

TECHNICAL DATA

Fluke 1587/ET Advanced Electrical Troubleshooting Kit



Key features

Fluke 1587 Insulation Multimeter

- With the Fluke 1587, perform insulation tests, plus a wide-range of DMM tasks with confidence and ease.
- Two products in one: Powerful and full-featured multimeter.
- Ideal for work on motors, cables, and switch gear.
- Large display with backlight.
- Filter for motor drive measurements.
- Insulation test (0.01 MΩ to 2 GΩ).
- Insulation test voltages (50 V, 100 V, 250 V, 500 V, 1000 V) for many applications.
- CAT III 1000 V /CAT IV 600 V overvoltage rating for added user protection.

Fluke i400 Current Clamp

- Use the Fluke i400 with your Fluke 1587 to accurately measure AC current without breaking the circuit.
- Use with your Fluke 1587 to measure 1A AC to 400 A AC.
- 1 mA/Amp output guarantees easy reading.
- CAT III 1000 V / CAT IV 600 V overvoltage rating for added user protection.
- Specially designed to offer maximum utility in a very compact shape.
- Maximum conductor: Ø 32 mm.

Fluke 62 MAX+ IR Thermometer

- Dust and water-resistant: IP54 rated.
- Rugged: 3-meter (9.8-foot) drop tested.
- Ergonomically designed: Completely redesigned for a more natural hand fit.
- Distance to spot: 12:1.
- Dual lasers: Identifies area to be measured.
- Large, backlit display: Makes data easier to read, even in dark areas.

Product overview: Fluke 1587/ET Advanced Electrical Troubleshooting Kit

The products in this kit have been specifically selected for both troubleshooting and preventative maintenance applications.

Establishing preventative maintenance programs are becoming critical to maintaining the uptime of electrical equipment and can significantly reduce both planned and unplanned downtime. Unplanned downtime costs are difficult to calculate, but often significant. For some industries, it can represent 1% - 3% of revenue (potentially 30% - 40% of profits) annually.

Includes a Fluke 1587 Insulation Multimeter, Fluke i400 Current Clamp, and a Fluke 62 Mini Infrared Thermometer.

- With the Fluke 1587, perform insulation tests, plus a wide-range of DMM tasks with confidence and ease.
- Use the Fluke i400 with your Fluke 1587 to accurately measure AC current without breaking the circuit.
- Check for hot spots and measure temperature with the Fluke 62 Mini non-contact thermometer.

Specifications: Fluke 1587/ET Advanced Electrical Troubleshooting Kit

Fluke 1587 Insulation Multimeters

Specifications		
Voltage DC	Maximum voltage	1000 V
	Accuracy	u00b1(0.09% + 2)
	Maximum resolution	0.001V
Voltage AC	Maximum voltage	1000 V
	Accuracy	u00b1(2% + 3)
	AC bandwidth	5 kHz ¹
		1. With low pass filter; 3 db @ 800 Hz
	Maximum resolution	0.1 mV
Current DC	Maximum amps	400 mA
	Amps accuracy	u00b1(0.2% + 2)
	Maximum Resolution	0.01 mA

Current AC	Maximum amps	400 mA
	Amps accuracy	$\pm(1.5\% + 2)$
		1.1 kHz bandwidth
	Maximum resolution	0.01 mA
Resistance	Maximum resistance	50 M Ω
	Accuracy	$\pm(0.9\% + 2)$
	Maximum resolution	0.1 $\mu\Omega$
Capacitance	Maximum capacitance	9,999 μF
	Accuracy	$\pm(1.2\% + 2)$
	Maximum resolution	1 nF
Frequency	Maximum frequency	100 kHz
	Accuracy	$\pm(0.1\% + 1)$
	Maximum resolution	0.01 Hz
Temperature measurement	-40.0 $^{\circ}\text{C}$ to 537 $^{\circ}\text{C}$ -40.0 $^{\circ}\text{F}$ to 998 $^{\circ}\text{F}$ excluding probe	
Diode test	Range	6 V
	Resolution	1 mV
	Accuracy	$\pm(2\% + 1)$
Insulation Test		
Minimum test current @ 1 k Ω /V	1 mA	
Test voltages	50, 100, 250, 500, 1000 V	
Maximum resistance per test voltage	50 V	
	100 V	
	250 V	
	500 V	
	1000 V	2 G Ω
Maximum resolution per test voltage	50 V	0.01 M Ω
	100 V	0.01 M Ω
	250 V	0.1 M Ω
	500 V	0.1 M Ω
	1000 V	0.1 M Ω

