Technical Information

Honeywell

XYR6000 Smart Transmitter
Series 100 Flange Mounted Liquid Level Models
Specifications
34-XY-03-47 August 2012

Introduction

Building upon the tremendously successful ST 3000 series transmitter line; Honeywell brings simple, safe, and secure wireless technology to its measurement portfolio in the XYR 6000 Series Wireless Transmitters.

The XYR 6000 series measurements are part of the Honeywell OneWireless system and are ISA100.11a Compliant.

Measurement and information without wires! The XYR 6000 wireless transmitter series enable customers to obtain data and create information from remote and hazardous measurement locations without the need to run wires, where running wire is cost prohibitive and/or the measurement is in a hazardous location. Without wires, transmitters can be installed and operational in minutes, quickly providing information back to your system.

XYR 6000 wireless transmitters send information to an ISA100.11a compliant MESH infrastructure.

Wireless Data Managers (WDM) provides the path to bring that information into Experion PKS or any other control system wirelessly via OPC client or Modbus-TCP.

Transmitter power is supplied by two “D” size lithium batteries in an intrinsically safe module with an expected lifetime of up to ten years or by an external 24 Vdc power supply. Transmitter range with the integral antenna is 1000’ (305 m) under ideal conditions..

Models		
STFW128	0 to 400 inH_2O	0 to 1,000 mbar
STFW132	0 to 100 psi	0 to 7bar
STFW12F	0 to 400 inH_2O	0 to 1,000 mbar
STFW13F	0 to 100 psi	0 to 7 bar
STFW14F	0 to 600 inH_2O	0 to 1,500 mbar

Figure 1 – XYR 6000 Wireless Flange Mount Transmitter

Honeywell flange-mount transmitters may be installed directly onto a tank flange and are offered with a variety of tank connections to include ANSI flange connections. Typical applications are high accuracy level measurement in pressurized and un-pressurized vessels in the chemical and hydrocarbon industries. Honeywell flange mount transmitters demonstrate proven reliability in hundreds on installations in a wide variety of industries and applications.

Implement the value of wireless technology today:

- Measure remote access points simply, safe and securely
- Obtain and utilize previously inaccessible information due to high wiring cost or hazardous locations.
- Easily meet Regulatory Requirements
- Improve process efficiency

- Enhance Flexibility to monitor applications:
  - that have no access to power
  - that are remote or difficult to reach
  - that may require frequent reconfiguration
  - where manual readings have been required previously.

Operating Conditions – All Models

Parameter	Reference Condition		Rated Condition		Operative Limits		Transportation and Storage	
	°C	°F	°C	°F	°C	°F	°C	°F
Ambient Temperature	25±1	77±2	-40 to 85[5]	-40 to 185[5]	-40 to 85[5]	-40 to 185[5]	-40 to 85	-40 to 185
Ambient Temperature LCD Display Visible	25±1	77±2	-40 to 85[5]	-40 to 185[5]	-40 to 85[5]	-40 to 185[5]	-40 to 85	-40 to 185
Meter Body Temperature								
All models except STFW14F	25±1	77±2	-40 to 110[1]	-40 to 230[1]	-40 to 125	-40 to 257	-40 to 85	-40 to 185
STFW14F	25±1	77±2	-40 to 85	-40 to 185	-40 to 85	-40 to 185	-40 to 85	-40 to 185
Process Interface Temp. STFW128, STFW132 only	25±1	77±2	-40 to 110[1]	-40 to 230[1]	-40 to 175[2]	-40 to 350[2]	-40 to 85	-40 to 185
Humidity %RH	10 to 55		0 to 100		0 to 100		0 to 100	
Minimum Pressure								
mmHg absolute	atmospheric		25		2 (short term[3])			
inH_2O absolute	atmospheric		13		1 (short term[3])			
Power	Battery powered 3.6V Lithium thionyl chloride (LiSOCl2) batteries non rechargeable, size D. There is an option to have the battery fitted or not fitted for shipping. 24 Vdc Wired Power (option) - For I.S. Application: 21 V to 25 Vdc Operated with MTL7728P+ barrier (252 Ohms Max. end to end resistance), Max input current 26mA. For Non I.S. application: 11 V to 30 Vdc Input range, Max input current 100mA.							

[1] For CTFE fill fluid, the rating is –15 to 110 °C (5 to 230°F)

[2] For CTFE fill fluid, the maximum temperature rating is 150°C (300°F)

[3] Short term equals 2 hours at 70°C (158 °F)

[4] The Ambient Limits shown are for Ordinary Non-Hazardous locations only. Refer to the appropriate Control Drawing, FM/CSA, ATEX, or IECEx for the Ambient Limits when installed in Hazardous Locations.

[5] 24V power option rated 80°C (176°F)

Maximum Allowable Working Pressure (MAWP) [3]

(XYR 6000 products are rated to Maximum Allowable Working Pressure. MAWP depends on Approval Agency and transmitter materials of construction.)

STFW128, STFW132	Flange Material	Ambient Temperature -29 to 38°C [-20 to 100°F]	Maximum Meterbody Temperature 125°C [257°F]	Process Interface Temperature 175°C [350°F]
ANSI Class 150 **psi [bar]**	Carbon Steel 304 S.S. 316 S.S.	285 [19.6] 275 [19.0] 275 [19.0]	245 [16.9] 218 [15.0] 225 [15.5]	215 [14.8] 198 [13.7] 205 [14.1]
ANSI Class 300 **psi [bar]**	Carbon Steel 304 S.S. 316 S.S.	740 [51.0] 720 [49.6] 720 [49.6]	668 [46.0] 570 [39.3] 590 [40.7]	645 [44.5] 518 [35.7] 538 [37.1]
DN PN40 **psi [bar]**	Carbon Steel 304 S.S. 316 S.S.	580 [40.0] [1] 534 [36.8] [1] 534 [36.8] [1]	574 [39.6] 419 [28.9] 434 [29.9]	559 [38.5] 385 [26.5] 399 [27.5]
STFW12F, STFW13F, STFW14F ANSI Class 150 **psi [bar]**	316L Stainless Steel	230 [15.9]	185 [12.8]	No rating at this temp

[1] Ambient Temperature for DN PN40 is –10 to 50°C [14 to 122 F]

[3] MAWP applies for temperature range -40 to 125°C.

