

# AFV-S series

## Programmable AC Power Source

### Interfaces

Standard **RS-232** **RS-485** **PLC Remote**

Option **Ethernet** **Analog** **USB**

### QR Code



Product Info.



Product Video



**Output Power**  
**600VA~5000kVA**

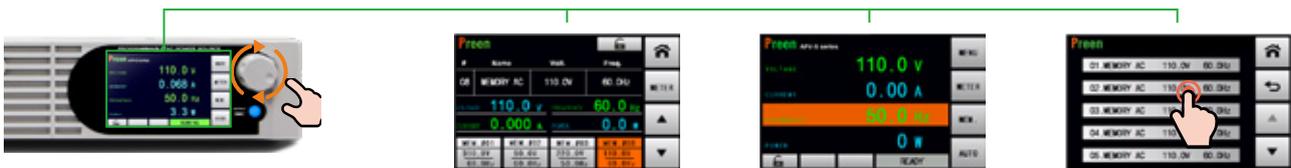
RoHS Compliant **CE**

Preen's AFV-S series is a programmable AC power source with precise measurement capability. This compact product comes in four output power levels: 600VA, 1250VA, 2500VA and 5000VA, which provides clean power with low harmonic distortion.

The AFV-S series can display 4 shortcuts of 20 memory sets, and the voltage and frequency setting of each memory sets can be clearly read. Users can quickly set and view the parameters via 5 inches touch panel or rotary knob, which provides an easy operation and measurement display.

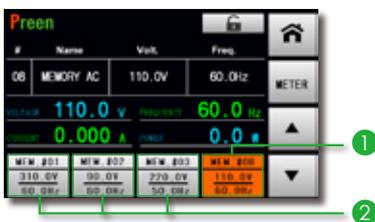
The AFV-S series is equipped with communication interfaces of RS232, RS485, Ethernet(opt.), Analog(opt.), and USB(opt.). Its complete remote interfaces and specialized control software offer an easy programming manner to remotely control the product. It is ideal for home appliances, power connector, LED lighting, automation testing in manufacturing and product testing in laboratory.

### Intuitive Touch Screen Control



The 5 inches touch screen provides users a clear display and an easy set up. AFV-S is also equipped with a rotary knob for better fine tune adjustments.

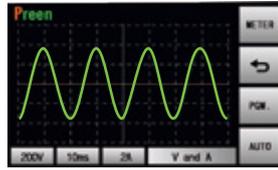
### 4 Shortcuts of Memory Sets



- ① One user-assigned shortcut from 20 memory sets
- ② Three fixed shortcut from first three memory sets

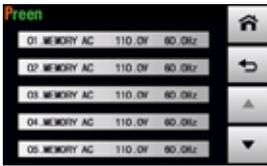
AFV-S series can display 4 shortcuts of memory sets, and the voltage and frequency setting of each memory sets can be clearly read. The user can quickly switch the output by selecting the shortcuts. Also, the Screen Lock function is also provided for preventing operators from accidentally changing shortcuts during output and causing DUT damage.

## Waveform Display & Comprehensive Measurement



AFV-S series is capable of providing output waveform display and precise measurements, user can easily check the measurements of RMS voltage, output frequency, RMS current, true power, apparent power, reactive power, power factor and crest factor according to the product output. Additionally, all measurements can be exported as a report via the control software for analyzing and tracking EUT performance.

## 20 Memory Sets with Value Adjustment



The AFV-S is equipped with 20 customizable memory sets and a 5-inch touchscreen, offers precise control for multiple testing applications. Its intuitive interface allows for simultaneous display of 5 settings, voltage, and frequency values, ensuring efficient and accurate measurements.

## PANEL DESCRIPTION



- 1. Power Switch
- 2. Touch Screen HMI
- 3. Rotary Knob
- 4. Output / Reset
- 5. AC Output Socket
- 6. Output Terminals
- 7. Remote Sense
- 8. RS-232/RS-485
- 9. Input Voltage Selector
- 10. PLC Remote In/Out
- 11. USB Interface(for firmware update)
- 12. Sync. Signal I/O
- 13. Input Socket\*

\*AFV-S-1250, AFV-S-2500, AFV-S-5000 have input terminals.