Accuracy per test voltage	50 V	u00b1(3% + 5)
	100 V	u00b1(3% + 5)
	250 V	u00b1(1.5% + 5)
	500 V	u00b1(1.5% + 5)
	1000 V	u00b1(1.5% + 5) to 600 Mu03a9, u00b1(10% + 3) above 600 Mu03a9
Environmental Specifications		
Operating temperature	u201320u00b0C to +55u00b0C	
Storage temperature	-40u00b0C to +60u00b0C	
Humidity (without condensation)	0% - 95% (10u00b0C u2013 30u00b0C)	
	0% - 75% (30u00b0C u2013 40u00b0C)	
	0% - 40% (40u00b0C u2013 55u00b0C)	
Operating altitude	2000 m	
Safety Specifications		
Overvoltage category	Complies with ANSI/ISA 82.02.01 (61010-1) 2004, CAN/CSA-C22.2 NO. 61010-1-04, and IEC/EN 61010-1 2nd Edition for measurement CAT III 1000 V and CAT IV 600 V	
Agency approvals	2000 m CAT III 1000 V, CAT IV 600 V; 3000 m CAT II 1000 V, CAT III 600 V	
Mechanical and General Specifications		
Size	203 x 100 x 50 mm (with holster)	
Weight	624 g	
Warranty	3 years	
Baery life Alkaline	Meter use	1000 hours
	Insulation test use	Meter can perform at least 1000 insulation tests with fresh alkaline baeries at room temperature. These are standard tests of 1000 V into 1 Mu03a9 with a duty cycle of 5 seconds on and 25 seconds off.
IP Rating	IP40	

Fluke i400 AC Current Clamp

Specifications	
Nominal current range	400 A
Continuous current range	1 A - 400 A
Maximum non-destructive current	1000 A
Lowest measurable current	1 A
Basic accuracy	2% + 0.06 A (45 - 400 Hz) (% reading + floorspec)
Useable frequency	5 Hz - 20 kHz

Output level(s)	1 mA/A
Safety Specifications	
Safety	CAT IV 600 V, CAT III, 1000 V
Maximum voltage	1000 V AC rms from earth to ground, in compliance with EN61010
Mechanical and General Specifications	
Warranty	1 year
Maximum conductor diameter	32 mm (1.25 in)
Maximum conductor size (busbar)	750 MCM
Output cable length	1.5 m (59 in)
Shrouded banana plugs	Yes

Fluke 62 MAX+ Infrared Thermometer

Specifications		
Temperature range	-30u00b0C to 650u00b0C (-22u00b0F to 1202u00b0F)	
Accuracy	u00b11.0u00b0C or u00b11.0% of reading, whichever is greater -10u00b0C to 0u00b0C: u00b12.0 -30u00b0C to -10u00b0C: u00b13.0	
Response time (95%)	Fluke 62 MAX+	< 300 ms (95% of reading)
	Spectral response	8 to 14 microns
	Emissivity	0.10 to 1.00
Optical resolution	12:1 (calculated at 90% energy)	
Display resolution	0.1u00b0C (0.2u00b0F)	
Repeatability of readings	u00b10.5% of reading or < u00b10.5u00b0C (1u00b0F), whichever is greater	
Power	AA baery	
Baery life	8 hours with laser and backlight on	

Physical specifications	Weight	255 g (8.99 oz)
	Size	175 x 85 x 75 mm (6.88 x 3.34 x 2.95 in)
	Operating temperature	0u00b0C to 50u00b0C (32u00b0F to 122u00b0F)
	Storage temperature	-20u00b0C to 60u00b0C (-4u00b0F to 140u00b0F), (without baery)
	Operating humidity	10% to 90% RH non-condensing at 30u00b0C (86u00b0F)
	Operating altitude	2000 meters above mean sea level
	Storage altitude	12,000 meters above mean sea level
	IP rating	IP 54 per IEC 60529
	Drop test	3 meters
	Vibration and shock	IEC 68-2-6 2.5 g, 10 to 200 Hz, IEC 68-2-27, 50 g, 11 ms
	EMC	EN 61326-1:2006 EN 61326-2:2006
Standards and agency approval	Compliance	EN/IEC 61010-1: 2001
	Laser safety	FDA and EN 60825-1 Class II

Ordering information



Fluke 1587/ET Kit

Fluke 1587/ET Advanced Electrical Troubleshooting Kit

Includes:

- Fluke 1587 Insulation Multimeter
- Fluke i400 Current Clamp
- Fluke 62 MAX+ IR Thermometer

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

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

For more information call:
In the U.S.A. (800) 443-5853
In Europe/M-East/Africa +31 (0)40 267 5100
In Canada (800)-36-FLUKE
From other countries +1 (425) 446-5500

Fluke Electronics (Malaysia) Sdn Bhd
Suite D-3A-4, Block D
SouthGage Commercial Centre, No2
Jalan Dua Off Jln Chan Sow Lin
55200 KL
Malaysia
Email: info.asean@fluke.com
www.fluke.com/my

©2024 Fluke Corporation. Specifications subject to
change without notice.
12/2024

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