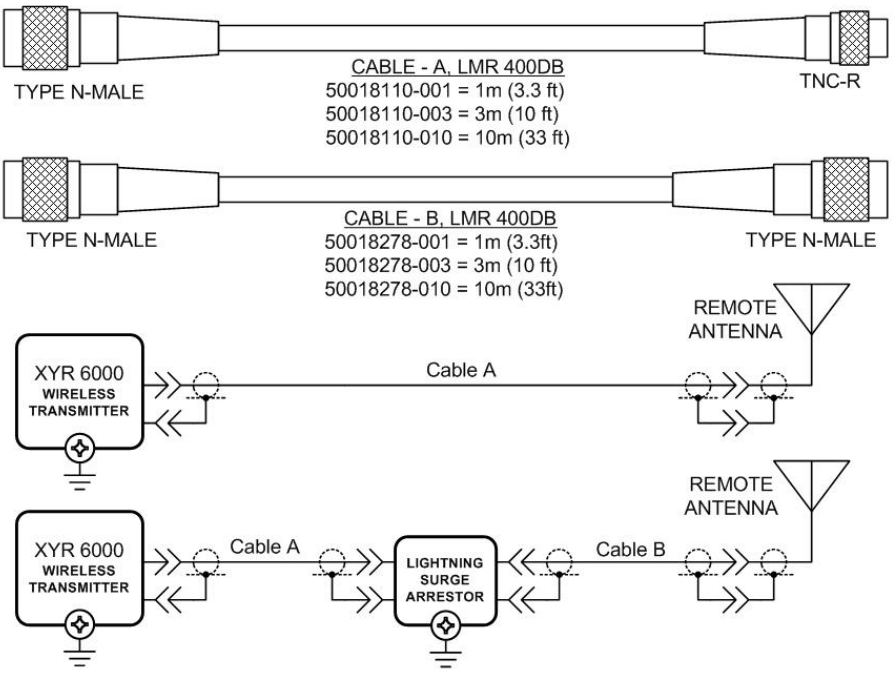
Wireless Specifications

Parameter	Description
Wireless Communication	2,400 to 2,483.5 MHz (2.4 GHz) Industrial, Scientific and Medical (ISM) band FHSS Selection – Frequency Hopping Spread Spectrum DSSS Selection – Direct Sequential Spread Spectrum per FCC 15.247 / IEEE 802.15.4–2006. ISA100.11a Compliant (2.4 GHz Direct Sequence Spread Spectrum 802.15.4 DSSS-FH) Every data packet transmitted in either direction is verified (CRC check) and acknowledged by the receiving device. USA – FCC Certified Canada – IC Certified European Union – RTTE/ETSI Conformity Japan – Ministry of Internal Affairs and Communications Certified (DSSS Selection only)
ISA100.11a RF Transmitter Power (Optional)	NA Selection – 125 mW (20.9 dBm) maximum transmit power not including antenna per FCC/IC, or 400 mW (26.0 dBm) maximum EIRP including antenna for USA and Canadian locations. EU Selection – 10 mW (10.0 dBm) maximum EIRP including antenna per RTTE/ETSI for EU locations.
DSSS RF Transmitter Power (Optional)	NA Selection – 125 mW (20.9 dBm) maximum transmit power not including antenna per FCC/IC, or 400 mW (26.0 dBm) maximum EIRP including antenna for USA and Canadian locations. EU Selection – 10 mW (10.0 dBm) maximum EIRP including antenna per RTTE/ETSI for EU locations. JP Selection – 12.14 dBm/MHz [32mW (15.14 dbm)] maximum EIRP including antenna for Japanese locations.
Data	PV Publish Cycle Time: Configurable as 1, 5, 10, 30 or 60seconds Rate: 250 Kbps
Antennas	Integral – 2 dBi omnidirectional monopole Integral – 4 dBi omnidirectional monopole Remote – 8 dBi omnidirectional monopole with up to 20 m cable and lightning surge arrester

	Remote – 14 dBi directional parabolic with up to 20 m cable and lightning surge arrester.
Signal Range	Nominal 305 m (1,000 feet) between Field Transmitter and Infrastructure Unit (Multinode) or Gateway Unit when using 2 dBi Integral antenna with a clear line of sight.* Two XYR 6000 transmitters both having TX Power set to 16 dBm with a clear line of site nominal signal range is 150 m (490ft.)
Routing vs Non-Routing	Unit can be set as a Field Routing or non-Field Routing device; the number of routing devices is set by the system manager. Using the device as a routing device will impact battery life, the more messages routed through a device, the greater the impact on battery life.

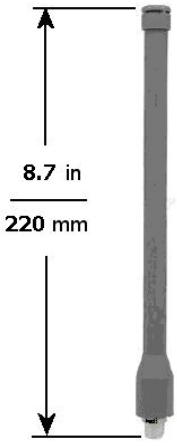
*Actual range will vary depending on antennas, cables and site topography.

Figure 2 - Remote antenna cables

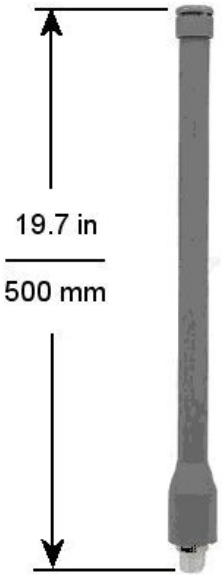


CABLE PARAMETERS			LIGHTNING SURGE ARRESTOR PARAMETERS
CABLE A, B LENGTH	CAPACITANCE	INDUCTANCE	
1 m	78.4 pF	0.2 µH	CAPACITANCE = 1 pF
3 m	235.2 pF	0.6 µH	INDUCTANCE = 10 nH
10 m	784 pF	2.0 µH	

Figure 3 - Remote Antennas



4 dBi Omnidirectional Antenna



8 dBi Omnidirectional Antenna

14 dBi Directional Antenna

Performance under Rated Conditions* - Model STFW128 (400 in H_2O)

Parameter	Description
Upper Range Limit **in H_2O** **mbar**	400 (39.2°F/4°C is standard reference temperature for in H_2O range.) 1,000
Lower Range Limit **in H_2O** **mbar**	-400 (39.2°F/4°C is standard reference temperature for in H_2O range.) -1,000
Minimum Span **in H_2O** **mbar** (Span can be between -400 to +400 inH_20 / -1000 to +1000 mbar)	4 10
Maximum Span **in H_2O** **mbar** (400 inH_20 / 1000mbar (span can be between -400 to +400 inH_20)	400 1000
Zero Elevation and Suppression	No limit except min. span within ±100% URL. Specifications valid from -5 to +100% URL.
Accuracy (Reference – Includes combined effects of linearity, hysteresis, and repeatability) • *Accuracy includes residual error after averaging successive readings.*	±0.075% of calibrated span or upper range value (URV), whichever is greater, terminal based. For URV below reference point (25 in H_2O), accuracy equals: $\pm\left[0.025+0.05\left(\frac{25\ \text{inH}_2\text{O}}{\text{span inH}_2\text{O}}\right)\right]$ or $\pm\left[0.025+0.05\left(\frac{62.5\ \text{mbar}}{\text{span mbar}}\right)\right]$ in % of span
Zero Temperature Effect per 28°C (50°F)	±0.20% of span. For URV below reference point (50 in H_2O), effect equals: $\pm 0.20\left(\frac{50\ \text{inH}_2\text{O}}{\text{span inH}_2\text{O}}\right)$ or $\pm 0.20\left(\frac{125\ \text{mbar}}{\text{span mbar}}\right)$ in % of span
Combined Zero and Span Temperature Effect per 28°C (50°F)	±0.375% of span. For URV below reference point (50 in H_2O), effect equals: $\pm\left[0.175+0.20\left(\frac{50\ \text{inH}_2\text{O}}{\text{span inH}_2\text{O}}\right)\right]$ or $\pm\left[0.175+0.20\left(\frac{125\ \text{mbar}}{\text{span mbar}}\right)\right]$ in % of span
Zero Static Pressure Effect per 300 psi (20 bar)	±0.1625% of span. For URV below reference point (50 in H_2O), effect equals: $\pm\left[0.0125+0.15\left(\frac{50\ \text{inH}_2\text{O}}{\text{span inH}_2\text{O}}\right)\right]$ or $\pm\left[0.0125+0.15\left(\frac{125\ \text{mbar}}{\text{span mbar}}\right)\right]$ in % of span
Combined Zero and Span Static Pressure Effect per 300 psi (20 bar)	±0.30% of span. For URV below reference point (50 in H_2O), effect equals: $\pm\left[0.15+0.15\left(\frac{50\ \text{inH}_2\text{O}}{\text{span inH}_2\text{O}}\right)\right]$ or $\pm\left[0.15+0.15\left(\frac{125\ \text{mbar}}{\text{span mbar}}\right)\right]$ in % of span

* Performance specifications are based on reference conditions of 25°C (77°F), zero (0) static pressure, 10 to 55% RH, and 316 Stainless Steel barrier diaphragm.

