

Model 2281S-20-6 Precision DC Supply and Battery Simulator



- Precision power source
- Battery test
- Battery simulator

Tektronix introduces Model 2281S-20-6 Battery Simulator. The Series 2281S single channel, precision DC supply and battery simulator innovatively integrates the functions of high-precision power supply, battery test, and battery simulation. It is able to analyze the DC consumption of a device under test, test a battery and generate a battery model based on battery charging process, and simulate a battery based on the battery model.

Key features:

The 2281S has three basic functions: high performance power supply, battery test, and battery simulation

As a high performance power supply with DMM-quality accuracy:

- Output up to 120W of low noise, linear regulated power
- Monitor load currents from 100nA to 6A with high accuracy
- Measure voltage and current with 6½-digit measurement resolution
- Fast current measurements to test or study load current pulses as narrow as 140 µs
- Built-in graphing/web page simplifies analyzing trends/automated control and monitoring



Power consumption test

As a battery test instrument:

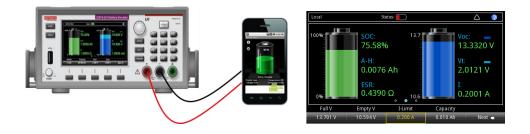
- Battery capacity test with charging/discharging functions
- Log battery charge/discharge process and data (V, I, ESR and Amp-Hour information)
- Build up battery model based on battery test result
- Customize your own battery models by editing existing models or creating a new one



Battery test

As a battery simulator:

- Simulate a real battery based on a selected battery model
- Two operation modes: Static and dynamic simulation mode
- Intuitive way to show battery capacity and battery voltage on home screen



Battery simulation

Key Specifications of 2281S are shown in below table:

Specification	2281S-20-6	
Numbers of output	1	
Max Output Voltage	20 V	
Max Output Current	6 A	
Max Sink Current	1A	
Maximum Power	120 W	
Ripple & Noise (20~20MHz)	5 mVpp/1 mVrms	
Programming resolution (V)	1 mV	
Programming resolution (I)	0.1 mA	
Programming accuracy (V) (at 25°C)	±(0.02% +3 mV)	
Programming accuracy (I) (at 25°C)	±(0.05% +5 mA)	
Meter resolution (V)	0.1 mV	
Meter resolution (I)	Range	Resolution
	10 mA	10 nA
	100 mA	100 nA
	1 A	1 uA
	10 A	10 uA
Meter accuracy (V) (at 25°C)	±(0.02% +2 mV)	
Meter resolution (I) (at 25°C)	Range	Resolution
	10 mA	±(0.04% +10 uA)
	100 mA	±(0.04% +10 uA)
	1 A	±(0.04% +250 uA)
	10 A	±(0.05% +250 uA)
Control modes	CV, CC	
Display	4.3" TFT LCD Display	
Memories for Test Scripts	9	
Connectivity	USB/LAN-LXI/ GPIB	
Power Source	100 – 240 VAC; 47~63 Hz	
Warranty	3-year	