

High-performance, electrometer calibration standard for use with the Keithley 6517 and others.

Resistances and capacitance values as specified in the Keithley Service Manual for current range and coulombs verification.

Replacement for the Keithley 5156.

Features:

- 4 resistance standards
100 MΩ to 100 GΩ
- 1 nF and 100 nF capacitors for charge calibration
- Accuracy: 1%
- Accredited calibration certificate



SCR-5156

The SCR-5156-IET contains 4 resistors and 2 capacitors as recommended in the Keithley 6517 Service Manual for current and coulombs verification.

The metal housing provides shielding from noise and a shorting link is provided to connect guard and ground when required.

The output of the SCR-5156-IET is a triaxial connector for direct connection to the Keithley 6517.

There are 6 bnc connectors for each of the internal standards.

The calibrated value of each standard is located on the front panel.

Custom resistance values are available upon request

SPECIFICATIONS

| Nominal Value | Initial adjustment to nominal | Stability (ppm/yr) | Voltage coefficient (ppm/V) | Temperature coefficient (ppm/°C) | Resistor type |
|---------------|-------------------------------|--------------------|-----------------------------|----------------------------------|---------------|
| 100 MΩ | 1% | 100 | 1 | ±35 | Thick-film |
| 1 GΩ | | 100 | 1 | ±35 | |
| 10 GΩ | | 500 | 2 | ±50 | |
| 100 GΩ | | 500 | 5 | ±50 | |
| 1 nF | | 300 | 5 | ±50 | Polystyrene |
| 100 nF | | 300 | 5 | ±50 | MPP |

Calibrated Values:

23°C; traceable to SI with measurement uncertainties

Capacitance is calibrated at 1 kHz, 15 Vac

Maximum Input Voltage:

500 Vpk

Terminals:

6 bnc connectors for standard values
One triaxial output which is common for all 6 standards
One five-way binding post for guard with shorting link for connection to ground, and one ground post electrically connected to case

Environmental:

Operating 23°C ± 3°C
Humidity: 30 to 60 % RH non-condensing

Dimensions:

20 cm W x 11 cm H x 5.7 cm D (7.55" W x 4.38" H x 2.24" D)

Weight:

2.4 kg (3.5 lbs), nominal

ORDERING INFORMATION

SCR-5156-IET Electrometer Calibration Standard

Includes:
Instruction Manual
SCR-5156-200 Cable, 3 Lug Triaxial to 3 Lug Triaxial, 5'
SCR-5156-300 Short, BNC
Accredited Calibration Certificate Traceable to SI



IET LABS, INC. in the **GenRad** Tradition
Long Island, NY 11590

www.ietlabs.com
TEL: (516) 334-5959 • (800) 899-8438 • FAX: (516) 334-5988
SCR-5156-IET Datasheet Sept. 2018