Performance under Rated Conditions* - Model STFW132 (100 psi)

Parameter	Description
Upper Range Limit **psi** **bar**	100 7
Upper Range Limit **psi** **bar**	-100 -7
Minimum Span **psi** **bar** (Span can be between -400 to +400 inH_20 / -1000 to +1000 mbar)	1 0.07
Minimum Span **psi** **bar** (400 inH_20 / 1000mbar (span can be between -400 to +400 inH_20)	100 7
Zero Elevation and Suppression	No limit except minimum span within –18 and +100% URL. Specifications valid from –5 to +100% URL.
Accuracy (Reference – Includes combined effects of linearity, hysteresis, and repeatability) • *Accuracy includes residual error after averaging successive readings.*	±0.075% of calibrated span or upper range value (URV), whichever is greater, terminal based. For URV calibrated below reference point (20 psi), accuracy equals: $\pm\left[0.025+0.05\left(\frac{20\ \text{psi}}{\text{span psi}}\right)\right]$ or $\pm\left[0.025+0.05\left(\frac{1.4\ \text{bar}}{\text{span bar}}\right)\right]$ in % of span
Zero Temperature Effect per 28°C (50°F)	±0.20% of span. For URV below reference point (30 psi), effect equals: $\pm 0.20\left(\frac{30\ \text{psi}}{\text{span psi}}\right)$ or $\pm 0.20\left(\frac{2\ \text{bar}}{\text{span bar}}\right)$ in % of span
Combined Zero and Span Temperature Effect per 28°C (50°F)	±0.375% of span. For URV below reference point (30 psi), effect equals: $\pm\left[0.175+0.20\left(\frac{30\ \text{psi}}{\text{span psi}}\right)\right]$ or $\pm\left[0.175+0.20\left(\frac{2\ \text{bar}}{\text{span bar}}\right)\right]$ in % of span
Zero Static Pressure Effect per 300 psi (20 bar)	±0.1625% of span. For URV below reference point (30 psi), effect equals: $\pm\left[0.0125+0.15\left(\frac{30\ \text{psi}}{\text{span psi}}\right)\right]$ or $\pm\left[0.0125+0.15\left(\frac{2\ \text{bar}}{\text{span bar}}\right)\right]$ in % of span
Combined Zero and Span Static Pressure Effect per 300 psi (20 bar)	±0.30% of span. For URV below reference point (30 psi), effect equals: $\pm\left[0.15+0.15\left(\frac{30\ \text{psi}}{\text{span psi}}\right)\right]$ or $\pm\left[0.15+0.15\left(\frac{2\ \text{bar}}{\text{span bar}}\right)\right]$ in % of span

* Performance specifications are based on reference conditions of 25°C (77°F), zero (0) static pressure, 10 to 55% RH, and 316 Stainless Steel barrier diaphragm.

Performance under Rated Conditions* - Model STFW12F (0 to 400 in H_2O)

Parameter	Description
Upper Range Limit **in H_2O** **mbar**	400 (39.2°F/4°C is standard reference temperature for in H_2O range.) 1,000
Minimum Span **in H_2O** **mbar**	1 Note: Recommended minimum span in square root mode is 20 in H_2O (50 mbar). 2.5
Zero Elevation and Suppression	No limit except minimum span within ±100% URL. Specifications valid from –5 to +100% URL.
Accuracy (Reference – Includes combined effects of linearity, hysteresis, and repeatability) • *Accuracy includes residual error after averaging successive readings.* •	±0.0625% of calibrated span or upper range value (URV), whichever is greater, terminal based. For URV below reference point (25 in in H_2O), accuracy equals: $\pm\left[0.0125+0.05\left(\frac{25\ \text{inH}_2\text{O}}{\text{span inH}_2\text{O}}\right)\right]$ or $\pm\left[0.0125+0.05\left(\frac{62\ \text{mbar}}{\text{span mbar}}\right)\right]$ in % of span
Zero Temperature Effect per 28°C (50°F)	±0.05% of span. For URV below reference point (50 in H_2O), effect equals: $\pm 0.05\left(\frac{50\ \text{inH}_2\text{O}}{\text{span inH}_2\text{O}}\right)$ or $\pm 0.05\left(\frac{125\ \text{mbar}}{\text{span mbar}}\right)$ in % of span
Combined Zero and Span Temperature Effect per 28°C (50°F)	±0.075% of span. For URV below reference point (50 in H_2O), effect equals: $\pm\left[0.025+0.05\left(\frac{50\ \text{inH}_2\text{O}}{\text{span inH}_2\text{O}}\right)\right]$ or $\pm\left[0.025+0.05\left(\frac{125\ \text{mbar}}{\text{span mbar}}\right)\right]$ in % of span
Zero Static Pressure Effect per 1000 psi (70 bar)	±0.075% of span. For URV below reference point (50 in H_2O), effect equals: $\pm\left[0.0125+0.0625\left(\frac{50\ \text{inH}_2\text{O}}{\text{span inH}_2\text{O}}\right)\right]$ or $\pm\left[0.0125+0.0625\left(\frac{125\ \text{mbar}}{\text{span mbar}}\right)\right]$ in % of span
Combined Zero and Span Static Pressure Effect per 1000 psi (70 bar)•	±0.15% of span. For URV below reference point (50 in H_2O), effect equals: $\pm\left[0.0875+0.0625\left(\frac{50\ \text{inH}_2\text{O}}{\text{span inH}_2\text{O}}\right)\right]$ or $\pm\left[0.0875+0.0625\left(\frac{125\ \text{mbar}}{\text{span mbar}}\right)\right]$ in % of span

* Performance specifications are based on reference conditions of 25°C (77°F), zero (0) static pressure, 10 to 55% RH, and 316 Stainless Steel barrier diaphragm.

