

EX Series 3 1/2 Digital Voltage/Ampere Meter User's Manual



Features

- ⊙ Reliable performance & high accuracy
- ⊙ Sampling rate:2.5 times/s
- ⊙ Zero point adjustable
- ⊙ Wide display range:±1999

For your safety, please read following content carefully before you are using the meter!

■ Safe Caution

※ Please read the manual carefully before you use the meter!

Please comply with the below important points:

- ⚠ Warning An accident may happen if the operation does not comply with the instruction.
- ⚠ Notice An operation that does not comply with the instruction may lead to product damage.

※ The instruction of the symbol in the manual is as below:

- ⚠ An accident danger may happen in a special condition.

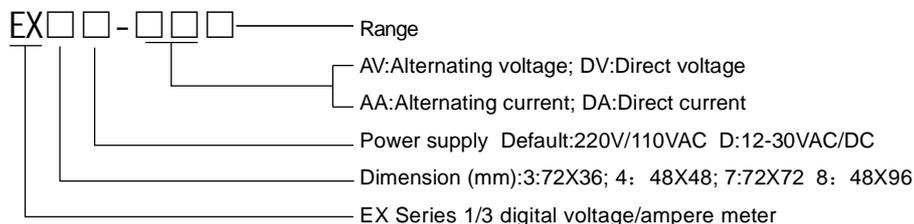
⚠ Warning

- 1.A safety protection equipment must be installed or please contact with us for the relative information if the product is used under the circumstance such as nuclear control, medical treatment equipment, automobile, train, airplane, aviation, entertainment or safty equipment, etc. Otherwise, it may cause serious loss, fire or person injury.
- 2.A panel must be installed, otherwise it may cause creepage (leakage).
- 3.Do not touch wire connectors when the power is on, otherwise you may get an electric shock.
- 4.Do not dismantle or modify the product. If you have to do so, please contact with us first. Otherwise it may cause electric shock and fire.
- 5.Please check the connection number while you connect the power supply wire or input signal, otherwise it may cause fire.

⚠ Caution

- 1.This product cannot be used outdoors. Otherwise the working life of the product will become shorter, or an electric shock accident may happen.
- 2.When you connect wire to the power input connectors or signal input connectors, the moment of the No.20 AWG (0.50 mm²) screw tweaked to the connector is 0.74n.m - 0.9n.m. Otherwise the connectors may be damaged or get fire.
- 3.Please comply with the rated specification. Otherwise it may cause fire after the working life of the product becomes shorter.
- 4.Do not use water or oil base cleaner to clean the product. Otherwise it may cause electric shock or fire, and damage the product.
- 5.This product should be avoid working under the circumstance that is flammable, explosive, moist, under sunshine, heat radiation and vibration. Otherwise it may cause explosion.
6. In this unit it must not have dust or deposit, otherwise it may cause fire or mechanical malfunction.
7. Do not use gasoline, chemical solvent to clean the cover of the product because such solvent can damage it. Please use some soft cloth with water or alcohol to clean the plastic cover.

1. Code Illustration



2. Ordering Code

◆AC digital voltage meter

Code	Measuring range	Resolution	PT	Accuracy
EX□□-AV0.2	200mV	100uV	Direct input	±0.5%F.S±2Digit
EX□□-AV2	2V	1mV	Direct input	±0.5%F.S±2Digit
EX□□-AV20	20V	10mV	Direct input	±0.5%F.S±2Digit
EX□□-AV200	200V	100mV	Direct input	±0.5%F.S±2Digit
EX□□-AV600	600V	1V	Direct input	±1%F.S±2Digit

◆AC digital ampere meter

Code	Range	Resolution	CT	Accuracy
EX□□-AA0.2	200mA	100uA	Direct input	±0.5%F.S±2Digit
EX□□-AA2	2A	1mA	Direct input	±0.5%F.S±2Digit
EX□□-AA5	5.00A	10mA	Direct input	±1%F.S±2Digit
EX□□-AA20	20A	10mA	20A:5A	±0.5%F.S±2Digit
EX□□-AA200	200A	100mA	200A:5A	±0.5%F.S±2Digit

◆DC digital voltage meter

Code	Range	Resolution	Accuracy
EX□□-DV0.2	200mV	100uV	±0.5%F.S±2Digit
EX□□-DV2	2V	1mV	±0.5%F.S±2Digit
EX□□-DV20	20V	10mV	±0.5%F.S±2Digit
EX□□-DV200	200V	100mV	±0.5%F.S±2Digit
EX□□-DV500	500V	1V	±1%F.S±2Digit

◆DC digital ampere meter

Code	Range	Resolution	CT	Accuracy
EX□□-DA0.002	2mA	1uA	Direct input	±0.5%F.S±2Digit
EX□□-DA0.02	20mA	10uA	Direct input	±0.5%F.S±2Digit
EX□□-DA0.2	200mA	100uA	Direct input	±0.5%F.S±2Digit
EX□□-DA2	2A	1mA	Direct input	±0.5%F.S±2Digit
EX□□-DA20	20A	10mA	20A:75mV	±0.5%F.S±2Digit
EX□□-DA200	200A	100mA	200A:75mV	±0.5%F.S±2Digit

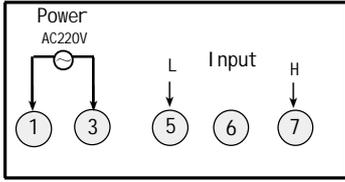
Note:

- (1) All CTs,PTs & splitters above are basic models, their accuracy≤0.3% . Other ranges can be ordered as specified indication : such as AC primary current :10A、15A、30A、75A、250A、1500A....., DC primary current 10A、15A、75A、300A、1500A....., AC primary voltage:1KV、6KV、11KV、35KV、110KV.....
- (2) Be quipped with AC current transformer ,and the secondary current is 5A .equipped with AC voltage transformer ,the secondary voltage is 100V, be equipped with DC splitter , the secondary voltage is 75mV. Special requirements should be specified in advance .
- (3) According to user's different requirements , we can select CTs/PTs/Splitter for them .

