

3 PHASE AMMETER



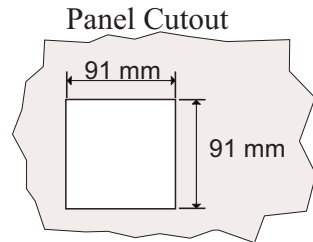
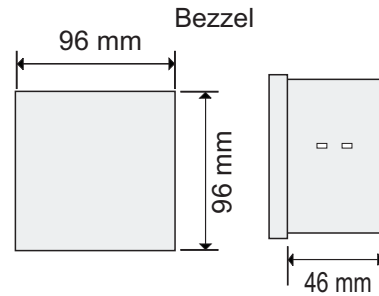
FEATURES

- State of Art Microcontroller Based Design
- 1 Line 4 Digit ultra bright LED display
- Site programmable CT ratio (Primary & Secondary)
- True RMS measurement
- Password Protection
- Harmonics THDI
- RS 485 Computer Interface (Optional)
- Auto Ranging
- Universal Aux. Supply

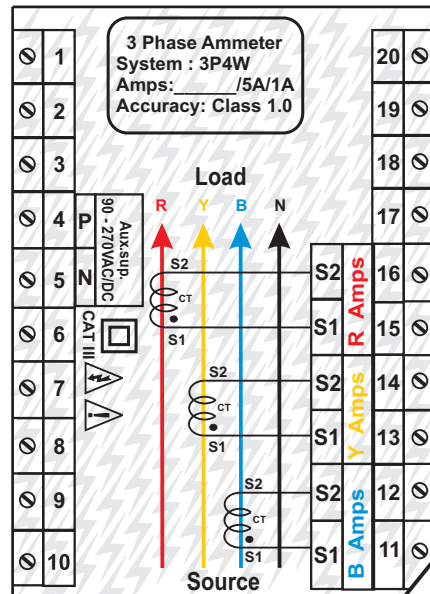
PARAMETERS

- ✓ Amps : R Phase
- Y Phase
- B Phase
- Average
- ✓ THDI : R
- Y
- B
- Average

MECHANICAL DIMENSION



Electrical Wiring / Connection Diagram



DISPLAY PAGES

| Page | Symbol | PARAMETERS |
|------|--------|---|
| 1 | A | Amps , R , Y , B & Average |
| 2 | | Harmonics - Amps - THDI Phase wise & Average. |

Manual Scroll Mode :

In this mode the display shows all parameters of the selected page one after another. The parameters of next / previous page can be viewed by pressing or key.

Auto Scroll Mode :

In this mode the display shows all parameters of page1 one after another , then scroll to page2 and shows all parameters of page 2 one after another and so on.

Display Freeze Mode :

This mode can be activated by pressing key during normal meter operation.

When this key is pressed the display will remain on the parameter it is currently displaying.

In this mode key can be pressed to see the other parameters of this page only , but to scroll to next page parameters first you have to come out of freeze mode. Pressing key once again will bring the meter out of freeze mode.

Note :

3 Parameters : When this option is selected in menu 8 the following parameters will be displayed

Page 1 IR IY IB
Page 2 THDR THDY THDB

4 Parameters : When this option is selected in menu 8 the following parameters will be displayed

Page 1 IR IY IB I Avg
Page 2 THDR THDY THDB THDI Avg

1 Parameter : When this option is selected in menu 8 the following parameters will be displayed

Page 1 I Avg
Page 2 THDI Avg

SPECIFICATIONS

| | |
|--------------|---|
| Input | : 3 phase 4 wire |
| Amps | : 0.015 to 6.00 Amps |
| Burden | : 0.2 VA max. per input for Current 3 VA max. on Aux. Supply |
| Aux. Supply | : 90 - 270 VAC / DC |
| Display | : 1 Line x 4 Digit {0.56 Inches 7 Segment LED Display} |
| Computation | : True RMS |
| Frequency | : 45 Hz - 65 Hz. |
| Ambient | : -10 to 55°C |
| Storage | : -20 to 75°C |
| Humidity | : < 95 % Non-condensing |
| Weight | : 280gms |
| Dimensions | : 96 X 96 X 46 mm (L x W x D) |
| Panel Cutout | : (90 ^{+1.0})mm X (90 ^{+1.0})mm |
| Mounting | : Flush Mounting with side clamps. |

Measurement range :

| | |
|----------------|-----------------------------------|
| Amps | : 0.015 to 6.00 Amps |
| Display update | : 1Sec |
| Hz | : 45.0 to 65.0HZ |
| Resolution | : Auto ranging |
| Accuracy | : ±0.5% of full scale for current |

PROGRAMMING

- 1) Press key to enter Program Mode.
- 2) The Meter Shows Password Entry Page { PASS and then 0000}.