Performance under Rated Conditions* - Model STFW13F (0 to 100 psi)

Parameter	Description
Upper Range Limit **psi** **bar**	100 7
Minimum Span **psi** **bar**	1 0.07
Zero Elevation and Suppression	No limit except minimum span within –18 and +100% URL. Specifications valid from –5 to +100% URL.
Accuracy (Reference – Includes combined effects of linearity, hysteresis, and repeatability) • *Accuracy includes residual error after averaging successive readings.* •	±0.0625% of calibrated span or upper range value (URV), whichever is greater, terminal based. For URV below reference point (15 psi), accuracy equals: $\pm\left[0.0125+0.05\left(\frac{15\ \text{psi}}{\text{span psi}}\right)\right]$ or $\pm\left[0.0125+0.05\left(\frac{1\ \text{bar}}{\text{span bar}}\right)\right]$ in % of span
Zero Temperature Effect per 28°C (50°F)	±0.05% of span. For URV below reference point (30 psi), effect equals: $\pm 0.05\left(\frac{30\ \text{psi}}{\text{span psi}}\right)$ or $\pm 0.05\left(\frac{2\ \text{bar}}{\text{span bar}}\right)$ in % of span
Combined Zero and Span Temperature Effect per 28°C (50°F)	±0.075% of span. For URV below reference point (30 psi), effect equals: $\pm\left[0.025+0.05\left(\frac{30\ \text{psi}}{\text{span psi}}\right)\right]$ or $\pm\left[0.025+0.05\left(\frac{2\ \text{bar}}{\text{span bar}}\right)\right]$ in % of span
Zero Static Pressure Effect per 1000 psi (70 bar)	±0.075% of span. For URV below reference point (30 psi), effect equals: $\pm\left[0.0125+0.0625\left(\frac{30\ \text{psi}}{\text{span psi}}\right)\right]$ or $\pm\left[0.0125+0.0625\left(\frac{2\ \text{bar}}{\text{span bar}}\right)\right]$ in % of span
Combined Zero and Span Static Pressure Effect per 1000 psi (70 bar)	±0.15% of span. For URV below reference point (30 psi), effect equals: $\pm\left[0.0875+0.0625\left(\frac{30\ \text{psi}}{\text{span psi}}\right)\right]$ or $\pm\left[0.0875+0.0625\left(\frac{2\ \text{bar}}{\text{span bar}}\right)\right]$ in % of span

* Performance specifications are based on reference conditions of 25°C (77°F), zero (0) static pressure, 10 to 55% RH, and 316 Stainless Steel barrier diaphragm.

Performance under Rated Conditions* - Model STFW14F (0 to 600 inH_2O)

Parameter	Description
Upper Range Limit **inH_2O** **mbar**	600 (39.2°F/4°C is standard reference temperature for inH_2O range.) 1,500
Minimum Span **inH_2O** **mbar**	6 15
Zero Elevation and Suppression	No limit except minimum span within 0 to 100% URL.
Accuracy (Reference – Includes combined effects of linearity, hysteresis, and repeatability) • *Accuracy includes residual error after averaging successive readings.*	±0.05% of calibrated span or upper range value (URV), whichever is greater, terminal based. For URV below reference point (25 inH_2O), accuracy equals: $\pm\left[0.0125+0.0375\left(\frac{25\ inH_2O}{span\ inH_2O}\right)\right]$ or $\pm\left[0.0125+0.0375\left(\frac{62\ mbar}{span\ mbar}\right)\right]$ in % of span
Zero Temperature Effect per 28°C (50°F)	±0.05% of span. For URV below reference point (50 inH_2O), effect equals: $\pm 0.05\left(\frac{50\ inH_2O}{span\ inH_2O}\right)$ or $\pm 0.05\left(\frac{125\ mbar}{span\ mbar}\right)$ in % of span
Combined Zero and Span Temperature Effect per 28°C (50°F)	±0.075% of span. For URV below reference point (50 inH_2O), effect equals: $\pm\left[0.025+0.05\left(\frac{50\ inH_2O}{span\ inH_2O}\right)\right]$ or $\pm\left[0.025+0.05\left(\frac{125\ mbar}{span\ mbar}\right)\right]$ in % of span
Zero Static Pressure Effect per 1000 psi (70 bar)	±0.075% of span. For URV below reference point (50 inH_2O), effect equals: $\pm\left[0.0125+0.0625\left(\frac{50\ inH_2O}{span\ inH_2O}\right)\right]$ or $\pm\left[0.0125+0.0625\left(\frac{125\ mbar}{span\ mbar}\right)\right]$ in % of span
Combined Zero and Span Static Pressure Effect per 1000 psi (70 bar)	±0.20% of span. For URV below reference point (50 inH_2O), effect equals: $\pm\left[0.1375+0.0625\left(\frac{50\ inH_2O}{span\ inH_2O}\right)\right]$ or $\pm\left[0.1375+0.0625\left(\frac{125\ mbar}{span\ mbar}\right)\right]$ in % of span

* Performance specifications are based on reference conditions of 25°C (77°F), zero (0) static pressure, 10 to 55% RH, and 316 Stainless Steel barrier diaphragm.

Performance under Rated Conditions - General for all Models

Parameter	Description
Lightning Surge Arrester (Remote antenna only)	Frequency range: 0 – 3 GHz, 50 Ohms, VSWR = 1:1.3 Max, Insertion Loss = 0.4 dB Connectors Type N Female, Max, Gas Tube Element: 90 V ± 20%, Impulse Breakdown Voltage = 1,000 V ± 20%, Maximum Withstand Current = 5 KA.
CE Conformity	These transmitters are in conformity with the protection requirements of European Council Directives: 89/336/EEC, the EMC Directive and 1999/5/EC, the Telecommunications Directive per EN 300 328 V1.7.1, EN301 893 V1.3.1, EN301 489-17 V1.2.1, EN301 489-1 V1.6.1 and EN61326-1 (1st Edition, 2002-02, Industrial Locations). Electrical Equipment for Measurement, Control and Laboratory Use – EMC Requirements.
Hazardous Location	Certifications: See the Model Selection Guide on page 12.

Physical and Approval Bodies

Parameter	Description
Barrier Diaphragms Material (Wetted)	316L SS, Hastelloy® C-276*[2], Monel®400**[3]
Gasket Ring Material (Wetted)	316/316L SS, Hastelloy® C-276*[2], Monel®400**[3]
Extension Tube Material	316 SS
Process Head and Adapter Flange Material	316 SS[4], Carbon Steel (Zinc-plated) [5], Monel®400**[7], Hastelloy® C-276*[6]
Process Head Gaskets	Teflon® is standard. Viton® is optional
Meter Body Bolting	Carbon Steel (Zinc-plated) or 316 SS (NACE) bolts.
Mounting Flange STFW128, STFW132 STFW12F, STFW13F, STFW14F	 **Flush or Extended Diaphragm:** Zinc plated Carbon Steel, 304 SS, or 316 SS 316L SS ***(NOTE: Mounting Flange is process wetted.)***
Fill Fluid	DC® 200 Silicone oil or CTFE (Chlorotrifluoroethylene)
Electronic Housing	Epoxy-Polyester hybrid paint. Low Copper-Aluminum. Meets NEMA 4X (watertight) and NEMA 7 (explosion proof). Stainless Steel optional.
Process Connections All Models STFW128, STFW132 STFW12F, STFW13F, STFW14F	 **Process Head:** 1/4-inch NPT; 1/2-inch NPT with adapter and DIN, standard options. **Flange:** 2, 3 or 4-inch Class 150 or 300 ANSI; DN50-PN40, DN80-PN40 or DN100-PN40 DIN flange. **Extended Diaphragm:** 2, 4, or 6 inches (50, 101, 152 mm) long. 2 or 3-inch, Class 150 ANSI flange.
Mounting	See Figure 4 for typical flange mounting arrangement.
Dimensions	See Figure 5, Figure 6, and Figure 7
Net Weight STFW128, STFW132 STFW12F, STFW13F, STFW14F	 **Flush or Extended Model:** 15.5 to 35.0 pounds (7 to 16 Kg) depending on flange size[8] 14.2 to 18.4 pounds (6.5 to 9 Kg) depending on flange size[8]

