

GPP-3610H/7250

Single Channel Programmable DC Power Supply

FEATURES

- 4.3" TFT LCD Display
- Programming Resolution: 1mV/0.2mA (GPP-3610H); 2mV/0.2mA (GPP-7250)
- Readback Resolution: 0.1mV//0.1mA
- Low Ripple Noise: ≦1mVrms/≦2mArms
- Transient Response Time: ≦100μs
- Load Function (CC, CV, CR Mode)
- Utilizes Hardware to Realize Over Voltage Protection/Over Current Protection/Over Temperature Protection
- Delay Function/Output Monitoring Function/Output Recorder Function
- Supports Setting Value, Measurement Value and Output Waveform Display
- Sequential Output Function and 8 Built-in Template Waveforms
- The Output Recorder Function Records the Output Voltage & Current Parameters With a Minimum Recording Interval of 1 Second
- Sequence/Delay/Recorder/Panel Setting Conditions Respectively Provide 10 Sets of Internal Storage Memory
- Intelligent Temperature-controlled Fan Effectively Reduces Noise
- Standard Interface: RS-232, USB, Ext I/O
- Optional Interface (Manufacturer Installed Only): LAN, GPIB+LAN

GW INSTEK
Simply Reliable

Meet Your Necessity of High Resolution in Single Channel Measurement

GPP programmable DC power supply series incorporates two 360W models, namely the 36V/10A GPP-3610H and the 72V/5A GPP-7250. GPP-3610H provides high programming resolution (1mV/0.2mA) and readback resolution (0.1mV/0.2mA); GPP-7250 provides high programming resolution (2mV/0.1mA) and readback resolution (0.1mV/0.1mA), and the best low ripple noise characteristics ≦1mVrms (5Hz~ 1MHz)/≦2mArms and output transient recovery capability≦100μs.

GPP-3610H and GPP-7250 provide a variety of display modes, including channel setting values, measurement values, and waveform display. Using the output monitoring function of the GPP-Series, users can set monitoring conditions according to their needs, generate an alarm or stop output during the measurement process, stop the measurement and protect the customer's DUT. The GPP series provides an output recorder function, the voltage/current of the output process can be recorded in the internal memory, and the results can be saved as (*.REC) or (*.CSV) file and transferred to a USB. The saved *.CSV can be later exported into Excel for analysis.

GPP-3610H and GPP-7250 are designed with a load function of up to 100W. The GPP-3610H provides 36V/10A power output, and has built-in maximum 36.5V constant voltage load (CV), maximum 10.2A constant current load (CC) and maximum 1kΩ constant resistance load (CR) functions. GPP -7250 provides 72V/5A power output, and has built-in maximum 72.5V constant voltage load (CV), maximum 5.2A constant current load (CC) and maximum 1kΩ constant resistance load (CR) functions

The output of GPP-3610H and GPP-7250 provides the sequence output function, which not only allows users to edit the power output waveform, but also allows users to set a sequence of constant voltage (CV) or constant current (CC) load waveform. For example, sequential power output or dynamic load simulation testing. In order to simplify the settings of waveform editing, the GPP-Series has 8 built-in waveforms in the templet waveform from the sequence output function, including Sine, Pulse, Ramp, Stair Up, Stair Dn, Stair UpDn, Exp Rise, Exp Fall waveforms, providing users to apply for output directly.

The complete protection functions comprise OVP, OCP, OPP, and OTP. The protection mechanism of OVP, OCP, and OTP is implemented by hardware circuits. Compared with competitors that use software to implement protection, it has the advantage of fast response time. The OVP and OCP functions allow users to set the protection action point based on the conditions of the DUT. OPP only protects the operation of the load function. The delay function can set the length of time during which the power output is on or off.

In addition, the Trigger In/Trigger Out function can synchronize external devices. The intelligent temperature-controlled fan can adjust the speed according to the temperature of the power transistor to reduce unnecessary noise. The output value setting and Sequence/Delay/Recorder functions respectively provide 10 sets of internal storage memory, and can be exported/stored using a USB. In addition to standard RS-232 and USB remote interfaces, GPP-3610H and GPP-7250 also have optional LAN or LAN+GPIB interfaces to meet different user needs.

