

Characteristics & Applications

ME 545 Energy Band Gap by Four Probe Method

Objective : Energy band gap of Semiconductor material (Ge Crystal) By four probe method.

Technical Specification :

Power supply unit is housed in metal cabinet and comprises of constant current generator 0-20mA, Oven Power Supply & built in Digital Voltmeter of 0-200mV/2V DC.

Probes Arrangement : It has four individually spring loaded, coated with Zn at the tips.

The probes are collinear and equally spaced.

The whole arrangement is mounted on a suitable stand and leads are provided for current and voltage measurements.

Sample : Ge (Germanium) crystal in the form of a chip slice.

Oven : Maximum Temp. : 200°C

Standard Accessories : Power chord, Patch chords & Instruction manual.

Crystal (Germanium), Oven with cable, Four probe & Thermometer 200°C



ME 545L Energy Band Gap by Four Probe Method with PC Interface

– do– same as ME 545 but with PC Interface.



ME 546 Thermistor Characteristic Apparatus

Objective: Plot characteristics of the following : - Temp. Vs resistance at different voltages, voltage vs current at different Temperatures & current vs time at different voltages.

Technical Specifications :

Output voltage (Regulated) : 0-10V DC

Meters (Analog) 65mm Round : 0-10V DC, 0-500uADC

Housed in ABS cabinet, Electric Oven, Glass Thermometer 100°C mounted & symbol diagram printed on Bakelite front panel.

Glass Thermistor (68K ohm) placed inside the Oven & connections of all important outputs brought out at front panel.

Also provided with patch chords & instruction manual

ME 546D

– do– same as ME 546 but with Aluminum Panel, Analog Rectangular deluxe meters (60x35mm) & detachable power chord.



ME 546P

– do– same as ME 546 but with Aluminum Panel, 3.5 digit LED Digital panel meters & detachable power chord.

ME 547

UJT Characteristics Apparatus (V-I)

Technical Specifications :

Output voltage (Regulated) : 0-15VDC, 0-25VDC

Meters (Analog) 65mm Round : 0-15VDC, 0-25VDC

0-1.5mA/ 60mADC (Dual Range)

Housed in ABS cabinet, symbol diagram printed, connections of UJT (2N2646) & all important outputs brought out at Bakelite front panel. Also provided with patch chords & instruction manual.

ME 547D

– do– same as ME 547 but with Aluminum Panel, Analog Rectangular deluxe meters (60x35mm) & detachable power chord.

ME 547P

– do– same as ME 547 but with Aluminum Panel, 3.5 Digit LED digital panel meters & detachable power chord.