[2] Hastelloy® C-276 or UNS N10276
[3] Monel® 400 or UNS N04400
[4] Supplied as 316 SS or as Grade CF8M, the casting equivalent of 316 SS.
[5] Carbon Steel heads are zinc-plated and not recommended for water service due to hydrogen migration. For that service, use 316 stainless steel wetted Process Heads.
[6] Hastelloy® C-276 or UNS N10276. Supplied as indicated or as Grade CW12MW, the casting equivalent of Hastelloy® C-276
[7] Monel® 400 or UNS N04400. Supplied as indicated or as Grade M30C, the casting equivalent of Monel® 400
[8] Add 8.0 pounds (3.6 kg) to any model equipped with the stainless steel housing option. (Model Selection Guide Table IV selections A3 or SH)
* Flush design only.
**Flush or pseudo flange design.

NOTE: Pressure transmitters that are part of safety equipment for the protection of piping (systems) or vessel(s) from exceeding allowable pressure limits, (equipment with safety functions in accordance with Pressure Equipment Directive 97/23/EC article 1, 2.1.3), require separate examination.

Certifications

MSG CODE	AGENCY	TYPE OF PROTECTION
2C	CSA 1903673 (USA and Canada)	**Intrinsically Safe:** Class I; Division 1; Groups A, B, C, D; Class II, Division 1, Groups E, F, G; Class III, Division 1; T4 Class I, Zone 0 Ex ia IIC T4 Class I, Zone 0 AEx ia IIC T4
		Nonincendive: Class I; Division 2; Groups A, B, C, D; Class II, Division 2, Groups F, G; Class III, Division 2, T4 Class I, Zone 2 Ex nA IIC, T4 Class I, Zone 2 AEx nA IIC, T4
		Explosion-Proof/ Flameproof: Class I, Division 1; Groups A, B, C, D; Class II, Division 1, Groups E, F, G; Class III, Division 1; T4 Class I, Zone 1 Ex d IIC T4 Class I, Zone 1 AEx d IIC, T4
		Ambient Temperature -40 °C to +85 °C : Battery -40 °C to +80 °C : DC Supply
		Enclosure: Type 4X/ IP66
1C	FM Approvals™ 3032450 (USA)	**Intrinsically Safe:** Class I; Division 1; Groups A, B, C, D; Class II, Division 1, Groups E, F, G; Class III, Division 1; T4 Class I, Zone 0 AEx ia IIC T4
		Nonincendive: Class I; Division 2; Groups A, B, C, D; Class II, Division 2, Groups F, G; Class III, Division 2, T4 Class I, Zone 2 AEx nA IIC, T4
		Explosion-Proof/ Flameproof: Class I, Division 1; Groups A, B, C, D; Class II, Division 1, Groups E, F, G; Class III, Division 1; T4 Class I, Zone 1 AEx d IIC, T4
		Ambient Temperature -40 °C to +85 °C : Battery -40 °C to +80 °C : DC Supply
		Enclosure: Type 4X/ IP66
3C	ATEX- KEMA 08ATEX0062X	**Intrinsically Safe:** II 1 G Ex ia IIB T4 II 1 D Ex tD A20 IP66 T90 °C
		Flameproof: II 2 G Ex d [ia] IIB T4 II 2 D Ex tD A21 IP66 T90 °C
		Ambient Temperature -40 °C to +70 °C : Battery -40 °C to +80 °C : DC Supply
		Enclosure: IP66
	ATEX- DEKRA 08ATEX0074	**Nonincendive:** II 3 G Ex nA [nL] IIC T4 II 3 D Ex tD A22 IP66 T90 °C Ambient Temperature -40 °C to +84 °C : Battery -40 °C to +80 °C : DC Supply
		Enclosure: IP66

MSG CODE	AGENCY	TYPE OF PROTECTION
C1	IECEx- CSA 09.0001X	**Intrinsically Safe:** Ex ia IIB T4 Ex tD A20 IP66 T90 °C
		Flameproof: Ex d [ia] IIB T4 Ex tD A21 IP66 T90 °C
		Nonincendive: Ex nA [nL] IIC T4 Ex tD A22 IP66 T90 °C
		Ambient Temperature -40 °C to +70 °C (Ex ia, Ex d) -40 °C to +84 °C (Ex nA) : Battery -40 °C to +80 °C : DC Supply
		Enclosure: IP66
ZC	SAEx S/09-036X (South Africa)	**Intrinsically Safe:** Ex ia IIB T4 Ex tD A20 IP66 T90 °C
		Flameproof: Ex d [ia] IIB T4 Ex tD A21 IP66 T90 °C
		Nonincendive: Ex nA [nL] IIC T4 Ex tD A22 IP66 T90 °C
		Ambient Temperature -40 °C to +70 °C (Ex ia, Ex d) -40 °C to +84 °C (Ex nA) : Battery -40 °C to +80 °C : DC Supply
		Enclosure: IP66
6C	INMETRO* NCC 11.0331 X (BRAZIL)	**Intrinsically Safe:** Ex ia IIB T4 Ga
		Flameproof: Ex d [ia] IIB T4 Ex tb IIIC T90 °C IP66
		Nonincendive: Ex nA [ic] IIC T4 Ex tc IIIC T90 °C IP66
		Ambient Temperature -40 °C to +70 °C (Ex ia, Ex d) -40 °C to +84 °C (Ex nA) : Battery -40 °C to +80 °C : DC Supply
		Enclosure: IP66

