmly and securely.

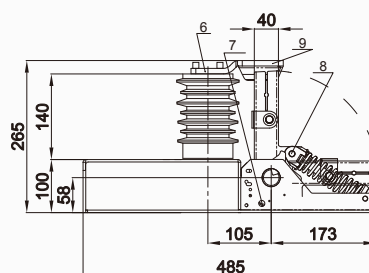
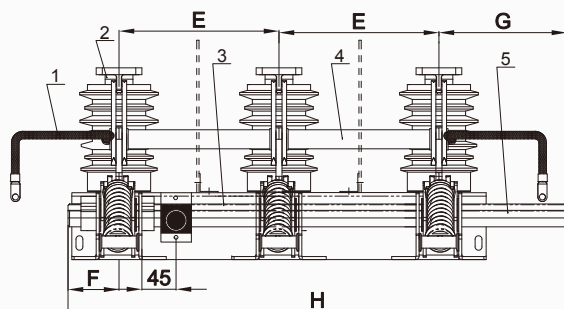
When manual operation opening, the torque force to the shaft 5 and the spring force to overcome the resistance torque, drive crank arm 7 along the opening direction of rotation, and earthing knife 8 and pressure spring 9 through the dead point, spring energy storage finished in order to prepare for the next closing times.

When electric operation, earthing switch inside has bevel gear, reducer, motor, control board which combined to drive device, this device output torque forward and reverse directions, so that the earthing switch opening or closing.

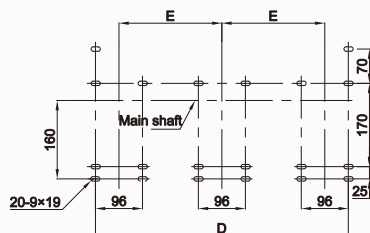
Whether earthing switch is manually or electrically operated, it is regardless of the speed of closing and opening the earthing switch.

Outline dimension, installation dimension and busbar joint dimension

Figure 2: GPJN15-12/D31.5/150 motorized earthing switch outline dimension



Holing dimension



Products model	E	F	G	H	D
GPJN15-12/D31.5-150	150	75	140	515	396.5
GPJN15-12/D31.5-165	165	75	160	565	426

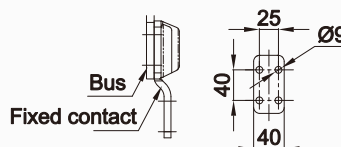
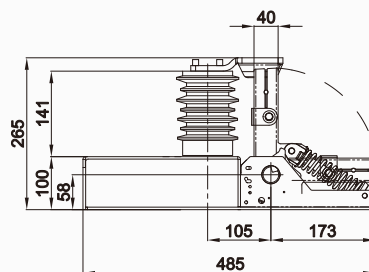
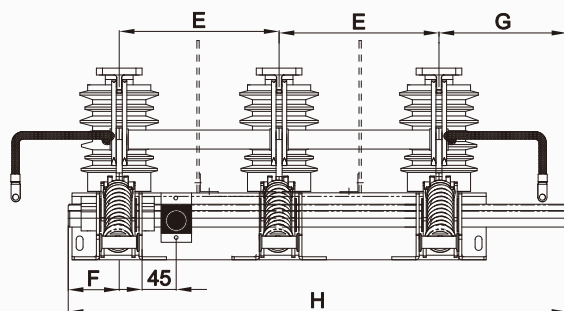
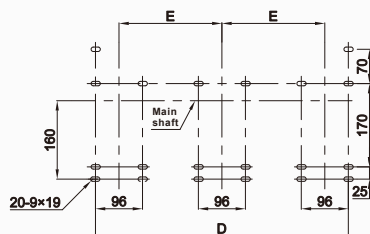


Figure 3: GPJN15-12/D31.5/210/275 motorized earthing switch outline dimension

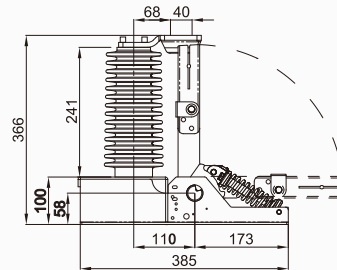
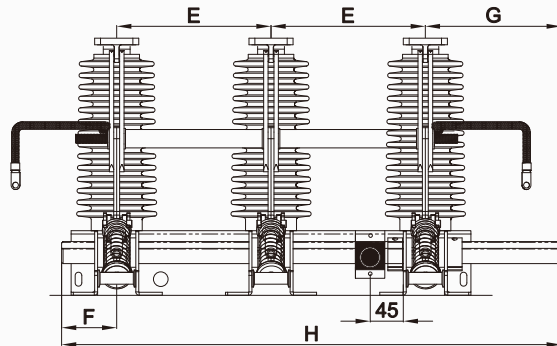


Holing dimension

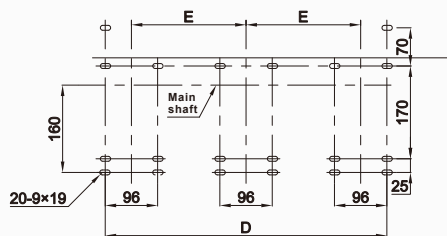


Products model	E	F	G	H	D
GPJN15-12/D31.5-275	275	75	185	810	646
GPJN15-12/D31.5-210	210	75	160	665	516
GPJN15-12/D31.5-250	250	75	160	735	596

Figure 4: GPJN15-24/D31.5/210/275 motorized earthing switch outline dimension



Holing dimension



Products model	E	F	G	H	D
GPJN15-24/D31.5-275	275	75	185	810	646
GPJN15-24/D31.5-210	210	75	160	665	516

Phase distance 210mm need add insulating partition

Figure 5: GPJN15-12(24)/D31.5

GPJN15-40.5/D31.5 series motorized earthing switch busbar joint size

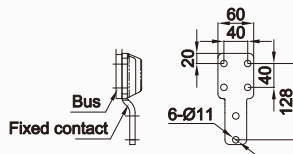
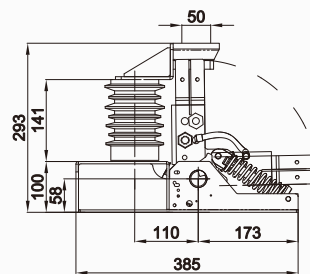
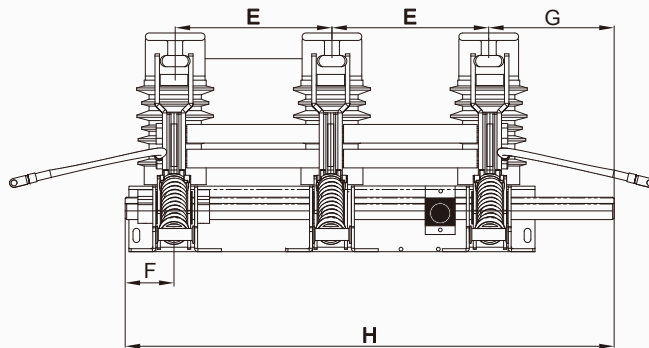
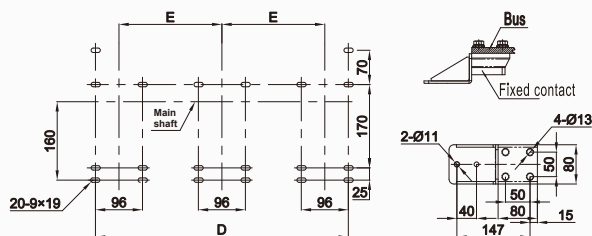


Figure 6: GPJN15-12/D40/210/275 motorized earthing switch outline dimension

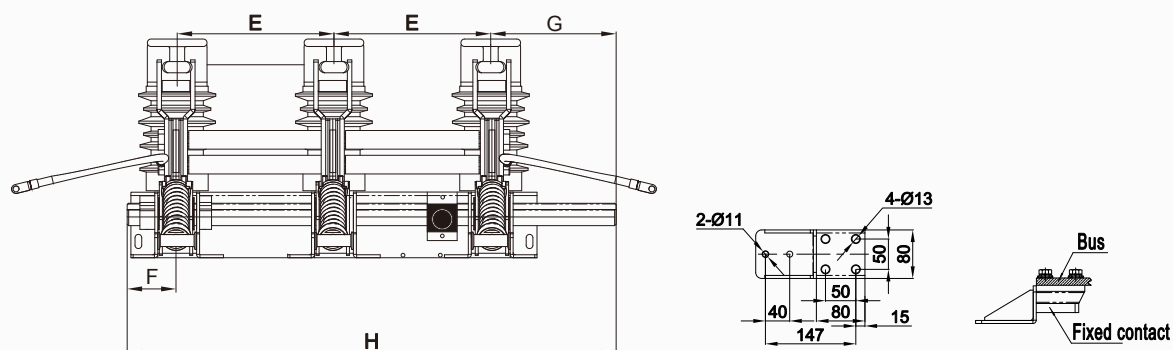


Holing dimension

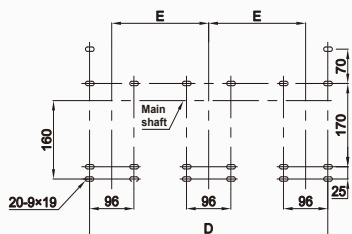


Products model	E	F	G	H	D
GPJN15-12/D40-275	275	75	185	810	646
GPJN15-12/D40-210	210	75	160	665	516

Figure 7: GPJN15-12/D50/210/275 motorized earthing switch

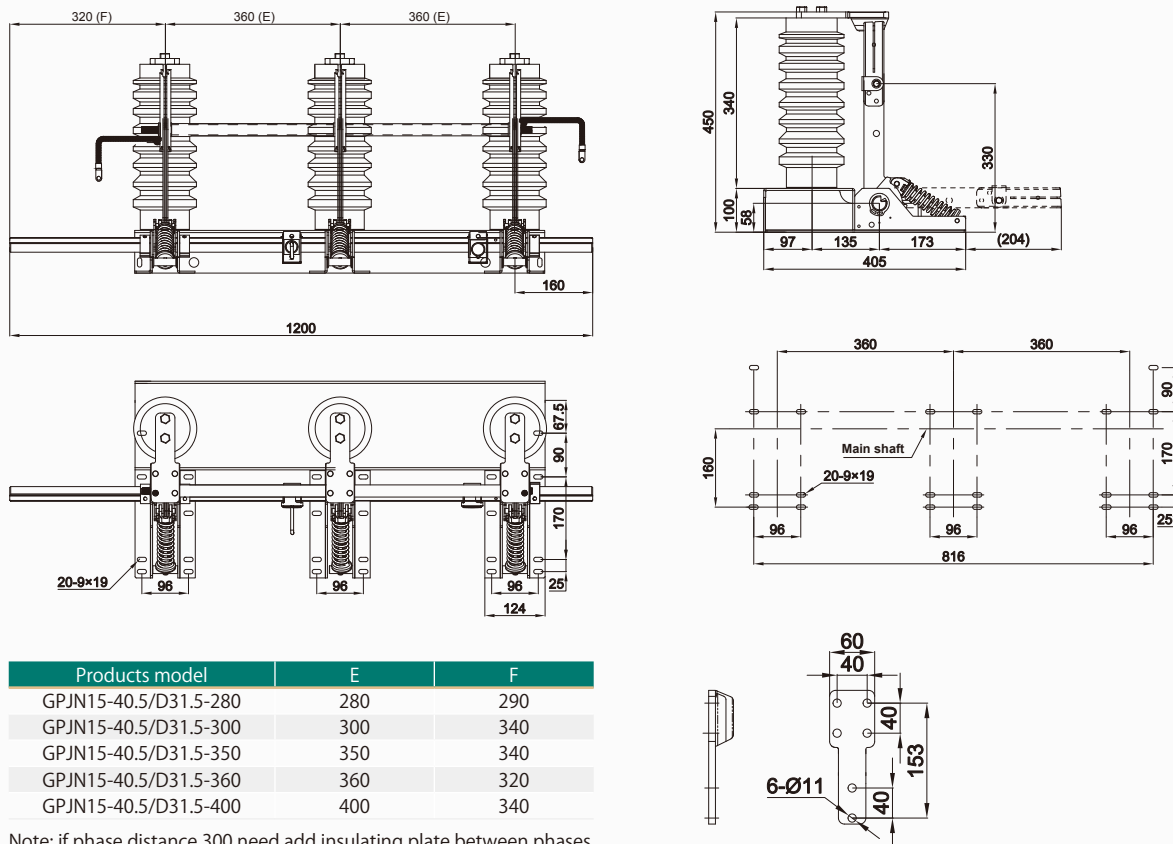


Holing dimension



Products model	E	F	G	H	D
GPJN15-12/D50-275	275	75	185	810	646
GPJN15-12/D50-210	210	75	160	665	516

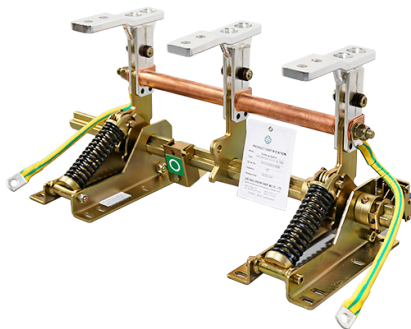
Figure 8: GPJN15-40.5/D31.5 motorized earthing switch outline dimension



Products model	E	F
GPJN15-40.5/D31.5-280	280	290
GPJN15-40.5/D31.5-300	300	340
GPJN15-40.5/D31.5-350	350	340
GPJN15-40.5/D31.5-360	360	320
GPJN15-40.5/D31.5-400	400	340

Note: if phase distance 300 need add insulating plate between phases.

GPJN15A-12/31.5 Indoor high voltage AC earthing switch



Description

GPJN15A-12/31.5 type indoor high voltage earthing switch is the assembly type new generation products, its performance meet GB1985-2004 High Voltage AC Disconnecter and Earthing Switch and the requirements of standard IEC62271-102:2002. The products suit for power system with 3-12kV, 3 phase, AC, 50(60)Hz; It has capacity of short-circuit close to protect the electrical equipment from damage, Applicable for high voltage switchgear arrangement as the earthing protection when maintenance.

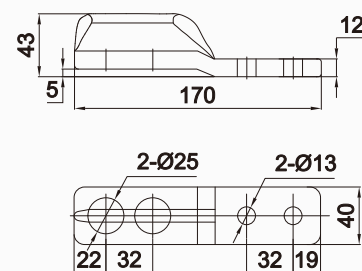
Working condition

1. Altitude sea level not exceeding 1000m;
2. Ambient air temperature: +45°C, -25°C ;
3. Seismic intensity not exceeding 8 degree;
4. Related humidity daily average value not more than 95%, monthly average not more than 90%;
5. Pollution class: II

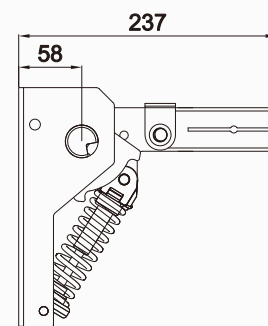
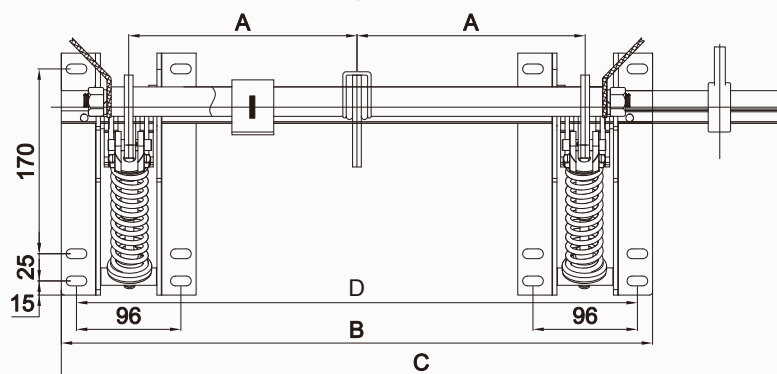
Main technical data

Items	Unit	Data
Rated voltage	kV	12
Rated short-time withstand current	kA	31.5
Rated short circuit duration	s	4
Rated short circuit close	kA	80
Rated peak withstand current	kA	80
Rated insulation level	Power frequency withstand voltage(1min)	kV 42
	Lighting impulse voltage	kV 75
Mechanical Life	time	3000

Fixed contact outline dimension



GPJN15A-12/31.5 Earthing switch layout and installation size



Model	A	B	C	D
GPJN15A-12/31.5-150	150	424	535	396
GPJN15A-12/31.5-165	165	454	565	426
GPJN15-12/31.5-180	180	484	571	456
GPJN15A-12/31.5-190	190	504	615	476
GPJN15A-12/31.5-200	200	524	635	496
GPJN15A-12/31.5-210	210	544	655	516
GPJN15A-12/31.5-230	230	584	695	556
GPJN15A-12/31.5-250	250	624	735	596
GPJN15A-12/31.5-275	275	674	785	646

Ordering notice

1. When ordering earthing switch, please specify product model, right or left operation, phase distance, with or without live indicator device (specify the indicator model).
2. Flexible connect length need extend or not.
3. If any special requirements, please contact with GreenPower to develop detailed specifications.

GPJ-3100 Series short circuit and earth fault indicator

100447

The GPJ-3100 series of short circuit and earth fault indicator is designed for testing and indicating short circuit and earth fault in real time. It is applied to monitor circuitry in RMU, overhead line, power cable distribution line, box-type transformer and other similar places. According to alarm signal showed by indicator, workers can figure out and cut off fault area rapidly when short circuit or earth fault occurring in the circuitry, so the system can recover supplying power for non-fault area promptly to save time and enhance efficiency.

Functions:

1. Short circuit alarming
2. Earthing alarming
3. Auto reset
4. Test / Reset
5. Transmit alarming information remotely
6. Alarming indication with low voltage of the battery

Technical data:

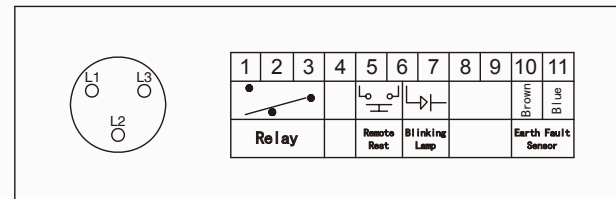
1. Short circuit alarming current: 100A to 1000A time delay 40ms
2. Earthing alarming current: 20A,30A,40A,50A,60A $\pm$ 10% time delay 40ms
3. Temperature range : -25 to +70 °C
4. Humidity range: $\leq$ 95%
5. Earth lead length : 4m
6. Conduct optical fiber length 3.5m
7. Power supply: lithium battery 3.6V/2.45Ah
8. Auto-reset time : 7s,2hrs,4hrs,8hrs
9. Output relay : 120 V AC 1A, 30V DC 2A
10. Main controller dimension : 95x50x80mm
11. Cutting hole size : 91x44 mm
12. Protection class : Main Controller :IP40, Sensor:IP65



Characteristics

1. High reliable MCU to get low consumption when monitoring.
2. Passive sensor.
3. Long-life lithium battery as power supply.
4. Three phases detect independently.
5. Used optical fiber to transmit short circuit signal, separate from high voltage, have good safety and high reliability.
6. Self-lock output relay.

Connection diagram

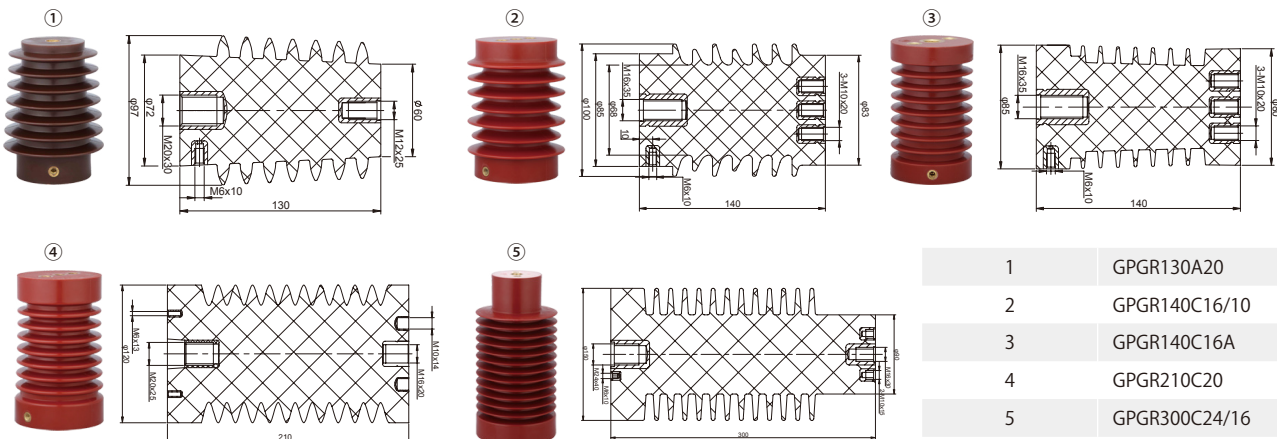


GPGR Series sensors for 12kV, 24kV, and 35kV

With the automation pressure gel techniques (called APG Techniques),the new type of voltage Insulator can be applied to indoor high voltage electric facility 3-40.5kV,frequency 50/60Hz. When it is used with voltage indicator ,it can indicate the electriferous status of high-voltage loop circuit and also realize the locking function to prevent any dangerous operation entering into electriferous spacing.

Technical parameters

Rated voltage(kV):	12	24	40.5
Lighting impulse withstand voltage(kV)	75	125	185
Power frequency withstand voltage(kV)	42	68	95
Partial discharge(pC)	≤ 10	≤ 10	≤ 10
Creepage distance(mm)	≥ 240	≥ 480	≥ 810
Capacitance(pF)	G : (8) R : (20)		15
Height(mm)	130/140/145	210	300



● Voltage indicator

The voltage presence indicating system is comprised of voltage indicator and high voltage insulator to indicate electriferous status of high voltage circuitry. The voltage indicator with interlocking function can interlock high voltage electrical equipment to prevent any dangerous operation entering into the electriferous spacing .

