POWERSCOUT™ 12
Twelve (12) Channel Power Meter

The PowerScout™ PS12HD has been designed to be one of the safest and most flexible power meters on the market today, since it can monitor up to 4 three phase or 12 single phase circuits from a single voltage reference. All PS12 power meters include all four Serial/Ethernet BACnet and Modbus communication protocols. Any DENT Standard and Revenue Grade mV output current transformers can be used to monitor currents from 0.25 to 4000 Amps. This reduces lead time and number of skus required when compared to other power meters that must be factory configured. The CTs are sold separately as shown on the Standard and Revenue Grade CTs product data sheets. Additional features such as the Tri-Color PhaseChek™ display, high voltage cover (safer installation), positive and negative Modbus Registers for bi-directional metering, ViewPoint™ HD configuration software, Revenue Grade 0.2% accuracy, NIST Calibration Certificate, displays real time information, pulse outputs and is internally fused. The ViewPoint™ HD Configuration Software will allow for easy setup or reconfiguration while sitting at your desk or in the field through the use of a single USB Port and standard USB A-B cable. All setup table information can be saved to allow for easy programming of multiple meters with similar configurations. The optional display will provide local streaming of data once installed. For more information regarding the PS12HD and any of its accessories or to discuss your application in further detail, please contact your ACI Sales representative.

Applications: Energy and Demand Metering, Data Centers, Bi-Directional Metering, Load Surveys, LEED/Green Projects, Real Time Power Monitoring in Commercial, Retail and Industrial Environments
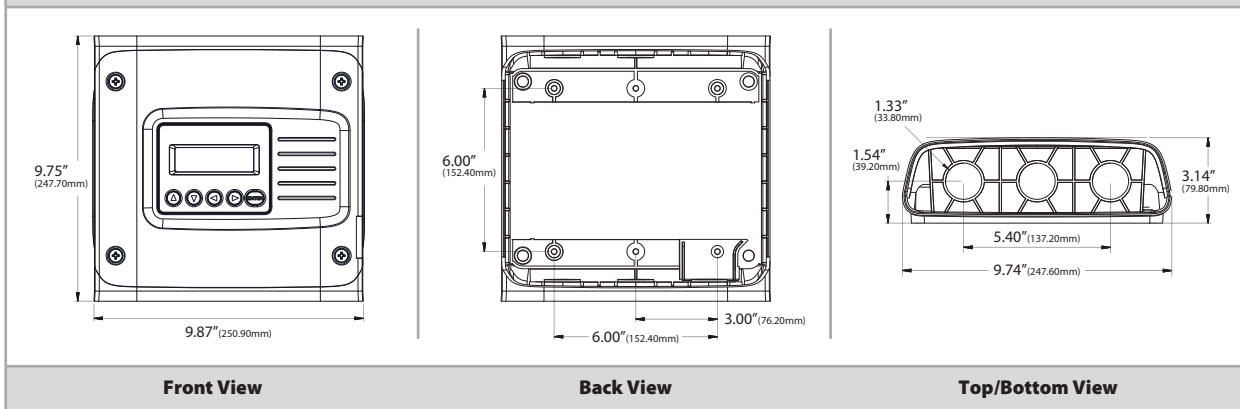
PRODUCT SPECIFICATIONS