* At time of Printing Certification was pending

Electrical Data

Battery

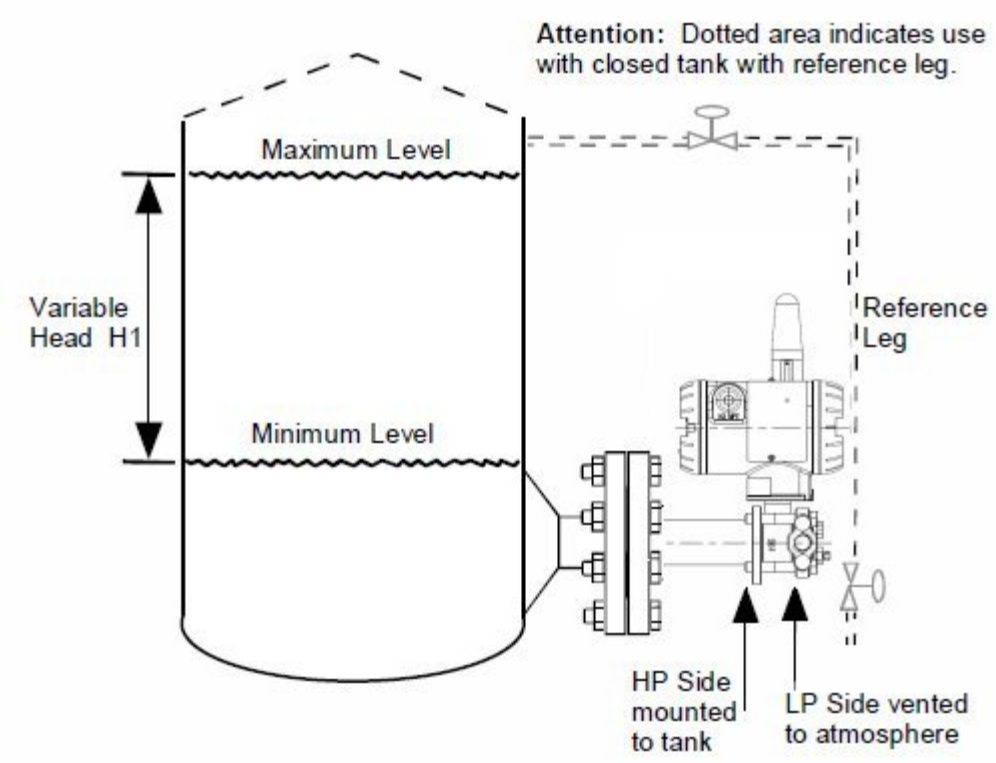
Two in series connected (D size) Lithium batteries, type 5930 manufactured by Tadiran, type XL-205F manufactured by Zeno Energy or type PT-2300H manufactured by Eagle Picher.
Additionally for ATEX and IECEx certifications, Lithium Battery SL-2780, manufactured by Tadiran, GmbH may be used.

DC Supply

For Ordinary Locations, Explosion-proof and Non Incendive:
16.0 V min to 28.0 V max, Current = 100 mA

For Intrinsically Safe:
A Barrier, MTL 728P+ or MTL 7728P+ mounted in a suitable enclosure, or in a non-hazardous location is needed, see Agency Certification drawings in Section 6.

Mounting

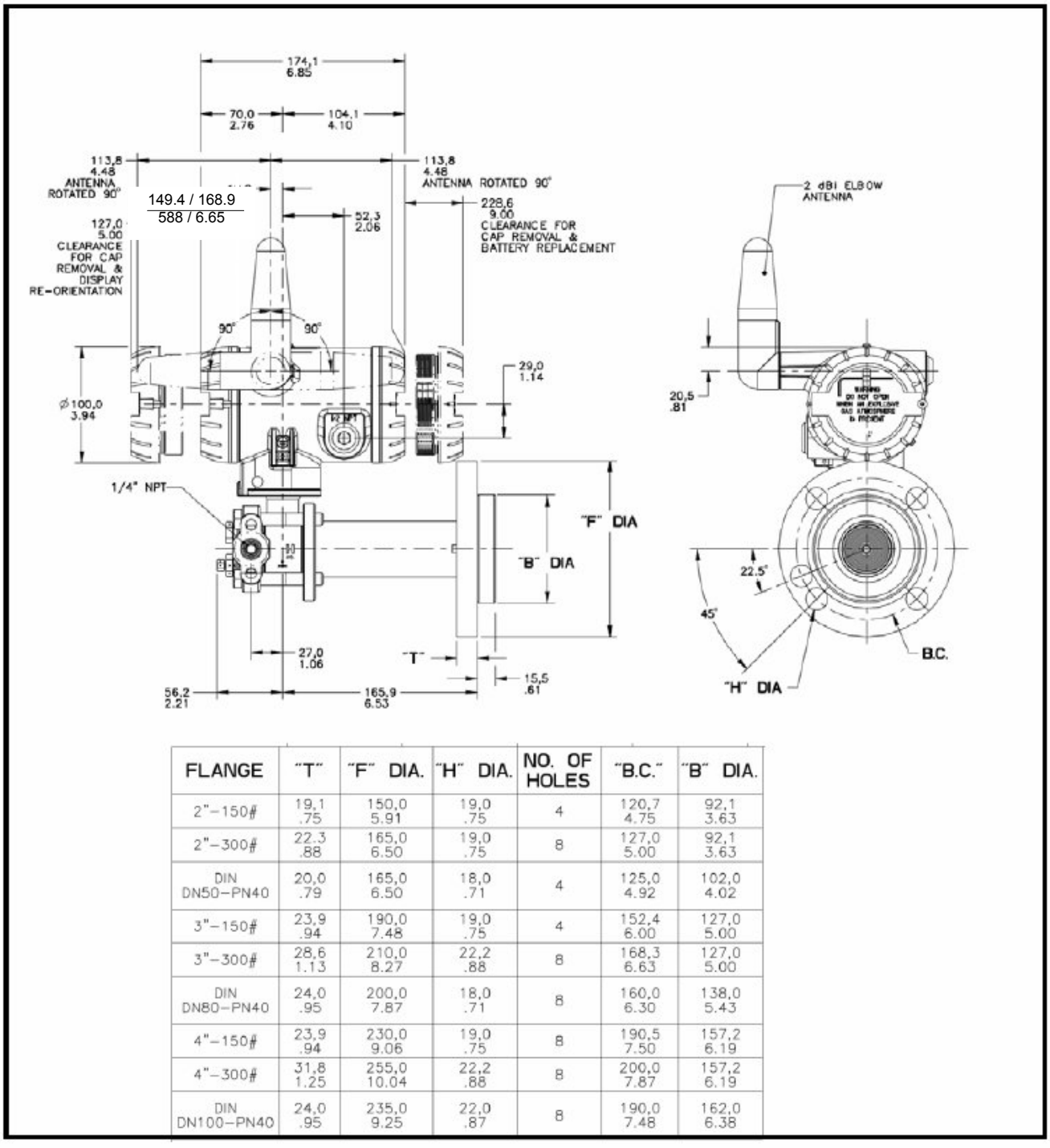


Error! Reference source not found.

Figure 4 - Typical mounting arrangement for flange mounted liquid level transmitter.

