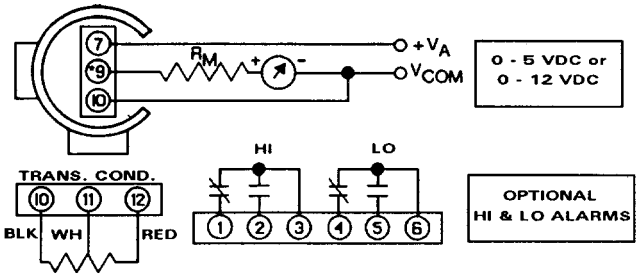
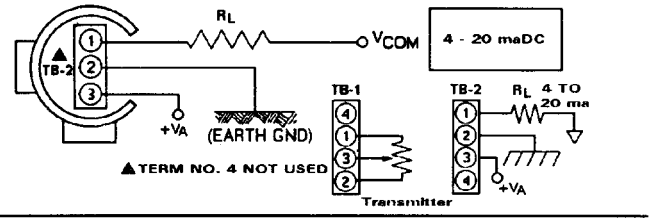
Wiring Connections - General Usage

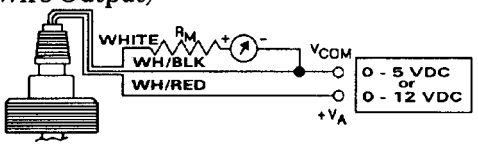
XT-800 Series Configurations (Junction Box Output)



Only with 0-12 VDC Output J-Box Type



(Lead Wire Output)



Important Points!

Product must be maintained and installed in strict accordance with the National Electrical Code and GEMS technical brochure and instruction bulletin. Failure to observe this warning could result in serious injuries or damages.

An appropriate explosion-proof enclosure or intrinsically safe interface device must be used for hazardous area applications involving such things as *(but not limited to)* ignitable mixtures, combustible dust and flammable materials.

Pressure and temperature limitations shown on individual catalog pages and drawings for the specified liquid level transmitters must not be exceeded. These pressures and temperatures take into consideration possible system surge pressures/temperatures and their frequencies.

The liquids used must be compatible with the materials of construction. Specifications of materials will be given upon request.

Physical damage sustained by the product may render it unserviceable.

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140893
Rev. B

XT-800
Compact Transmitters

Instruction Bulletin No. 140893

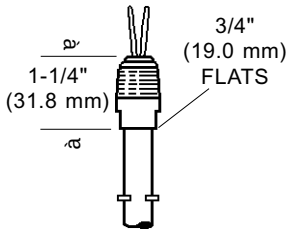
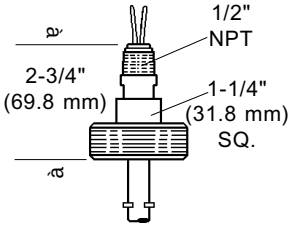
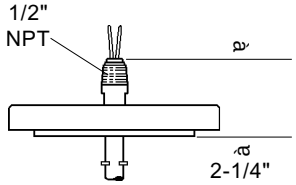
General Information

GEMS XT-800 Series provides signal conditioning for use with our digital receivers or other digital instrumentation and control equipment. The units mount internally and are accurate to ± 1/4", regardless of tank depth

Installation and Maintenance

The XT-800 may be installed through the tank top with mounting plug or flange, up to 30° vertical. Maintenance requirements are minimal and usually limited to occasional removal of accumulated scum or scale.

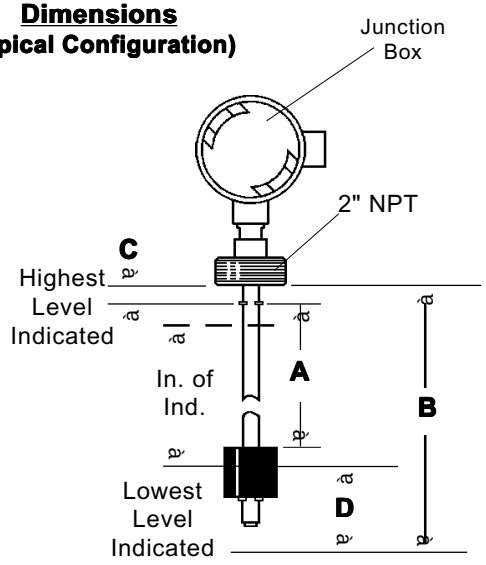
- Mounting Types -

Type 1 1/2" NPT	Type 3 2" NPT	Type 4 3" - 150# Flange
		

Stem Material	Brass or 316 Stainless Steel (Types 1 and 3) 316 Stainless Steel (Type 4)
Mounting Material	Brass or 316 Stainless Steel (Types 1 and 3) Carbon or 316 Stainless Steel (Type 4)
Float Stop Material	Grip Rings (18-8 Stainless Steel)
Operating Temperature*	Buna N Float Oil: -40°F to +230°F (-40°C to 110°C) Water: to +180°F (82.2°C) Stainless Steel Float -40°F to +230°F (-40°C to 110°C)
Operating Pressure	Dependent on Float Type (See Next Page)
Overall Length, Max.	70" (177.8 cm); (Please consult Factory for longer lengths)

