

Programmable AC Power Source



Aplab's all new 8600 series of Programmable AC Power Source is compact in size and light in weight due to the use of the state of the art switch mode high frequency PWM technology. These A C Power Sources come with a built in PFC with universal input to provide a typical input power factor of 0.99 at full load, suitable for all the utility power outlets in almost all the countries. The output AC is of full rated current and is delivered in the voltage range of 135V AC or 270V AC, which is user selectable, using a push switch on the front panel.

The Programmable AC Power Source is provided with 16x2 character VF display for parameter display (output voltage and selected voltage range, current, frequency, power and mode of operation; local/remote). The control is through a rotary encoder with the push button switch for control of output voltage and frequency. A separate output ON/OFF switch controls power to the load. The unit is protected against over temperature, overload and short circuit.

These units are available in three output power ratings of 500VA, 1000VA and 1500VA. However higher power models can be offered against specific requirements. It is ideally suitable for industrial product testing; power conversion, automatic test equipment, avionics and military applications for bench top or standard 19" rack mount applications.

Model Selection: S 86 5 Series Power Output M- Manual **Optional Features** V-Extended Voltage Range, 05-500VA A- Analog Prog. 0-5V DC/0-10V DC **10**- 1000VA 0-150V, 0-300V **15**- 1500VA User Defined R-Factory fitted Rack **20**-2000VA P- Programmable mounting Kit **30**- 3000VA

Features:

- Compact size and light weight, standard 19" rack construction
- Step-less frequency setting from 45 to 450Hz
- Very low distortion sine wave output
- Output voltage range selectable 135 or 270V AC
- Galvanically isolated input/ output
- •Independent on/off switch for input and output
- 16x2 vacuum florescent display for parameter display
- Complete operation through push switches and a digital rotary encoder
- Automatic protection against overload, short circuit and over temp.
- Built in PFC to provide
 0.99 input power factor
 and wide input range
- Conforms to EN55022, class A, safety standard EN60950

SPECIFICATIONS:

