

25 MHz Differential Probe

CT4066

Overview:

The CT4066 is an active differential probe with a high input impedance and low input capacitance. With a 25 MHz bandwidth, this probe is great for working on a wide variety of measurements ranging up to ± 700 V. The CT4066 is compatible with oscilloscopes from all major manufacturers.

Features:

- 25 MHz bandwidth (-3 dB)
- Up to ± 700 V (DC + AC peak)
- Attenuation 20x/50x/200x
- High accuracy ($\pm 2\%$)
- Power indicator LED
- Meets IEC 61010-1:2010 CAT II safety standard



Kit Contents:

- Differential Probe
- (2) Pincer clips
- (2) Alligator clips
- (2) Sheathed 4 mm banana plug test leads, silicone jacketed
- (1) Insulated BNC cable
- (1) 120 VAC power adapter (CT3957-NA)
- Optional: 220 VAC power adapter (CT3957-EU)

Technical data subject to change.

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All specifications apply to the unit after a temperature stabilization time of 20 minutes over an ambient temperature range of 25 °C ± 5 °C.

Electrical Characteristics

Bandwidth	25 MHz (50x and 200x attenuation) 15 MHz (20x attenuation)
Rise Time	14 ns for 50x and 200x 24 ns for 20x
Attenuation	20x / 50x / 200x
Accuracy	±2% *
AC CMRR	80 dB @ 60 Hz 60 dB @ 100 Hz 50 dB @ 1 MHz
Maximum Input Voltage (DC + AC peak)	±70 V / ±175 V / ±700 V
Maximum Differential Voltage (DC + AC peak)	±70 V / ±175 V / ±700 V
Absolute Maximum Input Voltage Each side to Ground (DC + AC peak)	±70 V / ±175 V / ±350 V
Input Impedance (Differential)	4 MΩ // 1.2 pF
Input Impedance (each side to ground)	2 MΩ // 2.3 pF
Output Voltage Swing	±7 V (driving 1 MΩ oscilloscope input)
Offset (typical)	±5 mV
Noise (typical)	2 mVrms
Source Impedance	50 Ω
Power Supply	9 V power adapter (included)

Mechanical Characteristics

Weight	250 g
Dimensions	195 x 55 x 30 mm
BNC Cable Length	100 cm
Input Leads Length	55 cm each

Environmental Characteristics

Operating Temp/Humidity	0°C to 50°C / 10% to 85% RH
Storage Temp/Humidity	-30°C to 70°C / 10% to 90% RH
Pollution Degree	Pollution Degree 2

Safety Specifications

IEC 61010-1 CAT II

* Accuracy based on DMM with 10 MΩ input impedance.

Specifications are subject to change without notice. To ensure the most current version of this manual, please download the current version from our website: caltestelectronics.com

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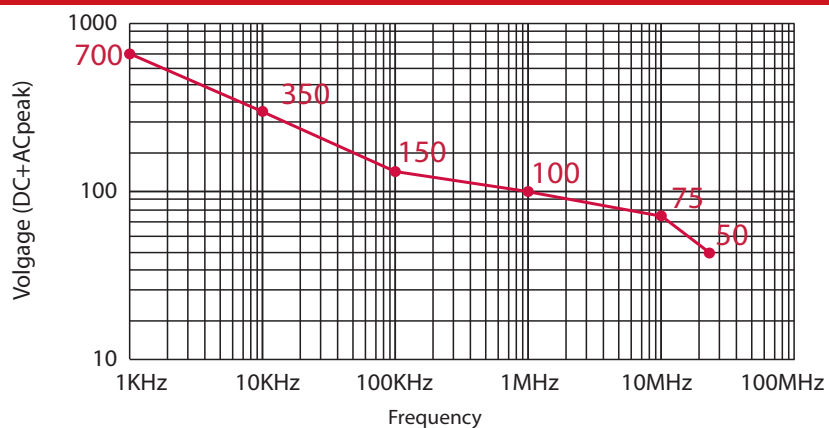
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Performance Data Plots

CT4066 Maximum Input Voltage Derating Curve



Derating Curve

