

Fluke Digital Multimeters Solutions for every need



Meters designed for the way you work

FLUKE ®

	Ad	vanced mete	ers	Wireless	s meters	General	purpose
Models	87 V	289	287	233	3000 FC	179	77 IV
Basic features							
Counts	20000	50000	50000	6000	6000	6000	6000
True-rms readings	ac	ac+dc	ac+dc	ac	ac	ac	
Basic dc accuracy	0.05 %	0.025%	0.025%	0.25%	0.09%	0.09%	0.3%
Wide bandwidth	20 kHz	100 kHz	100 kHz				
Auto/manual ranging	•/•	•/•	•/•	•/•	•/•	•/•	•/•
Digits	4-1/2	4-1/2	4-1/2	3-1/2	3-1/2	3-1/2	3-1/2
ATEX II 2G Eex ia IICT4 safety rating							
Zone 1 and Zone 2							
Measurements							
Voltage ac/dc	1000V	1000V	1000V	1000 V	1000 V	1000 V	1000 V
Current ac/dc	10 A	10 A	10 A	10 A	400 mA	10 A	10 A
Resistance	50 MΩ	500 MΩ	500 MΩ	40 MΩ	50 MΩ	50 MΩ	50 MΩ
Frequency	200 kHz	1 MHz	1 MHz	50 kHz	100 kHz	100 kHz	100 kHz
Capacitance	10,000 μF	50,000 μF	50,000 μF	10,000 µF	10,000 μF	10,000 μF	10,000 μF
Temperature	(+) 1090 °C	(+) 1350 °C	(+) 1350 °C	(+) 400 °C		(+) 400 °C	
dB		60 dB	60 dB				
Conductance	50 nS	50 nS	50 nS				
Duty cycle/pulse width	•/-	•/•	•/•				
Continuity/diode test	•	•	•	•	•	•	•
Motor Drive (ASD) Measurements	•	•					
VoltAlert [™] , non-contact voltage							
detection							
VCHEKTM							
LoZ: low input impedance		•					
Lo Ohms		•					
Microamps	•	•	•				
Display							
Wireless capabilities				Removable Wire-	Remote wireless		
moross capabilities				less Display	readings. Connect to smart phone.		
Dot matrix display		•	•		•		
Dual display		•	•		•		
Analog bargraph	•	•	•			•	•
Backlight	Two level	Two level	Two level	•	•	•	•
Graphical trend display		•	•				
Diagnostics and data							
Min Max recording/with time stamp	•/-	•/•	•/•	•/-	•/-	•/-	•/-
Fast Min Max	250 μs	250 μs	250 μs				
Display Hold/Auto (Touch) Hold	•/•	•/•	•/•	•/•	•/•	•/•	•/•
Relative reference	•	•	•				
Stand alone logging		•	•				
Trend Capture		•	•				
Readings memories		10,000	10,000				
USB interface		•	•				
Other features							
Automatic selection, ac/dcvolts							
Real time clock		•	•				
Overmolded case, integrated holster		•	•	•	•	•	•
Removable holster	•						
	•	•	•	•	•	•	•
Closed case calibration				•	•	•	•
Separate battery/fuse access	•/-	•/•	•/•	•	•	•	•
Completely sealed/ watertight							
Automatic power off	•	•	•	•	•	•	•
Low battery indication	•	•	•	•	•	•	•
Operating temperature range	-20 °C, +55 °C	-20 °C, +55 °C	-20 ℃, +55 ℃	-10 °C, +50 °C	-10 °C, +50 °C	-10 ℃, +50 ℃	-10 °C, +50 °C
Warranty and electrical safety							
Warranty (years)	Lifetime	Lifetime	Lifetime	3	3	Lifetime	Lifetime
Input alert	•	•	•				
Dangerous voltage indication	•	•	•	•	•	•	•
	TROO	IP42	IP42		IP54		
IP Rating	IP30	1P42	11 72				
	1930 1000 V	1000 V	1000 V	1000 V	1000 V	1000 V	1000 V

Digital Multimeter selection chart

	Best for	Applications	Recommended DMM		
neters	Advanced industrial troubleshooting,	Logging: For unattended monitoring of signals over time, to detect intermittent problems.	289		
	including data logging	Graphing: View logged values graphically in the field right on the meter, without a PC.			
	and graphing intermittent problems	Working on VSDs: Take accurate voltage, current and frequency measurements on the output side of the drive at either the drive itself or the motor terminals.			
		Testing motor windings or contact resistance: Allows testing of resistance up to 50 ohms with one milliohm (0.001 ohm) resolution.			
	Advanced electronic applications, including data logging and graphing intermittent problems	Logging: For unattended monitoring of signals over time, characterize device performance.			
9		Graphing: View logged values graphically in the field right on the meter, without a PC.			
Advanced		Monitoring two parameters at the same time: Dual display allows for monitoring of two selectable parameters.			
		Performance testing: Testing the frequency response of amplifiers and audio transmission line.			
	Industrial troubleshooting	Working on VSDs: Take accurate voltage, current and frequency measurements on the output side of the drive at either the drive itself or at the motor terminals.	87V		
		Industrial troubleshooting: All of the resolution and accuracy you need to solve more problems on motor drives, in-plant automation, power distribution, and electrome-chanical equipment.			
		Checking power quality: Capture glitches and spikes as short as 250 µs. Identify irregular signals.	ling man		
Wireless meters	Remote Display Digital Multimeter	Take measurements in hard to reach places: With its removable display, you have the flexibility to take measurements in hard to reach places or in areas with restricted access. You can be in two places at once and reduce the risk of arc flash by separating yourself from hazardous measurement situations.	233		
		Work more productively: Now one person can complete a test that would have required two people using ordinary test tools.			
	Fluke FC wireless test tools work together to help you troubleshoot faster	Work faster, safer and easier with FC Wireless Test Tools: The 3000 FC Multimeter displays the meter measurement, plus readings from up to three wireless modules, connect to your smart phone to see reading directly on your phone.	3000 FC		
		Build the system as your needs grow: Start with the multimeter and future proof your investment.	New		
urpose meters	Every day use requiring true-rms, accurate, rugged meter	Industrial troubleshooting: Applications requiring exceptional ease-of-use, ruggedness and reliability.	179		
		Electrical maintenance and troubleshooting: Variety of commercial electrical troubleshooting, installation and maintenance.			
		Temperature measurements: Built-in thermometer conveniently allows you to take temperature readings without having to carry a separate instrument.	17 18 8.4 17 18 18 18 18 18 18 18 18 18 18 18 18 18		
General purpose	Every day use requiring average responding, accurate, rugged meter	Industrial troubleshooting: Applications requiring exceptional ease-of-use, ruggedness and reliability.	72 IV		
Ge		Electrical maintenance and troubleshooting: Variety of commercial electrical troubleshooting, installation and maintenance.	17 0.0 mm. 17 0.0 mm. 17 0.0 mm. 18		