Reference Dimensions

millimeters
inches

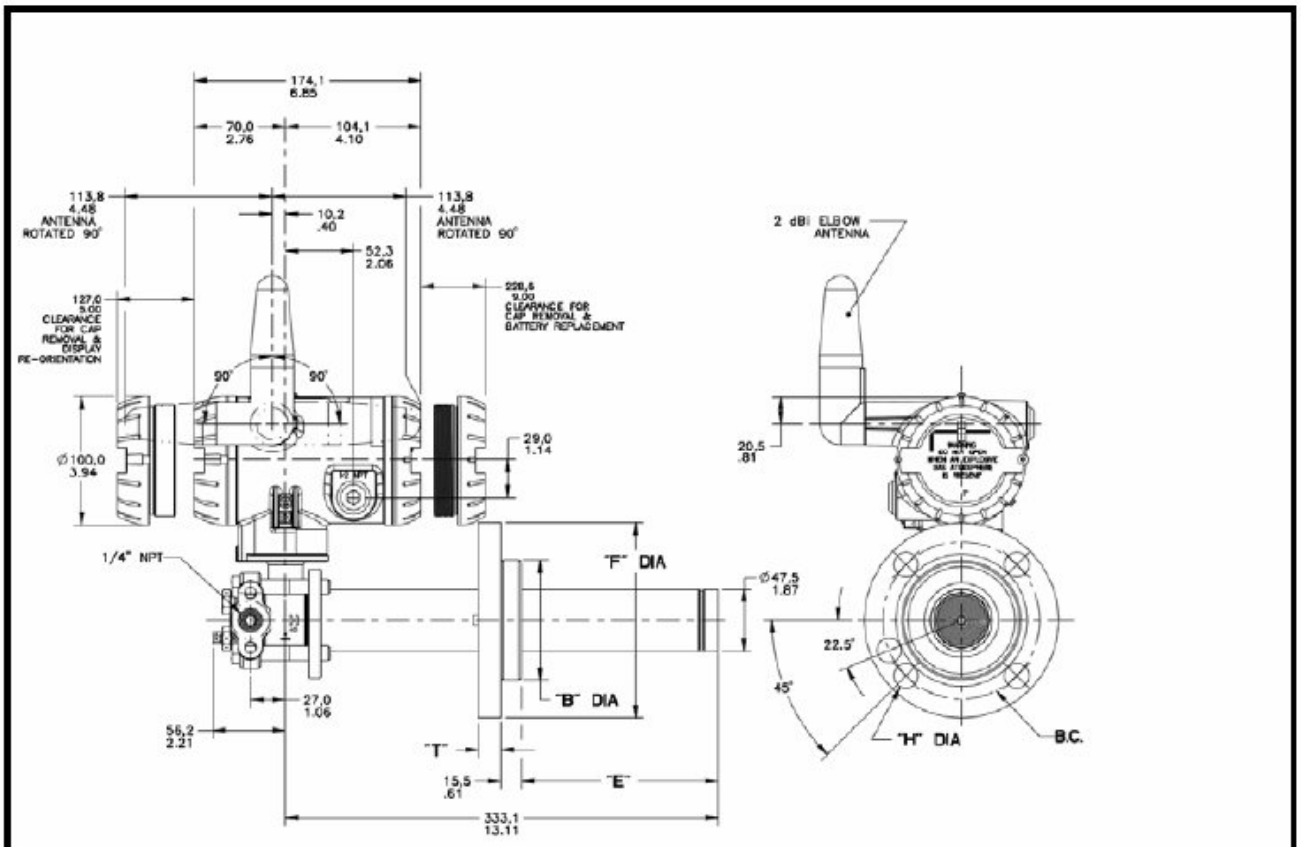


FLANGE	"T"	"F" DIA.	"H" DIA.	NO. OF HOLES	"B.C."	"B" DIA.
2"–150#	19,1 .75	150,0 5.91	19,0 .75	4	120,7 4.75	92,1 3.63
2"–300#	22,3 .88	165,0 6.50	19,0 .75	8	127,0 5.00	92,1 3.63
DIN DN50–PN40	20,0 .79	165,0 6.50	18,0 .71	4	125,0 4.92	102,0 4.02
3"–150#	23,9 .94	190,0 7.48	19,0 .75	4	152,4 6.00	127,0 5.00
3"–300#	28,6 1.13	210,0 8.27	22,2 .88	8	168,3 6.63	127,0 5.00
DIN DN80–PN40	24,0 .95	200,0 7.87	18,0 .71	8	160,0 6.30	138,0 5.43
4"–150#	23,9 .94	230,0 9.06	19,0 .75	8	190,5 7.50	157,2 6.19
4"–300#	31,8 1.25	255,0 10.04	22,2 .88	8	200,0 7.87	157,2 6.19
DIN DN100–PN40	24,0 .95	235,0 9.25	22,0 .87	8	190,0 7.48	162,0 6.38

Figure 5 - - Approximate mounting dimensions for flush diaphragm type models STFW128 and STFW132.