Technical parameters

1. Rated frequency: 50Hz or 60Hz
2. Ambient temperature range: -25°C to +55°C
3. Protection class: IP54
4. Power frequency withstand voltage 2kV/1min
5. Threshold voltage 15% to 40%Un

Type Description

GP XN □ □ - □ □ □

- System voltage: 3kV to 35kV
- Special code : CS—with self-check function ; /L—with 2 auxiliary contact output; Z—sub-master; M—master; W—insert
- Type: T—cue; Q—lock
- Design code: empty—without testing hole; 1—with testing hole
- Design code: letter or number
- In-door voltage indicator
- Company feature code



Figure 1



Figure 2



Figure 3



Figure 4



Type	Item	Display method	Power check	Locking single contact	Locking double contact	Insert	Self check	Dimension	Cutting size	Figure
Builtin type Swg.	GPXN-Q	Key-press		√				96 × 48 × 88	91 × 44	3
	GPXN-T	Key-press						96 × 48 × 55	91 × 44	3
	GPXN1-Q	Brightness	√	√				96 × 48 × 88	91 × 44	1
	GPXN1-T	Brightness	√					96 × 48 × 55	91 × 44	1
	GPXN4-Q	Key-press	√	√				144 × 48 × 104	138 × 44	4
	GPXN4-T	Key-press	√					144 × 48 × 104	138 × 44	4
	GPXN5-Q	Key-press	√	√				96 × 48 × 88	91 × 44	2
	GPXN5-T	Key-press	√					96 × 48 × 55	91 × 44	2
One Insulator with 2 Indicators	GPXN4-Q/M	Key-press	√	√				144 × 48 × 104	138 × 44	4
	GPXN4-T/M	Key-press	√					144 × 48 × 104	138 × 44	4
	GPXN4-T/Z	Key-press						144 × 48 × 104	138 × 44	4
Special Type	GPXN1-Q/CS	Brightness	√	√			√	96 × 48 × 88	91 × 44	
	GPXNP1-Q/W	Brightness	√	√		√		96 × 48 × 88	91 × 44	1
	GPXN-Q/LCS	Brightness			√		√	96 × 48 × 88	91 × 44	3

● Voltage indicator used in Ring Main Unit

The voltage indicator is used together with insulator to indicate electriferous state of the voltage circuitry.

The continuous voltage detector GPXN9-C is used with indicator to indicate the electriferous state. The hole distance of the power-check terminal is 14mm or 19mm.

Phase comparator GPXN-C is used with indicator to indicate the electriferous state of high-voltage circuitry and check phase sequence of electrical equipment.

Power-check: phase comparator insert into the earthing or the other terminals of the high-voltage equipment.

Phase-check: phase comparator insert into the same phase power-check terminal of two high-voltage equipment, if the LED light is bright, it shows that the testing phase having power supply.

Technical Parameters

- Rated frequency: 50(60)Hz
- Threshold voltage 15% to 40% Un
- Threshold current : 2.5uA
- Ambient temperature : -25°C to +55°C
- Protection class: IP54

100429<33kv/45pF>

100874<40.5kV/15-25pF>

100873<24kV/15-25pF>

100569<lead 1m>

Type	Outline Dimensio (mm)	Cutting Size (mm)	Installation Size (mm)
GPXN6-T	70 × 35 × 33	55 × 32	Φ 3.4 × 2 Distance 64
GPXN2-T	130 × 30 × 45	110 × 26	Φ 5.2 × 2 Distance 64
GPXN2-Q	96 × 48 × 88	91 × 44	
GPXN7-T	100 × 35 × 33	84 × 32	Φ 3.4 × 2 Distance 64



GPXN7-T
100438



Phase comparator
100679



Voltage detector GPXN9-C
100678



GPXN6-T



GPXN2-T
100432



GPXN2-Q
100435

● GPK-3360 Multi-funtional control unit

The GPK-3360 serial of multi-functional control unit are applied to all kinds of switchgears, such as builtin type, handcart type, fixed type, ring main unit and so on. With so many functions of phase-voltage indication, interlock, temperature & humidity controll, circuit breaker status indication, stored energy indication, earth switch status indication, handcart position indication, remote/local operation, and open/close operation.

Characteristics

1. High reliability and long lifespan
2. Use LCD to indicate temperature and huimidity status
3. The functions of voltage indication and interlock function can operate independently and both contains 2 groups of output relays.
4. Control temperature and humidity in 2 channels
5. Key-type open/close operation switch is optional.
6. Check power and phase sequency with testing hole.

Technical Parameters

Threshold voltage	15% to 40% Un
Rated frequency	50Hz or 60Hz
Auxiliary contact capacitance	7A, 250VAC or 30VDC
Interlock voltage	15% -40% Un
Temperature range	-9°C~+ 99°C accuracy $\pm 1^\circ\text{C}$
Humidity range	0 ~ 99%RH accuracy $\pm 5\%\text{RH}$
Heating start-up condition	T< lower limit settings H> upper limit temperature settings
Heating stop condition	T> lower limit settings H< upper limit temperature settings
Fan start-up condition	T> upper limit settings



Fan stop condition	T< lower limit settings
Temperature Setting value	3°C to 45°C
Humidity setting value	40% to 90%
Contact output capacitance	8A/250V AC
Power supply	110V/220V AC or DC
Ambient temperature	-15 to 55°C
Protection class	IP54
Power-frequency withstand voltage	2kV/min
Rated power	<15 W
Dimension	240 × 186 × 70mm
Cutting size	220 × 165mm

● GPSJ-4 Current indicator

100451

The GPSJ-4 current indicator is used to indicate and alarm the absence of loop circuit resistance.

It has a 4-gear switch to choose the load power. When the load is normal, the normal state indicating lamp is on, the output contacts 4# and 3# connected, while connectors 2# and 1# disconnected. When the loop circuit resistance increased (for example: the heater is aging or one of parallel heaters is occurring open fault), the normal state indicating lamp is off, and the alarm indicating lamp on, meanwhile, the output alarm contact status is changed. Namely, when any load power in the 4-gear switch is absent and fall down to 20% of rated power, the current indicator will take prompt and accurate action.

It also can sample supply voltage to adjust the reference value to avoid any monitor fault or failure opearation caused by the fluctuation of power supply voltage which is more suitable for monitoring the heaters which are parallel connected .

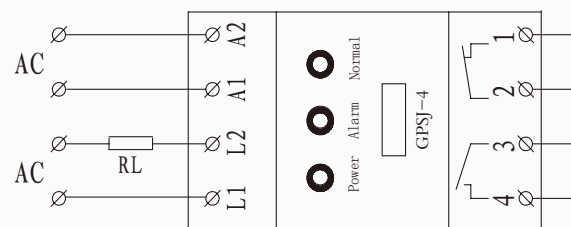
The current indicator is easy for connecting and mounting with high performance on resist current impact.

Technical parameters

Rated voltage	AC110V/220V
Start current	20% optional load absence
Ambient humidity	$\leq 95\%\text{RH}$
Ambient temperature	-25°C ~ +55°C
Defend class	IP2X
Rated frequency	50/60Hz
Max monitoring current	5A
Withstand resisting impact current	20A/1S
Power frequency withstand voltage	2000V/min
Output contact capacitance	5A, 250VAC or 30VDC
Responding time	<5 s
Life time	>100000 hours
Dimension	90 × 45 × 59 (Installed with 35mm DIN rail)



Connection diagram

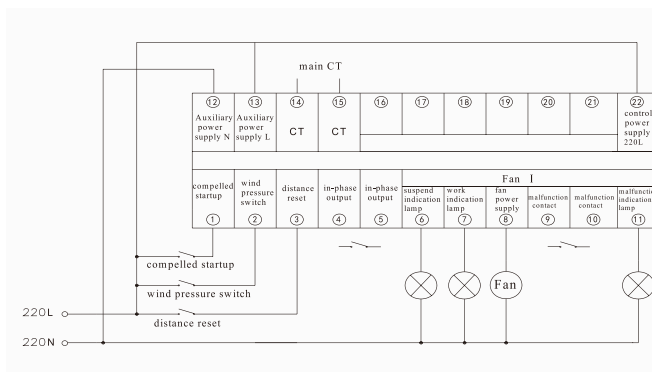


● GPFC-1 Intelligent Fan Control Device

100452

GPFC-1 is an intelligent digital radiating system specially designed for switchgear which to force air-cooling. With brand-new digital way replacing temperature indirect control, which can absolutely solve big error in open-control point caused by temperature, frequent acting for the fan and startup lag behind, etc. It is an update products comprised of independent components for controlling and observing loop circuit which can successively observe the working state of fan. It has a characteristic of setting, choosing manual force-open pattern, cascade working against the startup current site.

Using MCU as main controller and add some practical control programs which make control style more reasonable. It is specially developed for industrial control using in high voltage switchgear with mature digital circuit design, advanced workmanship and perfect related test so that it can have a long working life, strong anti-interference, less node and optimized circuit to ensure the high reliability and stability of the product in practice.



Performance	Data
Power supply	220AC $\pm$ 10%/50Hz
Standby power	$\leq$ 10W
Outline dimension	160 $\times$ 90 $\times$ 57.5
Installation	35mm Guide rails Installation
Current jumper	1A(single)/5A(connection)
Setting range	30%~105%le
Fan power	155-175w
Fan start current upper limit	2.3A $\pm$ 10%
Fan rated current upper limit	1A $\pm$ 10%
Fan rated current lower limit	0.47A $\pm$ 10%
Environment ambient temperature	-20°C~+55°C
Environment ambient humidity	$\leq$ 95%RH
Main contact Capacitance	10A/250AC

● Position Indicator

Position indicator can simulate the operating position and condition of switch apparatus like switch and circuit breaker in electric system. It is extensively used on all kinds of mimic board of central control room and panel of switchgear in power plant, power station and transformer station. This serial of position indicators have high reliability,wide range of working voltage and long lifespan. DC and AC are available for usage.

Technical Parameters

Rated voltage	DC/AC 98V~242V
Luminous intensity	> 40 cd/m ²
Power frequency withstand voltage	2kV/1min
Insulation resistance	$\geq$ 100M Ω
Power dissipation	$\leq$ 1W
Operating temperature	-15°C to +50°C
Lifespan	> 10 years
Display function	Working condition is indicated with red/green color and graphics(As customers' option)
Outline dimension:	37.5 $\times$ 37.5 $\times$ 62(mm)
Cutting size:	Φ 25(mm)

Model	Description
GPWZ25-K/2	Position Indicator-Circuit-Breaker
GPWZ25-E/1	Position Indicator-Earthling Switch
GPWZ25-B/2	Position Indicator-Handling Truck
GPWZ25-B/1	Position Indicator-Disconnector
GPWZ25-K/1	Position indicator-Three position Switch



GPWZ25-K/2

100453<98-242V>



GPWZ25-E/1

100454<98-242V>
100605<DC24V>
100776<48V>



GPWZ25-B/2

100455<98-242V>



GPWZ25-B/1

100456<98-242V>



GPWZ25-K/1

100457<98-242V>

● GPD5000 Series digital electricity meter

With the standard Modbus-RTU communication function, the GPD5000 series is a intelligent integrated power parameter monitoring instruments which the wire system can be set and ratio can be changed. It can measure three-phase AC voltage, AC current, frequency, power factor, active and reactive power, active and reactive energy and so on, and displays the result in seven-segment LED or segment LCD. GPD5000 series digital electricity meter is designed according to the state standard, designed with advanced electric circuit, international brands of electronic components, and combined with careful software design, which has the characteristics of high integration and high reliability. The GPD5000 has been rigorously tested for hardware and software, as well as a variety of environment test and EMC test, so it can work well in harsh environment.

Applications: 1) Used in the high and low voltage switchgear for the power system include power plants, substations, power distribution to achieve the power monitoring in transmission and distribution.

2) Used in petroleum, chemical, metallurgy, railway construction and other industries, it can achieve power monitoring and power management of distribution system and electrical equipment that in airports, ports, housing district, smart buildings and other facilities.

Product Features

True RMS of the voltage and current
The wire system can be set
Ratio can be changed
The main interface is user-defined
Modular design
Standard shell
Standard Modbus-RTU
Good electromagnetic resistance

GPD50 30 IU - A S ☐ ☐ ☐ ☐
① ② ③ ④ ⑤ ⑥ ⑦ ⑧ ⑨

③ Function code

-Blank: All parameters can be measured

IU Ammeter/Voltmeter
IW Ammeter power meter
I Ammeter
U Voltmeter
P Active power meter
Q Reactive power meter
C Power factor meter
D Power factor angle meter
Wh Active power meter
Qh Reactive energy meter

① Products code

-GPD50: Electricity digital display

② Products serial number

-10: Single-phase meter: Seven-segment LED display
-20: Three-phase meter: Seven-segment LED display
-30: Three-phase meter: Segment LED display

④ Outline dimension code

A: 96x96x112 B: 96x96x89 C: 96x48x112
D: 120x120x112 F: 72x72x112 K: 82x82x80

⑤ Communication interface

-N: None -S: RS485 interface -R: RS232 -P: RS232 Printer

⑥ Extended function I N: None

1AO: Analog output 1 2AO: Analog output 2
3AO: Analog output 3 4AO: Analog output 4

⑦ Extended function II N: None

1DO: Relay output 1 2DO: Relay output 2
3DO: Relay output 3 4DO: Relay output 4

⑧ Extended function III N: None

1DI: Switch input 1 2DI: Switch input 2
3DI: Switch input 3 4DI: Switch input 4

⑨ Extended function IV

N: None
1EP: Electric energy pulse output 1 2EP: Electric energy pulse output 2



GPD5036
96 × 96 × 89

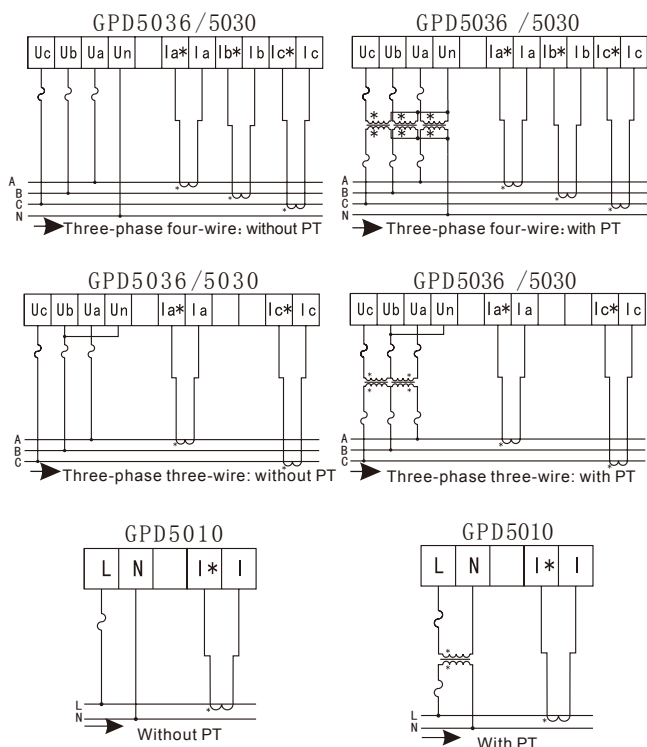


GPD5030
96 × 96 × 112



GPD5010
96 × 48 × 112

Typical wiring diagram :



Power supply:

AC	85~265V (45~65Hz)
DC	85~330V

Input:

Rated voltage	420V AC/100V AC 1.2 times rated: continued, 2 times rated: 10 seconds
Rated current	5A AC/1A AC 1.2 times rated: continued, 10 times rated: 10 seconds

Precision:

Voltage	0.2 level
Power	0.5 level
Electric energy	1 level
Current	0.2 level
Frequency	± 0.05Hz

EMC Characters:

Surge	GB/T 17626.5-2008 (IV, 4kV)
Pulse train	GB/T 17626.4-2008 (IV, ± 4kV)
Static	GB/T 17626.2-2006 (III, ± 8kV)

Environments:

Working	Temperature: -10°C ~ +50°C Humidity: 20%~95% no condensation
Storage	Temperature: -25°C ~ +85°C Humidity: 20%~95%, no condensation

● GPZ Series electrical operation controller

GPZ series electrical operation controller use intergrated control, applied in all kinds of ring main electric operating control such as load switch opening or closing, energy storage motor storage and so on. Though the inspection agencies in the auxiliary contact state and the opening and closing signal, control the motor energy storage and control mechanism of closing or opening, effectively prevent the switch misoperation. This controller has the advantages of high reliability, long service life, which is replaced by a discrete component of traditional choice of control circuit.

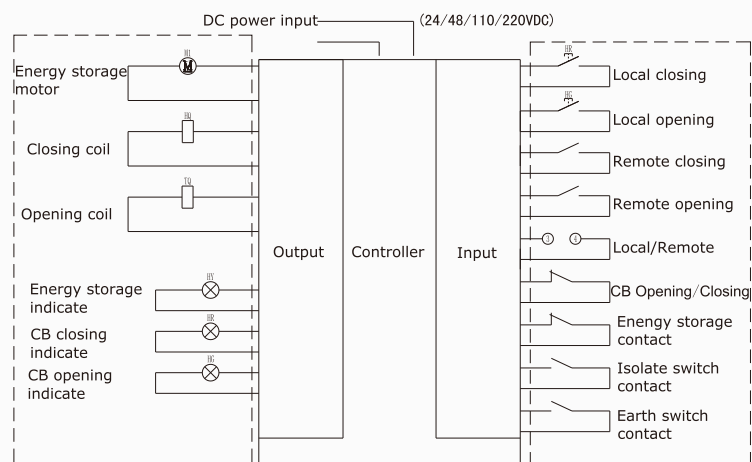
Product features

Closing with anti-pumping function;
Adopt centralized control, high reliability, low failure rate;
External auxiliary contact function can be designed according to customer demand;
Product is fully sealed, with waterproof, prevent condensation function, can be function well in damp high and low temperature, and other harsh environment;
Small volume, convenient installation;
Wiring is simple, the connector with anti-error function, high mounting efficiency;
Many models and different voltage grade products to choose.

Technical parameters

Rated voltage	24/48/110/220 VDC
Withstand voltage	2kV/ 1min
Working environment	-25℃ ~55℃ , ≤ 90%RH
Power consumption	<5W
Service life	10 years
Protection class	IP54
Outline dimension	110X85X80mm

Outline view



● Position Indicating Screen GPAS-72 100477

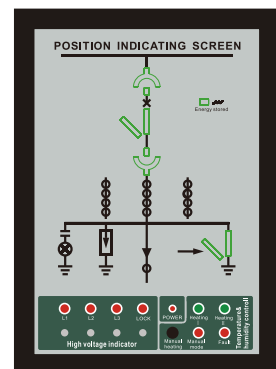
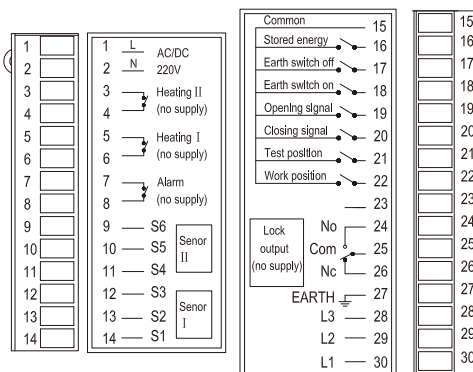
The GPAS-72 serial position indicating screen adopts LED as the light source, with low energy consumption, high reliability, long service life, etc. And it can be applied to all kinds of switchgears as position indicating screen with different system diagram solutions. With so many functions of phase-voltage indication, interlock, temperature & humidity control, handcart position indication, circuit breaker status indication, earth switch status indication, stored energy indication. It is the good choice to replace the traditional single switch state position indicator.

Features

Wide range of power supply.
Use LED as the light source, with low energy consumption, high reliability, long service life.
The functions of voltage indication and interlock function can operate independently, and with one output relays.
Control temperature and humidity in 2 channels, and heating fault alarm.
Adopt embedded installation structure, easy for mounting.

Technical parameters

Rated voltage	AC/DC 110V/220V
Power frequency withstand	2kV/min
Work environment	-25℃ to 55℃ , ≤ 90%RH
Analog indicator light luminance	>40cd/m2
Working life	10 years
Protection level	IP42
Dimension	199x146x63mm
Cutting size	177x121mm

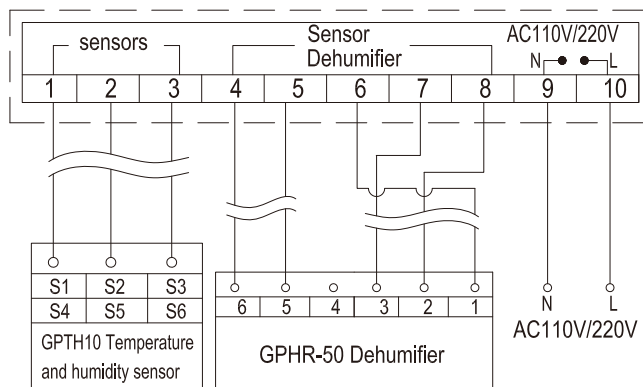


Intelligent cabinet dehumidifier GPHR-50

This products combines semiconductor refrigeration condensing dehumidification technology and heating dehumidification technology, it is integration of dehumidification heating equipment, using imported high-performance digital temperature and humidity sensors and integration of advanced process control technology, used in switchgear terminal boxes and other equipment which need dehumidification for current time monitoring and control. The products with stable and reliable performance, moisture dehumidifying effect is obvious, long-term work in the strong electric field, magnetic field, wet, low temperature and other harsh environment. It can effectively prevent the electrical equipment accidents in operation due to the damp, creepage, flash improve the security of grid operation.

