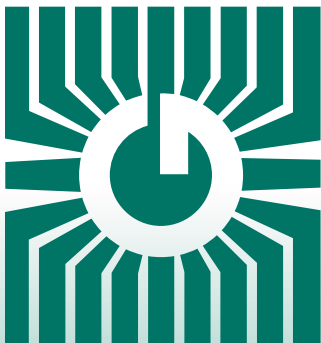


GREYSTONE

ENERGY SYSTEMS INC



HIGH ACCURACY LIQUID PRESSURE TRANSMITTERS HAWP Series



Precision pressure control/sensing

FEATURES:

- Differential and gauge pressure models
- Four, switch selectable, ranges per model
- Jumper selectable outputs: 4-20mA, 0-5 Vdc or 0-10 Vdc
- Optional backlit (jumper-selectable) LCD
- All stainless steel sensor construction
- Port swap switch to correct incorrect plumbing
- Switch selectable uni or bi-directional
- IP65 (Nema 4X) hinged enclosure

*Peace of mind
through reliable
pressure monitoring*

GREYSTONE HAS AN ISO 9001 REGISTERED QUALITY SYSTEM

APPLICATIONS:

- Pump Monitoring
- Chiller Monitoring
- Filter Monitoring
- HVAC Systems

SPECIFICATIONS:

Media Compatibility.....	17-4 PH stainless steel		
Pressure Ranges	4 ranges per model - Switch selectable		
	0-5/10/25/50 psig/d	0-.5/1/2.5/5 Bar	0-50/100/250/500 kPa
	0-10/20/50/100 psig/d	0-.75/1.5/3.75/7.5 Bar	0-75/150/375/750 kPa
	0-20/40/100/200 psig/d	0-1/2/5/10 Bar	0-100/200/500/1000 kPa
	0-50/100/250/500 psig/d	0-3/6/15/30 Bar	0-300/600/1500/3000 kPa
Line Pressure	Max. line pressure is the highest of the selectable ranges on each model i.e.: HAWP-D-101 has a maximum line pressure of 50 psi		
Proof Pressure	Max. 2X highest range per model		
Burst Pressure	Max. 5X highest range per model		
Accuracy	± 0.5% F.S. of selected range (Range 4 = 1%)		
Pressure Cycles	>100 million		
Surge Damping	Normal: 4 second averaging Slow: 8 second averaging, switch selectable		
Sensor Operating Range.....	-40° to 85°C (-40° to 185°F)		
Compensated Range	0° to 55°C (32° to 130°F)		
Operating Environment	0° to 50°C (32° to 122°F), 10-90% RH condensing		
Stability	±0.25% typical (1 year)		
Zero Adjust	Push-button auto-zero and digital input		
Operating Humidity	0 to 95% RH non-condensing		
Power Supply.....	18 to 28 Vac/Vdc (non-isolated half-wave rectified)		
Consumption	100 mA max @ 24 Vdc with LCD backlight, 35 mA with backlight disabled		
Output Signal.....	3-wire transmitter; user selectable 4-20mA active(sourcing), 0-5V and 0-10V		
Pressure Connections	1/8" NPT female		
Enclosure.....	ABS, hinged lid with gasket, IP65 (Nema 4X) 145 X 100 X 64 mm (5.7" X 3.95" X 2.5")		
Shock	100G, 11 mSec, 1/2 sine		
Vibration	10G peak 20 to 2000 Hz 10K ohms min for voltage output		
Wiring Connections.....	Screw terminal block (14 to 22 AWG)		
Optional LCD Display	35 mm x 15 mm (1.4" w x 0.6" h) alpha-numeric 2 line x 8 character Resolution - 1 psi Backlight - Enable or disable via jumper		



HAWP-G



HAWP-D

DESCRIPTION:

The Wet-Wet pressure transmitter is designed with dual sensors that enable it to accept high differential pressure ranges. The gauge pressure transmitter is designed with a single sensor that enables it to accept high pressures ranges.

Both transmitters can accept ranges from 5 PSI to 500 PSI. All models can handle overload pressure 2X the maximum full scale range and burst pressure is 5X the maximum full scale range. Features include field selectable pressure ranges and output signal types for the most flexible applications. Typical HVAC applications include monitoring of liquid differential and gauge pressure. The output signal is factory calibrated and temperature compensated for the highest start-up accuracy.

NOTE: When choosing pressure range ensure that the maximum individual port pressure does not exceed the maximum pressure range of the unit. For example, the maximum individual port pressure of the HAWP-D-102 is 100 PSI. Exceeding this may cause damage to the sensors and will give erroneous readings.

