

Automatic Voltage Switch

AVS Series User Manual

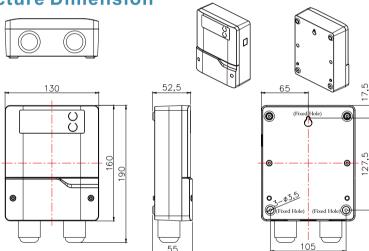


Description

AVS is an automatic ac voltage switch rated at 30 Amps or 50 Amps. It will switch off the equipment connected to it if it detects that the equipment is over or under voltage. And it will re-connect to the equipment if the voltage returns to the normal range. AVS can provide electric equipment with an automatic protection all the time.

- Built-in micro-processor control
- Human-Machine Interface
- Over voltage protection
- Under voltage delayed protection
- Automatic reconnection
- Surge and spike protection

Structure Dimension

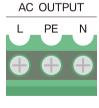


Installation Guide

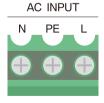
Steps are as follows:

- 1. Install the main nails on the wall;
- 2. Hang up the AVS;
- 3. Remove the lower cover;
- 4. Fix AVS with auxiliary nails;
- 5. Wiring (AC Cables);
- 6. Lock the lower cover.
- The supply to the AVS must be protected with a fuse or circuit breaker rated at 30A(AVS30)/50A(AVS50) or less. Don't overload it.

AC AC OUTPUT INPUT







Connected to grid or GEN

Human-Machine Interface



The interaction interface is designed for users to take advantage of the AVS more comprehensively. The table below is the introduction and indications of each condition. Please read it carefully.

Lights	Color	Conditions	Indication	Figures in the interface (voltage:V, time:s)
High cut	Red	Bright	Input over voltage, AVS has been disconnected from the electrical equipment	Present voltage
		Blink	Input over frequency or enter the "High cut" voltage setting menu	Voltage of high cut
High wait	Yellow	Bright	Waiting period after input over voltage recovery	Present voltage
		Blink	Enter the high and low voltage recovery delay setting menu (flashing with the "Low wait" light at the same time)	Time of high and low wait
ON	Green	Bright	The output is normal, AVS has been connected to the electrical equipment	Present voltage / frequency
Low wait	Yellow	Bright	Enter the waiting period after the low voltage is restored	Present voltage
		Blink	1.Enter the low voltage cut-off delay setting item menu; 2.Enter the high and low voltage recovery delay setting menu (flashing with the "High wait" light at the same time)	1.Time of low cut 2.Time of high and low wait
Low cut	Red	Bright	Low input voltage, AVS has been disconnected from the electrical equipment	Present voltage
		Blink	Low input frequency or enter the Low cut voltage setting menu	Voltage of low cut

The AVS has two buttons: the [back] button (multiplexed as page up) and the [enter] button (multiplexed as page down). Short press the [enter] button to cancel the delay waiting. The AVS provides 5 setting items:

- 1. High and low voltage recovery delay cut-in waiting time, 0-600s (default: 10s) can be set, 10s one gear;
- 2. AC input low voltage cut-out delay time, 0-10s (default: 5s) can be set, 1s one gear;
- 3. AC input low voltage cut-out voltage point, 150V-230V (default: 160V), 5V one gear;
- 4. AC input high voltage cut-out voltage point, 230V-300V (default: 260V), 5V one gear;
- 5. Digital tube display setting function: Long press the [Back] button on the main interface, it can be set that the digital tube will not light up after two minutes without operating the button. Long press the [Back] button again on the main interface to exit this mode. The factory default is that the digital tube is always on.

Button	【Bacl	k](\(\))	[Enter](V)	
Interface	Short press	Long press	Short press	Long press
Main interface	Switch to display the grid information (Voltage/Frequency)	Digital tube display setting	1. Cancel the delay waiting(Close the relay immediately) 2.Switch to display the grid information (Voltage/Frequency)	Enter the "Setting Menu"
Setting menu interface	Page Up	Return to the main interface	Page down	Enter "Parameter setting interface"
Parameter setting interface	Adjust the parameter value (+)	Cancel the current parameter, return to the setting menu interface	Adjust the parameter value (-)	Confirm and save the current parameter, return to the setting menu interface

Specifications

Model No.		AVS30	AVS50	
			1 11 1 1	
Nominal Voltage		230VAC		
Power		6900W	11500W	
Frequency		45Hz~55Hz / 55Hz~65Hz		
Nominal Current		30A	50A	
Max consumption		10W		
Wait time		0s∼600s (Adjustable)		
High Voltage Disco	nnect	230VAC~300VAC (Adjustable)		
High Voltage Recor	nnect	"High Voltage Disconnect" - 10VAC		
Low Voltage Discor	nect	150VAC~230VAC (Adjustable)		
Low Voltage Recon	nect	"Low Voltage Disconnect" + 5VAC		
Max voltage		300VAC		
Surge and spike	Joules	220J		
protection	Amps	6500A (8/20us)		
Protection index		IP41		
Operating temperat	ure range	-20 to +45°C		
Net Weight		0.40kg	0.43kg	
Dimension		190*130*55mm		