Technical parameters

Dehumidify power	50W
Heating power	40W
Temperature set range	+3°C ~+40°C
Humidity set range	40%RH~90RH
Rated voltage	110/220V AC
Withstand voltage	2kV/1min
Temperature display range	-9°C ~+99°C precision $\pm 1^{\circ}\text{C}$
Humidity display range	0~99%RH precision $\pm 5\%\text{RH}$
Working environment	-25°C ~+55°C , $\leq 95\%$
Dehumidify start condition	Humidity > set upper limit humidity
Dehumidify stop condition	Humidity < set lower limit humidity
Heating start condition	Temperature<set lower limit temperature
Heating stop condition	Temperature<set upper limit temperature



GPW-700
Controller
100427



GPTH30
Temperature and humidity
100479



GPHR-50
Dehumidifier

Model	Outline dimension(mm)	Installation method
GPHR-50 Controller	96X48X88	Cutting size 91X44mm
GPHR-50 Dehumidifier	95X150X180	For 35 rail
GPTH30	90X35X40	For 35 rail or M4 screw fixed.
Lead	3meter	100700

GPHR-51/35 All-in-one intelligent cabinet dehumidifier

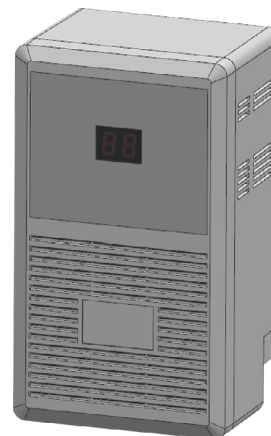
This product makes use of semiconductor refrigeration condensing dehumidification technology, using high performance temperature and humidity sensors and integration of advanced process control technology, used in switchgear, terminal boxes and other equipment which need dehumidification for current time monitoring and control. The products with small volume stable and reliable performance, moisture dehumidifying effect is obvious, long-term work in the strong electric field, magnetic field, wet, low temperature and other harsh environment. It can effectively prevent the electrical equipment.

Working principle

GPHR-51/35 All-in-one intelligent cabinet dehumidifier is consist of air supply device, dehumidifying device, and intelligent control unit. Combines the semiconductor refrigeration dehumidification technology, sensor detecting technology, automatic control technology, etc. When the system detects the environment humidity is higher than set dehumidification threshold, it start dehumidification function automatically. In the process of dehumidification, moist air is inhaled to the dehumidification devices by fan, after dehumidification equipment of refrigeration system's condensation dehumidification, reduce the humidity in the air, condensation of water is collected by the same tank and drained out of the cabinet by the hose, achieve the goal of dehumidification.

Characteristics

All-in-one design, internally installed switching power supply, small outline dimension
Using guide rail mounting structure, convenient and simple to install



Using semiconductor dehumidification, temperature rise is low, long life, dehumidifying effect is good;
With alarm sensors, dehumidifier self-checking function, can quickly find the point of failure.
Environmental humidity 24 hours real-time monitoring, automatic dehumidification

Technical parameters

Dehumidify power	35W
VDD power	220V AC/DC
Start dehumidify threshold	75%RH
Stop dehumidify threshold	65%RH
Working environment	-10°C ~+45°C , ≤ 95%RH
Humidity display range	0~99%RH
Withstand voltage	2kV/1min
Outline dimension	155X900X74
Drainage way	By the hose

● GPTP300 wireless temperature measurement system

The wireless temperature measurement is consists of wireless temperature measurement module (referred to as the module, with various models) and wireless temperature measurement host (Wireless temperature monitoring terminal, referred to as the host) two parts. Wireless Temperature host for embedded installation mounted on the instrument panel room. Wireless temperature measurement module contacts the inner sleeve in the box, or buckle copper or at cable connection. By wireless communications between the temperature and other data.

● Features

1. A host can be up collecting 16 wireless temperature measurement module (2.4G) temperature, and acquisition host installation position of the environmental temperature.
2. Support four kinds of alarm types, two sets of relay alarm output, including temperature measurement module wireless communication failure, temperature point temperature is too high, the temperature rise is too high, three-phase temperature difference is too large.
3. Host via 2.4G wireless module, and temperature measurement module for data exchange, acquisition of temperature difference measurement points.
4. By Isolated RS485 communication interface to communicate directly with the host computer. Field or single, multiple, remote communication network, such as GPRS DTU can also plug a wireless module. The computer can realize the data remote transmission, parameter modification.

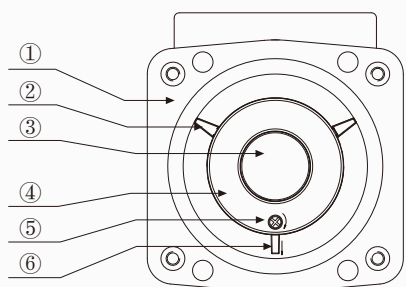


● GPTP300M main controller technical parameters

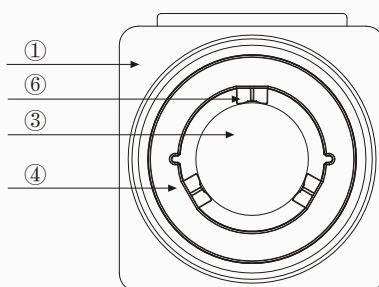
Power supply	90 ~ 264V AC/100 ~ 370V DC
Supply frequency	50Hz ± % Using 16x2 monochrome LCD and four LED display
Alarm Output	Two replay, per AC250V/5A
Wireless communication distance	Open area 50-100 meters
Host power consumption	≤ 5W
The communication with PC	With Isolated

● GPTP300S module technical parameters

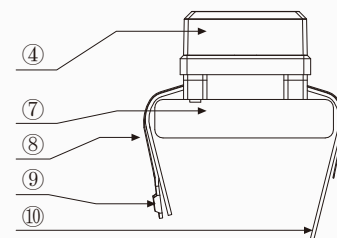
When working, a primary side current range	AC 15A~4000A
Working temperature range	-30°C ~ +115°C
Measuring temperature range	-30°C ~ +125°C
Accuracy of measurement	± 1.0°C
Reaction Time	≤ 3s
Wireless communication distance	Open area 50-100 meters
Module Power consumption	≤ 0.1W
Operating life	10 years



1. Spout
2. Fixed feet
3. Fixed contact
4. The temperature measurement module



5. Tighten the screws
6. Unfixed feet
7. Busbar
8. Bandage



9. Buckle straps
10. Silicon steel sheets

GPW-700 Temperature and humidity controller

With good quality digital sensors and advanced technology of program control, the device has two channels to monitor and control the ambient temperature & humidity. Its humanized design can automatically adjust heat, dehumidify or alarm according to the working environment state.

The field data can be controllably connected with the background through RS485 to achieve remote data acquisition.

It has high performance on reliability, dampproof and dehumidification which can operate in tough environment like strong electric/magnetic field, damp and low temperature location for a long time. It enhance the safety of electric networks by avoiding all kinds of accident caused by dampness, creepage and flashover during the electrical equipments operation.

Technical parameters

Humidity range	0 to 99%RH accuracy 5%RH
Temperature range	-9°C to +99°C accuracy $\pm 1^\circ\text{C}$
Heating start point	Temperature < lower limit settings Humidity > upper limit settings
Heating stop point	Temperature > lower limit settings Humidity < upper limit settings
Fan start point	Temperature > upper limit settings of fan
Fan stop point	Temperature < lower limit settings of fan
Ambient Temperature	-25 to +55°C
Ambient Humidity	$\leq 95\%\text{RH}$
Temperature setting range	+3°C to +45°C
Humidity setting range	40%RH to 90%RH
Power supply	110V/220V AC
Withstand voltage	2 kv/min
Contact output capacity	250V/AC 5A
RS485	Modbus RTU
Outline dimension	96X48X88(mm)
Installation dimension	139 X45(mm)
Power Consumption	$\leq 5\text{W}$



Temperature and Humidity Controller GPW-700



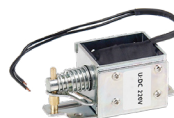
Sensor GPTH30

Blocking Magnet

Blocking magnet is widely used for controlling high voltage equipment. For example, the breaker and switchgear etc. The magnet has many types including blocking magnet, open/closing coils.

Product description

Model	Power	Stroke
GPM-1	200W / 300W	11mm
GPM-2	2.5W - 3.8W	7mm
GPM-3	185W - 385W	17mm
GPM-4	968W	15mm
GPM-5	590W - 865W	19mm
GPM-6	366W - 480W	33mm
GPM-7	370W	15-33mm
GPM-8	370W	28mm



GPM-1



GPM-5



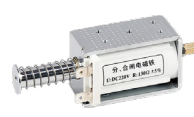
GPM-2



GPM-6



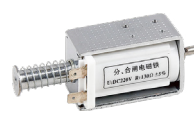
GPM-3



GPM-7



GPM-4



GPM-8

Technical drawing of a mechanical part, showing a side view and a top view.

Side View Dimensions:

- Total length: 269
- Central hole diameter: $\phi 20$
- Base diameter: $\phi 50$
- Internal hole diameter: $\phi 120$
- Internal hole length: 528
- Top flange thickness: 26.5

Top View Dimensions:

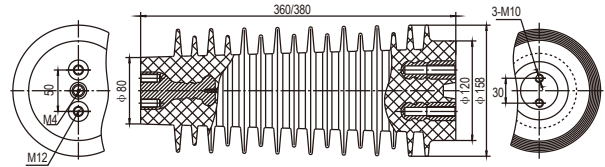
- Outer square flange side length: 335
- Inner circular hole diameter: $\phi 20$
- Distance between mounting holes: 290
- Mounting hole diameter: 4-M10, $D=16$

● GPNN40.5-360(S)/380(S) Insulator/ Capacity insulator(Sensor)

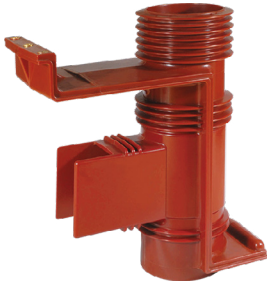


360	110011<Insulator>
	110013<Sensor>
380	110012<Insulator>
	110014<Sensor>

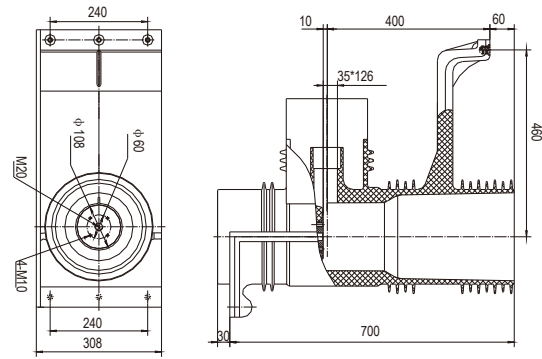
Technical specification:
 Rated voltage: 40.5kV
 Power frequency withstand voltage:
 118kV/1min
 Partial discharge: 40.5kV ≤ 3pC(reference value)
 Lighting impulse withstand voltage: 235kV
 Suit for altitude: 2500m
 Glass transition temperature : ≥ 95℃



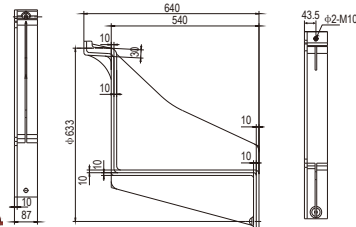
● GPHN40.5-/730-4 Screen shield contact box 110015



Technical specification:
 Rated voltage: 40.5kV
 Power frequency withstand voltage:
 137kV/1min
 Partial discharge: 52.6kV ≤ 3pC(reference value)
 Lighting impulse withstand voltage: 267kV
 Suit for altitude: 4000m
 Glass transition temperature : ≥ 95℃

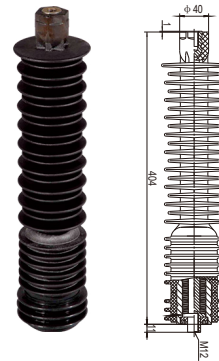


● GPB40.5-007 Supporting partition 110016



Technical specification:
 Specification: Width 87
 Suit for altitude: 4000m

● GPNN40.5/2000A-31.5kA Insulating tension rod 110017

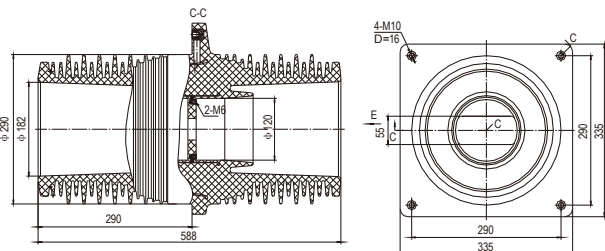


Technical specification:
 Rated voltage: 40.5kV
 Tension strength: > 25kN
 Rated voltage: 2000A
 Power frequency withstand voltage:
 137kV/1min
 Suit for altitude: 4000m

● GPN40.5-408P/588 Screen shield wall bushing 110018



Technical specification:
 Rated voltage: 40.5kV
 Power frequency withstand voltage:
 137kV/1min
 Partial discharge: 40.5kV ≤ 3pC(reference value)
 Lighting impulse withstand voltage: 267kV
 Suit for altitude: 4000m
 Glass transition temperature : ≥ 95℃

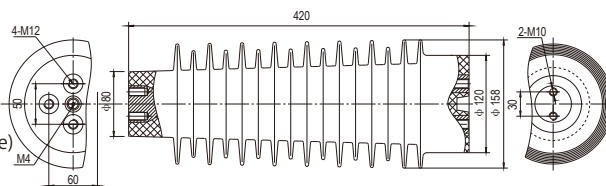


● GPNN40.5/420(S) Insulator/ Capacity insulator(Sensor)

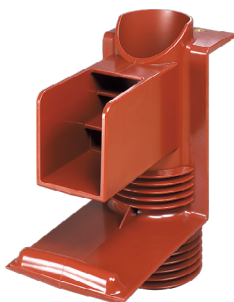


110019<Insulator>
110020<Sensor>

Technical specification:
Rated voltage: 40.5kV
Power frequency withstand voltage:
137kV/1min
Partial discharge: 52.6kV ≤ 3pC(reference value)
Lighting impulse withstand voltage: 267kV
Suit for altitude: 4000m
Glass transition temperature : ≥ 95℃

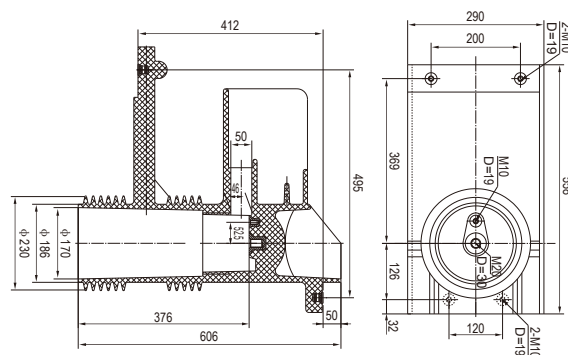


● GPHN40.5-304P/606 Screen shield contact box

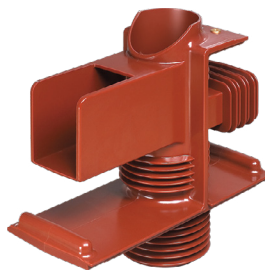


110287<M10>
110290<M12>
110021<M20>

Technical specification:
Rated voltage: 40.5kV
Power frequency withstand voltage: 95kV/1min
Partial discharge: 52.6kV ≤ 3pC(reference value)
Lighting impulse withstand voltage: 185kV
Glass transition temperature : ≥ 95℃

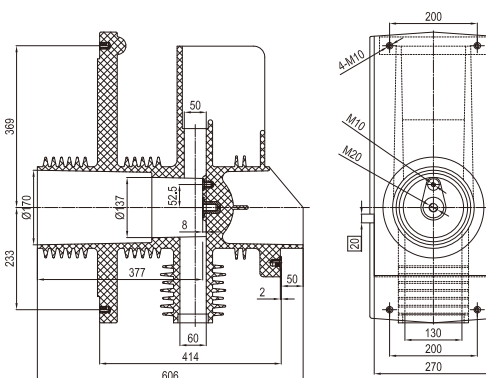


● GPHN3-40.5/606 Three-way screen shield contact box



110288<M10>
110291<M12>
110022<M20>

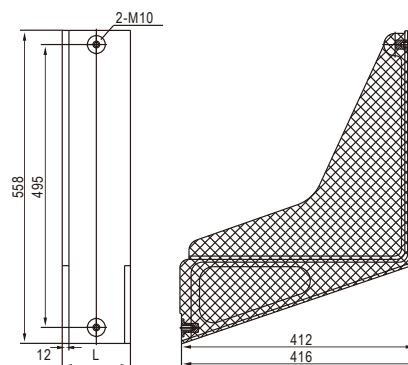
Technical specification:
Rated voltage: 40.5kV
Power frequency withstand voltage: 95kV/1min
Partial discharge: 52.6kV ≤ 3pC(reference value)
Lighting impulse withstand voltage: 185kV
Glass transition temperature : ≥ 95℃

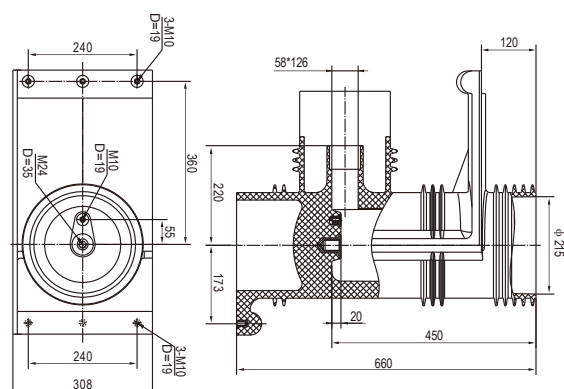
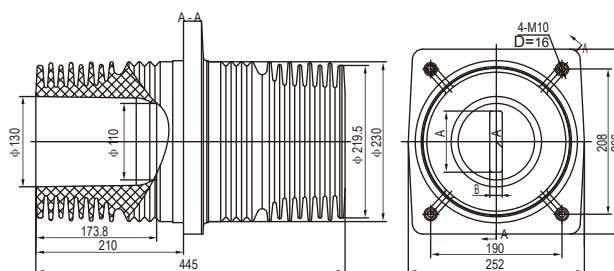
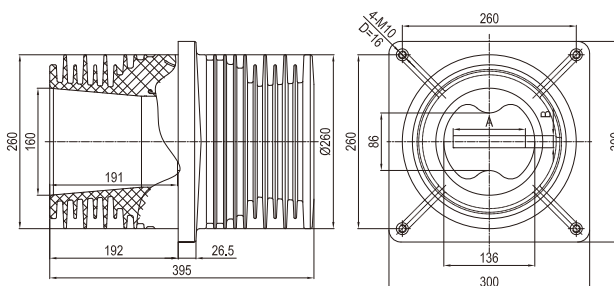
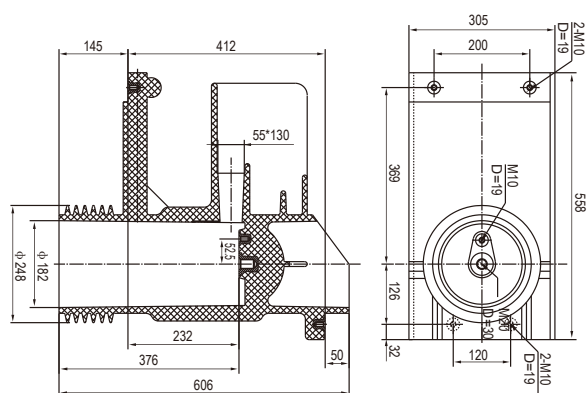


● GPB40.5-003/122 Supporting partition **110023**
GPB40.5-003/192 Supporting partition **110024**



Technical specification:
Rated voltage: 40.5kV
Specification: L=192 for GPN1 cubicle
L=122

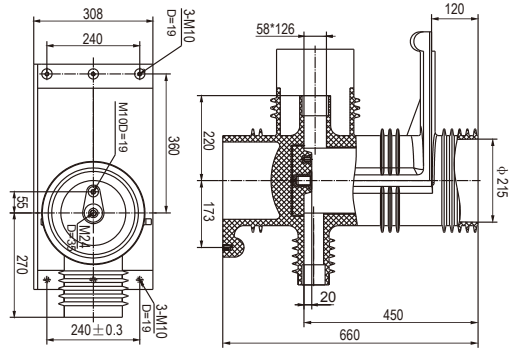




● GPN40.5-305P/660 Three-ways screen shield contact box **110043**



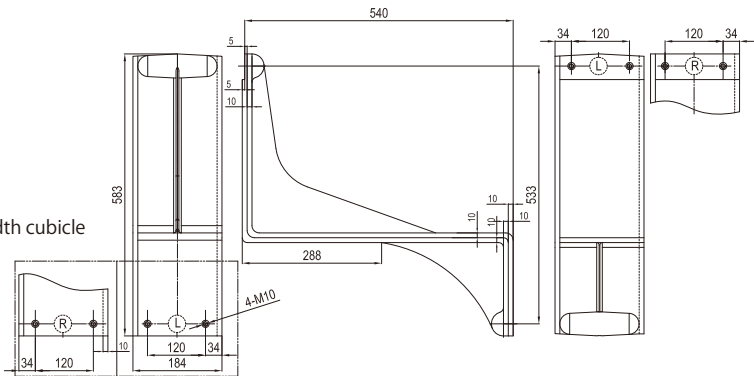
Technical specification:
Rated voltage: 40.5kV
Power frequency withstand voltage: 95kV/1min
Partial discharge: 52.6kV ≤ 3pC(reference value)
Lighting impulse withstand voltage: 185kV
Glass transition temperature : ≥ 95℃



● GPB40.5-001 Supporting partition(R) **110044**
GPB40.5-002 Supporting partition(L) **110045**



