

TECHNICAL DATA

Fluke T6 Electrical Testers with FieldSense technology



Measure voltage...without test leads

Measure voltage up to 1000 V ac through the open fork, without test lead contact to live voltage.* Without opening covers or removing wire nuts. On wires up to AWG 4/0 (120 mm²), carrying as much as 200 A. It will change your job. Safer. Faster. Easier.

Product Highlights

- FieldSense technology for ac voltage, current and frequency measurement without making electrical contact to live voltage*
- Simultaneous voltage and current display (T6-1000)—shows all power supply measurements at a glance for efficient troubleshooting
- 1 to 1000 V ac or dc (T6-1000); 600 V ac or dc (T6-600)
- 0.1 to 200 A ac
- Resistance 1 Ω to 100 kΩ (T6-1000), 1 Ω to 2 kΩ (T6-600)
- Frequency measurement 45 Hz to 66 Hz (T6-1000)
- Works with wires up to AWG 4/0 (120 mm²) with a 17.8 mm jaw opening.
- HOLD button temporarily freezes the reading for easy viewing
- Easy to read display with backlight
- Accepts optional Fluke TPAK Magnetic Meter Hanger for convenient operation
- Standard two-year warranty; extendable to four years through product registration within 45 days of purchase*

+ Requires capacitive path to ground, provided through user in most applications. Ground connection via test lead may be required in some situations.

* Register product online within 45 days of purchase to extend warranty to four years. See <http://a.fluke.com/registration> for details.



Specifications

Measurement Specifications					
Function	Requires test leads	T6-600	T6-1000	Resolution	Accuracy ^[1]
		Range	Range		
FieldSense ac voltage	No	600 V	1000 V	1 V	$\pm(3\% + 3 \text{ counts})$ ^[2] ^[3] 45 Hz – 66 Hz
FieldSense ac current	No	200.0 A	200.0 A	0.1 A	$\pm(3\% + 3 \text{ counts})$ 45 Hz – 66 Hz
FieldSense frequency (Hz)	No		45 Hz – 66 Hz	1 Hz	$\pm(1\% + 2 \text{ counts})$ ^[3]
Volts ac	Yes	600 V	1000 V	1 V	$\pm(1.5\% + 2 \text{ counts})$ 45 Hz – 66 Hz
Volts dc	Yes	600 V	1000 V	1 V	$\pm(1\% + 2 \text{ counts})$
Resistance	Yes	2000 Ω	2000 Ω	1 Ω	$\pm(1\% + 2 \text{ counts})$
	Yes		20.00 k Ω	0.01 k Ω	$\pm(1\% + 2 \text{ counts})$
	Yes		100.0 k Ω	0.1 k Ω	$\pm(1\% + 2 \text{ counts})$
Safety (measurement category)		600 V CAT III	1000 V CAT III 600 V CAT IV		

Accuracy^[1]: $\pm ([\% \text{ of reading}] + [\text{number of least significant digits}])$. Accuracy is specified for 1 year after calibration, at 18 °C to 28 °C (64 °F to 82 °F) with relative humidity to 90 %. AC conversions are ac-coupled, RMS responding.

Accuracy^[2]: Add 3 % without an external ground connection. External ground connection required for user wearing insulated gloves, standing on an insulated ladder and otherwise insulated from earth ground.

Accuracy^[3]: FieldSense specified from 16V to 100% of range.

General Specifications

Calibration	1-year calibration cycle
Dimensions	61.1 mm x 259.3 mm x 43.8 mm
Weight	0.35 kg (0.78 lb)
Fork opening	17.8 mm
Temperature Operating:	-10 °C to +50 °C (14 °F to 122 °F)
Storage:	-30 °C to +60 °C (-22 °F to +140 °F)
Altitude Operating:	2,000 m (6,562 feet)
Storage:	10,000 m (32,808 feet)
Relative Humidity	0 % to 90 %, 5 °C to 30 °C (41 °F to 86 °F) 0 % to 75 %, 30 °C to 40 °C (86 °F to 104 °F) 0 % to 45 %, 40 °C to 50 °C (104 °F to 122 °F)
Battery Type and Life	2 x AA (IEC LR6); 360 hours continuous, typical; 200 hours using FieldSense
Temperature coefficient	0.1 x (specified accuracy) / °C for <18 °C or >28 °C (< 64.4 °F or > 82.4 °F)
Safety	IEC/EN 61010-1, IEC/EN 61010-2-033: Pollution Degree 2
Electromagnetic Environment	IEC/EN 61326-1: Portable



Ordering information

Fluke T6-600 Electrical Tester

Fluke T6-1000 Electrical Tester

Included with product

Attached test leads with removable 4 mm probe caps, user documentation

Optional accessories

H-T6 Belt Holster

TPAK Magnetic Hanger

PRV240FS Proving Unit

TP1 Probe Set, Flat-Blade (US/UK flat tip)

TP38 Probe set, round (EU)

AC285 SureGrip Alligator Clips

AC220 SureGrip Alligator Clips

Service Information Sheet, PN 686953

Fluke. *Keeping your world up and running.®*

Fluke Corporation

PO Box 9090, Everett, WA 98206 U.S.A.

Fluke Europe B.V.

PO Box 1186, 5602 BD
Eindhoven, The Netherlands

Modification of this document is not permitted without written permission from Fluke Corporation.

For more information call:

In the U.S.A. (800) 443-5853 or
Fax (425) 446-5116
In Europe/M-East/Africa +31 (0)40 267 5100
or Fax +31 (0)40 267 5222
In Canada (800)-36-FLUKE or
Fax (905) 890-6866
From other countries +1 (425) 446-5500 or
Fax +1 (425) 446-5116
Web access: <http://www.fluke.com>

©2017 Fluke Corporation.
Specifications subject to change without notice.
8/2017 6009251b-en

* Two-year additional warranty offer may be discontinued without notice