Model 8300 Three Phase Programmable Digital Wattmeter

Apparent, Active and Reactive Power, Voltage and Current Power Factor

Operates with unbalanced loads and waveform distortion

Manual or Autoranging

Indicates power factor correction capacitors

RS232/USB interface Included PC_W3P Software for Windows ®

Specifications

Voltage
True RMS measurement
Ranges : 15, 50, 150, 500 V
Accuracy (45 - 500 Hz) : ±(0.2% V + 0.2% R)
Overload : 1000 V peak, 1 s
Crest factor : max. 3 at full scale (1.5 at 500 V)
Input Impedance : 4,8 MΩ // 100 pF

Current
True RMS measurement
Ranges : 0.5, 1.5, 5, 15 A (internal)
Up to 5000A with external transformer
Accuracy (45 - 500 Hz) : ±(0.2% V + 0.2% R)
Overload : 30 A continuous, 60 A 1s
Crest Factor : max. 3 at full scale (1,5 at 15 A)
External transformer : selectable Ip / Is ratio

Active Power
7.5W to 7500W (16 ranges)
Accuracy : ±(0.3% V + 0.3% R)
(U and I > 1/10 of range)

Reactive Power : 7.5VAr to 7500VAr (16 ranges)
Apparent Power : 7.5VA to 7500VA (16 ranges)
Power Factor : -1.000 to +1.000 (lead/lag)

Interface : USB/RS232 (3 wires) Xon-Xoff. Protocol
Transmission Rate 1200/9600 Baud
All functions and ranges programmable.

Safety : CEI 1010-1 Cat III 600 V
Power : 230 V ±10 % , 50-60 Hz, max. 10 W
Dimensions : 240 x 240 x 88 mm (W x L x H)
Weight : about 1,5 kg
Misc. : Simultaneous display of 4 parameters (10mm LED display).

OPW2 Option : 3 isolated wide bandwidth (100kHz) analog outputs (U, I or P according to display)

* V : Measured Value R : Range

Distributed by:

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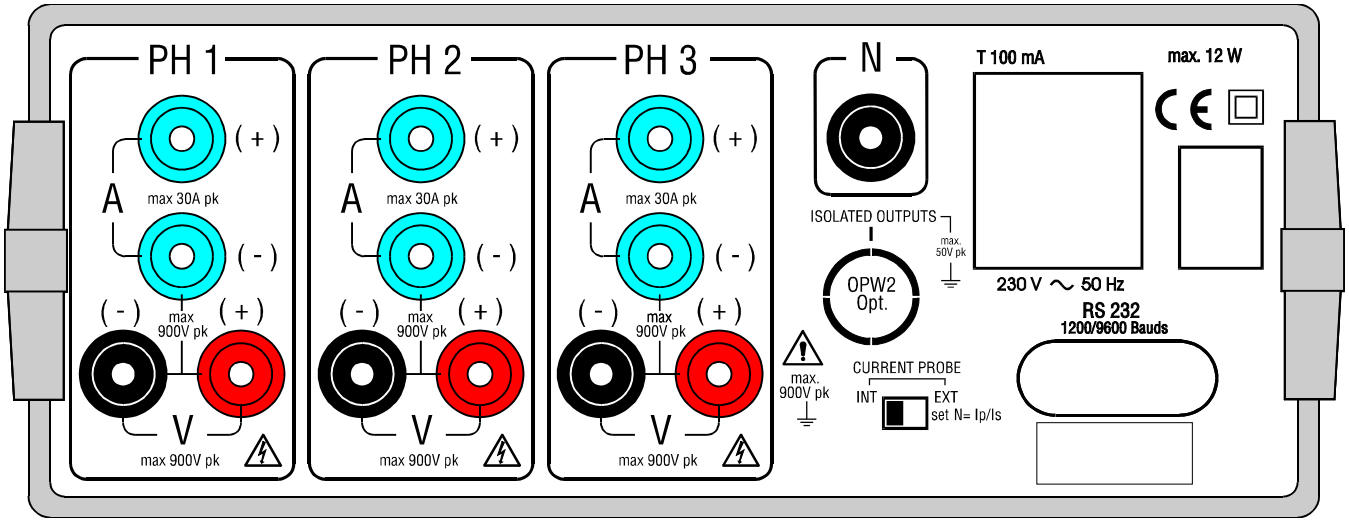
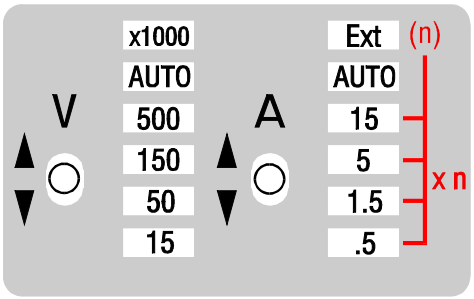


The ISW8300 Wattmeter is intended to measure power in single or three phase (balanced or unbalanced) networks. The voltage measurement circuits are isolated from one another and from current measurement circuits.

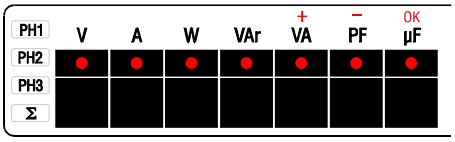
Besides power factor, active , reactive and apparent power measurements, it integrates a true RMS voltmeter and ammeter.

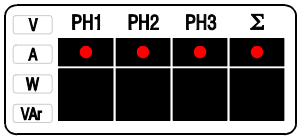
It is extremely resistant to overloads, specially over currents (60A), even on most sensitive ranges.

All functions and ranges are programmable through the standard RS232 interface. A free demonstration program, running under Windows® is included.

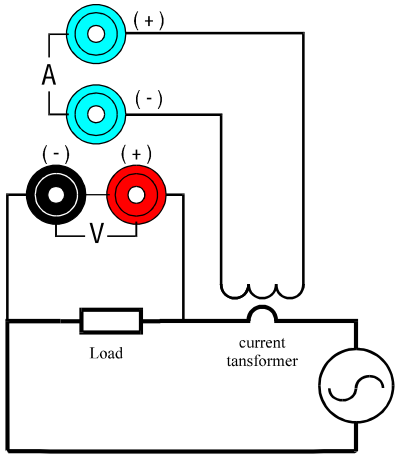


Four voltage ranges and four current ranges enable power measurements ranging from 7.5W to 7500W (16 ranges).





The different quantities (voltage, current, power, power factor) may be simultaneously displayed for three phases (a fourth display shows the total or average value). But it is also possible to display for each phase (or for the three phase network) voltage, current active power and reactive power.



With an external current transformer, the maximum power reaches 2500kW and on site measurements are possible with current probes.
The current ratio of the transformer is entered to provide direct reading of current or power (no multiplying factor).

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