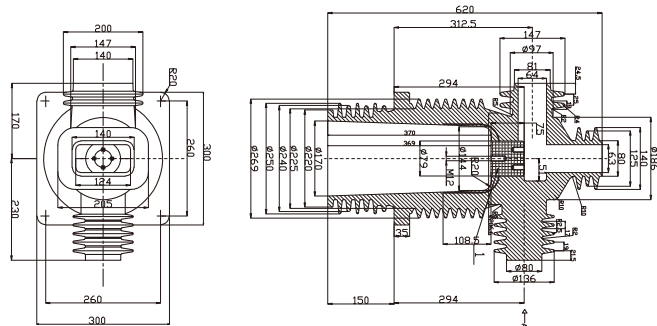
Technical specification:
Rated voltage: 40.5kV
Specification: L=184 for 1.4m width cubicle



● GPHZ307-40.5kV Contact box **110047**



Technical specification:
Rated voltage: 40.5kV
Short circuit power frequency withstand voltage: 95kV/1min
Lighting impulse withstand voltage: 185kV
Creepage distance ≥ 850mm

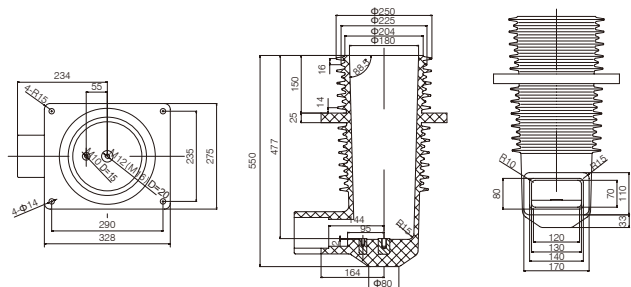


● GPHJ1-40.5kV Contact box

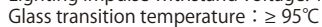
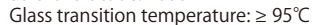


110048<M12>

Technical specification:
Rated voltage: 40.5kV
Short circuit power frequency withstand voltage: 95kV/1min
Lighting impulse withstand voltage: 185kV



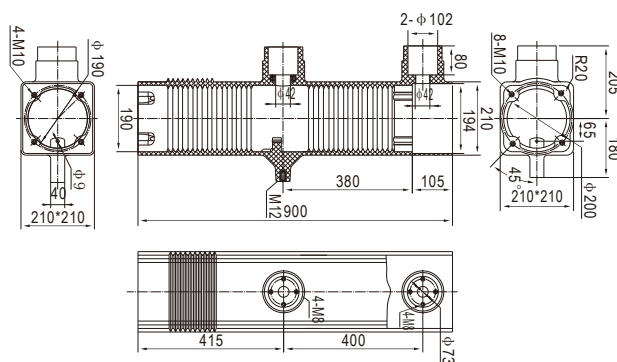
110306



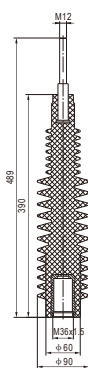
● GPN40.5/900-2(Height) Insulating Sleeve
Suit for SIEMENS (3AV7) **110054**



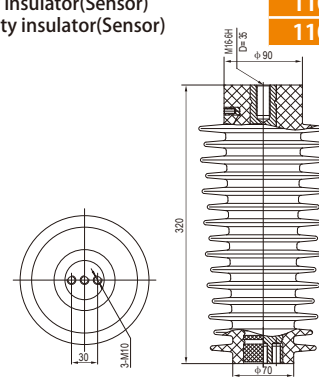
Technical specification:
Rated voltage: 40.5kV
Power frequency withstand voltage: 95kV/1min
Partial discharge: 40.5kV ≤ 5pC(reference value)
Lighting impulse withstand voltage: 185kV
Glass transition temperature : ≥ 95℃



● GPNY40.5/489 Insulating tension rod (SMC molded) **110055**



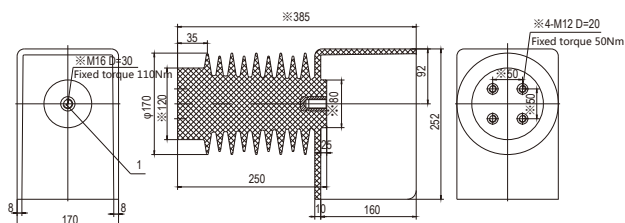
● GPNY40.5-320 Insulator
GPNY40.5-320S Capacity insulator(Sensor)
GPNY40.5-320S-2 Capacity insulator(Sensor) **110056**
110057
110299



● GPN40.5-5 Φ 170x400 Conjoined insulator **110058**



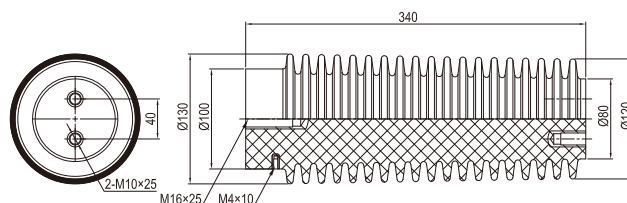
Technical specification:
Rated voltage: 40.5kV
Power frequency withstand voltage: 95kV/1min
Partial discharge: 44.6kV < 5pC(reference value)
Lighting impulse withstand voltage: 185kV



● GPNY40.5-340S Capacity insulator(Sensor) **110319**



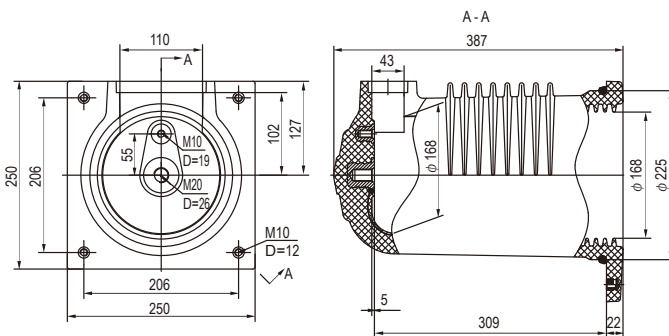
Technical specification:
Rated voltage: 40.5kV
Power frequency withstand voltage:
>122kV/1min
Partial discharge: 44.6kV ≤ 3pC
Creepage distance: ≥ 810mm
Bending force: ≥ 10kN



● GPHN24-507P Screen shield contact box **110059**



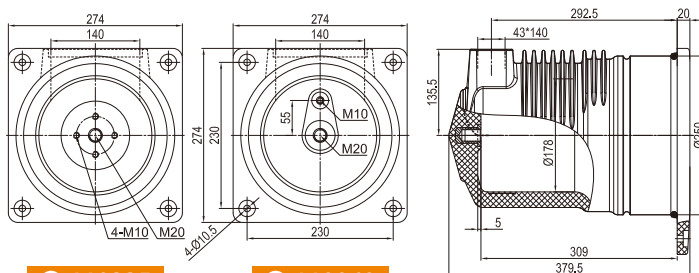
Technical specification:
 Rated voltage: 24kV
 Rated current: 2000A~2500A
 Power frequency withstand voltage:
 65kV/1min
 Partial discharge: 26.4kV ≤ 5pC(reference
 value)
 Lighting impulse withstand voltage: 125kV
 Glass transition temperature : ≥ 105℃
 Creepage distance: > 480mm



● GPHN24-506P Screen shield contact box



Technical specification:
 Rated voltage: 24kV
 Rated current: 2500A~3150A
 Power frequency withstand voltage:
 65kV/1min
 Partial discharge: 26.4kV ≤ 5pC(reference
 value)
 Lighting impulse withstand voltage: 125kV
 Glass transition temperature : ≥ 105℃
 Creepage distance: > 480mm



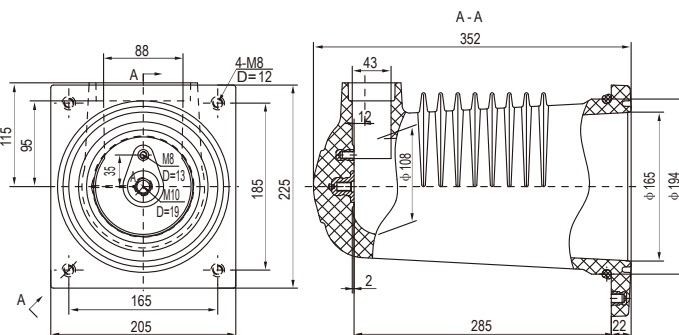
① 110335

② 110060

● GPN24-508P Screen shield contact box **110061**



Technical specification:
 Rated voltage: 24kV
 Rated current: 630A~1600A
 Power frequency withstand voltage:
 65kV/1min
 Partial discharge: 26.4kV ≤ 5pC(reference
 value)
 Lighting impulse withstand voltage: 125kV
 Glass transition temperature : ≥ 105℃
 Creepage distance: > 480mm

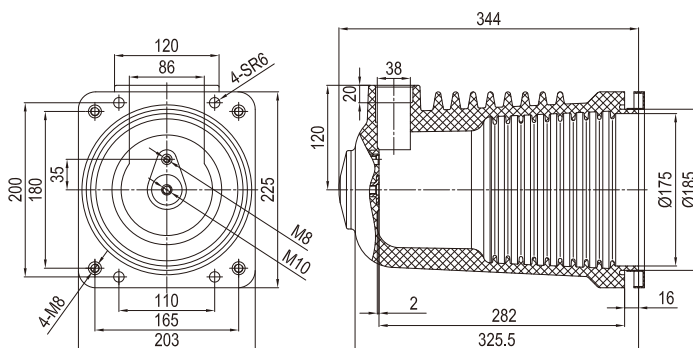


● GPHN24-503P Screen shield contact box

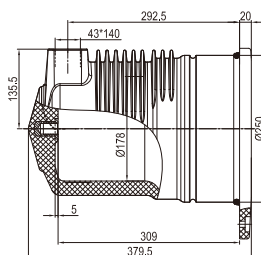


110062<M10>
110292<M12>

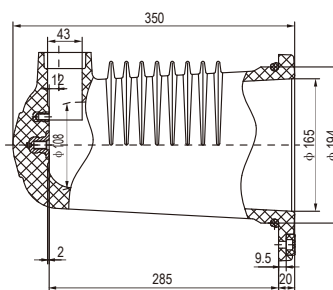
Technical specification:
 Rated voltage: 24kV
 Rated current: 630A~1600A
 Power frequency withstand voltage:
 65kV/1min
 Partial discharge: 26.4kV ≤ 5pC(reference
 value)
 Lighting impulse withstand voltage: 125kV
 Glass transition temperature : ≥ 105℃
 Creepage distance: > 480mm



② 110372



Technical drawing of a mechanical part, likely a pump housing, showing a cross-section with dimensions. The drawing includes a central bore with a diameter of 13 mm, a smaller central hole of 3.5 mm, and a larger outer hole of 88 mm. The part has a total width of 205 mm and a total height of 225 mm. A section line A-A is indicated on the left side.



A red, square-based, cylindrical fire alarm bell with a square mounting plate and a black mounting bracket. The bell has a square top with a rectangular opening. The body is cylindrical with horizontal ridges. The mounting plate is square with four mounting holes. The mounting bracket is black and circular with a central threaded hole.

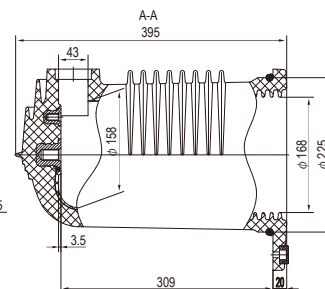
Technical drawing of a flange (Fig. 1.10) showing front and side views with dimensions and tolerances.

Front View Dimensions:

- Overall width: 250
- Overall height: 250
- Inner diameter: 110
- Flange thickness: 10
- Inner hole diameter: $M10$ ($D=19$)
- Outer hole diameter: $M20$ ($D=26$)
- Distance between hole centers: 50
- Distance from outer edge to hole center: 110
- Distance from outer edge to flange face: 125
- Distance from outer edge to mounting hole center: 125
- Mounting hole diameter: $4 \times \phi 10$

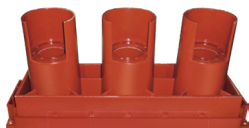
Side View:

- Shows the profile of the flange with a fillet radius R at the bottom.

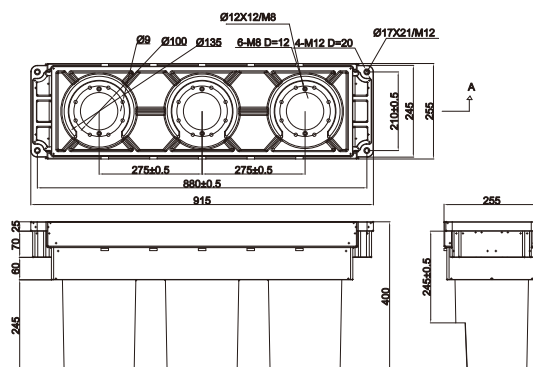
[illegible]

● GPHZ07-24kV Conjoint contact box

110070<Main body>
110277<Cover>



Technical specification:
Rated voltage: 24kV
Rated current: 630A~3150A

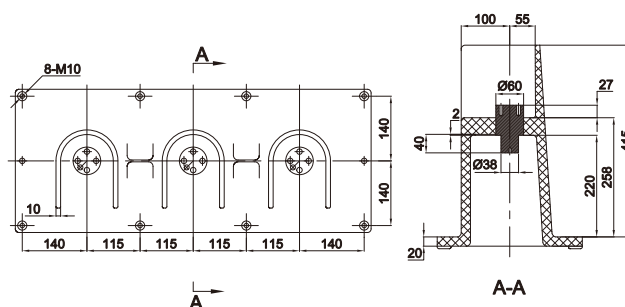


● GPHZ09-24kV Conjoint contact box

110071



Technical specification:
Rated voltage: 24kV
Rated current ≤ 2000A

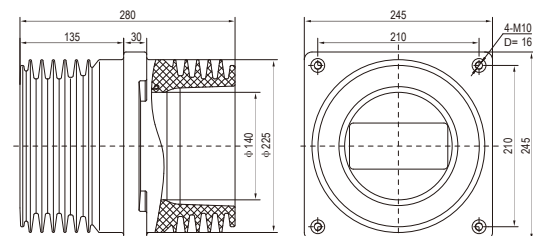


● GPN24-602P Screen shield wall bushing



Technical specification:
Rated voltage: 24kV
Rated current: 2500A
Power frequency withstand voltage: 65kV/1min
Partial discharge: 26.4kV ≤ 5pC(reference value)
Lighting impulse withstand voltage: 125kV
Glass transition temperature : ≥ 105℃
Creepage distance: > 480mm

Size	88x18x2	90x20	108x18x2
Code	110072	110073	110074
Size	88x18x3	108x18	70x20x2
Code	110076	110077	110078
Size	128x18x2	68x14	110x20x2
Code	110325	110075	110326

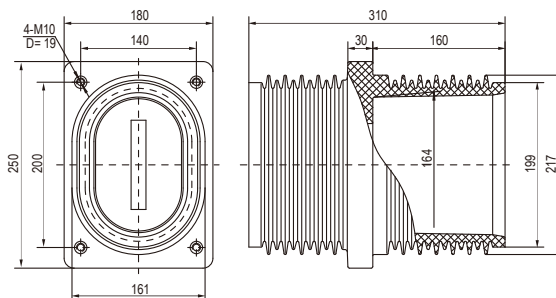


● GPN24/140x200 Wall bushing



Technical specification:
Rated voltage: 24kV
Rated current: 630A~1250A

Busbar opening size				
Size	88x18x2	90x20	108x18x2	68x14
Code	110079	110080	110081	110082
Size	88x18x3	108x18	70x20x2	
Code	110083	110084	110085	

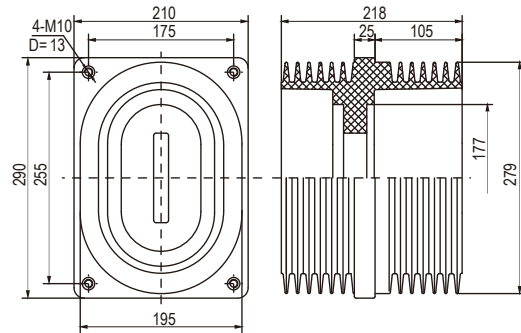


● GPN24/175x255 Wall bushing



Technical specification:
Rated voltage: 24kV
Rated current: 2500A~3150A

Busbar opening size			
Size	80x10	80x10x2	100x10
Code	110086	110087	110088
Size	100x10x2	120x10x2	120x10x3
Code	110089	110090	110091

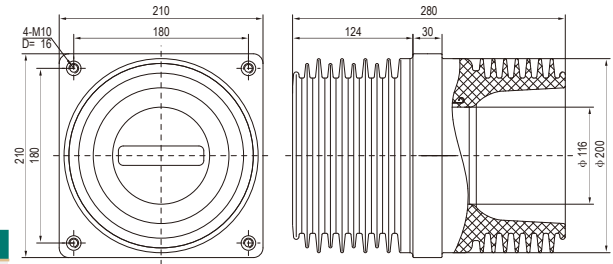


● GPN24-603P Screen shield wall bushing

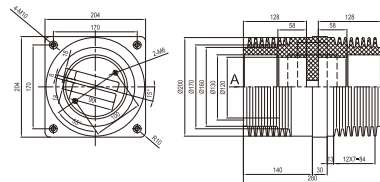


Technical specification:
Rated voltage: 24kV
Rated current: 1250A
Power frequency withstand voltage:
65kV/1min
Partial discharge: 26.4kV ≤ 5pC(reference value)
Lighting impulse withstand voltage: 125kV
Glass transition temperature : ≥ 105°C
Creepage distance: > 480mm

Busbar opening size			
Size	88x18x2	90x20	70x20x2 68x14
Code	110092	110093	110094 110095

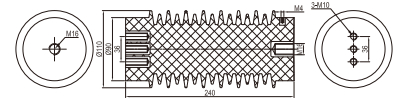


● GPN24-170P/280-3 Wall bushing **110323**



Technical requirement
Power frequency withstand voltage:
68kV/1min
Partial discharge: 26.4kV ≤ 3pC

● GPNY24-240S(90pF) Capacity insulator(Sensor) **110336**
GPNY24-240S(15pF) Capacity insulator(Sensor) **110415**



Technical specification:
Rated voltage: 24kV
Power frequency withstand voltage:
65kV/1min
Lighting impulse withstand voltage: 125kV
Partial discharge: 16.4kV ≤ 3pC
Creepage distance: ≥ 480mm
Bending force: ≥ 10kN

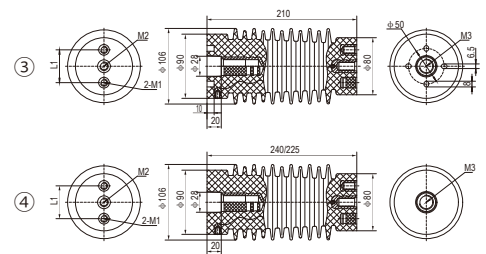
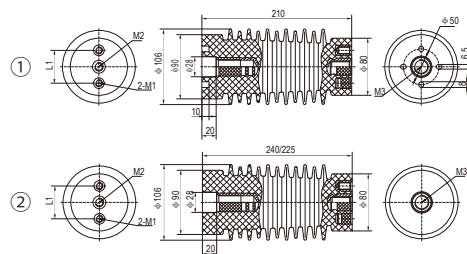
● GPNN24/210(S)-240(S)-225(S) Insulator/ Capacity insulator(Sensor)



Technical specification:
Rated voltage: 24kV

Code	Specification
L1	36/46
M1	M8
M2	M12
M3	M16

	L1=36 Insulator	L1=36 Sensor	L1=46 Insulator	L1=46 Sensor
H210	110096	110097	110102	110103
H240	110098	110099	110104	110105
H225	110100	110101	110106	110107

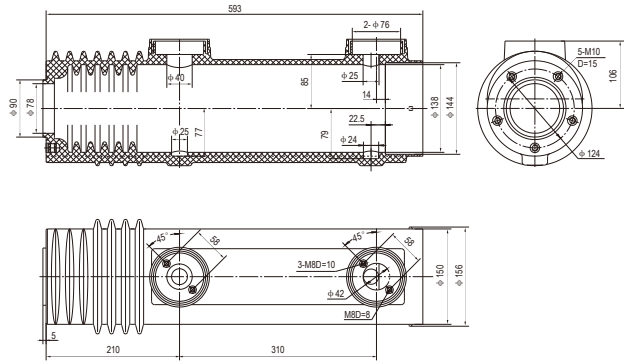


● GPN24/593 Insulating sleeve

110108



Technical specification:
Rated voltage: 24kV
Rated current: 1250A

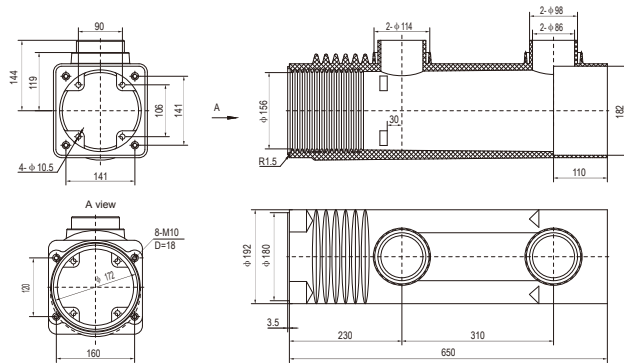


● GPN24/650 Insulating sleeve

110109

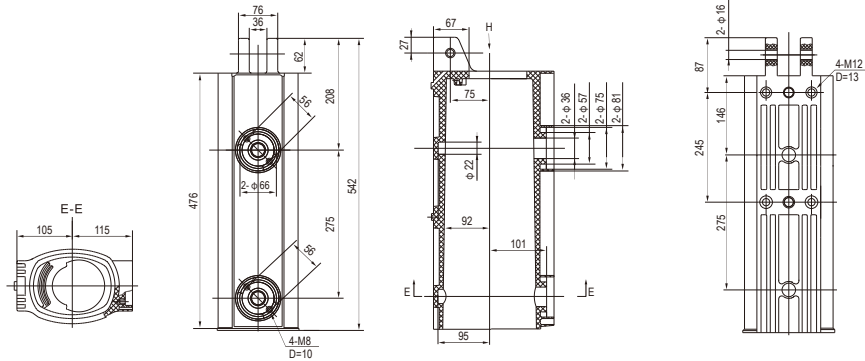


Technical specification:
Rated voltage: 24kV
Rated current: 3150A



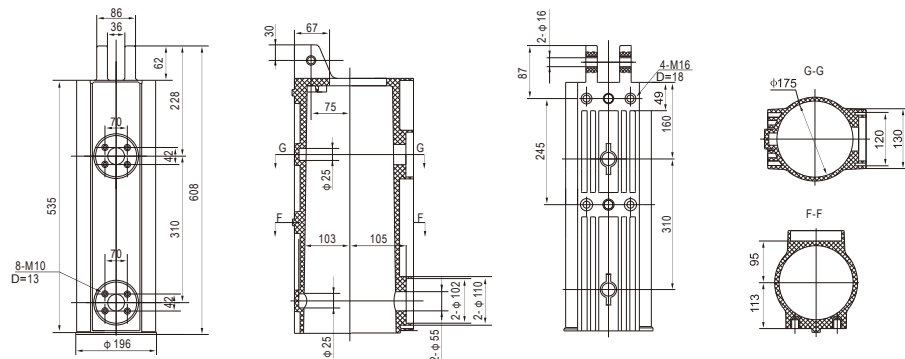
● GP-VBI-12/545 Insulating sleeve, rated current: 1250A