PRODUCT ORDERING INFORMATION:

MODEL	Description
HAWP-D	Wet/Wet differential pressure transmitter, jumper selectable outputs
HAWP-G	Gauge pressure transmitter, jumper selectable outputs

CODE	Pressure ranges
101	5, 10, 25 and 50 PSI ranges
102	10, 20, 50 and 100 PSI ranges
103	20, 40, 100 and 200 PSI ranges
104	50, 100, 250 and 500 PSI ranges
105	0.5, 1.0, 2.5 and 5.0 Bar
106	0.75, 1.50, 3.75 and 7.50 Bar
107	1, 2, 5 and 10 Bar
108	3, 6, 15 and 30 Bar
109	50, 100, 250 and 500 kPa
110	75, 150, 375 and 750 kPa
111	100, 200, 500 and 1000 kPa
112	300, 600, 1500 and 3000 kPa

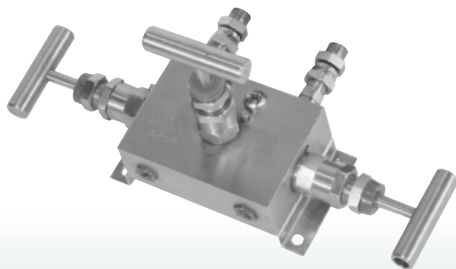
CODE	Option
LCD	Backlit LCD option
VB	Valve and bracket Assembly (Not available in the USA)

HAWP-D - 101 - LCD ← Typical Model Number

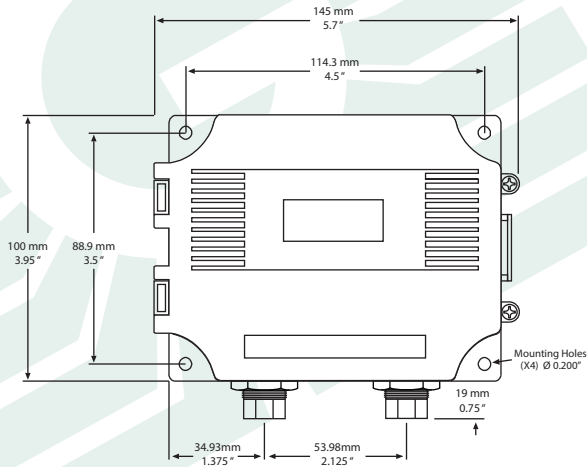
Example: Wet to Wet differential, 5 thru 50 PSI ranges c/w LCD (HAWP-D-101-LCD)

ACCESSORIES:

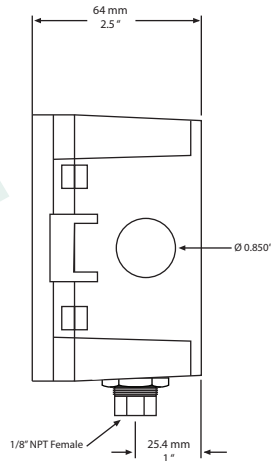
VB Option
3 Way Valve for HAWP-D
Not Available in the USA



DIMENSIONS:

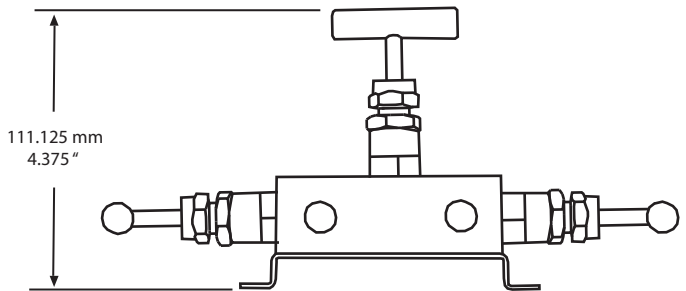
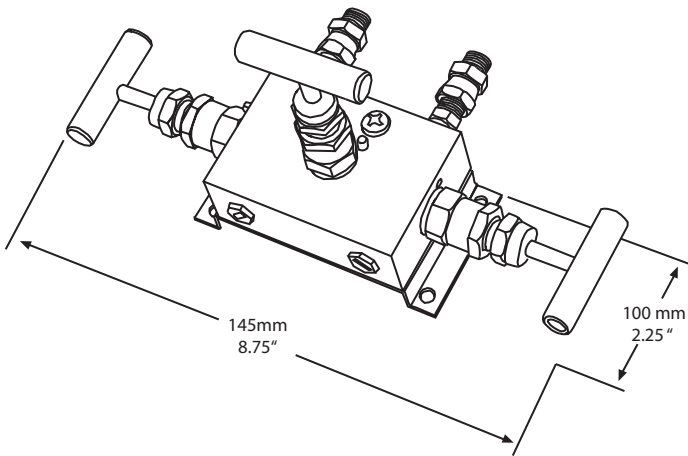


HAWP-D-XXX-LCD



HAWP-G-XXX-LCD

-VB Option
3 Way Valve for HAWP-D
Not Available in the USA



GREYSTONE

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Greystone Energy Systems Inc. is one of North America's largest ISO registered manufacturers of HVAC/R sensors and transmitters for Building Automation Management Systems.

We have conscientiously established a worldwide reputation as an industry leader by maintaining leading-edge design technology, prompt technical support, and a commitment to on-time deliveries. We take pride in our Quality Management System which is ISO 9001 certified, assuring our customers of consistent product reliability.

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