

PA103C-B Digital Multimeter Technical Specifications

Function		Measurement Range	Resolution	Function
DC Voltage (V)	mV ^[1]	60.00mV/600.0mV	0.01mV	±(0.5%+2dig)
	V	600.0mV/6.000V/60.00V/600.0V	0.1mV	
	V	1000V	1V	±(0.8%+2dig)
AC Voltage (V)	mV ^[1]	60.00mV/600.0mV	0.01mV	±(0.8%+3dig)
	V	600.0mV	0.1 mV	±(2%+5dig)
	V	6.000V/60.00V/600.0V	1mV	±(0.8%+3dig)
	V	750V	1V	±(1%+3dig)
DC Current (A)	μA	600.0μA/6000μA	0.1μA	±(0.8%+2dig)
	mA	60.00mA/600.0mA	0.01mA	±(0.8%+2dig)
	A	20.00A ^[2]	0.01A	±(1.2%+3dig)
AC Current (A)	μA	600.0μA/6000μA	0.1μA	±(1%+3dig)
	mA	60.00mA/600.0mA	0.01mA	±(1%+3dig)
	A	20.00A ^[2]	0.01A	±(1.5%+3dig)
Resistance (Ω)		600.0Ω/6.000kΩ/60.00kΩ/ 600.0kΩ/6.000MΩ	0.1Ω	±(0.8%+2dig)
		60.00MΩ	0.01 MΩ	±(2%+3dig)
Capacitance (F)		60.00nF/600.0nF/6.000μF/ 60.00μF	0.01nF	±(3%+3dig)
		600.0μF/6.000mF/60.00mF ^[3]	0.1μF	±(3%+5dig)
Frequency ^[4] (Hz)		9.999Hz/99.99Hz/999.9Hz/ 9.999kHz/99.99kHz/999.9kHz/ 9.999MHz	0.001Hz	±(0.8%+2dig)
Duty Cycle ^[5] (%)		0.1% - 99.9% (Typical: V _{rms} =1 V, f=1 kHz)	0.1%	±(1.2%+3dig)
		0.1% - 99.9%(≥1 kHz)		±(2.5%+3dig)
Temperature (°C/°F)		−50 °C to 400 °C	1 °C	±(2.5%+3dig)
		−58 °F to 752 °F	1 °F	±(4.5%+5dig)

[1] The rotary switch position  is only for specific models.

[2] When measuring current, for 10 A to 15 A, the measuring duration should not be over 2 minutes within 10 minutes, and in this 10 minutes, no other current should flow through except within the measuring duration; for 15 A to 20 A, the measuring duration should not be over 10 seconds within 15 minutes, and in this 15 minutes, no other current should flow through except within the measuring duration.

[3] When measuring capacitance, for the 60.00mF range, the measuring duration should be over 30 seconds.

[4] When measuring frequency, the typical waveform is Square or Sine. The signal meets the following conditions.

Frequency	Amplitude (rms)
1 Hz – 5 MHz	≥ 700 mV

[5] When measuring duty cycle, the typical waveform is Square.

Note: when measuring resistance and capacitance, the influence of the resistance reactance of the pen itself on the measured value should be considered.

Characteristics	Instruction	
Display	PA103C-B	5999
Frequency Response (Hz)	(40 - 1000) Hz	
Sample rate for digital data	3 times/second	
Bluetooth		Without
	PA103C-B	✓
Auto ranging	✓	
True RMS	✓	
Diodes Test	✓	
Sleep Mode	✓	
Continuity Test	✓	
NCV function	✓	
Flashlight	✓	
Low battery indication	✓ (The "  " is displayed when the battery is under the proper operation range.)	
Data Hold	✓	
Relative Measurement	✓	
LCD Backlight	✓	
Input Protection	✓	
Input Impedance	≥ 10 MΩ	
Battery	PA103C-B	9V battery (6F22)
		3 V (1.5 V × 2) AA
LCD Size	PA103C-B	58.5 mm * 41 mm
		69 mm * 52 mm
Weight (without package)	PA103C-B	0.32 kg
		0.29 kg
Dimension	PA103C-B	190 mm * 90 mm * 56
		85 mm * 185 mm * 30
Working temperature	0℃ to 40℃	
Storage temperature	-10℃ to 60℃	
Relative Humidity	≤ 80%	
Altitude	Operating: 3,000 meters Non-operating: 15,000 meters	

Standard conditions: The environment temperature is 18℃ to 28℃, the relative humidity is less than 80%.

Note: When measuring AC voltage/current or capacitance, accuracy guarantee range is 5% to 100% of the range.

Interval Period of Adjustment:

One year is recommended for the calibration interval period.