110110

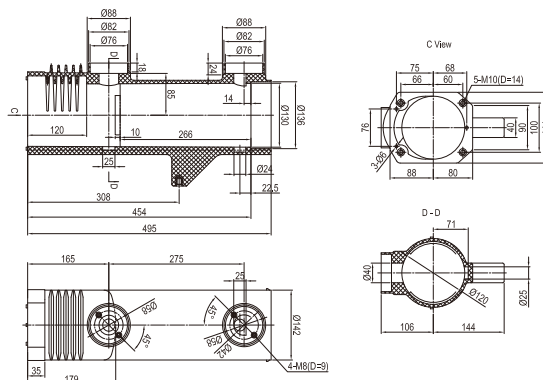


● GP-VBI-12/608 Insulating sleeve, rated current: 3150A

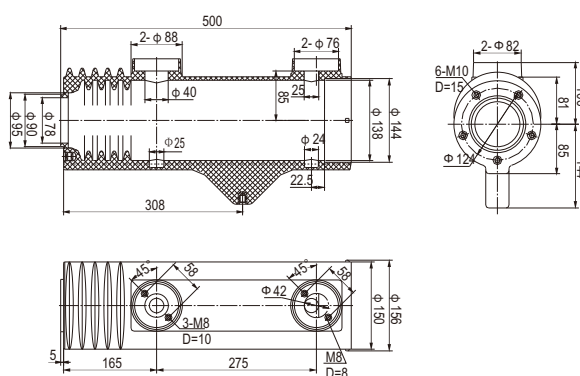
110111



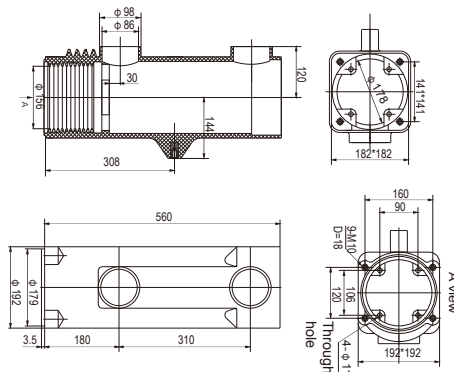
110112



110113



110114

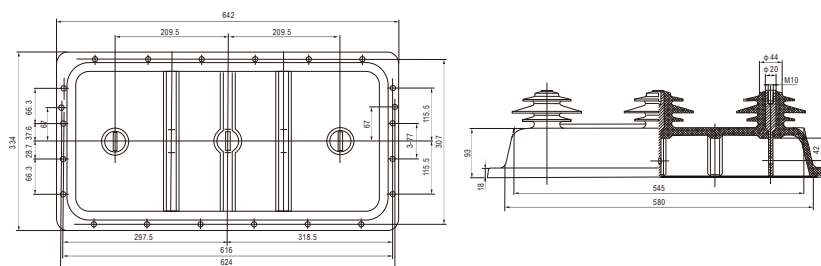
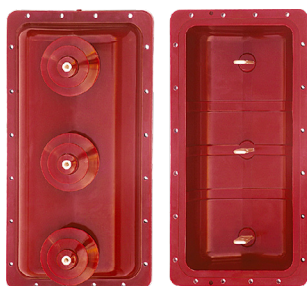


110355

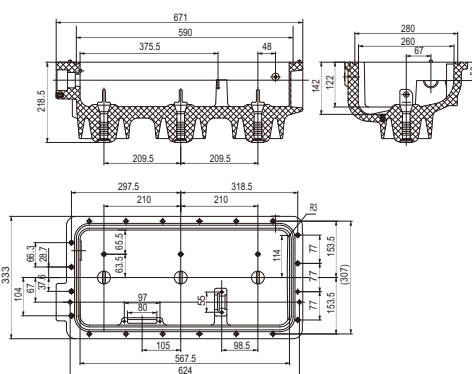
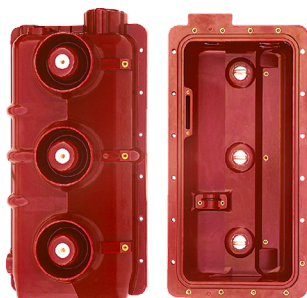


Technical drawing of a 125kV arrester. The drawing includes a side view and a top view. The side view shows a central core with a diameter of Ø32, a total length of 383, and a central section with a diameter of Ø85 and a length of 198. The top view shows a square base with a side length of 152 and a central circular area with a diameter of 129. The drawing is labeled '125kV' and 'pC'.

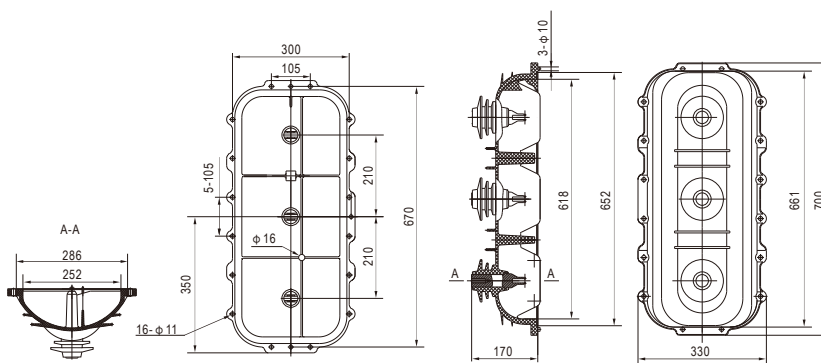
110118



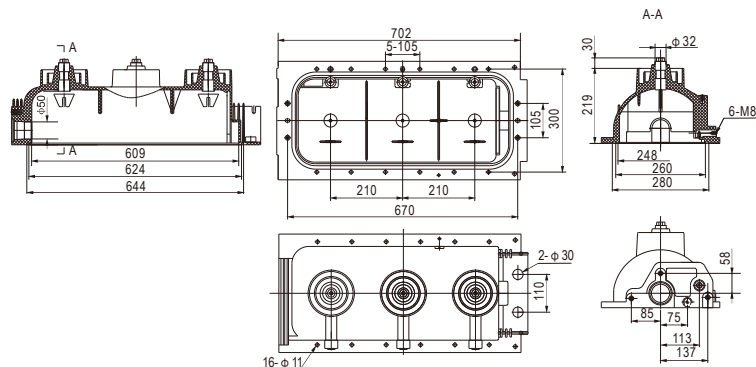
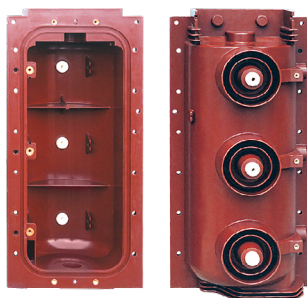
110119



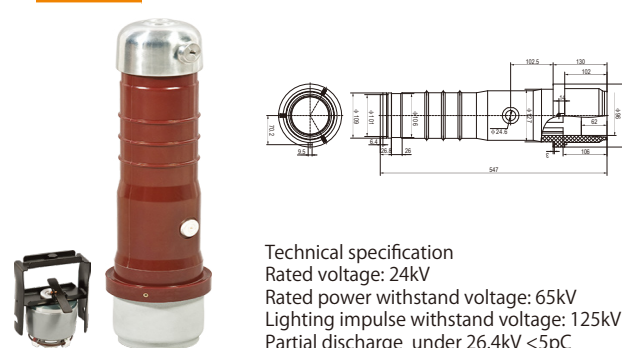
110120



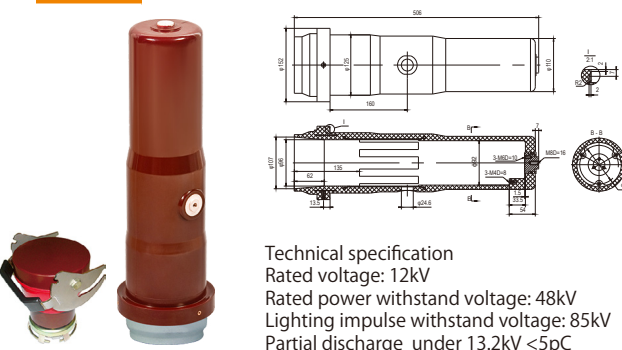
110121



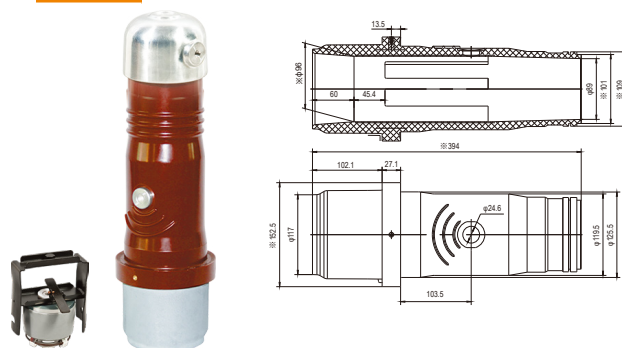
110249



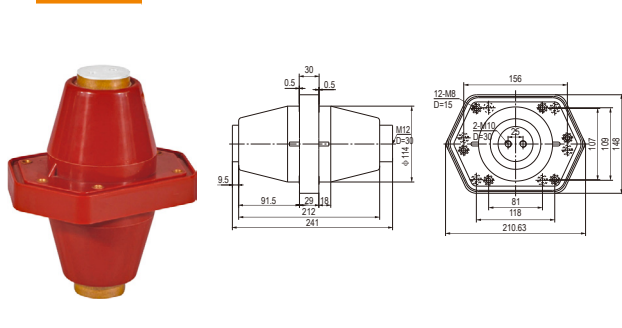
110251



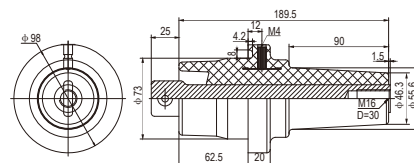
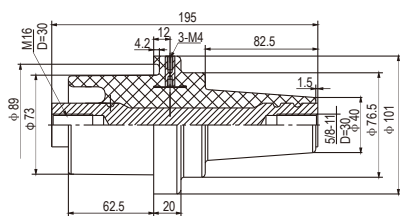
110253



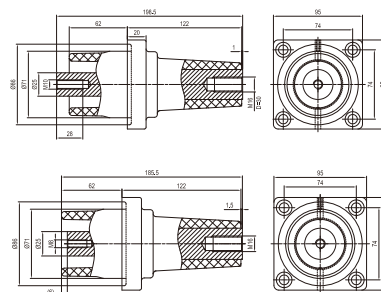
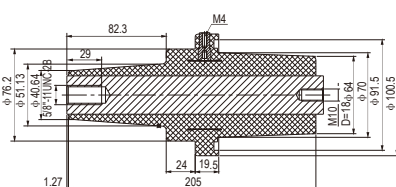
110132



110134

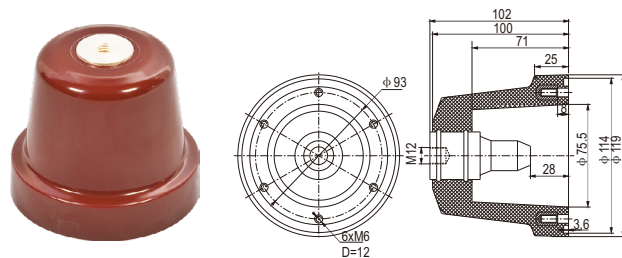
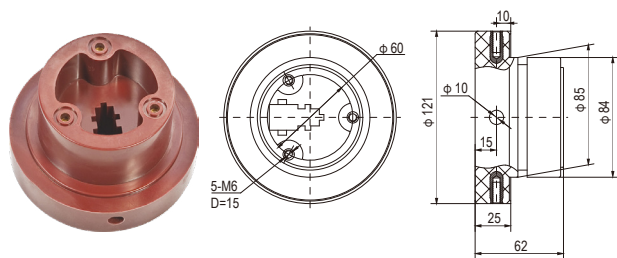


110137

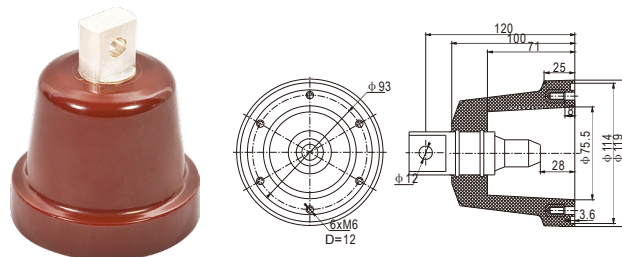
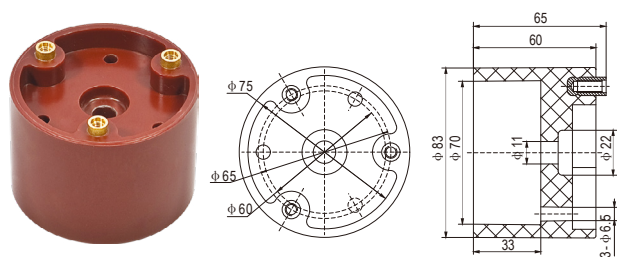


Outlet

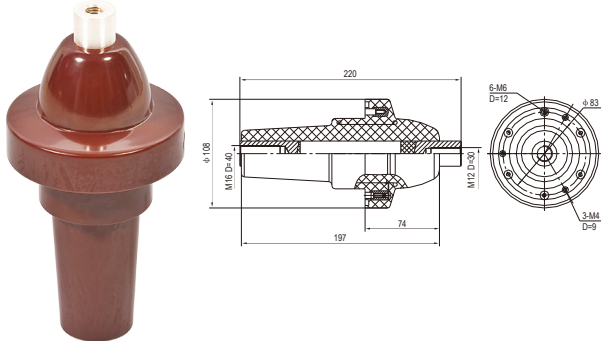
110139



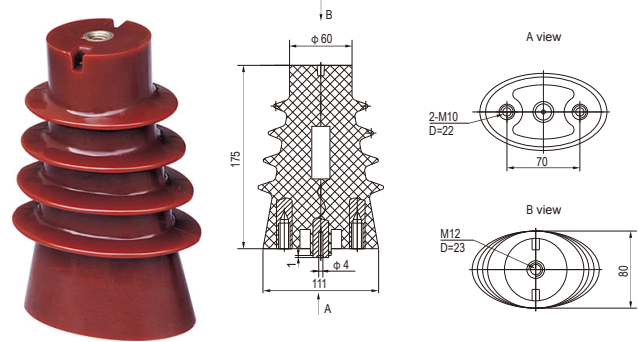
110141



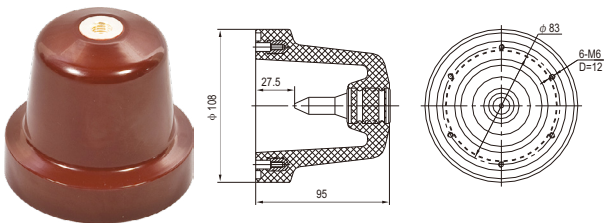
● GP-SF6-12/220 Incoming insulator
110142



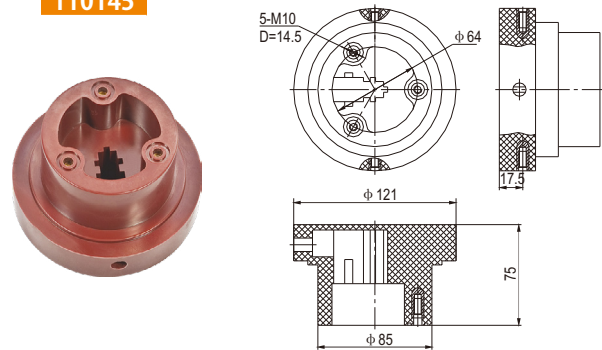
● GPN-6/111x175 Insulator
GPN-6/111x175 Indicating device Sensor **110259**
110143



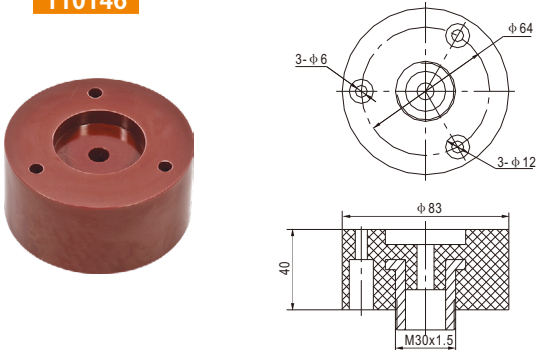
● GP-SF6-12/95 Busbar insulator
110144



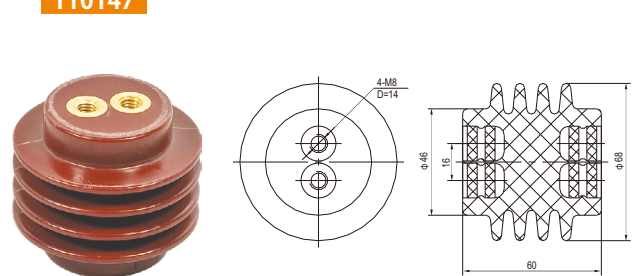
● GP-SF6-12/75 Insulating plug
110145



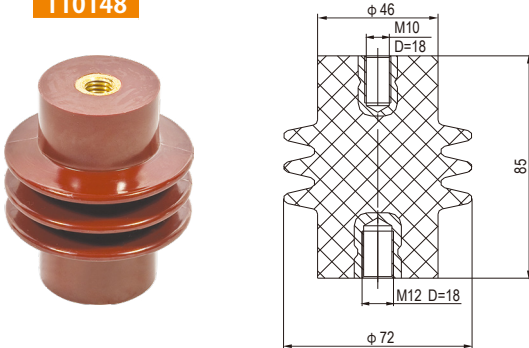
● GP-SF6-12/40 Bushing
110146



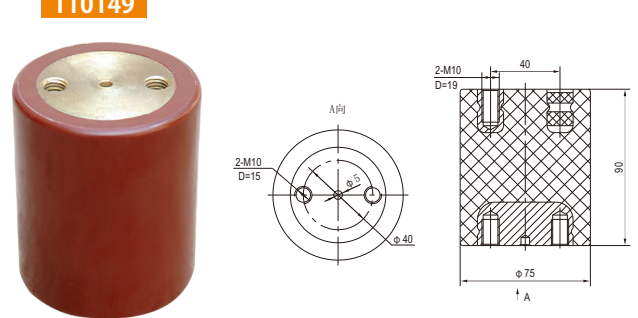
● GP-SF6-12/60 Supporting insulator
110147



● GP-SF6-12/85 Busbar Insulator
110148

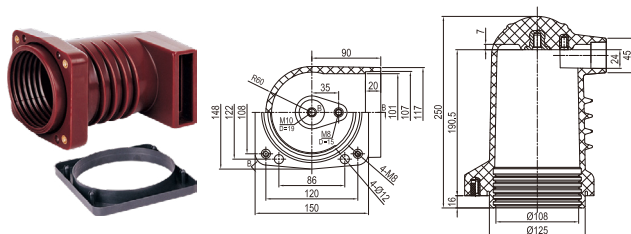


● GP-SF6-12/90 Insulator
110149



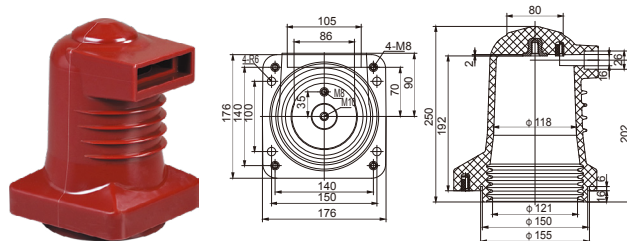
- GPHN3-10Q/150 Contact box
Rated current: $\leq 1250A$

110150



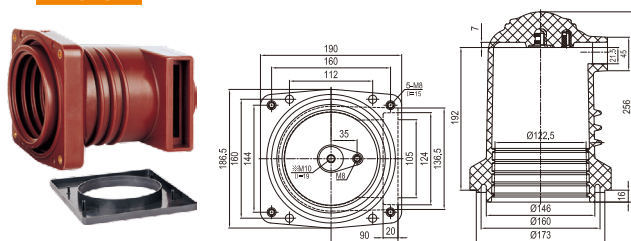
- GPHN3-10Q/176 Contact box
Rated current: $\leq 1250A$