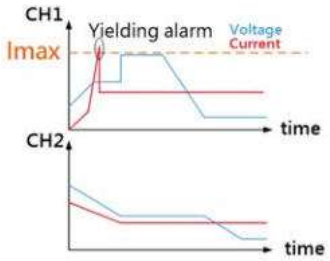



GPP-3610H




GPP-7250

A. OUTPUT MONITORING FUNCTION



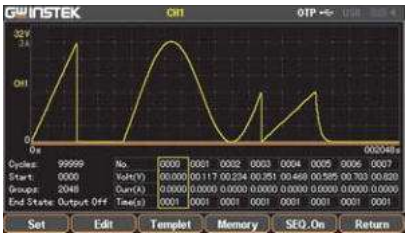
Output Monitoring



Monitoring Function Setting

The output monitoring function allows users to set the monitoring conditions according to the requirements, including voltage, current, and power greater than or less than the setting and the logical relationship of AND, OR. It also allows users to sound alarms or stop the output during the measurement process, stop the measurement, and protect the customer's DUT.

B. SEQUENCE OUTPUT FUNCTION

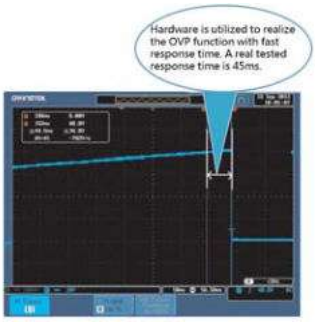


Output Waveform of the GPP-Series

GPP-3610H and GPP-7250 provide the sequence output function, which not only allows users to edit the power output waveform, but also allows users to set a sequence of constant voltage (CV) or constant current (CC) load waveform for instance, a serial power output or a simulation test of a dynamic load. The sequence editing point can set up to 2048 steps, and the interval time of each step can be set from 1 to 300 seconds. In order to simplify the settings of waveform editing, the GPP series has 8 built-in waveforms in the templet waveform in the sequence output function, including Sine, Pulse, Ramp, Stair Up, Stair Dn, Stair UpDn, Exp Rise, Exp Fall waveforms for users to apply output directly.

The edited data output by sequence can be stored in the instrument's internal 10 sets of memory, or can be accessed using a USB flash drive (Save/Recall) and saved as *.SEQ or *.CSV file. The saved *.CSV can be exported to Excel for editing and analysis. The edited files can be uploaded (Save/Recall) into the instrument using a USB flash drive.

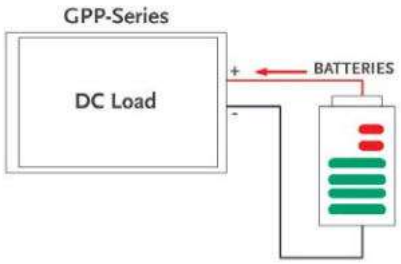
C. HARDWARE PROTECTION FUNCTION(OVP/OCP/OTP)



OVP Trigger

The protection mechanism of OVP/OCP/OTP is implemented by hardware circuit, which has the advantage of faster response time than competitors who use software to achieve protection. When it is detected that the voltage of the DUT exceeds the setting value of the OVP, the output of the power supply can be stopped in a short time to achieve the purpose of protecting the DUT.

D. LOAD FUNCTION

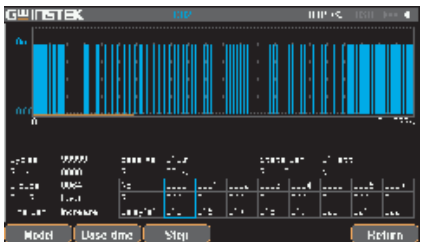


GPP-Series Application

GPP-3610H and GPP-7250 are designed with a load function of up to 100W. GPP-3610H has built-in maximum 36.5V constant voltage load (CV), maximum 10.2A constant current load (CC) and maximum 1kΩ constant resistance load (CR) functions.