Enter the Password using Key to increment count & Key to move to the next digit. After entering the password press key, if the pass word is correct, the unit will enter the program mode.

Default factory set password is 2000

- 3) Following Programming menus are available

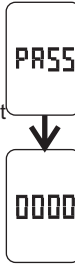
| Menu | Symbol | Description |
|------|--------|---------------------------------------|
| 1 | Addr | Unit Address for RS485 communication. |
| 2 | CTPr | To set CT primary value |
| 3 | CTSC | To set CT secondary value |
| 4 | nPAS | To set new password |
| 5 | bAUD | To set baud rate |
| 6 | PAR | To select parity |
| 7 | SCrL | To Select Auto / Manual Scroll |
| 8 | dYrD | To select the number of display rows |
| 9 | USPd | To select next parameter update speed |

Select the Menu to be edited using Keys and press Key to enter respective menu.

Menu 1: (Unit Address for RS485 communication)

when Key is pressed the display shows { 001}.

The address can be edited using & Keys. After entering desired value press key to save value.



Menu 2: (To set CT Primary)

when Key is pressed the display shows 0001 (Present value)

The value can be edited using & Keys. After entering desired value press key to save value.



Menu 3: (To set CT Secondary)

when Key is pressed the display shows 0001 (Present value)

The value can be edited using & Keys. After entering desired value press key to save value.



Menu 4: (To set New Password)

when Key is pressed the display shows 0000 (Current password)

The password can be edited using & Keys. After entering desired value press key to save value.



Menu 5: (To set the Baud Rate)

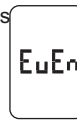
when Key is pressed the display shows 9600 current Baud rate The Baud Rate for RS485 communication can be set using key.

After entering desired value press key to save value. Maximum Baud rate 9600.



Menu 6: (To set the Parity)

when Key is pressed the display shows current parity . The Even / odd / none parity can be set using Key. After entering desired value press key to save value.

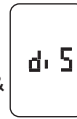


Menu 7: (To select Auto / Manual Scroll)

when Key is pressed the display shows d I S / En.

You can select "dIS" to disable Auto scroll or select "EN" to enable Auto scroll using & Keys.

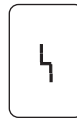
After entering desired value press key to save value.



Menu 8: (To select display rows)

when Key is pressed the display shows 1/3/4.(current display mode)

You can select 1/3/4 Parameter display mode using key . After entering desired value press key to save value.



Menu 9: (To select next parameter update speed)

when Key is pressed the display shows AUG (average) , SIO (slow) , uSLO (very slow) uFAS (very fast) , FAST (fast)

You can select any one parameter update rate.

This rate will determine the speed of change of displayed parameters within a page .for example in Page1 Amp reading (IR , IY , IB , I Avg can be seen) The time to change from IR to IY is determined by USPd (update speed) After entering desired value press key to save value.



Press Key to come out of Program MODE.

Safety Precautions :

All safety related codifications, symbols and instructions that appear in this operating manual or on the equipment must be strictly followed to ensure the safety of the operating personnel as well as the instrument.

If the equipment is not used in a manner specified by the manufacturer it might impair the protection provided by the equipment.

If there is physical damage to the unit then do not use it.

Read complete instruction prior to installation and operation of the unit.

Wiring Guidelines :

- 1) To Prevent the risk of electric shock power supply to the equipment must be kept OFF while doing the wiring arrangement.
- 2) Wiring shall be done strictly according to the terminal layout with shortest connection. Confirm that all connection are correct.

Caution :

- 1) To ensure the safe operation of unit , check the wiring and connections.