110151



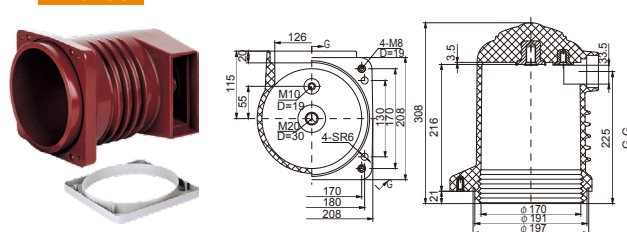
- GPHN3-10Q/190 Contact box
Rated current: $\leq 1250A$

110152



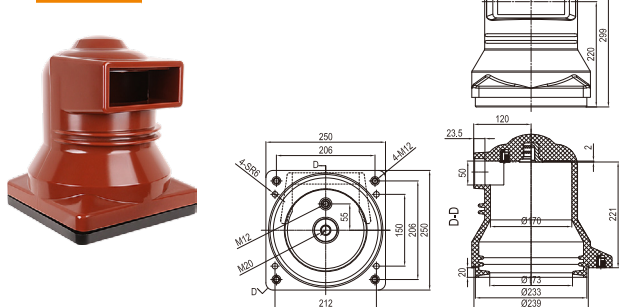
- GPHN3-10Q/208 Contact box
Rated current: $\leq 2500A$

110153



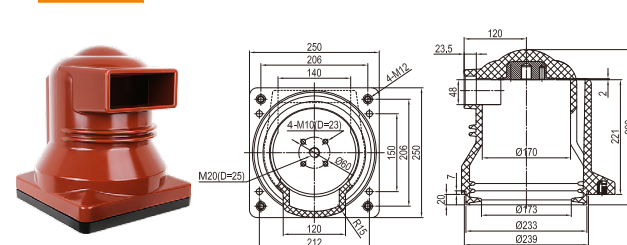
- GPHN3-10Q/250S Contact box
Rated current: $\leq 3150A$

110154



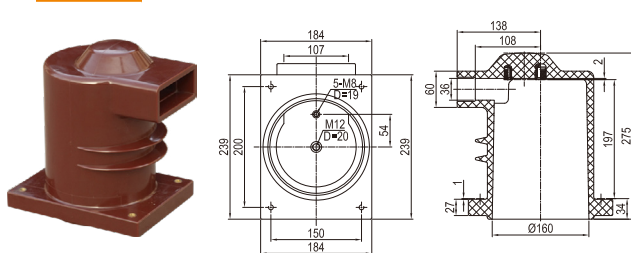
- GPHN3-10Q/250 Contact box
Rated current: $\leq 4000A$

110155



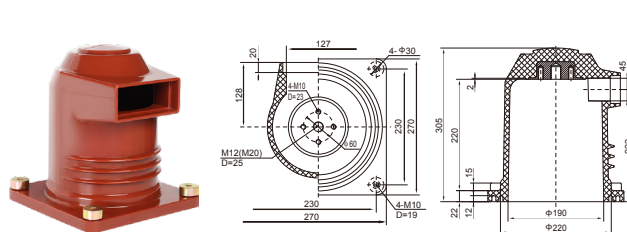
- GPHN3-10Q/240 Contact box
Rated current: $\leq 2000A$

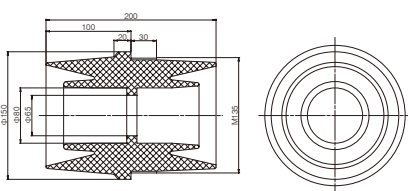
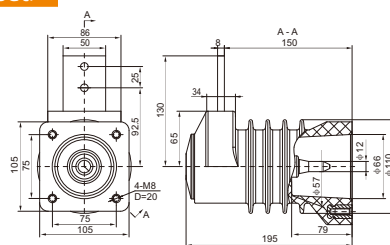
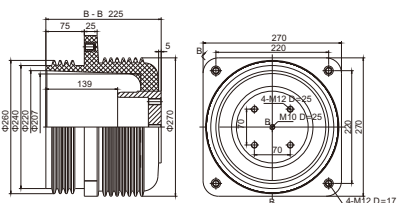
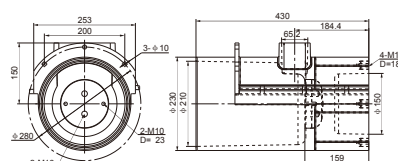
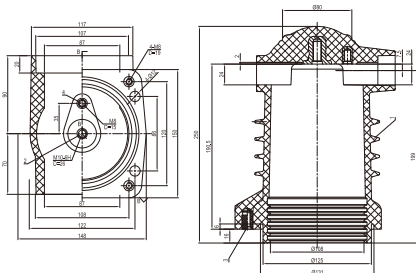
110156



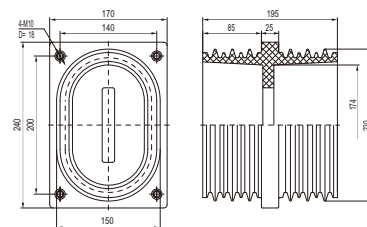
- GPHN3-10Q/230 Contact box
Rated current: $\leq 3150A$

Code	Description
110157	Common type
110286	Flame Retardant

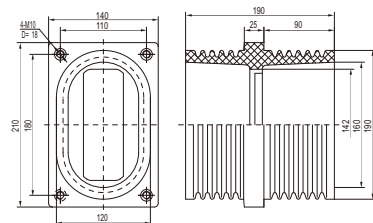
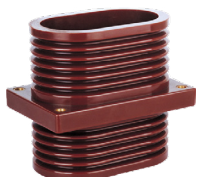




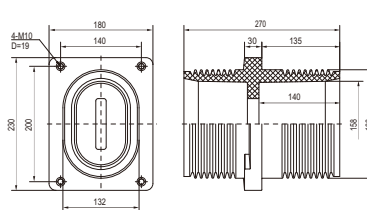
Ax8 (Busbar opening size)			
54x14	68x18	90x20	88x18x2
108x18	108x18x2	123x13	110x40
115x45	115x25	105x15	123x13x3
126x16x2	133x18	133x38	135x45



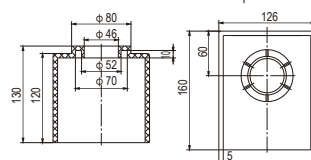
AxB (Busbar opening size)			
54x14	68x18	90x20	88x18x2
108x18	108x18x2	123x13	110x40
115x45	115x25	105x15	123x13x3
126x16x2	133x18	133x38	135x45



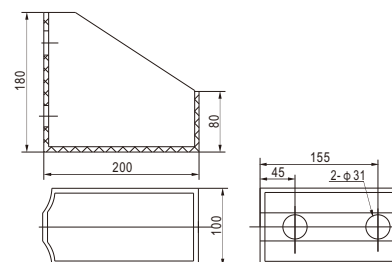
Ax8 (Busbar opening size)			
54x14	68x18	90x20	88x18x2
108x18	108x18x2	123x13	110x40
115x45	115x25	105x15	123x13x3
126x16x2	133x18	133x38	135x45



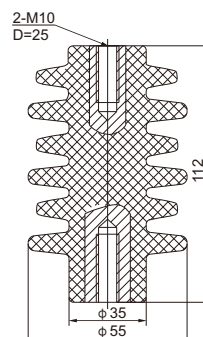
110219



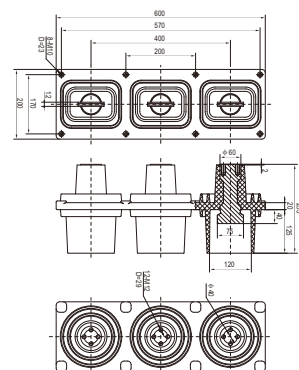
● 8GP.810.012 PT down insulating cover
110223



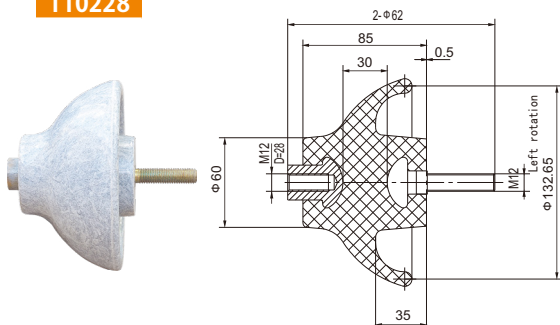
● GPZ-112 Ø 65x112 VE tension rod
BMC Moulded
110225 2-M



● GPDS-1250 VE Fixed socket part
110227

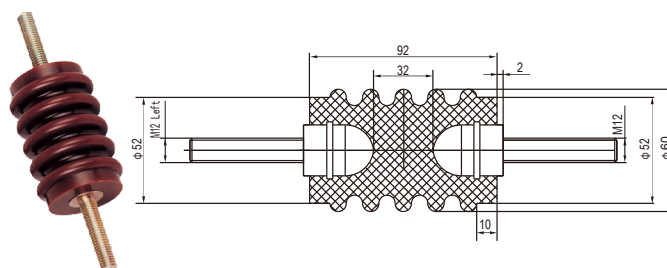


110228



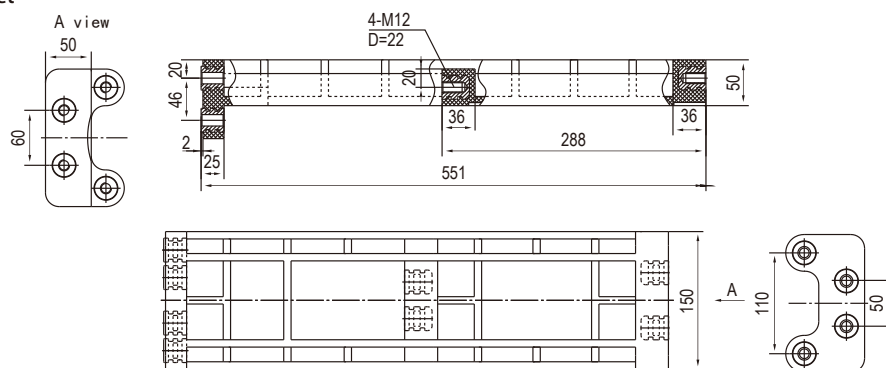
BMC moulded pressure

110229

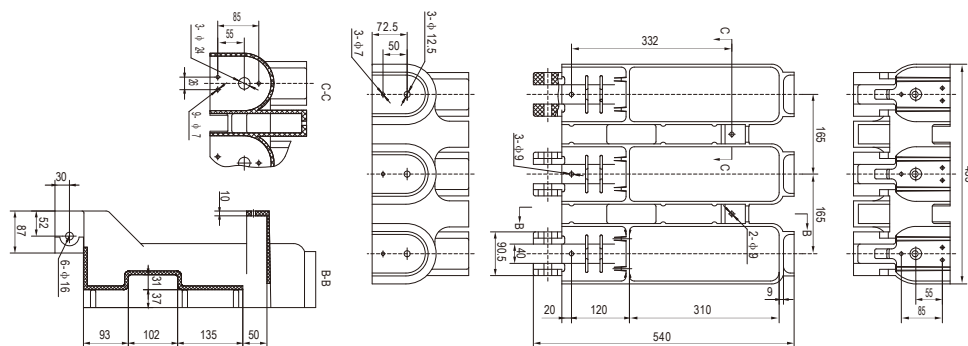


BMC moulded pressure

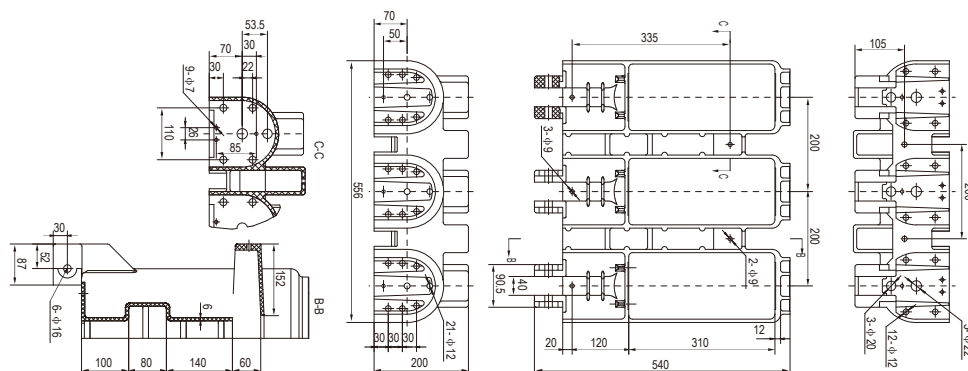
110230



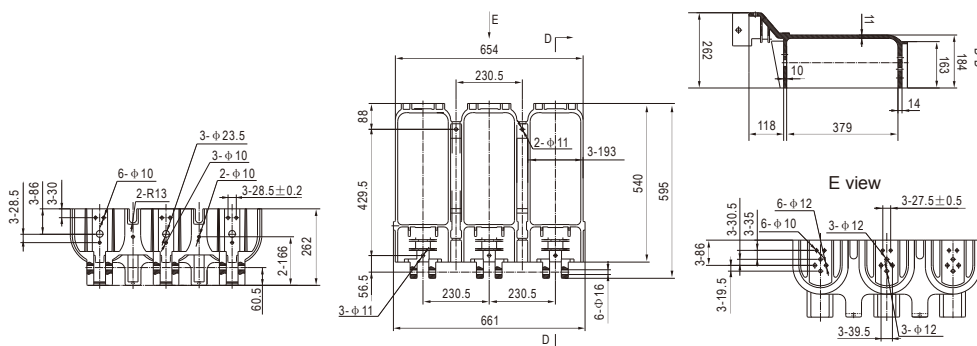
110231



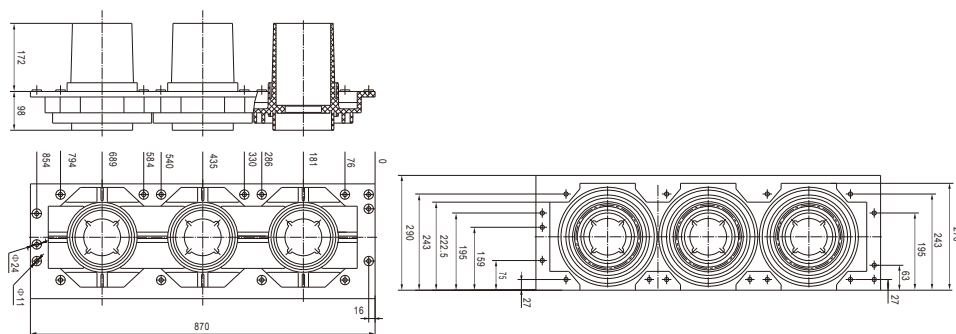
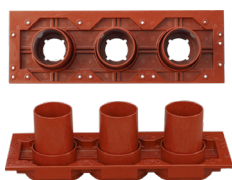
110232



110233



110234



- 24kV/ 25kA Tension rod
- 24kV/31.5kA Tension rod

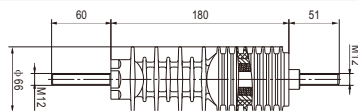
110235

110236



Technical data:
Rated voltage: 24kV
Tension strength >25kN
Rated current: 630A~1250A
Material: PA66 Plastic injection.

Drawing no.	Type
5GP24.026.103.01	24kV/25kA
5GP24.026.103.02	24kV/31.5kA



- 12kV/31.5kA Tension rod
- 12kV/40kA Tension rod

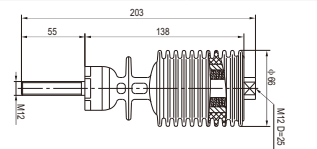
110237

110238



Technical data:
Rated voltage: 12kV
Tension strength >25kN
Rated current: 1250A~3150A
Material: PA66 Plastic injection.

Drawing no.	Type
5GP12.026.104.01	12kV/31.5kA
5GP12.026.104.02	12kV/40kA



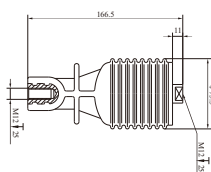
● 24kV/50kA Tension rod

110239



Technical data:
Rated voltage: 24kV
Tension strength >25kN
Rated current: 1250A
Material: PA66 Plastic injection.

Drawing no.	Type
5GP12.026.127	24kV/50kA



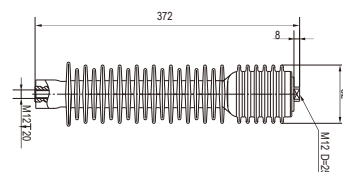
● 40.5kV/31.5kA Tension rod

110240



Technical data:
Rated voltage: 40.5kV
Tension strength >25kN
Rated current: 1250A~3150A
Material: PA66 Plastic injection.

Drawing no.	Type
5GP35.026.128.02	40.5kV/31.5kA

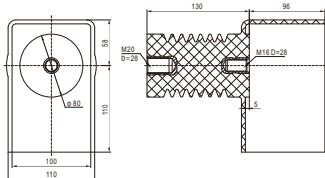


● GPN12-80/226 Insulator

110263



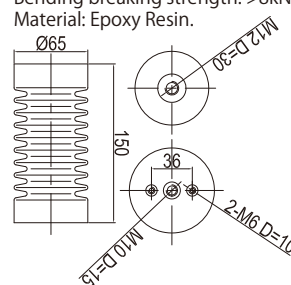
Technical data:
Rated voltage: 12kV
Bending breaking strength: >8kN
Material: Epoxy Resin.



● GPN12-65/150 Insulator



Technical data:
Rated voltage: 12kV
Bending breaking strength: >8kN
Material: Epoxy Resin.

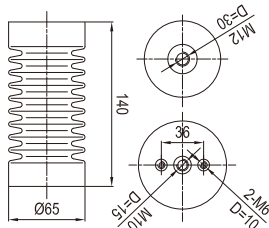


● GPN12-65/140 Insulator

110273



Technical data:
Rated voltage: 12kV
Bending breaking strength: >8kN
Material: BMC

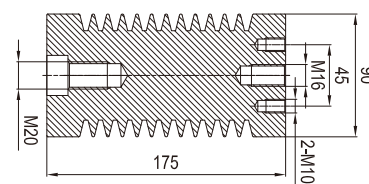


● GPN12-90/175 Insulator

110272

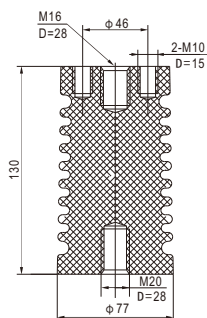


Technical data:
Rated voltage: 17.5kV
Bending breaking strength: >8kN
Material: Epoxy Resin.



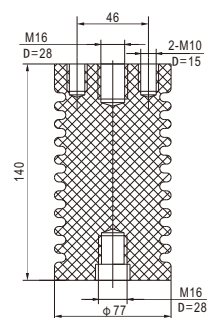
● GPN12-77/130 Insulator

110267



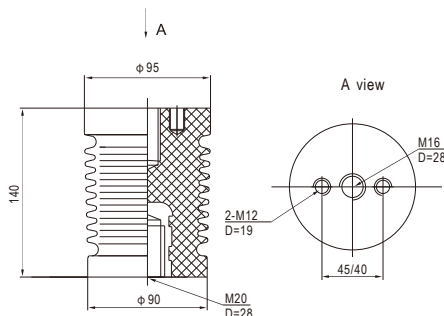
● GPN12-77/140 Insulator

110266



● GPN12-95/140 Insulator

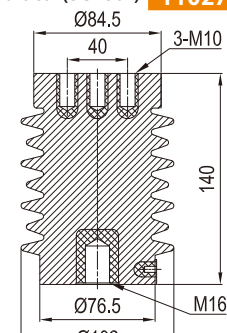
110262

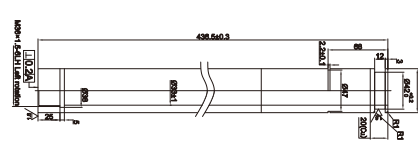
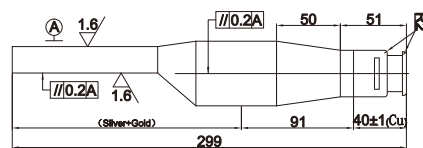
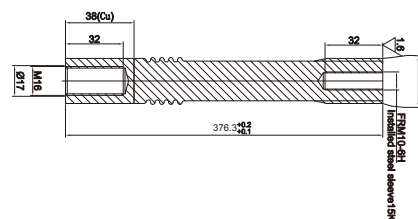
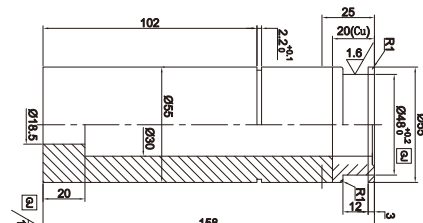
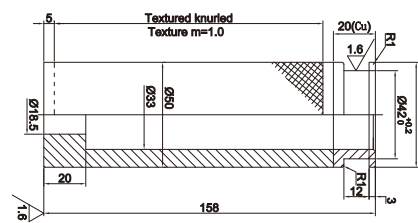
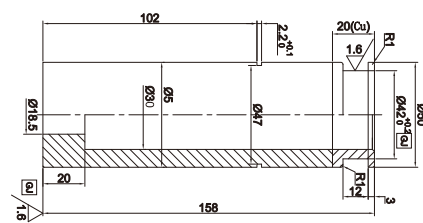
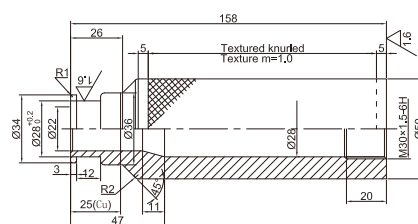
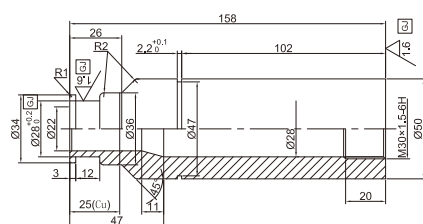


- GPN12-105/140 Insulator
- GPN12-105/140S Capacity insulator(Sensor)

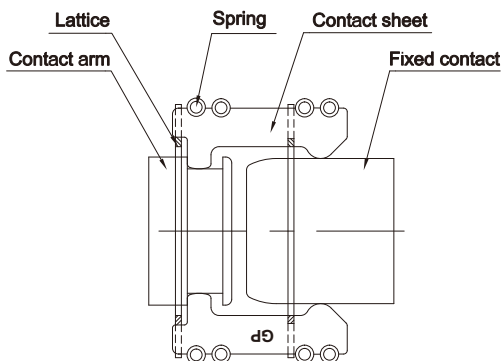
110314

110275





● Tulip contact installation diagram



Structural features

Ring spring pressure evenly
Excellent use of non-magnetic stainless steel, to avoid eddy
Thick silver plating, with strong anti-abrasion
Anti-color treatment, to avoid oxidation of the silver layer off
Fixed contact insertion depth reference dimensions: $34 \pm 2\text{mm}$

Silver plated

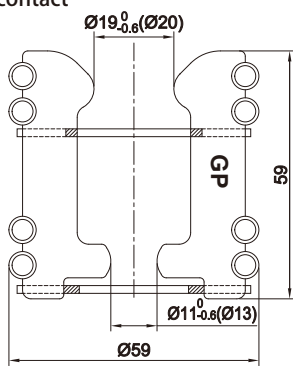
My company introduced the latest technology of contact surface partial plating thick silver, no-contact surface thin silver plating, which can effectively reduce product costs, plating range of 6(contact surface)+1(non-contact surface), 8 (contact surface)+1(non-contact surface), 12 (contact surface)+1 (non-contact surface), and according to customer requirement availability.

