



Current probe P32 3000A / 1A

The P32 3000A / 1A current probe has been designed for use with multimeters, recorders, safety testers etc. for accurate non intrusive measurement of AC current. Using the latest transformer technology, the P32 3000A / 1A probe can measure currents from 30A to 3600A over a frequency range of 30Hz to 10kHz.



Electrical Characteristics

Current Range I_N	: 3000 A _{RMS}
Measuring Range.....	: 30 A to 3600 A _{RMS}
Output Sensitivity	: 0.333 mA / A
Load Impedance	: $\leq 10 \text{ Ohm}$
Conductor Position Sensitivity.....	: 0.5% @ 50Hz
Error due to adjacent conductor	: $\leq 6\text{mA} / \text{A}$ @ 50 Hz
Phase Shift at 2 kHz @ 10A	: 3°
Frequency Range	: 30 Hz to 10 kHz
Temperature Coefficient	: 0.01% / °C
Working Voltage (see Safety Standards section)	: 600 V AC _{RMS} or DC

Accuracy

Primary Current	30 to 100A	100 to 300A	300 to 1000A	1000 to 3600A
Accuracy (of rdg)	2.5% +2 mA	2.5%	1%	0.5%
Phase Error	Not specified	3°	1°	0.5°

General Characteristics

Maximum Conductor Size	: 82 mm diameter
Output Connection	: 4 mm socket
Operating Temperature Range	: -10 to +55 °C
Storage Temperature Range	: -40 to +70°C
Operating Humidity	: $\leq 85\%$
Weight.....	: 1900 g

Reference conditions: Temperature : +18°C to 26 °C, humidity: 20 to 75% RH, sinusoidal current: 48 to 65Hz, distortion factor: < 1%, DC current: none, DC magnetic field: 40 A/m earth's magnetic field, alternating magnetic field: none, proximity of external conductor: none, primary conductor: centred in the aperture, load impedance: $\leq 1\Omega$ for current output.

Safety Standards

IEC61010-1: 2010

IEC61010-2-032: 2012

IEC61010-2-031: 2008

600 V_{RMS}, Category III, Pollution Degree 2

Use of the probe on **uninsulated conductors** is limited to 600 V AC_{RMS} or DC and frequencies below 1 kHz.

EMC Standards

EN 61326 :1998

Dimensions

