

Data sheet

DC Electronic Load

Model 8540



The 8540 DC electronic load is a very compact, economically priced instrument that is at home on both the bench and the production floor.

Though this is a DC load in a small package, it can reliably test a 5 volt power supply to 30 amps and do it continuously.

The 8540 DC electronic load can operate in CC, CV or CR mode while voltage/current or resistance/power values are measured and displayed in real time, making it well suited to test a variety of DC power sources.

The 8540's performance is comparable to most full size bench DC loads, yet it does the job at half the price and takes up half the space on your bench.

Features & Benefits

- Operates between 0-60 VDC, 1 mA-30 A (150 W maximum)
- Easy operation
- Bright, easy-to-read display
- Very compact and light weight
- Two current ranges: 3 A (1 mA resolution) and 30 A (10 mA resolution)
- Constant current (CC), constant resistance (CR) and constant voltage (CV) operation
- Over-current and over-voltage protection
- Short mode to simulate shorts
- Save up to 400 instrument settings

Specifications	8540		
Input Rating (0-40 °C)	Voltage	Current	Power
	0-60 V	1 mA-30 A	150 W
Load Regulation	Range	Accuracy	Resolution
	0-10 V	$\pm(0.05\%+0.1\%FS)$	1 mV
	0-60 V	$\pm(0.05\%+0.1\%FS)$	10 mV
	0-3 A	$\pm(0.1\%+0.1\%FS)$	1 mA
CV Mode Regulation	0-30 A	$\pm(0.1\%+0.15\%FS)$	10 mA
	0.1-60 V	$\pm(0.05\%+0.1\%FS)$	10 mV
CC Mode Regulation	0-3 A	$\pm(0.1\%+0.1\%FS)$	1 mA
	0-30 A	$\pm(0.1\%+0.15\%FS)$	10 mA
CR Mode Regulation	0.1-10 Ω	$\pm(1\%+0.8\%FS)$	0.001 Ω
	10-99 Ω	$\pm(1\%+0.8\%FS)$	0.01 Ω
	100-999 Ω	$\pm(1\%+0.8\%FS)$	1 Ω
	1-4 k Ω	$\pm(1\%+10\%FS)$	1 Ω
Current Measurement	0-3 A	$\pm(0.1\%+0.1\%FS)$	1 mA
	0-30 A	$\pm(0.1\%+0.15\%FS)$	10 mA
Voltage Measurement	0-10 V	$\pm(0.05\%+0.1\%FS)$	1 mV
	0-60 V	$\pm(0.05\%+0.1\%FS)$	10 mV
Power Measurement	0-10 W	$\pm(1\%+0.5\%FS)$	1 mW
	10-99 W	$\pm(1\%+0.5\%FS)$	10 mW
	100-150 W	$\pm(1\%+0.5\%FS)$	100 mW
Dimensions (W x H x D)	3.5" x 6.9" x 11.10" (88 x 175 x 282 mm)		
AC Input	198~242V or 99~121V, Frequency: 47~63Hz		
Weight	6 Lbs. (2.7 kg)		
One-Year Warranty			
Included Accessories	User Manual, Power Cord		