● Products code: GPA102
400/630A Bundled tulip contact

120014



Material: Cu
12 sheets

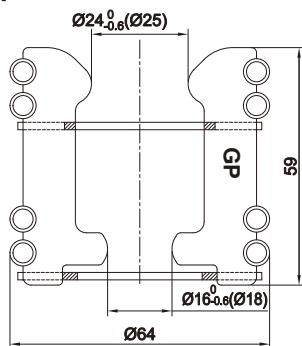


● Products code: GPA119
630A Bundled tulip contact

120015



Material: Cu
12 sheets

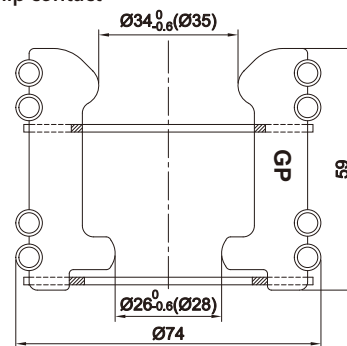


● Products code: GPA103
630A/1000A Bundled tulip contact

120016



Material: Cu
12 sheets

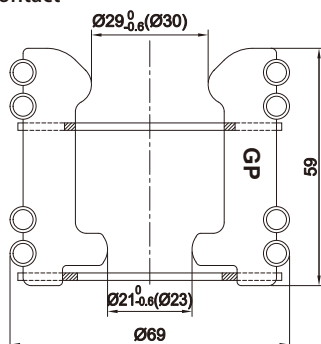


● Products code: GPA120
630/800A Bundled tulip contact

120017



Material: Cu
18 sheets

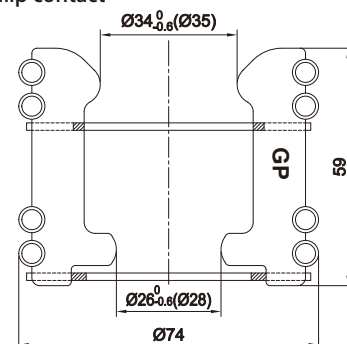


● Products code: GPA104
630A/1000A Bundled tulip contact

120018



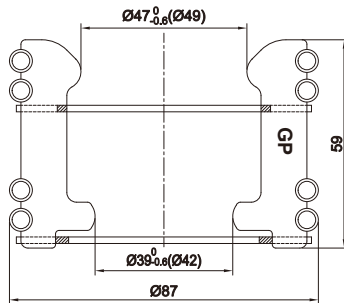
Material: Cu
18 sheets



- Products code: GPA105
630A/1000A Bundled tulip contact
120019



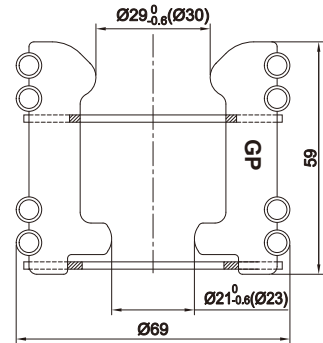
Material: Cu
18 sheets



- Products code: GPA121
1000A Bundled tulip contact
120020



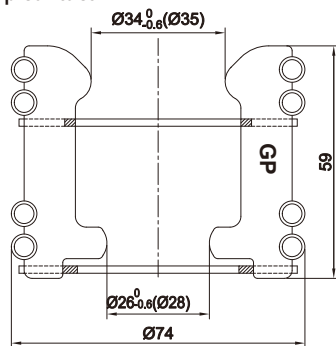
Material: Cu
24 sheets



- Products code: GPA106
630A/1250A Bundled tulip contact
120021



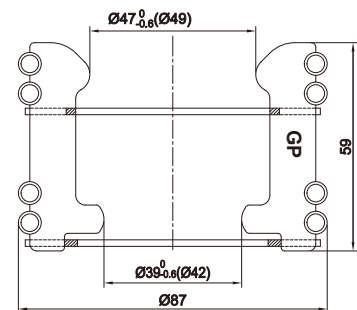
Material: Cu
24 sheets



- Products code: GPA127
630A/1250A Bundled tulip contact
120022



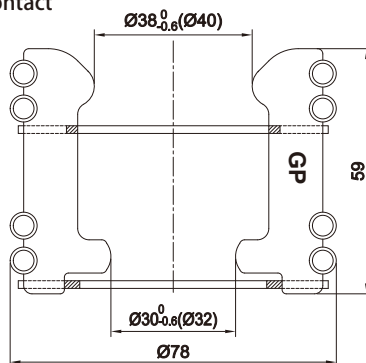
Material: Cu
24 sheets



- Products code: GPA107
1250A Bundled tulip contact
120023



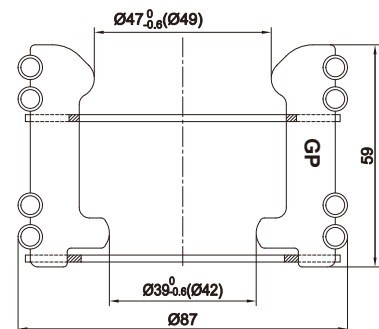
Material: Cu
30 sheets



- Products code: GPA108
1250A Bundled tulip contact
120024



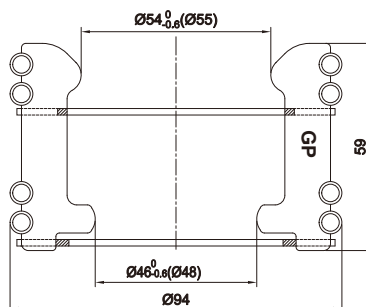
Material: Cu
30 sheets



- Products code: GPA109
1600A Bundled tulip contact
120025



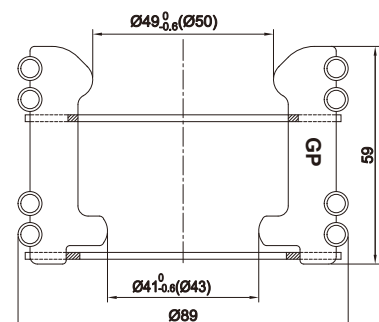
Material: Cu
36 sheets



- Products code: GPA123
1600A Bundled tulip contact
120026



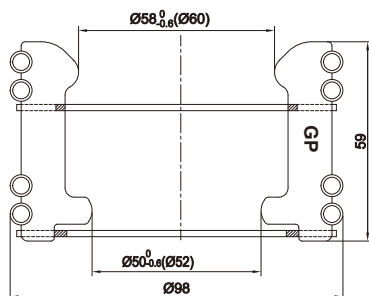
Material: Cu
40 sheets



- Products code: GPA110
1600A Bundled tulip contact
120027



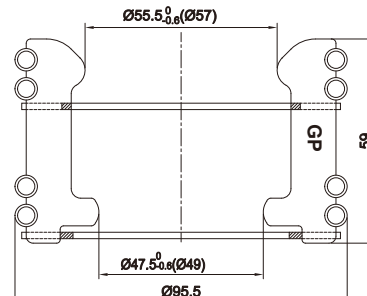
Material: Cu
40 sheets



- Products code: GPA122
2000A Bundled tulip contact
120028



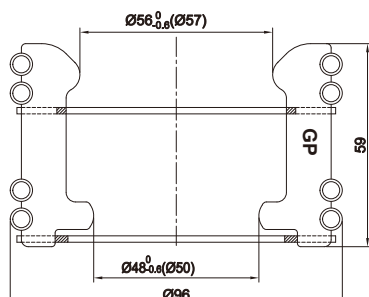
Material: Cu
40 sheets



- Products code: GPA111
2000A Bundled tulip contact
120029



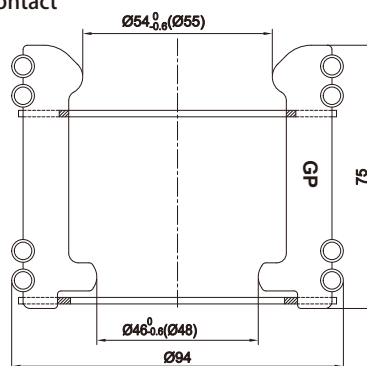
Material: Cu
42 sheets



- Products code: GPA124
2000A Bundled tulip contact
120030



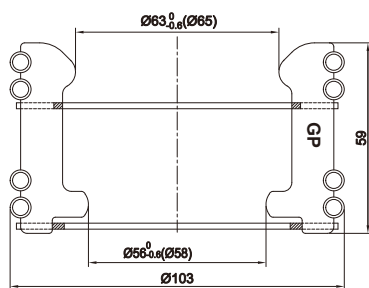
Material: Cu
42 sheets



- Products code: GPA125
2000A Bundled tulip contact
120031



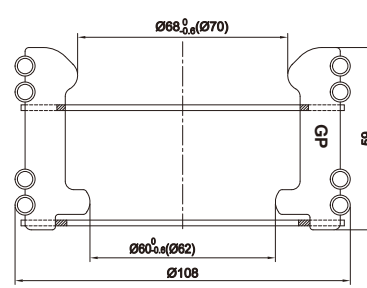
Material: Cu
42 sheets



- Products code: GPA112
2000A Bundled tulip contact
120032



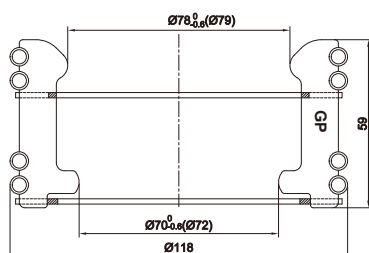
Material: Cu
48 sheets



- Products code: GPA113
2000A Bundled tulip contact
120033



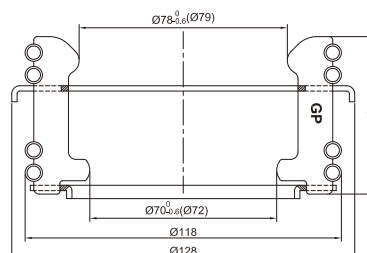
Material: Cu
48 sheets



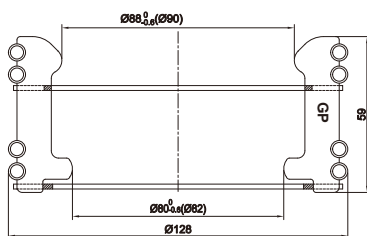
- Products code: GPA128
2000A Bundled tulip contact
120034



Material: Cu
48 sheets

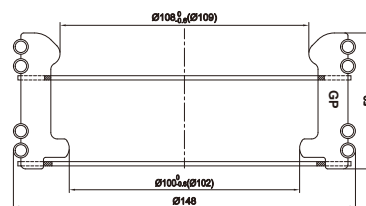


- Products code: GPA114
2500A Bundled tulip contact
120035



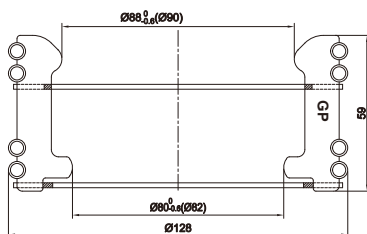
Material: Cu
60 sheets

- Products code: GPA126
2500A/3150A Bundled tulip contact
120036



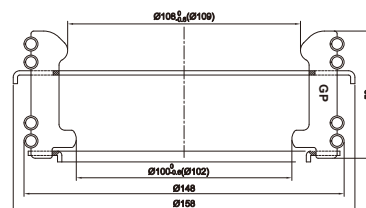
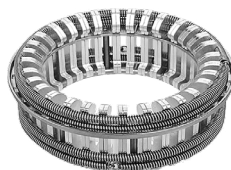
Material: Cu
60 sheets

- Products code: GPA115
2500A/3150A Bundled tulip contact
120037



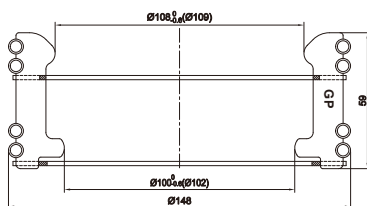
Material: Cu
64 sheets

- Products code: GPA116
3150A Bundled tulip contact
120038



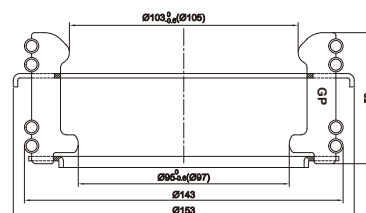
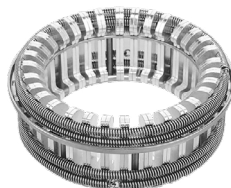
Material: Cu
64 sheets

- Products code: GPA129
3150A Bundled tulip contact
120039



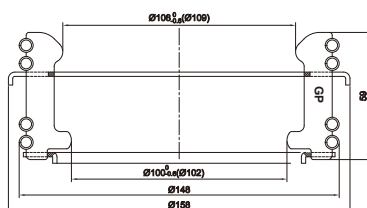
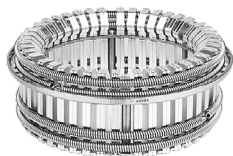
Material: Cu
64 sheets

- Products code: GPA117
3150A Bundled tulip contact
120040



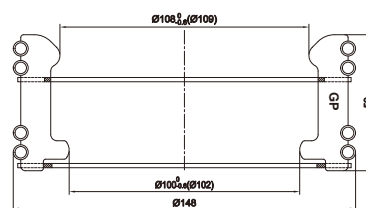
Material: Cu
72 sheets

- Products code: GPA118
4000A Bundled tulip contact
120041



Material: Cu
84 sheets

- Products code: GPA130
4000A Bundled tulip contact
120042



Material: Cu
84 sheets

● **Contact installation diagram**

Structural Features of tulip contact

Spring piece Wing paint treatment to prevent oxidation rust;

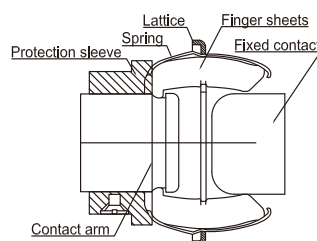
Thick silver plating, with strong anti-abrasion;

Anti-change process, avoid silver oxide off;

Aluminum protective cover for the fixed contact against;

spring plate deformation, shedding;

Fixed contact insertion depth reference dimensions: 22 ± 2 mm.

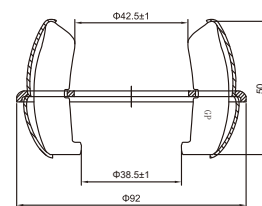


● Products code: GPA204
1250A Round tulip contact

120046



Material: Cu
15 sheets

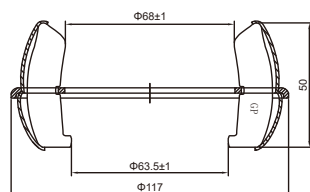


● Products code: GPA205
2500A Round tulip contact

120047



Material: Cu
24 sheets

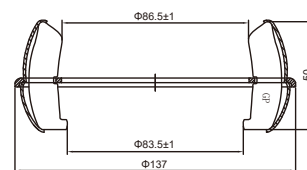


● Products code: GPA206
3150A Round tulip contact

120048



Material: Cu
30 sheets

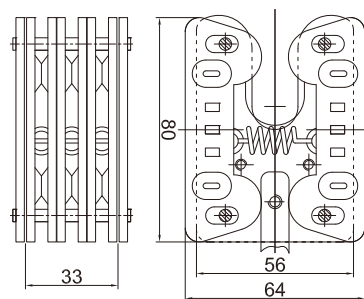


● Products code: GPA301
630A Extension spring flat contact

120049



Material: Cu
12 sheets



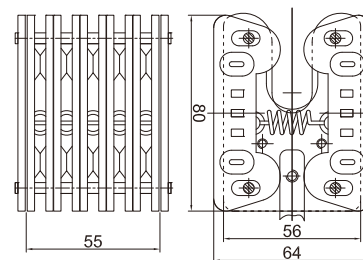
Contact plate thickness: 10mm
Insertion depth: 34 ± 2

● Products code: GPA302
1000A Extension spring flat contact

120050



Material: Cu
20 sheets



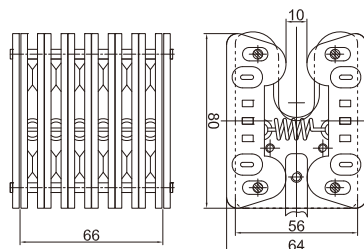
Contact plate thickness: 10mm
Insertion depth: 34 ± 2

● Products code: GPA303
1250A Extension spring flat contact

120051



Material: Cu
24 sheets



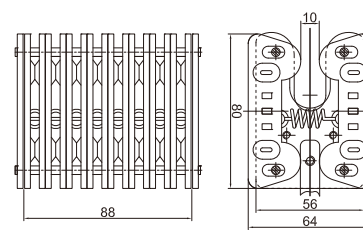
Contact plate thickness: 10mm
Insertion depth: 34 ± 2

● Products code: GPA304
1600A Extension spring flat contact

120052

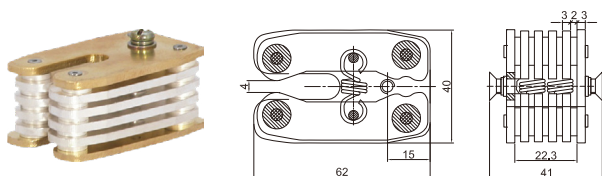


Material: Cu
32 sheets



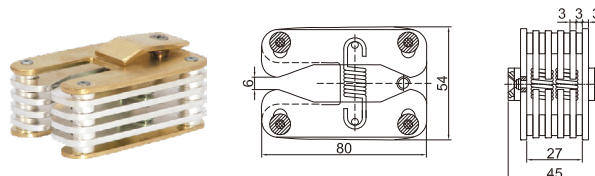
Contact plate thickness: 10mm
Insertion depth: 34 ± 2

- Products code: GPA401
400A Extension spring flat contact
120053



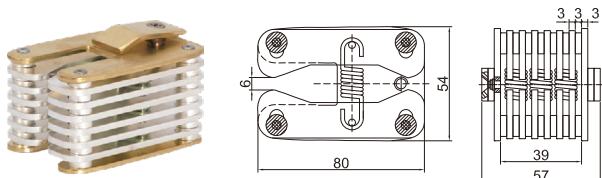
Material: Cu
8 sheets
Contact plate thickness: 6mm
Insertion depth: 22 ± 2

- Products code: GPA402
400A Extension spring flat contact
120054



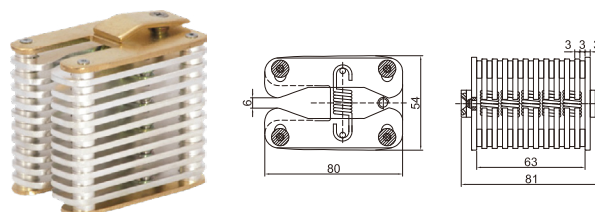
Material: Cu
8 sheets
Contact plate thickness: 10mm
Insertion depth: 34 ± 2

- Products code: GPA403
630A Extension spring flat contact
120055



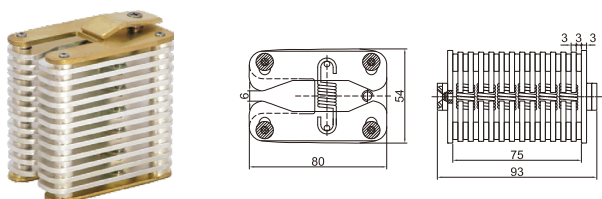
Material: Cu
12 sheets
Contact plate thickness: 10mm
Insertion depth: 34 ± 2

- Products code: GPA404
1000A Extension spring flat contact
120056



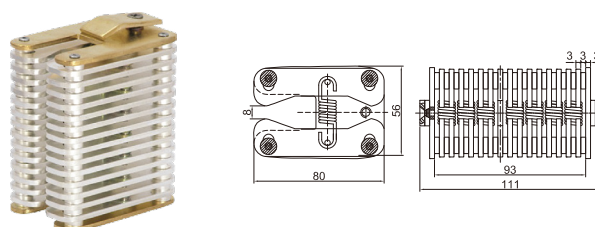
Material: Cu
20 sheets
Contact plate thickness: 10mm
Insertion depth: 34 ± 2

- Products code: GPA405
1250A Extension spring flat contact
120057



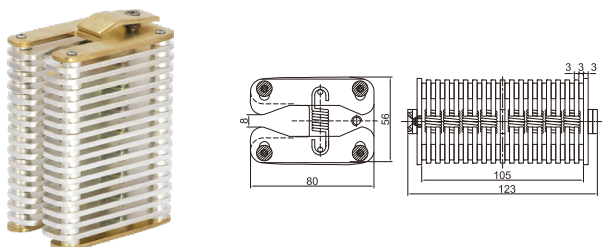
Material: Cu
24 sheets
Contact plate thickness: 10mm
Insertion depth: 34 ± 2

- Products code: GPA406
1600A Extension spring flat contact
120058



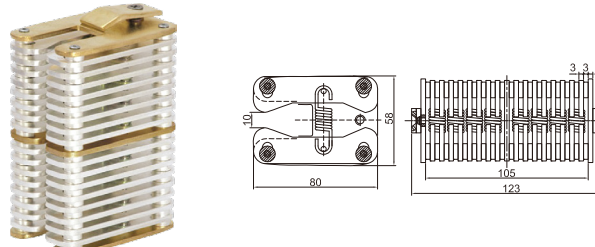
Material: Cu
28 sheets
Contact plate thickness: 12mm
Insertion depth: 34 ± 2

- Products code: GPA407
1600A Extension spring flat contact
120059



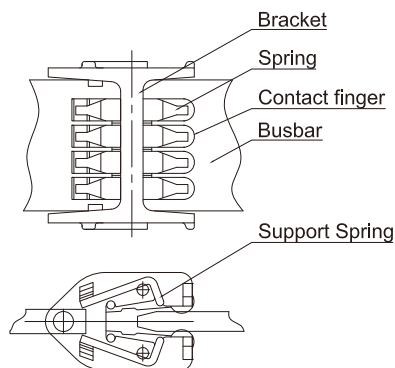
Material: Cu
32 sheets
Contact plate thickness: 12mm
Insertion depth: 34 ± 2

- Products code: GPA408
2000A Extension spring flat contact
120060



Material: Cu
32 sheets
Contact plate thickness: 15mm
Insertion depth: 34 ± 2

● 10kV Flat contact installation diagram

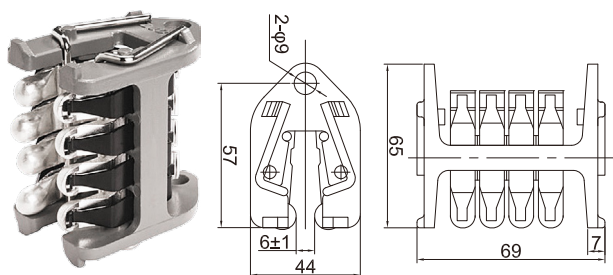


Structural features

WCD series indoor vertical rotating isolation movable contact, is isolating moving contact of a three-phase (single-phase) 50Hz indoor rotary breakers, load isolation switch, which can be used as isolation and grounding purposed for vertical rotating / removing indoor AC metal-enclosed switchgear device.

