

Programmable DC Electronic Load

C. TH8300 Series Programmable DC Electronic Load

Features

- High resolution: 0.1mV/10μA
- Up to 50kHz dynamic frequency
- Up to 500kHz sampling speed
- 12 advanced test functions
- Modular design, support each module to operate independently
- One single machine can support up to five modules in parallel and support up to ten channels
- The maximum power of the whole machine is 2000W, and the online maximum current is 400A
- The maximum power of the module is 400W, the maximum current is 80A and the maximum voltage is 600V
- Connect via CAN interface, support up to four complete machines online
- 24-bit color 2.8-inch color LCD display
- Chinese and English operation interface
- Smart fan system
- Support power-on hold function
- Support timing function
- Electrical isolation, external input and output
- Support over current protection (OCP), over voltage protection (OVP), over power protection (OPP), over temperature protection (OTP), reverse polarity protection (REV), low voltage protection (LVP)



- Standard RS232 USB HOST USB DEVICE GPIB
- SYSTEM I/O LAN CAN

Dimension(mm): 477mm(W)x177mm(H)x590mm(D) Weight: 15kg
 Dimension(mm): 142mm(W)x85.5mm(H)x550mm(D) Weight: 4.2kg

Application

- Power supply
Chargers, switching power supplies, communication power supplies, LED drivers, mobile phone batteries, power banks, etc.
- New energy
Solar cells, new power cars, electric bicycles
- Electronic power components
Fuse/connector/relay/sensor
- Automation equipment integration test

Specifications

Main machine	TH8300 frame												
Supported modules	5												
Interface	RS232、USB HOST、USB DEVICE、LAN、GPIB、SYSTEM I/O、CAN												
Module													
Model	TH8301-80-20			TH8302-80-40			TH8303-80-60			TH8304-80-80			
Power	100W×2			200W×1			300W×1			400W×1			
Voltage	0-80V			0-80V			0-80V			0-80V			
Current	0-20A			0-40A			0-60A			0-80A			
Normal mode	Constant current (CC), constant resistance (CR), constant voltage (CV), constant power (CP)												
Constant voltage	Range	6V			16V			80V					
	Resolution	0.1mV			1mV			1mV					
	Accuracy	0.05%+0.1%FS											
Constant current	Range	0-0.2A	0-2A	0-20A	0-0.4A	0-4A	0-40A	0-0.6A	0-6A	0-60A	0-0.8A	0-8A	0-80A
	Resolution	0.01mA	0.1mA	1mA	0.01mA	0.1mA	1mA	0.01mA	0.1mA	1mA	0.01mA	0.1mA	1mA
	Accuracy	0.1%+0.1%FS											
Constant resistance	Range	0.04-80Ω	1.44-2.9kΩ	5.76-12kΩ	0.02-40Ω	0.8-1.5kΩ	3-6kΩ	0.015-30Ω	0.3-600Ω	1.5-3kΩ	0.01-20Ω	0.36-720Ω	1.45-2.9kΩ
	Resolution	100W/6V	100W/16V	100W/80V	200W/6V	200W/16V	200W/80V	300W/6V	300W/16V	300W/80V	400W/6V	400W/16V	400W/80V
	Accuracy	0.1Ω											
Constant power	Range	0-2W	0-10W	0-100W	0-4W	0-20W	0-200W	0-6W	0-30W	0-300W	0-8W	0-40W	0-400W
	Resolution	1mW	10mW	100mW	2mW	20mW	200mW	3mW	30mW	300mW	4mW	40mW	400mW
	Accuracy	1%											
Advanced mode	dynamic test, dynamic frequency scan, CR-LED test, battery test, time test, MPPT test, OCPT test, OVPT test, OPPT test, sine wave test, list test, automatic test												
Dynamic mode-constant current mode													
Frequency range	100Hz-50kHz/0.01Hz-1kHz												
Accuracy	1μs/1ms+100ppm												
Measurement (read back)													
Voltage	Range	0-6V			0-16V			0-80V					
	Resolution	0.2mV			0.3mV			1.4mV					
	Accuracy	0.025%+0.01%FS											
Current	Range	0-0.2A	0-2A	0-20A	0-0.4A	0-4A	0-40A	0-0.6A	0-6A	0-60A	0-0.8A	0-8A	0-80A
	Resolution	0.004mA	0.04mA	0.4mA	0.008mA	0.08mA	0.8mA	0.012mA	0.12mA	1.2mA	0.016mA	0.16mA	1.6mA
	Accuracy	0.05%+0.05%FS											
Protection function	Over voltage protection (OVP) Over current protection (OCP) Over power protection (OPP) Over temperature protection (OTP)												
Storage	40groups												