* Consult Factory for Higher Temperature Ranges

Dimensions
(Typical Configuration)



Notes

1. Distances for highest and lowest level indicated are based on use in liquid with specific gravity of 1.0 and are approximate values.
2. Indicating length must be specified in even increments of 1/2".

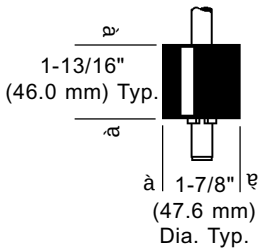
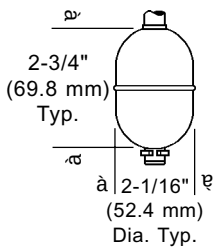
A: Float Travel = Indicating Length +3/8" (9.5 mm)

B: Overall Length (Not to Exceed 70 Inches):
With Buna N Float= Indicating Length +2-1/2" (63.5 mm) + C
With Stainless Steel Float = Indicating length +3-7/16" (87.3 mm) + C

C: Distance to Float Stop = 1/4" (6.4 mm) Min;
1-1/4" (31.8 mm) Min. on Type 1; Specified by Customer

D. Distance Lowest Level Indicated to End of Stem:
With Buna N Float = 1-5/16" (33.3 mm)
With Stainless Steel Float = 1-3/4" (44.5 mm)

Float Types

Float Material	Buna N	Stainless Steel
Float Dimensions		
Part Number	**43359**	**43590**
Min. Liquid Specific Gravity	.55	**.75**
Operating Pressure, Max.	150 PSI	**300 PSI**

Input / Output

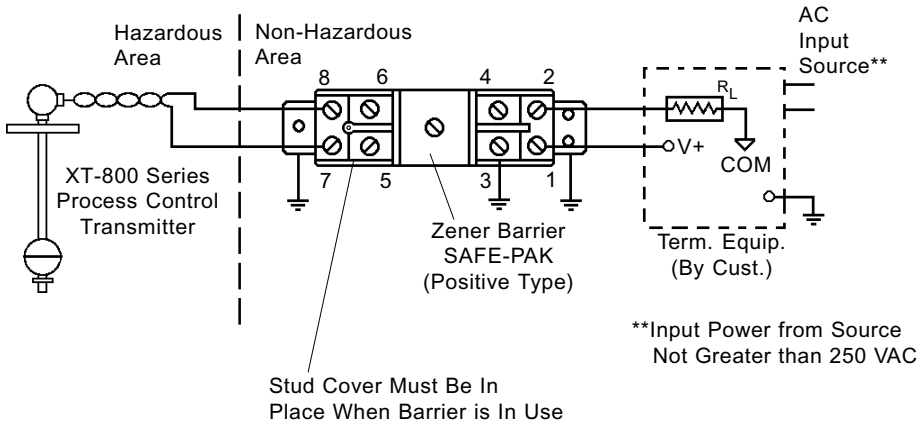
Specify the desired signal conditioning by part number (see below).

Input Voltage	Output Signal	Part Number	Electrical Termination	Compatible Mountings Types 1	3	4
8 to 24 VDC*	0 - 5 VDC	51965	Lead Wires, #22 AWG, 24" (60.9 cm), Teflon Jacket	●	●	●
14 to 30 VDC*	0 - 12 VDC	51970		●	●	●
8 to 24 VDC	0 - 5 VDC	52536	Junction Box		●	●
15 to 30 VDC	0 - 12 VDC	52537			●	●
18 to 30 VDC**	0 - 12 VDC with Hi and Lo Alarms	52544-1			●	●
10 to 40 VDC	4-20 mA	52555			●	●
	4-20 mA	112300	Panel Mount with Plug-In Base	●	●	●

* Stem-Mounted

** Consult Factory for other alarm functions

Typical Application: Process Control System



**Input Power from Source Not Greater than 250 VAC