GPP-7250 has built-in maximum 72.5V constant voltage load (CV), maximum 5.2A constant current load (CC) and maximum 1kΩ constant resistance load (CR) functions, so users can perform discharge tests without using an additional electronic load.

E. OUTPUT DELAY FUNCTION

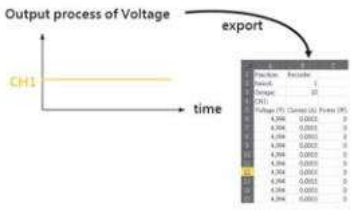


GPP-Series Delayed Waveform

Output delay function (Delay) allows users to edit the power output on/off timing waveform while the front panel voltage and current settings remain unchanged. In order to simplify the settings of waveform editing, the GPP series has 3 built-in timing modes in the delay output function in a standalone instrument, including Fixtime, Increase, and Decline, for users to apply directly.

The edited data output by output delay can be stored in the instrument's internal 10 sets of memory, or can be accessed using a USB flash drive (Save/Recall) and saved as *.DLY or *.CSV file. The saved *.CSV can be exported to Excel for editing and analysis. The edited files can be uploaded (Save/Recall) into the instrument using a USB flash drive.

F. OUTPUT RECORDER FUNCTION



Schematic Diagram for Recorder Function



Recorder Function Setting



Save as*.REC

The output recorder function records the voltage & current parameters of the output process. The recording interval of each point can be set according to user's requirements, and the shortest interval is 1 second and the longest is 300 seconds. The results can be stored in *.REC or *.CSV format to the power supply or directly saved in a USB flash drive. The stored *.CSV can be exported into Excel to conduct the future analysis. (*.REC can record up to 2018 lots, *.CSV can record up to 614400 lots)

PANEL INTRODUCTION

CE | RS-232 | GPIB | USB | LAN | Ext I/O



1. LCD Display
2. Number Pad
3. Function Keys
4. Output Buttons
5. USB Host
6. Front Panel Output Terminals
7. Power Button
8. AC Selector Switch
9. AC Input Socket and Line Fuse
10. RS-232 Port
11. USB Device Port
12. Ext I/O Port
13. GPIB Port
14. LAN Port
15. Rear Output Terminals

GRA-449-J Rack Mount Kit (JIS)



GRA-449-E Rack Mount Kit (EIA)



OUTPUT FUNCTION LIST

Model	GPP-7250/3610H
Functions	CH1
Sequence Output Function	✓
Load Functions (CC, CV, CR mode)	✓
Output Delay Function	✓
Output Monitoring Function (10 sets)	✓
Output Recorder Function	✓
Panel Save/Recall	✓

