FWP-A

Type 1+2 AC Surge Protective Device

FEED

► Application

FSP-A series surge protection device (in short SPD, alias:surge suppressor surge arrester) is suitable for TN-S, TN-C-S, TT, IT etc, power supply system of AC 50/60Hz,<380V, installed on the joint of LPZ1 or LPZ2 and LPZ3. It's designed according to IEC61643-1, GB18802.1, it adopts 35mm standard rail, there is a failure release mounted on the module of surge protection device, When the SPD fails in breakdown for over heat and over-current, the failure release will help electric equipments separate from the power supply system and give the indication signal, green means normal, red means abnormal, it also could be replaced for the module when has operating voltage.





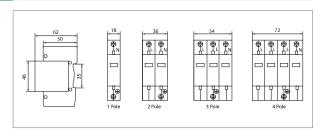
▶ Product Features

- ☐ Inside over-current and over-heat protection, temperature control open circuit.
- ☐ Module design, convenient installation, could be replaced online.
- ☐ Time of response <25ns
- ☐ The color of visible window shows operating status, green means normal, red means abnormal

► Specifications

Technical Parameters					
recommed rarameters					
Pole	1P	2P	3P		4P
Rated Operating Voltage Un(V~)	230V/275V 385V/420V			/	
Maximum Continuous Operating Voltage Uc(V~)	275/385/420VAC				
Voltage protection Level Up(V~)kV	≤2.5				
Nominal Discharge Current In µs kA	5	20	30	40	60
Maximum Discharge Current Imax µs kA	10	40	60	80	100
Response Time (ns)	<25				
Test Standard	IEC61643.1, GB18802.1				
Operating Environment(centigrade)	-40°C ~+85°C				
Max Connection Line	35mm2 hard wire/35mm2 strand wire copper line				
Recommended Connection Line	16mm2 hard wire/25mm2 strand wire copper line				
Installation	Standard Rail 35mm				
Material of Outer Covering	Burning-proof Nylon				

▶ Overall Dimensions



► Application

Type 1 + 2 SPD's have characteris cs of type 1 but also type 2, they are capable of discharging a very high lightning current (T1 10/350 μ s) and they have as well a low residual voltage (Up). They are installed in the main distribu on switchboard but also in subdistribu- on board. Because of their power, Type 1 + 2 SPD's can let pass through a too high residual voltage, if the announced Up is not compa ble with the withstand voltage of the equipment to protect or if the cable length to the equipment is longer than 10m,



▶ Features

- □ Patented QuickSafe ® technology
- Safety Reserve system
- □ Din rail moun ng□ Pluggable
- Improved safety
- ☐ Back up protec on up to 160 A Fuse or 125 A Mcb

▶ Specifications

Key characteristics		_				
Protection mode	L	L-N/L-PE/N-PE				
Number of protected lines		1-4				
Test class		1-11				
Integrated thermal disconnector		Yes				
End of life indicator		Yes				
Safety reserve		Yes				
Safety reserve						
Electrical characteristics						
Nominal discharge current	/n (8/20)	kA	20			
Maximal discharge current	/max (8/20)	kA	40			
Impulse current	/imp (10/350)	kA	7			
maximal continuous operating voltage	Uc	V	275/385/420			
Type of current/frequency		Hz	a.c.50/60			
Voltage protection level at In	Up(L-PE)	kV	1,2			
Voltage protection level at In	Up(L-N)	kV	-			
Voltage protection level at In	Up(N-PE)	kV	-			
Short circuit withstand	/SCCR	kA	100			
Total current	/TOTAL	kA	20			
Follow current interrupted	/fi	kA	-/-			
Ground residual current	/PE	μΑ	< 350			
TOV withstand(L-N:5s/N-PE:200 ms)	UT	UT V				
Voltage Combination Wave	Uoc	kV	20			
Required thermal/back up protection						
Curve B or C Circuit breaker		Α	≤125			
gG-gL fuse		А	≤160			
Comments						
Mechanical characteristics						
Dimensions	HxWxD	mm	89 × 18 × 69			
Wire range:Solid wire		mm ²	2.525			
Wire range:Stranded wire		mm²	12.5			
Stripping length		mm	Per 1			
Packing quantities		piece				
Miscellaneous characteristics						
Maximal altitude		m	2000			
Weight		g	150			
Response time		ns	25			
Fire resistance according to UL 94			< V-0			

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