## ORDERING INFORMATION

### AFV-S Series Single-Phase Output (600VA-5kVA)

Model Number	Description
AFV-S-600	Programmable AC Power Source ( 600VA/310V/40-500Hz )
AFV-S-1250	Programmable AC Power Source ( 1250VA/310V/40-500Hz )
AFV-S-2500	Programmable AC Power Source ( 2500VA/310V/40-500Hz )
AFV-S-5000	Programmable AC Power Source ( 5000VA/310V/40-500Hz )
AFV-S-002	Interface Card (Ethernet/RS-232&RS-485/USB)
AFV-S-003	Analog Control Interface
AFV-S-010	Input Power Cable 3M (for 1.25kVA/2.5kVA)
AFV-S-011	Input Power Cable 5M (for 5kVA)
ACCS-001	USB to RS-485 converter +RS-232/RS-485 Cable M-F type (2M)
ACCS-003	RS-232/RS-485 Cable M-F type (2M)

# SPECIFICATIONS

## AFV-S Series Single-Phase Output (600VA-5kVA)

Model	AFV-S-600	AFV-S-1250	AFV-S-2500	AFV-S-5000	
<b>INPUT</b>					
Phase	1Ø / 2 Wire + G				
Voltage	98-132Vac/196-264Vac		196-264Vac		
Frequency	47-63Hz				
Max. Current	10A	20A	20A	40A	
<b>OUTPUT</b>					
Power	(VA)	600VA	1250VA	2500VA	5000VA
	(W)	500W	1000W	2000W	4000W
Phase	1Ø / 2 Wire + G				
Voltage Ranges	0-155Vrms / 0-310Vrms, user selectable				
Voltage Accuracy	±(1% of Setting + 0.1% F.S.)				
Voltage Resolution	0.1Vrms				
Frequency	40-500Hz				
Frequency Accuracy	±0.02%				
Frequency Resolution	0.1Hz				
Max. Current (RMS)	5A/2.5A	10A/5A	20A/10A	40A/20A	
Max. Current (Peak)	20A/10A	40A/20A	80A/40A	160A/80A	
Total Harmonic Distortion (THD)	≤ 0.3% at 110V/220V, 50Hz, 60Hz ≤ 0.5% (Resistive Load)				
Line Regulation	±0.1V				
Load Regulation	≤ 0.07% F.S (Resistive Load)				
Response Time	≤ 300µs				
Crest Factor	≥ 3				
Inrush Current	≤ 4 time of max. output current ( RMS )				
<b>MEASUREMENT</b>					
Voltage Range	0-420Vrms				
Voltage Accuracy	±(0.2% of Reading + 5 Counts)				
Voltage Resolution	0.1V				
Frequency Range	40.0-500.0Hz				
Frequency Accuracy	±0.1Hz				
Frequency Resolution	0.1Hz				
Current Range (RMS)	Hi: 1-12A/Lo: 0.005-1.2A		Hi: 2-24A/ Lo: 0.005-2.4A	Hi: 0.05-48A	
Current Accuracy (RMS) <sup>1</sup>	±(1% of reading +5 counts) at PF>0.2				
Current Resolution (RMS)	Hi: 0.01A/Lo: 0.001A			Hi: 0.01A	
Peak Current Range	0-45A		0-90A	0-180A	
Peak Current Accuracy	±(1% of Reading + 10 Counts)				
Peak Current Resolution	0.1A				
Power Range	Hi: 100-1200W/ Lo: 0-120W		Hi: 200-2400W/ Lo: 0-240W	Hi: 0-4800W	
Power Accuracy	±(2% of Reading + 10 Counts), at 40-500Hz				
Power Resolution	Hi: 1W/Lo: 0.1W			Hi: 1W	
<b>GENERAL</b>					
Efficiency	≥ 77% at Max. Power		≥ 80% at Max. Power		
Protection	OVP, LVP, OCP, OPP, OTP, RCP, Fan Fail and AMP Fail				
Remote Interface	Standard : RS-232/RS-485/PLC Remote IN & OUT Option : Analog/Ethernet/USB				
Over Current Foldback	Over Current Foldback				
Output Sync Signal	ON, Event for Voltage or Frequency Change (Output signal 5V , BNC type)				
Memories	20 Memories, 4 Shortcuts				
Operating Temperature	0~40°C				
Dimensions (HxWxD)	89×442×495mm/ 3.5×17.4×19.5inch		89×442×650mm/ 3.5×17.4×25.6inch	176×442×665mm/ 6.9×17.4×26.2inch	
Weight	approx.16kg / 35.3lbs	approx.20kg / 44.1lbs	approx. 31.3kg / 69lbs	approx. 61.5kg / 135lbs	

\* All specifications are subject to change without notice.

\*1 AFV-S-2500 IS ±(1% F.S. + 5 counts).