It has a total of three common specifications, rated currents of 630A, 1250A, 1600A. And can be grouped together to become 2500A by two 1250As, and two 1600As combined to 3150A.

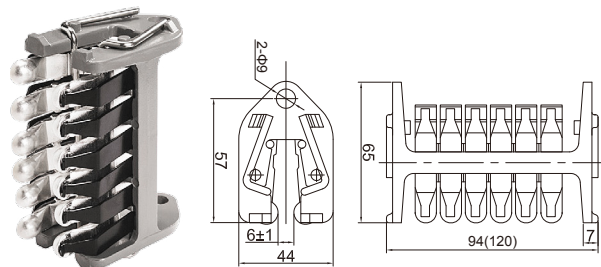
● Products code: GPA509 **120069**
630A Vertical rotating isolate movable contact



Material: Cu
8 sheets

Contact plate thickness: 10mm

● Products code: GPA510/GPA511 **120070 / 120071**
1250A/1600A Vertical rotating isolate movable contact



Material: Cu
12(16) sheets

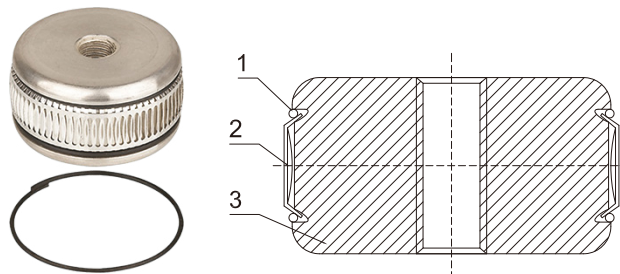
Contact plate thickness: 10mm

● Cable plug assembly

Structural features

The products are mainly used in cable quick connector, the use of fingers as a connecting surface, it has the effect of more contact points and good conductivity, using widely.

● Products code: GPA512 **120072**
Cable plugin assembly

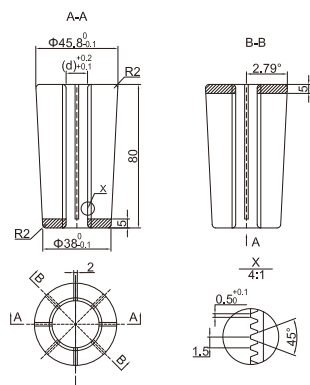


Material: Cu
Contact finger material: beryllium bronze

● Products code: GPA513 **120073**
Cable plugin assembly



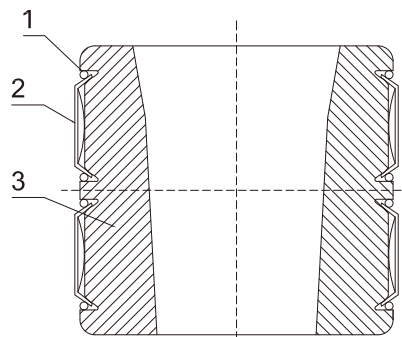
Material: Cu



● Products code: GPA514 **120074**
Cable plugin assembly

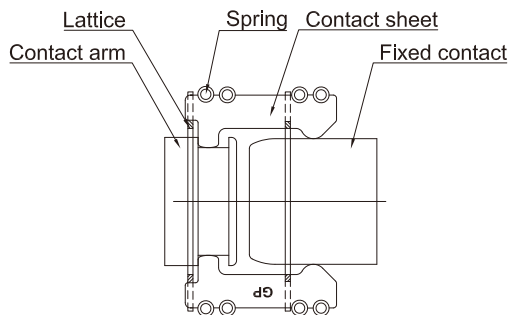


Material: Cu



● Fixed contacts

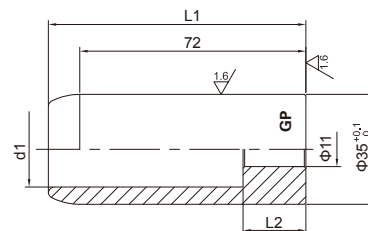
Installation diagram of fixed contacts
All difference dimensions can be customized as requirements.



● Products code: GPB113, GPB101,
630A Fixed Contact



Material: Cu

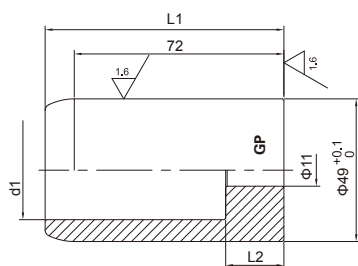


Code	Model	L1	L2	d1
120075	GPB113	82	20	24
120076	GPB101	82	50	24

● Products code: GPB114, GPB103,
1250A Fixed Contact



Material: Cu

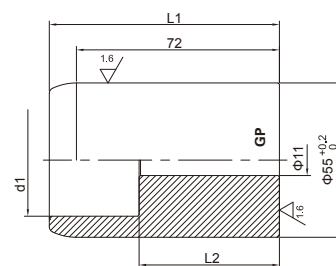


Code	Model	L1	L2	d1
120077	GPB114	82	20	36
120078	GPB103	82	50	34

● Products code: GPB115, GPB104,
1600A Fixed Contact



Material: Cu

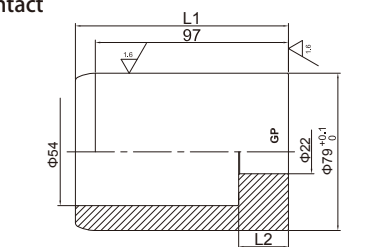


Code	Model	L1	L2	d1
120080	GPB104	82	20	40
120079	GPB115	82	50	42

● Products code: GPB105
2000A/2500A Fixed contact



Material: Cu

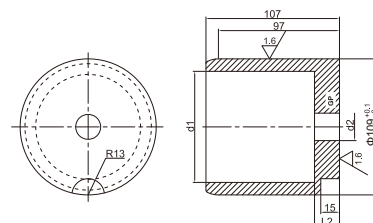


Code	Model	Current	L1	L2	d1
120081	GPB105	2000A	107	25	22
120171	GPB1508	2000A	104	30	22
120187	GPB1519	2500A	104	50	22

● Products code: GPB116, GPB1237
3150A Fixed contact



Material: Cu

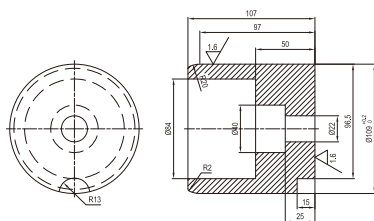


Code	Model	L2	d1	d2
120082	GPB116	20	89	22
120083	GPB1237	25	84	20

● Products code: GPB108 **120084**
3150A Fixed contact



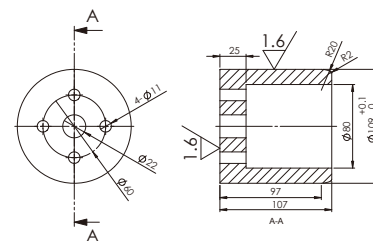
Material: Cu



● Products code: GPB109 **120199**
4000A Fixed contact



Material: Cu



● **Contacts arms (For PT, Busbar Truck, V.C.B., etc)**

Contact arms specification

The company produces vulcanized contact arm, can replace the contact arm sleeve, which is simplify the structure of the product, and can miniaturization the switchgear. Sulfide layer thickness 2-4mm, every millimeter can bear frequency withstand voltage 20kV.

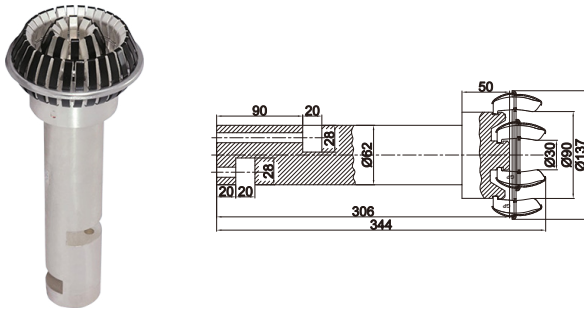
Contact arm ordering notice

Rated current
Description supporting contact form
Contact arm forms and mounting hole size
Whether to adopt the vulcanization process
The company can according to customer requirements of various types of contact arms.

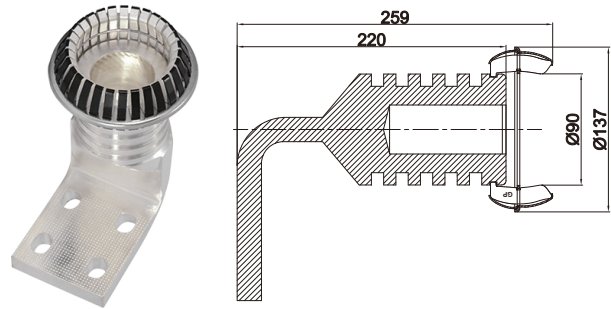
● **Bundled tulip contact assembly to contact arm**



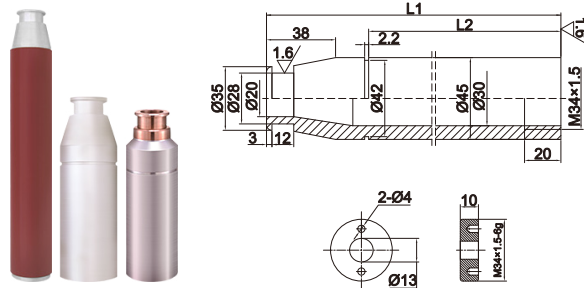
● **Double round tulip contact assembly to contact arm**



● **Round tulip contact assembly to contact arm**



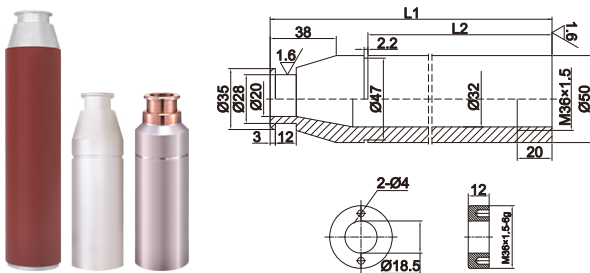
● **Products code: GPB203~GPB207
630A Contact arm**



Material: Cu or Cu-Alu

Product model	L1	L2	Cu-Alu	Cu<.1>
GPB203	158	102	120089	120207
GPB204	188	102	120091	120092
GPB205	256	No Slot	120093	120094
GPB206	315	No Slot	120095	120096
GPB207	321	No slot	130097	120098

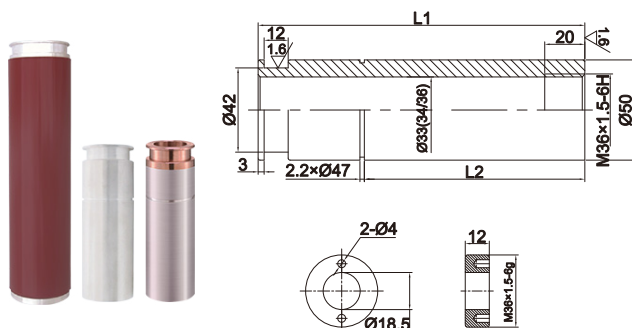
● **Products code: GPB212~GPB216
630A Contact arm**



Material: Cu or Cu-Alu

Product model	L1	L2	Cu-Alu	Cu<.1>
GPB212	158	102	120099	120100
GPB213	163	102	120101	120102
GPB214	200	102	120103	120104
GPB215	315	No Slot	120105	120106
GPB216	501	No Slot	130107	120108

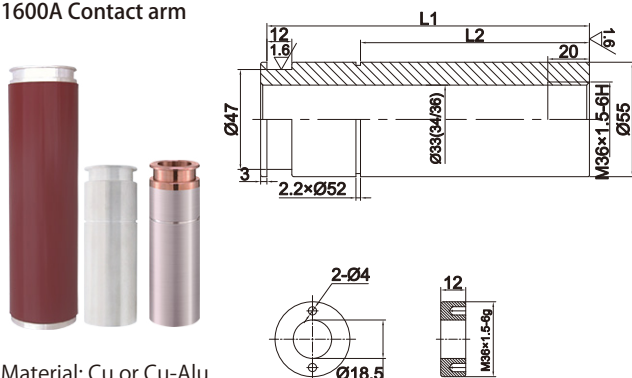
● Products code: GPB217~GPB221
1250A Contact arm



Material: Cu or Cu-Alu

Product model	L1	L2	Cu-Alu	Cu<.1>
GPB217	158	102	120109	120110
GPB218	200	102	120111	120112
GPB219	315	No Slot	120113	120114
GPB220	436.5	GPVN-40.5	120115	120116
GPB221	511	No Slot	120117	120118

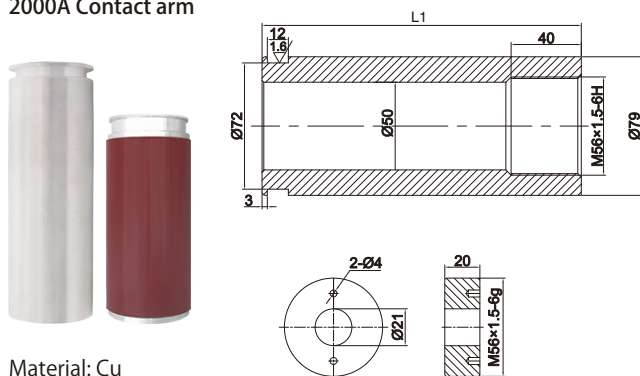
● Products code: GPB222~GPB225
1600A Contact arm



Material: Cu or Cu-Alu

Product model	L1	L2	Cu-Alu	Cu<.1>
GPB222	158	102	120119	120120
GPB223	295	No Slot	120121	120122
GPB224	315	No Slot	120123	120124
GPB225	436.5	GPVN-40.5	120125	120126

● Products code: GPB226~GPB229
2000A Contact arm

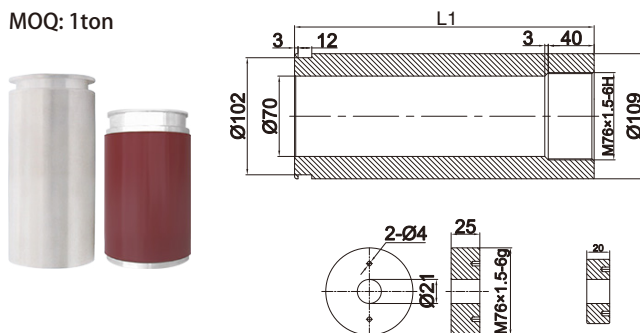


Material: Cu

Product model	L1	Cu
GPB226	182	120127
GPB227	261	120128
GPB228	283	120129
GPB229	436.5 GPVN-40.5	120130

● Products code: GPB230~GPB233
3150A Contact arm

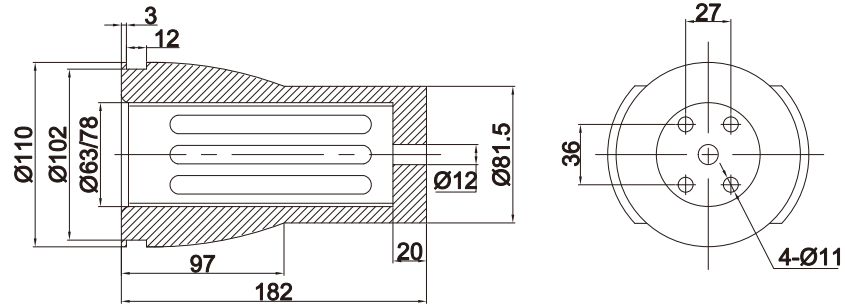
MOQ: 1ton



Material: Cu

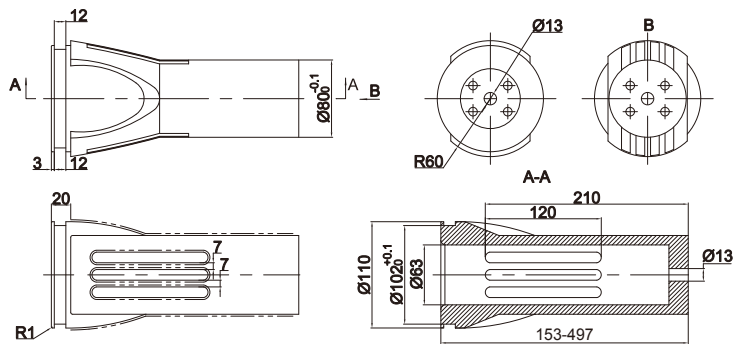
Product model	L1	Cu
GPB230	236	120131
GPB231	255	120132
GPB232	261	120133
GPB233	281	120134

- Products code: GPB259 **120135**
GPVN 3150A Contact arm



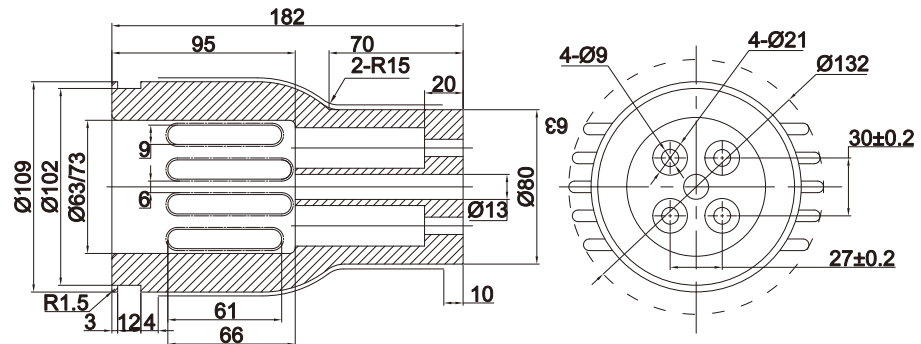
Material: Cu

- Products code: GPB265 **120136**
GPVN 3150A Contact arm



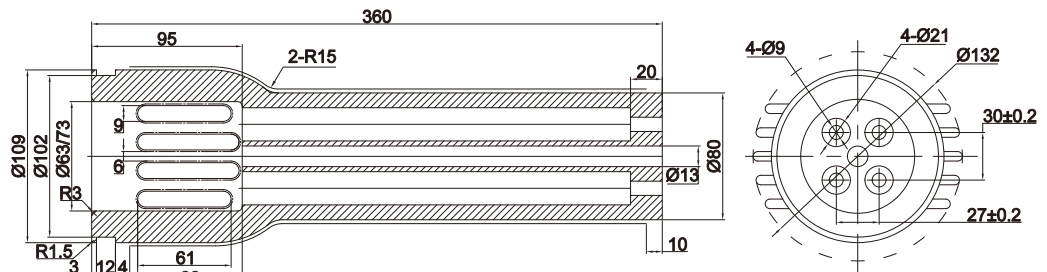
Material: Cu (Suit for large current busbar truck)

- Products code: GPB260 **120137**
GPVN 4000A Contact arm



Material: Cu

- Products code: GPB266 **120138**
GPVN 4000A Contact arm



Material: Cu

H1-GP-202504

Zhejiang Greenpower Electric Co., Ltd
Zhejiang GreenPower I&E Co., Ltd
Professional Power Equipment Provider

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