4021 DIGITAL μ-OHMMETER



Features:

- Economical and Portable.
- **×** AC or Battery Powered.
- Optional BCD Interface.
- **×** 4 ½ Digit Display.
- **×** Measurement ranges from 20Ω to 2ΜΩ
- 4-Wire Kelvin Terminal Configuration

Economical, Portable 4 Wire Measurement

The 4021 is Valhalla's most economical ohmmeter. Although the 4021 is available at a surprisingly low cost, this unit is packed with features you would expect to find only on instruments priced two to three times higher. To start with the 4021 is built around a low noise, high resolution analog to digital converter. The measurement is then displayed from 1mohm resolution to 2Mohms full scale on a high intensity, 4.5 digit, L.E.D. readout. As with all Valhalla ohmmeters, the 4021 uses a four-terminal output configuration to eliminate lead wire length and lead contact resistance errors. This means no more pot twiddling to compensate for lead resistance.

The 4021's four-terminal measurement technique provides for stable and repeatable low resistance readings. This kind of measurement performance cannot be obtained with a typical two-wire digital multimeter.

This tough benchtop instrument features a high impact injection molded case with handy tilt bail/handle that is easily adjusted to perfect viewing angle. The 4021 comes standard with "no hassle" AC power capability and a detachable line cord. As an added convenience in portable applications, the 4021 is available with an optional heavy duty rechargeable (option HDB) battery pack. A 6 VDC battery charger/eliminator is included with the battery pack option and is designated as Option "A".

Specification

Range	Resolution	Nominal Test Current	Accuracy
20Ω	1mΩ	10mA	$\pm 0.05\%$ of rdg, $\pm 0.025\pm$ of rng
200Ω	$10 \text{m}\Omega$	1mA	$\pm 0.05\%$ of rdg, $\pm 0.025\pm$ of rng
2kΩ	$100 \mathrm{m}\Omega$	100μΑ	$\pm 0.05\%$ of rdg, $\pm 0.025\pm$ of rng
20kΩ	1Ω	10μΑ	$\pm 0.05\%$ of rdg, $\pm 0.025\pm$ of rng
200kΩ	10Ω	1μA	$\pm 0.07\%$ of rdg, $\pm 0.03\pm$ of rng
2ΜΩ	100Ω	100nA	$\pm 0.1\%$ of rdg, $\pm 0.15\pm$ of rng

Temperature Specifications

Temperature Coefficient: ±0.002% per °C
Operating Temperature: ±0.002% per °C
0°C to 50°C

General Specifications

Full Scale Test Voltage: 200mV Current Source Compliance Voltage: 5V

Terminal Configuration:

Display Type:

Overrange/Overload Indication:

Conversion Rate:

4-Wire Kelvin

4 ½ Digit LED's

Display Flashes

3 Readings/Seconds

Power Specifications

Power Source AC: 115Vac or 230Vac ±10%, 50-400Hz Power Source DC: 4 Recharg. Ni-Cad 1.2V 4000mA/H

Battery Charger: 6VDC @ 300mA

Physical Specifications

Dimensions: 9.5"W/11"D/3"H
Weight: 3lbs (AC) 4lbs (DC)

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