Service Type:	Single Phase, Split Phase, Three Phase - 4 Wire (Wye), Three Phase - 3 Wire (Delta)
Power:	From L1 Phase to L2 Phase	90 to 600 VAC RMS CAT III 50/60 Hz, 500 mA AC maximum
AC Protection:	0.5A Fuse 200kA interrupt capacity
Power Output:	Unregulated 12 VDC Output, 200 mA, self-resetting fuse
Voltage Channels:	80 to 346 Volts AC Line to Neutral, 600 VAC Line to Line, Cat. III
Current Channels:	12 Channels, 0.525 VAC max, 333 mV CTs, 0 to 4000 Amps dependent on CTs
Maximum Current Input:	150% of Current transducer rating (mV CTs) to maintain accuracy	Measure up to 4000 Amps (Rocoil™ CTs)
Measurement Type:	True RMS using High Speed Digital Signal Processing (DSP) with continuous sampling
Line Frequency:	50/60 Hz
Waveform Sampling:	1.8 kHz
Parameter Update Rate:	1 second
Measurements:	Volts, Amps, kW, kVAR, kVA, aPF, dPF, kW Demand, kVA Demand, Import (Received) kWh, Export (Delivered) kWh, Net kWh, Import (Received) kVAh, Export (Delivered) kVAh, Net kVAh, Import (Received) kVARh, Export (Delivered) kVARh, Net kVARh, THD, Theta, Frequency, All parameters for each phase & system total
Accuracy:	0.2% ANSI C12.20-2010 Class 0.2
Resolution:	Values reported in IEEE-754 single precision floating point format (32 Bit)
Display:	4-Line Display, Tri-Color Backlight (PhaseChek™)
Pulse Outputs:	Open Collector, Optically Isolated, 5mA maximum current, 40V maximum open voltage
Hardware:	RS-485, Ethernet and USB (For ViewPoint™ HD Configuration Only)
Supported Protocols:	Modbus (Using SunSpec IEEE-754 Single Precision Floating Point Model) or BACnet
Maximum Distance:	1200 meters (3,937 Feet) with data range of 100K bits/second or less
Supported Baud Rates:	9600, 19200, 38400, 57600, 76800, 115200 Baud
**Data Bits	Parity	Stop Bit**	8	None, Even, One	2, 1
Data Formats:	Modbus RTU, BACnet MS/TP, Modbus TCP or BACnet IP
Operating Temperature Range:	-4 to 140ºF (-20 to 60ºC); At -20ºC (-4ºF) a minimum of 100 VAC is required to power the PS12HD
**Operating	Storage Humidity Range:**	5 to 95%, non-condensing
**Enclosure Material	Flammability Rating:**	ABS Plastic	UL 94V-0
High Voltage Cover IP Rating:	IP40
Enclosure Knockouts:	1" EMT Conduit Knockouts (Quantity: 6) No Drilling Required
Wiring Connections	De-pluggable, Screw/Push Lock Terminal Blocks (Polarity Sensitive - PhaseChek™ Indication)
Wire Size:	12-22 AWG (5.48 to 0.397 mm²)
Mounting:	Panel Mount/Enclosure or PCBA Version: 0.5" (12.7 mm) Standoffs, #6 (Quantity: 4 User Supplied Screws)
ViewPoint™ HD Software System:	Windows® 10, Windows® 8, Windows® 7 (Included with Purchase of Meter)
Security:	2 Password Levels
Agency Approvals:	RoHS2, WEEE, ISO 9001-2008, Made in USA, BTL (BACnet) Certified
	UL Recognized: Circuit Board Only Version	UL Listed: Indoor Enclosure Version (File # E186827)
	CE (**EN 61000-6-4:** Class A)	**ANSI C12.20 Class 0.2:** NIST Traceable Calibration Certificate Included
Product Weight:	See Ordering Grid on Back, *CTs not Included*
Product Dimensions (L x W x H):	**Enclosure:** 9.75" (247.70 mm) x 9.87" (250.90 mm) x 3.14" (79.80 mm)
	PCBA Version (Circuit Board Only): 5.00" (127.00 mm) x 8.5" (215.90 mm) x 2.50" (63.50 mm)

Automation Components, Inc.

DIMENSIONAL DRAWING

| Front View | Back View | Top/Bottom View |

STANDARD ORDERING

Model # Example: PS12HD-C-D-N -OR- 144082

Model #	Item #	Description	Product Weight	Modbus*		BACnet*	
				RTU	TCP/IP	MS/TP	IP
PS12HD-C-D-N	144082	Powerscout 12HD with Enclosure & Display	3.15 lbs. (1.43 kg)	•	•	•	•
PS12HD-C-N-N	144083	Powerscout 12HD with Enclosure & No Display	2.90 lbs. (1.32 kg)	•	•	•	•
PS12HD-P-D-N	144084	Powerscout 12HD with Mounting Plate & Display	1.65 lbs. (0.749 kg)	•	•	•	•
PS12HD-P-N-N	144085	Powerscout 12HD with Mounting Plate & No Display	1.40 lbs. (0.635 kg)	•	•	•	•

Note*: Communication Protocols Included

RoHS COMPLIANT 2002/95/EC