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## **CSI530S**

# **REGULATED DC POWER SUPPLY**

## **Users Manual**

**Circuit Specialists, Inc.**

Made in China

Thanks for using our products, please read this manual thoroughly before operation.

## GENERAL

This power supply is a regulated DC power supply which you can adjust the current and the voltage continuously. An LED display is used to show the current and voltage values. The output terminals are safe 4mm banana jacks.

This power supply can be used in electronic circuits such as operational amplifiers, digital logic circuits and so on. Users include researchers, technicians, teachers and electronics enthusiasts.

A 3 ½ digit LED is used to display the voltage and current values.

- 1) the voltage display accuracy: LED  $\pm 1\%$
- 2) the current display accuracy: LED  $\pm 1\%$

## SPECIFICATIONS

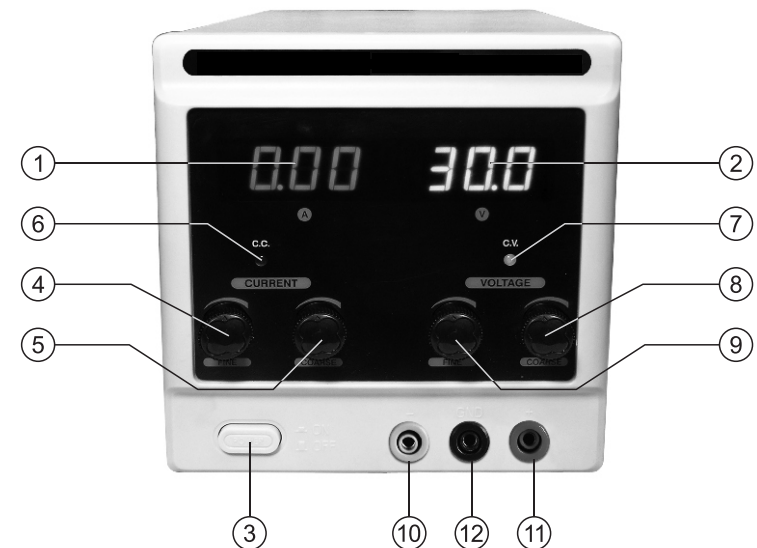
- Model: CSI530S
- Input voltage: 110V  $\pm 10\%$
- Frequency range: 60Hz
- Input current: 3A
- Output: DC 0~30V, 0~5A
- Voltage regulation
  - (C.V.):  $\leq 3\text{mV}$
  - (C.C.):  $\leq 15\text{mA}$
- Ripple:  $< 3\text{mVrms}$
- Operating temperature:  $+0^{\circ}\text{C} \sim +40^{\circ}\text{C}$
- Storage temperature:  $-20^{\circ}\text{C} \sim +80^{\circ}\text{C}$
- Storage and operating humidity:  $\leq 80\%\text{RH}$
- Altitude:  $\leq 2000\text{m}$
- Pollution Degree: 2
- Dimensions: 260(L)x150(W)x160(H)mm
- Net weight: 5.3kg
- Gross weight: 6kg

## FEATURES

- Voltage and current adjustable outputs.
- One display for adjusted voltage and current.
- Over voltage protection.
- Short circuit protection.
- Over temperature protection.

## THE INSTRUCTION OF THE FRONT PANEL

- |   |                                     |
|---|-------------------------------------|
| (1) <b>Current meter:</b> displays output current value | (7) Constant voltage mode indicator |
| (2) <b>Voltage meter:</b> displays output voltage value | (8) Output voltage coarse knob      |
| (3) <b>Power switch:</b> control the power              | (9) Output voltage fine knob        |
| (4) Output current coarse knob                          | (10) Power output “-” terminal      |
| (5) Output current fine knob                            | (11) Output “+” terminal            |
| (6) Constant current mode indicator                     | (12) Ground (Earth terminal)        |



The CSI530S front panel

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## OPERATIONS

1. Ensure that the power plug of this unit is connected to a 110V AC power outlet before using, switch the power ON, and adjust the (8)~(9) knobs to set the voltage to the desired value, and then plug your output cords into the output terminals (10)~(11), now the current meter (1) will show the current value.
2. Setting of current limiting.
  - ⌋ Use a short-circuit wire to short the current terminals (+) to (-).
  - ⌋ Adjust the current knob until the CC indicator is on.
  - ⌋ Adjust the current knob to the desired value (4) & (5).
  - ⌋ Take off the short circuit wire.

## SAFETY DEVICE AND MAINTENANCE

1. You should keep this unit in a dry and well ventilated place after using. Disconnect the power cord if you will not use the unit for a long period of time.
2. Do not put device in a moist or wet environment.
3. This device is designed for indoor use only.
4. Do use in extreme temperatures, direct sunlight, extreme humidity, or wet environments.
5. Replace fuse only with the original value fuse, please avoid short circuit of fuse and holder. The fuse is located on the rear panel adjacent to the power cord receptacle.
6. Fuse rating is 5A @ 250VAC (5x20mm).

7. Do not block the ventilation holes in the rear and side panel, as this will increase the internal temperature.
8. Please keep this device out of the reach of small children.
9. Do not put any liquid near the unit to avoid short circuit.
10. Do not place the system near strong magnetic fields.
11. Before operation the system must be temperature stabilized to avoid condensation.
12. Opening of the system and service must be performed by qualified service personal.
13. Ground the chassis by only using a three-contact AC power cable which must be plugged into an approved three-contact electrical outlet, and do not attempt to defeat the ground wire connection or float the device, to do so may pose a great safety hazard.
14. Clean and recalibrate the equipment on a regular basis to keep the equipment looking nice and working well.
15. Remove dirt & dust on the outside cover with a dry cloth whenever it becomes noticeable.
16. If the equipment ever becomes inoperative or damaged, refer servicing to a qualified repair facility.
17. Pay attention to warning-signs printed on the unit.



**Protective ground terminal**  
**Only connect this unit to a socket with grounded neutral conductor.**

## ACCESSORIES

- This instrument is supplied with the following accessories:
- ⌋ Power cable ..... 1pcs
  - ⌋ Operation manual ..... 1pcs