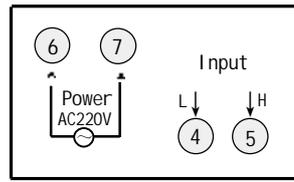
3. Technical Parameter

Max.display	1999 (average value for AC signal)
Input mode	Single-terminal input
A/D convert	Dual integration
Overflow indication	"1" or "-1"
Polarity	Display "-"for DC signal only
Power supply	AC 220V±10%, 50/60Hz; AC/DC 12-30V can be ordered
Energy consumption	≤4.5VA
Dielectrical strength	AC 1500V/1min
Insulation impedance	≥100MΩ DC 500V
Frequency range of AC signal	40~200Hz

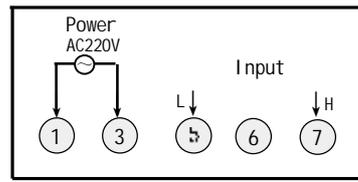
4. Connecting Drawing



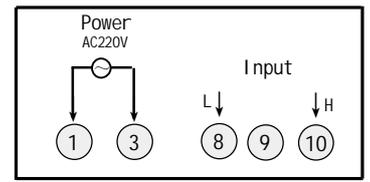
EX3 AC/DC voltage/ampere meter



EX4 AC/DC voltage/ampere meter



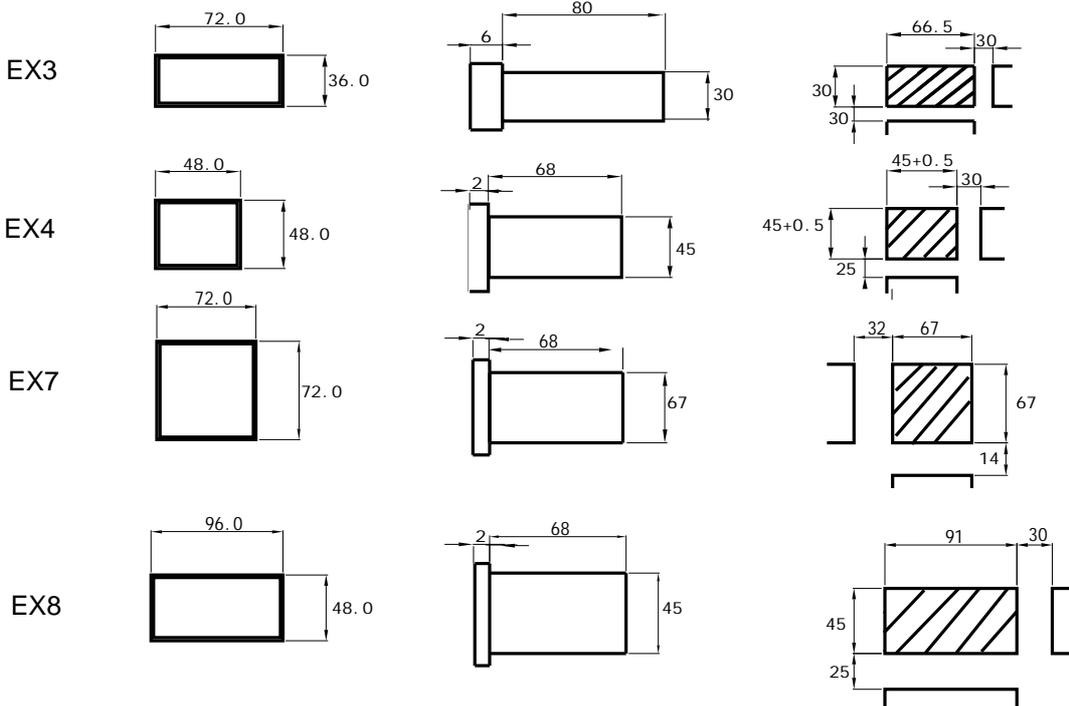
EX7 AC/DC voltage/ampere meter



EX8 AC/DC voltage/ampere meter

Note: Connect according to the actual product if any changes

5. Dimension (unit:mm)



6. Caution

- 1、 The meter should be heating for 15 min before using .
- 2、 Available ambient temperature is 0~40℃ , relative humidity is below 85% .
- 3、 It should be adjusted every year .
- 4、 Avoid vibration and crash . Don't use it under the circumstance which is over dusty / harmful chemicals and gas .
- 5、 If the input signal be interferenced by high frequency signal ,please apply high frequency filter in the system .
- 6、 Input wire could't be too long .If the distance can't be shortened ,please use twisted pair wire . shielding layer connects with low-terminal of the signal .
- 7、 If stored for a long time and unused ,connect on power for more than 4 hours once every 3 months .
- 8、 Don't expose it in the sunshine long term ,the available store temperature is -10~70℃ .Please make sure not to contact with gasoline, chemical solvent .