

JFET Characteristics with Digital Meters

Model : SA-117DM



SINCOM SA-117DM JFET Characteristics with Digital meters is comprehensive remarkable trainer is useful to study Drain and Transfer characteristics of JFET. The JFET is widely used as a switching and an amplification device in many electronics circuits. The trainer is simply designed to plot its characteristics and determine the various operational parameters in a simple experimental way. The trainer is equipped with on board Digital voltmeter and Digital Ammeter.

Features

- ❖ N-Channel JFET of TO-72 Metal Transistor package is provided
- ❖ Low Power, High Frequency Device
- ❖ Individual control of Gate and Drain Input DC voltages
- ❖ Current controlling resistors in Gate and Drain
- ❖ In-Built Variable regulated DC Power Supply
- ❖ Multi color Circuit Diagram printed on the front of the white board
- ❖ Enclosed in an attractive, light weight, High Quality, Poly Coated Imported Pine Wooden cabinet
- ❖ On Board 3^{1/2} Digit Digital Voltmeter and Ammeter
- ❖ User friendly Designed
- ❖ Very Easy for Operation
- ❖ Interconnections by 2mm high quality banana sockets and pins
- ❖ Maximum Test points to explore all the corners of experiment
- ❖ 1 Year Warranty

Technical Specifications

▪ AC Mains Power Supply	: 230V \pm 10%, 50Hz
▪ DC Power Supply	: Two Nos. Variable \pm 12V/500mA
▪ Gate-Source Voltage V_{GS}	: IC Regulated variable 0V to -12V/500mA
▪ Drain-Source Voltage V_{DS}	: IC Regulated variable 0V to +12V/500mA
▪ Transistor Package	: TO-72
▪ JFET Type	: N Channel Depletion
▪ JFET Used	: BFW10
▪ Pin Count	: 4 Gate, Drain Source and Substrate



An ISO 9001:2015 Co.

▪ Gate Current Controlling Resistor	: MFR 100KΩ, ±5%
▪ Drain Current Controlling Resistor	: MFR 10KΩ, ±5%
▪ Max. Drain-Source Voltage V_{DS}	: 30V DC
▪ Max. Drain-Gate Voltage V_{DG}	: 30V DC
▪ Reverse Gate-Source Voltage V_{GSR}	: -30V DC
▪ Forward Gate Current I_{GF}	: 10mA DC
▪ Operating Junction Temperature	: -65 to +150°C
▪ Total Digital Meters	: 03 (2 Voltmeter and 1 Ammeter)
▪ Digital Voltmeters	: 0-20V and 0-20V (Two Nos.)
▪ Digital Ammeter	: 0-20mA (One No.)
▪ Meter Display	: Red Color, 3 ^{1/2} Digit, LED Display
▪ Weight	: 2.0 kg (approx)
▪ Dimensions (mm)	: L 220 x W 270 x H 110
▪ Interconnections	: 2mm Banana sockets
▪ Operating Temperature	: 0-50°C, 80% RH

Learning Scope

- To Study the Drain characteristics of JFET.
- To Study the Transfer characteristics of JFET.
- To Determine VGS Cut-off Voltage of given JFET.

Other Instruments Required : Nil

Accessories Included : Set of Patch Cord and Details Instruction Manual