

TECHNICAL DATA

# Fluke 87V MAX True-rms Digital Multimeter



The 87V MAX contains all the trusted features of the most popular DMM used today, the Fluke 87V, plus much more.

**IP67 RATED**

Fully waterproof and dust proof, to work reliably in all the places that you need to work.

**WITHSTANDS DROPS UP TO 4-METERS (13 FEET)**

Fluke's most rugged digital multimeter. The 87V MAX is built with an industrial strength case and a removable holster. The holster doubles as a test probe holder for one-handed operation.

**WORKS AS LONG AS YOU DO**

The 87V MAX provides double the battery life of the original 87V.

**WITHSTANDS HEAT AND COLD**

The meter has an extended operating temperature range of -40 °C (for up to 20 minutes) to +55 °C.

**For use in extreme environments**

The Fluke 87V MAX True-rms Digital Multimeter defines a new standard for operating in extreme conditions, with the features and accuracy to troubleshoot most electrical problems. The 87V MAX has an IP 67 (waterproof and dustproof) rating, extended operating temperature range of -15 °C to +55 °C (5 °F to 131 °F, -40 °C for up to 20 minutes) and 95 % humidity, and has been designed and tested to withstand a 4 m (13 ft) drop. The Fluke 87V MAX True-rms Digital Multimeter is built to work in the toughest environments you might face.

The 87V MAX also has an industrial-strength outer shell and a removable holster that doubles as test lead storage and a test probe holder for one-handed operation.

**Product highlights**

- True-rms ac voltage and current for accurate measurements on non-linear signals
- Measure up to 1,000 V ac and dc
- Measure up to 10 A (20 A for 30 seconds)
- Frequency to 200 kHz
- Built in temperate function conveniently allows you to take temperature readings without having to carry a separate instrument using supplied thermocouple
- Min/Max/Average recording, plus 250 µs Peak min-max to capture variations automatically
- Unique function for accurate voltage and frequency measurements on variable frequency motor drives (VFDs) and other electrically noisy equipment
- Large display digits, 2-level bright white backlight and backlit keypad buttons for increased visibility
- Hi resolution 19,999 count display mode
- Long battery life (800 hours)



## Specifications

<b>Accuracy</b>		
DC voltage	Max. resolution Accuracy	0.1 mV to 1000 V 0.05 % + 1
AC voltage	Max. resolution Accuracy	0.1 mV to 1000 V 0.7 % + 4
DC current	Max. resolution Accuracy	0.1 $\mu$ A to 10 A 0.2 % + 2
AC current	Max. resolution Accuracy	0.1 $\mu$ A to 10 A 1.0 % + 2
Resistance	Max. resolution	0.1 $\Omega$ to 50 M $\Omega$
Display counts	6,000/19,999	
Capacitance	0.01 nF to 9999 $\mu$ F	
Frequency	0.5 Hz to 199.99 kHz	
Temperature	-200 $^{\circ}$ C to +1090 $^{\circ}$ C	
Low pass filter (Measurement on VFDs)	Yes	
Safety rating	CAT IV 600 V, CAT III 1000V	
IP rating	IP 67	
Power	Three AA batteries	
Battery life	800 hours	
<b>Display</b>		
Bar graph/backlight	Yes/Yes	
<b>Data storage</b>		
Peak transient capture	250 $\mu$ s	
Min/Max/Avg	Yes	
Reading hold	Yes	
<b>Other features</b>		
Relative readings (zero)	Yes	
Battery type	Three AA batteries	
<b>Warranty and protection</b>		
Safety rating	CAT IV 600 V/CAT III 1000 V	
External protection	Rubber holster	
Drop test	4 meter (13 feet) drop test	
Dustproof/waterproof	Yes, IP 67 rated	
Warranty	Limited lifetime	
Size (HxWxL) with holster	6.0 cm x 10.1 cm x 21.5 cm (2.4 in x 4.3 in x 8.5 in)	
Weight with holster	698.5 g (1.54 lb)	

## Ordering information

**Fluke 87V MAX True-rms Digital Multimeter**

### Included

Removable holster with test lead storage

**TL175 TwistGuard®** test leads

**AC175 Alligator clips**

**80BK-A** temperature probe

Three AA batteries (installed)



**Fluke.** *Keeping your world*