Split-core Current Transducer/Sensor

Model JC10F50-V





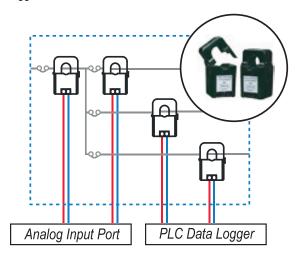
- + All-in one structure in a small size
- + Connect directly to PLCs
- + Sense motor stalls and short circuits
- + Industrial instrumentation
- + Process control loops
- + Phased fired-controlled heaters
- + UL, CSA, CE and RoHS available

OVERVIEW

The split-core current transducer, Model JC10F50-V, is designed for energy management with a convenient connection to electronic submetering. It may also be applied for current measurement in a system of distributed power line carriers (PLCs) or remote controls such as SCADA software for automation and supervision. Other applications include security and condition monitoring, load monitoring, protection systems, and predictive maintenance of conveyors, pumps, HVAC motors and more.

LOAD TREND MONITOR PER DISTRIBUTION PANEL

When a sensor outputing analog instrumentation signals in proportion to load current, is clamped directly onto the main or branch wiring of the distribution panel, direct input into analog port as PLC or data logger becomes available without a converter in the middle.



ORDERING INFORMATION

| MODEL NUMBER | DESCRIPTION |
|--------------|--------------------------------------|
| JC10F50-V | Split-Core Current Transducer/Sensor |

SPECIFICATIONS

| <u> </u> | |
|------------------------------|--|
| TECHNOLOGY | |
| Current Range (50/60 Hz) | 50 A RMS |
| Output Voltage | $0{\sim}5V$ DC (average) / 0 ${\sim}$ rated current, 7.5V DC limiter built-in |
| Maximum Allowable Current | 100% (continuous) 150% (1 min.) |
| Accuracy/Linearity | ± 2% FS. Dynamic range 1:100 (50/60 Hz sinewave) |
| Output Impedance | 6.2Κ Ω |
| Output Ripple Voltage | Within 5% of output voltage |
| Response Time | 300 ms |
| Insulation Resistance | DC500V / 100M Ω or more (between core and output terminals) |
| Dielectric Strength | AC 2000V / 1 min. (between core and output terminals) |
| MECHANICAL | |
| Sensing Aperture | 10mm (clamp-on type) |
| Latch/Unlatch | About 150 times |
| Output Terminals | 2 x M3-screw with terminal covers |
| Tightening Torque | 0.3 Nm |
| Weight | 45g (1.59 oz.) |
| ENVIRONMENTAL | |
| Operating Conditions | -20 \sim +50 $^{\circ}\text{C}$, ≤85% RH, No condensation, In-house & any direction installable |
| Storage Conditions | -30 \sim +90 °C, ≤85% RH, No condensation |
| | |

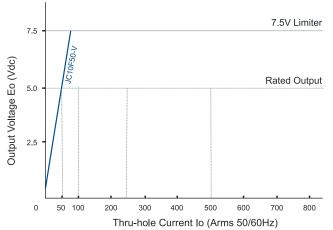
All product specifications are subject to change without notice. JC10F50-V_0517ds



Split-core Current Transducer/Sensor Model JC10F50-V

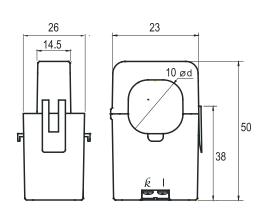


OUTPUT VOLTAGE DATA

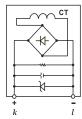


MECHANICAL

Unit = mm







CONNECTING THE LEAD WIRE

1.













3.





4.



8.



Cables & Cable Accessories

Mouser Electronics

Authorized Distributor

Click to View Pricing, Inventory, Delivery & Lifecycle Information:

B+B SmartWorx:

BB-JC10F50-V JC10F50-V