

FLUKE®

Fluke 317/319

True RMS Clamp Meters

Accurate. Rugged. Safe.



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New



Fluke 317, 319 functions: new/improved features

- 40 milli-amps measurement, highly accurate current testing: 0.01 A resolution, 1.6% precision measurements. (Many engineers measure low currents more often than high currents.)
- Thin jaws and small, light body mean the meters are more suitable for use in confined spaces.
- Inrush measurement technology allows measurement of starting current for devices such as motors and lightning equipment; integration time is 100 ms (Fluke 319 only).
- Frequency measurements enable accurate measurement of PWM output signal frequency (Fluke 319 only).
- Zero: Can display zero for direct current (DC) measurement.
- Large 1000 A AC/DC current measurement; AC/DC voltage measurement (Fluke 319 only).
- Min/max function file suitable for current and voltage
- RMS
- 6000 digit display
- Large backlit display for viewing
- 4000 Ω resistance measuring span
- Screen save function can save measurement results on the screen
- Continuity beeper $\leq 30 \Omega$
- Auto Power Off function maximises battery life span, so the instrument will work when needed
- Clamp opening: 37 mm

General specifications

Power supply	3x AAA IEC LR03 batteries
Max. jaw opening	37 mm (1.45 in)
Jaw diameter	37 mm (1.45 in)
Dimensions (L x W x H)	234 mm x 74 mm x 34.8 mm
Weight	384 g (13.5 oz) (with battery)
Calibration	Fully manual calibration and testing, one year calibration testing period
Digital display resolution	6000 digits
Safety	CE EN/IEC 61010-1 and IEC 61010-2-032 Measurement category: 600 V CAT III (Category III)

Environmental indicators

Working temperature	-10°C to 50°C (14°F to 122°F)
Storage temperature	-40°C to 60°C (-40°F to 140°F)
IP equivalent	IP40
Drop test requirements	Drop height tested to 1 m (3 ft), all six sides tested, oak flooring

General technical parameters

Accuracy is applicable at a temperature of 23°C $\pm$ 5°C (73°F $\pm$ 41°F).
Below 18°C and above 28°C (64°F and above 82°F), the accuracy decreases by 0.1 times the specification per °C.
AC voltage and AC current RMS measurements are set at 5% to 100%.



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Technical specifications

Function	Parameter	Fluke 317	Fluke 319
AC Current	Measurement	40.00 A	40.00 A
		600.0 A	600.0 A
			1000 A
	Resolution	0.01 A	0.01 A
		0.1 A	0.1 A
			1 A
	Precision	Accuracy 1.6% ± 6 digits (50-60 Hz) [40 A]	1.6% ± 6 digits (50-60 Hz) [40 A]
		2.5% ± 8 digits (60-500 Hz) [40 A]	2.5% ± 8 digits (60-500 Hz) [40 A]
		1.5% ± 5 digits (50-60 Hz) [600 A]	1.5% ± 5 digits (50-60 Hz) [600/1000 A]
		2.5 % ± 5 digits (60-500 Hz) [600 A]	2.5% ± 5 digits (60-500 Hz) [600/1000 A]
	When crest factor CF > 2, increase the specifications by 2%	For 500 A, maximum 3.0	For 500 A, maximum 3.0
		For 600 A, maximum 2.5	For 600 A, maximum 2.5
	AC response	RMS	RMS
DC Current	Range	40.00 A	40.00 A
		600.0 A	600.0 A
			1000 A
	Resolution	0.01 A	0.01 A
		0.1 A	0.1 A
			1 A
	Accuracy	1.6% ± 6 digits [40 A]	1.6% ± 6 digits [40 A]
		1.5% ± 5 digits [600 A]	
AC voltage	Range	600.0 V	
	Resolution	0.1V	
	Accuracy	1.5% ± 5 digits (20-500Hz)	
	AC response	RMS	
DC voltage	Range	600.0 V	
	Resolution	0.1 V	
	Accuracy	1% ± 4 digits	
Resistance	Measurement	400.0 Ω	
		4000 Ω	
	Resolution	0.1 Ω	
		1.0 Ω	
	Accuracy	1% ± 5 digits	
Continuity		≤ 30 Ω	
Inrush current	Integration time	NA	100 ms
Frequency	Measuring span	NA	5.0-500.0 Hz
	Accuracy	NA	0.5% ± 5 digits
	Power level	NA	10 - 100 Hz ≥ 5 A, 5 - 10 Hz, 100 - 500 Hz ≥ 10 A



Fluke 317/319 True RMS Clamp Meters

- Slim clamps, lightweight body
- More suitable for use in narrow spaces
- Unique 40 A low frequency measurements capability with 0.01 A resolution, 1.6 % accuracy
- Inrush current measurement
Measures electrical and lighting equipment start-up currents (Fluke 319)
- Frequency measurement
Enables accurate measurement of PWM output signal frequency (Fluke 319)

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Optional accessories

TL223 SureGrip electronics testing kit

One pair of silicone insulated test leads TL224, AC220 industrial alligator clips and TPI plane probe or TP4mm probe.

Category III 1000V. 10 A.



AC285 wide-opening alligator clips

A pair (red and black) of whole-edge banana-jack alligator clips.

Curved jaws, strong teeth and spring clasp.
Opening: 20 mm.

Includes 4x AAA batteries.



L206 deluxe LED hat light

Can be fixed to a helmet baseball cap or even onto a door frame.

3 high brightness, long-life LEDs.

Fixed accessories.

40-hour battery life.

Includes 4x AAA batteries.



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

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