

Hewlett Packard Model 4263A LCR Meter Specifications

Measurement Functions		
Measurement Parameters	Z , Y , q, R, X, G, B, L, C, Q, D, ESR Opt 001: Add DCR (dc resistance), N (turns ratio), and M (mutual inductance) measurement	
Measurement Circuit Mode	Series and parallel	
Mathematical Functions	Deviation and percent deviation	
Ranging	Auto and manual	
Trigger	Internal, external, manual, and HP-IB	
Delay Time	0 to 9999 ms in 1 ms steps	
Test Cable Lengths	0 m, 1 m, 2 m, 4 m, (freq = 100/120/1k Hz); 0 m, 1 m, 2 m (freq = 10 k/20k Hz); 0 m, 1 m (freq = 100 kHz)	
Measurement Time	Short, medium and long	
Averaging	1 to 256	
Test Signal Information		
Test Frequency	100 Hz, 120 Hz, 1 kHz, 10 kHz, and 100 kHz Opt 002: Add 20 kHz test frequency	
Frequency Accuracy	±0.01% (freq = 100 Hz, 1 kHz, 10 kHz, (20 kHz), 100 kHz), ± 1% (freq = 120 Hz)	
Output Impedance	100 W ± 10%, 25 W ± 10% (£ 1 W range)	
AC Test Signal Level	50 mV, 100 mV, 250 mV, 500 mV, and 1 V rms	
Accuracy	± 10% + 10 mV	
Internal DC Bias	Level: 1.5 and 2 V Accuracy: ± (5% + 2 mV)	
External DC Bias	0 to +3 V	
Measurement Range	Parameter	Measurement Range
	Z , R, X	1 mW to 100 MW
	Y , G, B	10 ns to 1000 S
	C	1 pF to 1 F
	L	10 nH to 100 kH
	D	0.0001 to 9.9999
	Q	-180° to +180° C
	q	0.1 to 9999.9
	DCR	1 mW to 100 MW
	N	0.9 to 200 (unspecified)
	L, M	1 µH to 100 H (unspecified)
	D%	-999.99% to 999.99%
Measurement Accuracy	± 0.1% (basic) (for Z , R, X, Y , G, B, C, L)	
Measurement Time	Mode	Time (typical)
	Short	25 ms
	Medium	65 ms
	Long	500 ms
Front-End Protection	Internal circuit protection when a charged capacitor is connected to the input terminals. The maximum capacitor voltage is $V_{max} = \sqrt{Q/C}$ typical @ $V_{max} \leq 250$ V; $V_{max} = \sqrt{Q/(2C)}$ typical @ $V_{max} \leq 1000$ V C is in Farads	
Display	5 digits max	
Correction Function		
Zero OPEN/SHORT	Eliminates measurement errors due to stray parasitic impedances in the test fixtures.	
Load	Improves measurement accuracy by using a calibrated device as a reference. Available only via HP-IB.	
Comparator Function	HIGH/IN/LOW for each primary measurement parameter and secondary measurement parameter.	
Contact Check Function	Contact failure between the test fixture and device can be detected. Additional time for contact check: 5 ms.	
Other Functions		
Save/Recall	Ten instrument setups can be saved/recalled from the internal nonvolatile memory.	
Continuous Memory Capability	If the instrument is turned off, or if a power failure occurs, instrument settings (except dc bias on/off) are automatically memorized (\approx 72 hours at 23° ± 5° C).	
HP-IB Interface	All control settings, measured values, and comparator information.	
Handler Interface	All output signals are negative-logic, optically isolated open collectors. Output signals include HIGH/IN/LOW, no contact, index, end of measurement, and alarm. Input signals include: keylock and external trigger.	
General Specifications		
Power Requirements	90 to 132 V or 198 to 264 V, 47 to 66 Hz, 45 VA max.	
Operating Temperature	0 to 55° C	
Size	320 mm W X 100 mm D (12.6 in X 3.94 in X 11.81 in)	
Weight	4.5 kg (9.9 lb)	