OPERATING RANGE

Model	Number of Output	CH1
GPP-3610H	1	0-36V/0-10A
GPP-7250	1	0-72V/0-5A

SPECIFICATIONS

		GPP-3610H	GPP-7250
OUTPUT MODE			
Number of Channel		CH1	CH1
Voltage		0 ~ 36.000V	0 ~ 72.000V
Current		0 ~ 10.0000A	0 ~ 5.0000A
Constant Voltage Operation			
Line Regulation		≤ 0.01% + 3mV	
Load Regulation		≤ 0.01% + 5mV	
Ripple & Noise (5Hz-1MHz)		≤2mVrms	
Transient Recovery Time		≤100μs (50% load change，minimum load	
Temperature Coefficient		≤ 300ppm/°C	
CONSTANT CURRENT OPERATION			
Line Regulation		≤ 0.01% + 3mA	
Load Regulation		≤ 0.01% + 3mA	
Ripple & Noise		≤ 2mArms	
RESOLUTION			
Programming	Voltage/Current	1mV / 0.2mA	2mV / 0.1mA
Reedback	Voltage/Current	0.1mV / 0.2mA	0.1mV / 0.1mA
METER			
Full Scale	Voltage/Current	36.5000V / 10.2000A	72.5000V / 5.2000A
Programming Resolution	Voltage/Current	5 digits / 6 digits	
Reedback Resolution	Voltage/Current	6 digits / 6 digits	
Setting Accuracy	Voltage	± (0.03% of reading + 10mV)	
	Current	± (0.3% of reading + 10mA)	
Readback Accuracy	Voltage	± (0.03% of reading + 10mV)	
	Current	± (0.3% of reading + 10mA)	
DC LOAD MODE			
Display	Voltage	1 ~ 36.50V	1 ~ 72.50V
	Current	0 ~ 10.200A	0 ~ 5.200A
	Power	0 ~ 100.00W	0 ~ 100.00W
CV Mode	CH1/CH2	1.500V ~ 36.50V	1.500V ~ 72.50V
	Setting/Reedback Accuracy	≤±(0.1% + 30mV)	≤±(0.1% + 30mV)
	Resoltion	10mV	10mV
CC Mode	CH1/CH2	0 ~ 10.200A	0 ~ 5.200A
	Setting/Reedback Accuracy	≤±(0.3% + 10mA)	≤±(0.3% + 10mA)
	Resoltion	1mA	1mA
CR Mode	CH1/CH2	1Ω ~ 1kΩ	1Ω ~ 1kΩ
	Setting/Reedback Accuracy	≤±(3% + 1Ω)	≤±(3% + 1Ω)
		(voltage≥0.1V, and current≥0.1A)	(voltage≥0.1V, and current≥0.1A)
	Resoltion	1Ω	1Ω
PROTECTION			
OVP	Power Mode	OFF,ON(0.5V ~ 38.0V)	OFF,ON(0.5V ~ 75.0V)
	Load Mode	OFF,ON(1.5V ~ 38.0V)	OFF,ON(1.5V ~ 75.0V)
	Setting Accuracy	±100mV	
	Resoltion	100mV	
OCP	Power Mode	OFF,ON(0.05A ~ 10.5A)	OFF,ON(0.05A ~ 5.50A)
	Load Mode	OFF,ON(0.05A ~ 10.5A)	OFF,ON(0.05A ~ 5.50A)
	Setting Accuracy	±20mA	
	Resoltion	10mA	
Insulation Resistance		Between chassis and terminal : 20MΩ or above (DC 500V)	
		Between chassis and DC power cord : 30MΩ or above (DC 500V)	
GENERAL			
Operation Environment		Indoor use, Altitude: ≤ 2000m	
		Ambient temperature: 0 ~ 40°C / Relative humidity: ≤ 80%	
		Installation category: II / Pollution degree: 2	
Storage Environment		TEMPERATURE: -10°C ~ 70°C / HUMIDITY: ≤70%	
Power Input		AC 100V/120V/220V/230V±10%, 50/60Hz	
Power Consumption		900VA, 680W	
Dimensions & Weight		213 (W) x 145 (H) x 362 (D) mm ; Approx. 10kg	

Specifications subject to change without notice. GPP-3610H7250GD1BH_202311

ORDERING INFORMATION

GPP-3610H **36V/10A Single Channel Programmable DC Power Supply**
GPP-7250 **72V/5A Single Channel Programmable DC Power Supply**

ACCESSORIES

Power Cord ; Test Lead : GTL-104A x 1, GTL-105A x 1

OPTIONAL ACCESSORIES

GTL-246 USB Cable
GRA-449-E Rack Mount Kit (EIA)
GRA-449-J Rack Mount Kit (JIS)

INTERFACE

Optional(manufacturer installed only): LAN Interface;
GPIB+LAN Interface

GOOD WILL INSTRUMENT CO., LTD.
No.7-1, Jhongsing Road, Tucheng Dist., New Taipei City 236, Taiwan
T +886-2-2268-0389 **F** +886-2-2268-0639
E-mail: marketing@goodwill.com.tw

Website Facebook LinkedIn

GW INSTEK
Simply Reliable