	Model	8605P	8610P	8615P	8620P	8630P	
Voltage							
Section Sect			1000111	1000111	2000	0000171	
185V - 263V AC, single phase 185V - 264V AC, single phase							
APTALE to 63Hz Power Factor 0.98 typical 6 full load 85% typical		90V	- 265V AC, single n	hase	185V - 264V AG	C. single phase	
Power Souva Souv							
Marcollist	•						
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				00 % typican			
Notage		500\/Δ/400\//	1000\/4/800\//	1500\/\\/\/1200\\/\	2000\/A/1600\//	3000\/\\\/\\\\	
Resolution		300 77/4007				3000 VA/2400 V	
Accuracy							
A5Hz to 450Hz							
Accuracy	•		1,70 51.1511 5551151				
Resolution Current - Maximum	· · · · · · · · · · · · · · · · · · ·						
At 0-135V Range (Amps)							
At 0-135V Range (Amps)				U.U ITIZ.			
At 0-270Y Range (Amps) 2.0	***	4.0	9.0	12.0	16.0	24.0	
Distortion					1010		
April		2.0	4.0		8.0	12.0	
Line Regulation Line Regulation Line Regulation £10.1% Load Regulation £11% Doverload/Short-circuit Over Temperature Input side CONTROLS & INDICATIONS Input Power ON/OFF Read out 2x16 character vacuum fluorescent display for output voltage, current, frequency, power, range and mode Voltage, current, frequency, power, range and mode Display Voltage: Accuracy \$21% of full scale \$24% of full scale \$25% of full scale, ±1 digit Resolution \$25% of full scale \$25% of full scale \$25% of full scale, ±1 digit Resolution \$25% of full scale \$25% of full scale \$25% of full scale, ±1 digit \$25% of f	0.000.0000.						
Line Regulation ±0.1% Load Regulation ±1% PROTECTIONS Overload/Short-circuit Output trip and indication Over Temperature Output trip and indication Output trip and indication Output trip and indication Output trip and indication Input side Fast acting fuse CONTROLS & INDICATIONS Input Power ON/OFF Read out Programmable 2x16 character vacuum fluorescent display for output voltage, current, frequency, power, range and mode 2x16 character vacuum fluorescent display for output voltage, current and power trough selector switch 4 digit 7 segment display for output Frequency Display Voltage: Accuracy \$\frac{2}{2}\$ 1\% of full scale} \frac{2}{2}\% of full scale, \frac{2}{2}\							
Description Display			-				
Overload/Short-circuit Over Temperature Input side CONTROLS & INDICATIONS Imput Power ON/OFF Read out Display Voltage: Accuracy Resolution Power: Accuracy Resolution Digital rotary encoder for voltage and frequency setting for full scale, ±1 digit.* Prower: Accuracy Resolution Controls Digital rotary encoder for voltage and frequency, mode, range and output ON/OFF selection. Controls Digital rotary encoder for voltage and frequency, mode, range and output ON/OFF selection. Fault Alarm Command Protocol MECHANICAL & ENVIRONMENTAL Dimensions (mm) Media digital rotary encoder of voltage and not output on the product of the			1 11				
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Programmable Manual							
2x16 character vacuum fluorescent display for output voltage, current, frequency, power, range and mode 2x16 character vacuum fluorescent display for output voltage, current and power through selector switch 4 digit 7 segment display for output Frequency Display Voltage: Accuracy Resolution O.1V Current: Accuracy Resolution O.01A Power: Accuracy Resolution Controls Digital rotary encoder for voltage and frequency setting and frequency setting full scale, ±1 digit.* Digital rotary encoder for voltage and frequency setting and frequency setting for output ON/OFF selection. Spush button switches for voltage and frequency setting and frequency setting for output ON/OFF selection. Fault Alarm Common LED alarm for fault conditions (overload and over temperature) Interface Resolution Common LED alarm for fault conditions (overload and over temperature) Resolution Common LED alarm for fault conditions (overload and over temperature) Resolution for output voltage setting as an option. Baud Rate ScPI compliant MECHANICAL & ENVIRONMENTAL Dimensions (mm) 88H x 482.6W x 500D 132H x 482.6W x 520D Weight (Kgs) 20 21 23 30 35 Operating Temperature Input Connection Universal socket Terminal block with safety cover our universal receptacle Universal socket Terminal block with safety cover	•						
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Current: Accuracy ±1% of full scale ±2% of full scale, ±1 digit Resolution 0.01A 0.1A Power: Accuracy ±2% of full scale ±5% of full scale, ±1 digit.* Resolution 1W 1W Controls Digital rotary encoder for voltage and frequency setting and frequency setting. Multiturn potentiometer for voltage and frequency setting and frequency setting. 5 push button switches for voltage, frequency, mode, range and output ON/OFF selection. 3 push button switches for display selection, one push button switch footput range selection, rocker switch for output on/OFF selection. Fault Alarm Common LED alarm for fault conditions (overload and over temperature) Interface RS232 as standard RS485 or GPIB as optional 0 - 5V or 0 -10V isolated analog control for output voltage setting as an option. Baud Rate 9600 SCPI compliant MECHANICAL & ENVIRONMENTAL Dimensions (mm) 88H x 482.6W x 500D 132H x 482.6W x 520D Weight (Kgs) 20 21 23 30 35 Operating Temperature 0-45°C, peak 50°C. Input Connection Terminal block with safety cover or universal receptacle Output Connection Universal socket Terminal block with safety cover	Voltage: Accuracy		±1% of full scale			±2% of full scale, ±1 digit	
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Power: Accuracy Resolution 1W 1W 1W	Current: Accuracy		±1% of full scale			±2% of full scale, ±1 digit	
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Input Connection Terminal block with safety cover or universal receptacle Output Connection Universal socket Terminal block with safety cover Safety EN60950	Weight (Kgs)	20	21	23	30	35	
Input Connection Terminal block with safety cover or universal receptacle Output Connection Universal socket Terminal block with safety cover Safety EN60950	Operating Temperature		0-45°C, peak 50°C.				
Safety EN60950	Input Connection		Terminal block with safety cover or universal receptacle				
Safety EN60950	Output Connection		Universal socket Terminal block with safety cover				
•	Safety		EN60950				
	EMC			EN55022 class A			



* Wattmeter readings are indicative in Manual version.

Note: Specifications are subject to change without notice. Specifications are warranted over an ambient temperature range of 25°± 5°C. unless otherwise noted; specifications are for a sine wave with a resistive load and apply after a 15-minute warm-up period. The unit will operate with input voltage range of 90V-265V AC. However for continuous operation, the voltage required will be 100V and above.