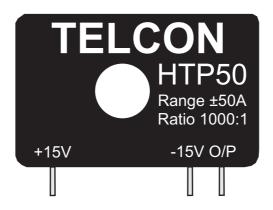


# Speciality Magnetic Components QUALIFIED to ISO 9001:2008

# PCB Mounting Hall Effect Current Transformer Type HTP50



The HTP50 is a closed loop Hall Effect Current Transformer suitable for measuring currents up to 50A. The product provides an output current into an external load resistance.

#### **Features**

- High Accuracy
- 3 kV Proof Stress
- Fast Response
- · Designed in Quality

## **Applications**

- Variable Speed Drives
- UPS Systems
- D.C. Power Supplies
- Low Frequency Current Measurement

#### **Benefits**

- · Galvanic Isolation
- Ease of assembly
- High Reliability
- Non Invasive
- Overcurrent Protection
- Robotics
- Frequency Inverters
- Power Factor Monitoring

### **TECHNICAL DATA**

**Nominal Primary Current** 

Turns Ratio

**Nominal Power Supply** 

±15V ±5% **Power Supply Current** 16mA per rail + output current

Minimum Load Resistance **Operating Temperature Range** Storage Temperature Range

75 Ω 0 to +70°C

-25°C to +85°C

50A

1000:1

#### **SPECIFICATION**

Linearity 0.1% of nominal primary current.

Limit of Linearity ± 80A peak value

**Overall Accuracy** 0.5% of nominal primary current Output Zero Adjustment <±200µA at primary current =0A

Zero Offset/Temperature <5µA/°C Zero Offset/Supply Variation <5µA/V Coil resistance 52 Ω

Bandwidth (-1dB) dc to 200kHz min.

di/dt following >200A/µs **Delay Time**  $0.1 \mu S$ dV/dt Immunity 10kV/µs

**Proof Stress Voltage** 3kV a.c., rms, 50Hz for 1 minute, bore to output terminals

#### **GENERAL DATA**

Weight 17g nominal

Housing Modified Polyphenylene Oxide Mounting Direct mounting to PCB by 3 pins

Signal Sense Positive output obtained when current flows in direction of arrow

**Conductor Temperature** The temperature of the primary conductor should not exceed

Conductor Position Optimum dynamic performance is achieved with a single

conductor filling the bore

#### DIMENSIONS

