# **Rishabh Portable Measuring Kit Instruction**





Fig: - Portable Measuring Kit Layout & Connections

#### **Instructions**

- 1. Connect Voltage Probes to Voltage Terminal on Portable Kit. Here V1 Represent R Phase, V2 Y Phase, V3 B Phase, VN Neutral Conductor.
- 2. Connect Current Clip on CT's to Current Terminal R Phase Clip on CT to I1 I1', Y Phase Clip on CT to I2 I2', B Phase Clip on CT to I3 I3'.
- 3. Aux Supply is looped from R Phase. That is R Phase and Neutral = Aux Supply.
  - a) So for Single phase supply connect Voltage connection to R phase and Neutral and CT to I1-I1'
  - b) In Case of 3 phase 4 wire, connect voltage connections to R Phase, Y Phase, B Phase, Neutral and CT's to I1, I2, I3
  - c) In Case of 3 Phase 3 Wire, connect voltage connections to R Phase, Y Phase, B Phase (Loop B phase and Neutral conductor (voltage not greater than 414V L-L or else meter will get damage) to turn on the meter or connect Neutral conductor to Neutral terminal) and CT's to I1,& I3
  - d) ON and OFF Toggle Switch to complete the aux supply connection and to turn ON the meter
- 4. MODBUS Communication terminal BAG where B is Positive, A is negative, G is ground. To program, read and to fetch the data logged parameters.
- 5. USB Connection to fetch the logged parameters and to program the meter.

Note - Aux supply below less than 100Volts will make meter turn OFF. If R phase voltage goes less than 100 Volts then meter will turn OFF until voltage does not cross the 100V limit.

Also, in case meter is not getting on even in case of voltage is between 100V to 550V AC (\*100V to 4154L-L in case of 3 phase 3 wire) then open the 4 side screws of the kit and check the connection.

### **Input Supply Details**

Nominal input voltage (AC RMS) - 100VLL to 600 VLL programmable on site. - 57.5VLN to 346.42 VLN

System PT primary values - 100VLL to 1200kVLL programmable on site.

Nominal input current - 1A / 5A onsite programmable



System CT primary values - From 1A to 9999A

Max continuous input current - 200% of nominal value

Higher Auxiliary supply range - 100-550V AC/DC (230V AC/DC nominal)\*

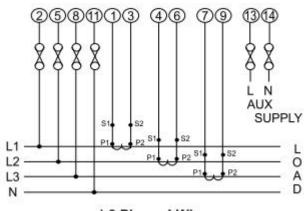
Frequency - 45Hz to 66Hz



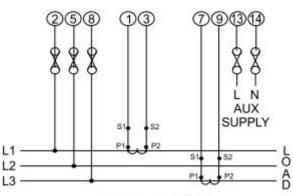
#### **Environmental**

- 1. Operating temperature -20 to +70°C
- 2. Storage temperature -25 to +75°C
- 3. Relative humidity 0... 95%RH (non condensing)

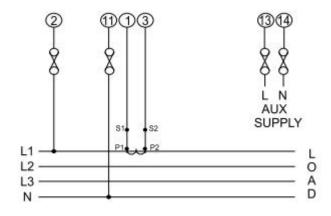
## **Electrical Connection Diagram**



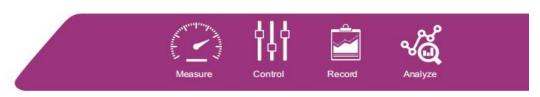




b) 3 Phase 3 Wire



c) Single Phase Load







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