SPS5000X Series wide range programmable Switching DC Power Supply release

July 01, 2021

SIGLENT Technologies increase its offering to address the Power Electronics Market

Power electronics has grown in importance in the recent years. The right test equipment technology plays a critical role in the development and optimization of modern designs. Power supplies are part of the standard equipment in the laboratory and in production. In order to be able to cover applications that demand higher power, Siglent is introducing a new series of switched-mode power supplies with a maximum output power of 1080 watts. The versatile new SPS5000X series offers high power density, lower weight and a large power range.

June 2021: SIGLENT Technologies presents its new series of programmable DC switching power supplies. The SIGLENT SPS5000X series are powerful and flexible DC power sources with excellent load control properties. The right model can be selected from ten different combinations of voltage and current to suit the application requirements. In addition to the single-channel devices, there are 2 and 3 channel models to choose from. The series is divided into three performance-classes 360, 720 and 1080 W. The maximum output current can be up to 90 A, the maximum output voltage 160 V. A special feature of the power supply units is a parallel mode which can delivery maximum output power of up to 3240 W.

All models are equipped with a bright and easy-to-read 2.4-inch OLED display. The integrated web server enables the devices to be configured quickly and easily using the web interface, without the need to install any software

The SPS5000X series is more flexible than conventional power supplies, whose output power curve is typically rectangular and whose maximum power is limited by the voltage or current settings. The new source from Siglent can automatically adjust the voltage and current output in constant power mode. With this it covers a larger output range. The integrated list function supports up to 50 individual steps for the sequenced output of voltage or current patterns. In addition to the dwell time and the slope, each step can also be programmed with a user-defined switch-on delay. (Keyword: power sequencing). The lists can be created on the control panel, in the web interface or by importing list sequence files in CSV format (USB storage device, web interface).

There is also a priority mode for current and voltage. In “current mode”, possible inrush current overshoots are limited to protect the test object. In “voltage mode” the priority is to reach the set output voltage as

quickly as possible. Another very useful feature is the device's adjustable output resistance. If the device is used to test battery-operated products, it can be used to examine the behavior of the DUT when it ages or when different types of batteries are used.

In addition to the common protection modes such as over-voltage, over-current, over-temperature and maximum power limit, an internal discharge circuit has been implemented as a further safety function. With this, all remaining charge on the output are discharged through an internal capacitance in a defined manner. This feature can also be used to accelerate this process in the event of a down step of the output voltages.

In summary, the new series of switched-mode power supplies scores with its wide output power range, versatile and flexible output capabilities, as well as simple and intuitive user interface. The signature SIGLENT value rounds out this new series nicely.

About:

SIGLENT TECHNOLOGIES started in 2002 with the development of their first oscilloscope. Now, the portfolio has rapidly expanded to cover many areas of general purpose test instrumentation, including oscilloscopes, signal and function generators, digital multimeters, lab power supplies, electronic DC-Loads, spectrum analyzers and RF-signal generators.

Today SIGLENT TECHNOLOGIES is a global leader producing electronic test and measurement equipment that combines innovative features and functionality with a strong commitment to quality and performance. SIGLENT is ISO 9001:2000 and ISO 14001:2004 certified for its product quality and environmental management programs.

North American Headquarters

SIGLENT Technologies America, Inc
6557 Cochran Rd Solon, Ohio 44139
Tel: 440-398-5800
Toll Free:877-515-5551
Fax: 440-399-1211
info@siglent.com
www.siglentamerica.com/

European Sales Offices

SIGLENT TECHNOLOGIES EUROPE GmbH
Staetzlinger Str. 70
86165 Augsburg, Germany
Tel: +49(0)-821-666 0 111 0
Fax: +49(0)-821-666 0 111 22
info-eu@siglent.com
www.siglenteu.com

Asian Headquarters

SIGLENT TECHNOLOGIES CO., LTD.
Blog No.4 & No.5, Antongda Industrial Zone,
3rd Liuxian Road, Bao'an District,
Shenzhen, 518101, China.
Tel:+ 86 755 3661 5186
Fax:+ 86 755 3359 1582
sales@siglent.com
www.siglent.com/ens