Section 1

GENERAL INFORMATION (Continued)

The ohm scale length: 2.375" approximate (60.3 mm).

The instrument is calibrated to have an accuracy of $\pm 0.03^{\circ}$ (.76 mm) from any marked position.

The instrument to be cranked at 160 RPM, minimum.

1-3 QUICK REFERENCE DATA

Catalog No.	Test Voltage DC	Range (max.) Megohms	Type Operation
21159	100 to 1000	2000	Hand
21160	50 to 500	1000	Hand
21189	10 to 150	300	Hand
21259	100 to 1000	2000	Line
21359	100 to 1000	2000	Dual
21170	500 to 1000	20,000	Hand
21172	250	10,000	Hand

a. TEST VOLTAGE, OPEN CIRCUIT, AT 160 RPM

MEGOHM RANGE: +10%, -0% Rated Voltage.

OHM RANGE: 2 to 300 Volts.

b. SHORT CIRCUIT SURRENT

MEGOHM RANGE: 0.5 to 0.6 mA all except Cat. No. 21170, Cat. No. 21170: 2.0 to 4.5 mA.

OHM RANGE: 2.0 mA.

c. CONTINUITY RANGE

O to 20,000 (Cat. Nos. 21159, 21259, 21359 only).

- \underline{d} . ACCURACY: $\pm 0.030^{\circ}$ (.76 mm) from any marked position when checked with standard resistor.
- e. Voltage change at infinity between cranking speed of 160-240 RPM is $\pm 3\%$.
- \underline{f} , OPERATING TEMPERATURES: 50 to 450 C (410 to 1140 F).

Section 1

GENERAL INFORMATION (Continued)

g. MAXIMUM DIMENSIONS:

- (1) Length: 7.0 inches, (177.8 mm).
- (2) Width: 4.5 inches, (114.3 mm).
 - 6.0 inches, including handle (152.4 mm).
- (3) Height: 5.0 inches, (127 mm).

I-4 SAFETY PRECAUTIONS

- SAFETY IS THE RESPONSIBILITY OF THE USER -
- LA SEGURIDAD ES EL CARGO DEL OPERADOR -

The Test Set and the sample to which it is connected are a source of high-voltage electrical energy and all persons making or assisting in the tests must use all practical safety precautions to prevent contact with energized parts of the test equipment and associated circuits.

Persons actually engaged in the test must stand clear of all parts of the complete high-voltage circuit unless the set is de-energized and all parts of the test circuit are grounded.

Any persons not directly associated with the work must be kept away from test activities by suitable barriers, barricades or warnings.

If the set is properly operated and all grounds correctly made, no rubber gloves are necessary. As a routine safety procedure, however, some users require the use of rubber gloves, not only in making connections to the high-voltage terminals, but in manipulating the controls. BIDDLE Instruments considers this to be an excellent safety practice.

1-5 RECEIVING INSTRUCTIONS

Your Megger instrument has been thoroughly tested and inspected to rigid inspection specifications before being shipped and is