

Voltage Sensor CV100-1000/SP1

The CV100-1000/SP1 voltage sensor adopts high-performance imported Hall elements and utilizes the magnetic compensation principle to achieve electrically isolated measurement of DC, AC, or pulsed voltages. The output current is proportional to the measured voltage, ensuring excellent accuracy, linearity, and long-term stability.

Parameters

Electrical Specifications

- Rated Voltage Input: $\pm 1000\text{V}$
- Measurement Range: : $0 \sim \pm 1200\text{V}$
- Overload Capacity: $\pm 1500\text{V}$ 3min/h
- Rated Output: $\pm 40\text{mA}$
- Supply Voltage: $\pm 12 \sim \pm 24\text{VDC}$ ($\pm 5\%$)
- Measurement Resistance: 150Ω (@ $\pm 15\text{V}$, U_N)
- Current Consumption: 15mA (no-load) + output current
- Dielectric Strength: $6\text{kVrms}/50\text{Hz}/1\text{min}$

Accuracy & Dynamic Performance

- Accuracy: $\pm 1\%$
- Non-Linearity: $\pm 0.1\%$
- Temperature Drift: $\leq \pm 0.3\text{mA}$
- Offset Current: $\leq \pm 0.3\text{mA}$
- Response Time: $\leq 100\mu\text{s}$

General Data

- Operating Temperature: $-40^{\circ}\text{C} \sim +85^{\circ}\text{C}$
- Storage Temperature: $-45^{\circ}\text{C} \sim +90^{\circ}\text{C}$
- Flame-retardant, self-extinguishing insulating plastic housing
- Connection Type: FASTON quick-connect tabs *3
- Mounting: Bottom mounting holes $\phi 6.5 \text{ mm} \times 2$, hole spacing 122 mm
- Weight: $\leq 600\text{g}$

Outline & Interface

