

TECHNICAL DATA

Fluke 353 True RMS 2000 A Clamp Meter





Key features

- Reliably handle a wide range of high-current applications with 2000 A AC + DC true-rms, 1400 A ac, and 2000 A DC
- The large 58 mm (2.3 in) jaw capacity is suitable for large or multiple conductors
- CAT IV 600 V, CAT III 1000 V rating for added user protection
- In-rush current measurement captures 'power-on' surge current with accuracy and repeatability
- Accurately measure frequency up to 1 kHz for optimum troubleshooting
- Quickly analyze readings using the MIN, MAX, and AVG functions
- A large backlit display allows for easy visibility in low-lit areas
- Use the display hold feature to capture readings even when the display cannot be viewed
- Use the low-pass filter to smooth out noisy loads and stabilize readings

Product overview: Fluke 353 True RMS 2000 A Clamp Meter

Versatile and rugged tool for applications with high currents

Confidently take reliable readings with the True RMS, Fluke 353 digital clamp meter; the tools of choice for high current clamp-on amp meter measurement up to 2000 A. The extra-wide jaw easily clamps around large conductors, typically found in high-current applications. The extra rugged design and CAT IV 600 V, CAT III 1000 V ratings add an extra element of user protection when taking high-powered measurements.

Accurate peak measurements can be taken using the in-rush current mode, ideal for motors and inductive loads.

Specifications: Fluke 353 True RMS 2000 A Clamp Meter

Electrical Specifications		
Current measurement DC and AC 10 Hz to 100 Hz	Range	40 A / 400 A / 2000 A / 1400 AC RMS
	Resolution	10 mA / 100 mA / 1 A
	Accuracy	A: 1.5% rdg + 15 digits A: 1.5% rdg + 5 digits
	Trigger level for Inrush	0.50 A / 5.0 A / 5 A
	Trigger level for Hz filter OFF	2.50 A / 2.5 A / 8 A
	Trigger level for Hz filter ON	0.50 A / 2.5 A / 8 A
Crest Factor (50/60 Hz)	Range	40 A / 400 A / 2000 A / 1400 AC RMS
	Crest Factor ¹	2 @ 33 A, 2.4 @ 27 A 2 @ 330 A, 2.4 @ 270 A 2 @ 1000 A, 2.4 @ 833 A
Current measurement AC 100.1 Hz to 1 kHz	Range	40 A / 400 A / 2000 A; 1400 AC RMS
	Resolution	10 mA / 100 mA / 1 A
	Accuracy	10 A: 3.5% rdg + 15 digits 10 A: 3.5% rdg + 5 digits
	Trigger level for Inrush	0.50 A / 5.0 A / 5 A
	Trigger level for Hz filter OFF	2.50 A / 2.5 A / 8 A
	Trigger level for Hz filter ON	0.50 A / 2.5 A / 8 A

Frequency measurement	Measurement range	5.0 Hz to 1 kHz
	Resolution	0.1 Hz (15 Hz to 399.9 Hz); 1 Hz (400 Hz to 1 kHz)
	Accuracy – 5.0 Hz to 100 Hz	0.2% + 2 counts
	Accuracy – 100.1 Hz to 1 kHz	0.5% + 5 counts
	Trigger level	Refer to current and voltage tables
1. Add 2% to error spec for CF > 2		
General Specifications		
Baeries	Six 1.5 V AA NEDA 15 A or IEC LR6	
Baery life (with typical usage, backlight off)	100 hours	
Test leads	Rated to 1000 V	
Weight	.814 kg (1.8 lb)	
Jaw size	58 mm (2.28 in)	
Dimensions (L x W x D)	300 x 98 x 52 mm (12 x 3.75 x 2 in)	
Safety rating	IEC 61010-2-032, 600 V CAT IV, 1000 V CAT III	
Environmental Specifications		
Operating temperature	32°F to +122°F (0°C to +50°C)	
Storage temperature	-4°F to 140°F (-20°C to +60°C)	
Operating humidity	0 to 95% (non-condensing)	
Operating altitude	2000 m	
Storage altitude	10,000 m	
IP rating	42 (indoor use only)	
Drop test requirements	1 m	
EMI, RFI, EMC	FCC part 15, IEC/EN 61326-1:1997 class B IEC/EN 61326:1997 3V/m, performance criteria B, EN61325	
Temperature coefficients	Current	0.1% of reading per °C outside 22°C to 24°C
	Voltage	0.1% of reading per °C outside 22°C to 24°C

Ordering information



Fluke 353

Fluke 353 True RMS 2000 A Clamp Meter

Includes:

- 353 clamp meter
- C43 Soft carrying case
- 6 AA batteries
- User manual
- 3 year warranty

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

Fluke Europe B.V.

P.O. Box 1186
5602 BD Eindhoven
The Netherlands
www.fluke.com/en

©2025 Fluke Corporation. All rights reserved.

Data subject to alteration without notice.

01/2025

For more information call:

In Middle East/Africa
+31 (0)40 267 5100

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