Reference Dimensions

millimeters
inches

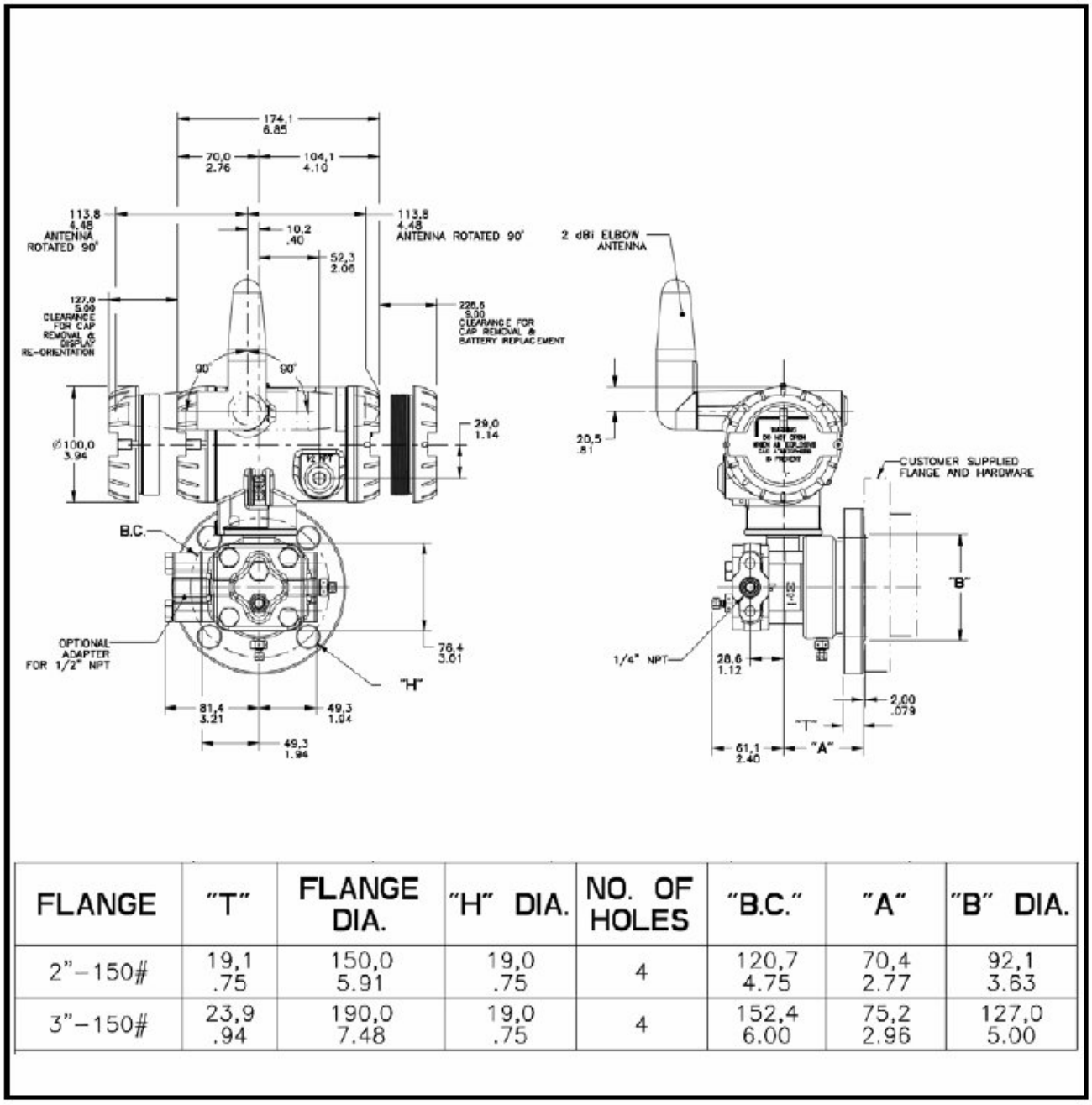


FLANGE	"T"	"F" DIA.	"H" DIA.	NO. OF HOLES	"B.C."	"B" DIA.	EXTENSIONS "E"		
							2"	4"	6"
2"–150#	19,1 .75	150,0 5.91	19,0 .75	4	120,7 4.75	92,1 3.63	50,8 2.00	101,6 4.00	152,4 6.00
2"–300#	22,3 .88	165,0 6.50	19,0 .75	8	127,0 5.00	92,1 3.63			
DIN DN50–PN40	20,0 .79	165,0 6.50	18,0 .71	4	125,0 4.92	102,0 4.02			
3"–150#	23,9 .94	190,0 7.48	19,0 .75	4	152,4 6.00	127,0 5.00			
3"–300#	28,6 1.13	210,0 8.27	22,2 .88	8	168,3 6.63	127,0 5.00			
DIN DN80–PN40	24,0 .95	200,0 7.87	18,0 .71	8	160,0 6.30	138,0 5.43			
4"–150#	23,9 .94	230,0 9.06	19,0 .75	8	190,5 7.50	157,2 6.19			
4"–300#	31,8 1.25	255,0 10.04	22,2 .88	8	200,0 7.87	157,2 6.19			
DIN DN100–PN40	24,0 .95	235,0 9.25	22,0 .87	8	190,0 7.48	162,0 6.38			

Figure 6 - - Approximate mounting dimensions for extended diaphragm type models STFW128 and STFW132

Reference Dimensions

millimeters
inches



FLANGE	"T"	FLANGE DIA.	"H" DIA.	NO. OF HOLES	"B.C."	"A"	"B" DIA.
2"–150#	19,1 .75	150,0 5.91	19,0 .75	4	120,7 4.75	70,4 2.77	92,1 3.63
3"–150#	23,9 .94	190,0 7.48	19,0 .75	4	152,4 6.00	75,2 2.96	127,0 5.00

Figure 7 - Approximate mounting dimensions for pseudo flange type models STFW12F, STFW13F, and STFW14F.

Options

- **Tagging (Option TG)**

  Up to 30 characters can be added on the stainless steel nameplate mounted on the transmitter's electronics housing at no extra cost. Note that a separate nameplate on the meter body contains the serial number and body-related data. A stainless steel wired on tag with additional data of up to 4 lines of 28 characters is also available. The number of characters for tagging includes spaces.

- **Transmitter Configuration (Option TC)**

  All configurable parameters are accessible via the OneWireless network via READ/WRITE transactions.

- **Custom Calibration and ID in Memory (Option C)**

  The factory can calibrate any range within the scope of the transmitter's range.

Ordering information

Sales and Service

For application assistance, current specifications, pricing, or name of the nearest Authorized Distributor, contact one of the offices below.

ASIA PACIFIC

(TAC)
hfs-tac-support@honeywell.com

Australia
Honeywell Limited
Phone: +(61) 7-3846 1255
FAX: +(61) 7-3840 6481
Toll Free 1300-36-39-36
Toll Free Fax:
1300-36-04-70

China – PRC - Shanghai
Honeywell China Inc.
Phone: (86-21) 5257-4568
Fax: (86-21) 6237-2826

Singapore
Honeywell Pte Ltd.
Phone: +(65) 6580 3278
Fax: +(65) 6445-3033

South Korea
Honeywell Korea Co Ltd
Phone: +(822) 799 6114
Fax: +(822) 792 9015

EMEA

Honeywell Process Solutions,
Phone: + 80012026455 or +44 (0)1202645583
FAX: +44 (0) 1344 655554
Email: (Sales)
sc-cp-apps-salespa62@honeywell.com
or
(TAC)
hfs-tac-support@honeywell.com

NORTH AMERICA

Honeywell Process Solutions,
Phone: 1-800-423-9883
Or 1-800-343-0228

Email: (Sales)
ask-ssc@honeywell.com
or
(TAC)
hfs-tac-support@honeywell.com

SOUTH AMERICA

Honeywell do Brasil & Cia
Phone: +(55-11) 7266-1900
FAX: +(55-11) 7266-1905

Email: (Sales)
ask-ssc@honeywell.com
or
(TAC)
hfs-tac-support@honeywell.com

Model Selection Guides are subject to change and are inserted into the specifications as guidance only.
Prior to specifying or ordering a model check for the latest revision Model Selection Guides which are published at:
https://www.honeywellprocess.com/en-US/explore/products/wireless/input-output-devices/xyr-6000/Pages/default.aspx

Model Selection Guide (34-XY-16-23)

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XYR 6000 Wireless Transmitter Flange Mounted Liquid Level Series 100

Model Selection Guide

Instructions

- Select the desired Key Number. The arrow to the right marks the selection available.
- Make one selection from each table, I, II and III, using the column below the proper arrow.
- Select as many Table IV options as desired (if no options or approvals are desired, specify 9X).
- A (•) denotes unrestricted availability. A letter denotes restricted availability.
- Restrictions follow Table VI.

Key Number		I		II		III		IV (Optional)		V		VI
_ _ _ _ _ _ _	-	_ _ _	-	_ _ _ _ _	-	_ _ _ _ _	-	_ _, _ _, _ _	-	_ _ _ _	-	XXXX

KEY NUMBER

Span	Selection	Availability		
0-4" to 0-400" H_2O / 0-10 to 0-1,000 mbar - Compound Characterized	STFW128	↓		
0-1 to 0-100 psi / 0-0.07 to 7 bar - Compound Characterized	STFW132	↓		
0-1" to 0-400" H_2O / 0-2.5 to 0-1,000 mbar	STFW12F		↓	
0-1 to 0-100 psi / 0-0.07 to 0-7 bar	STFW13F		↓	
0-6" to 0-600" H_2O / 0-15 to 0-1,500 mbar	STFW14F			↓

TABLE I - METER BODY

	Design	Ref. Head	Vent Drain Valve on Ref. Head [2]	Barrier Diaphrm. (wetted)	Diaphrm. Plate (wetted)	Extension (wetted)	Sel.			
Materials of Construction	Flush	Carbon [1] Steel	316 SS	316L SS Hast C [3] Hast C [3] Monel 400 [4]	316L SS 316L SS Hast C [3] Monel 400 [4]	N/A	A _ _ W _ _ B _ _ C _ _	• • • r		
		316 SS [5]		316L SS Hast C [3] Hast C [3] Monel 400 [4]	316L SS 316L SS Hast C [3] Monel 400 [4]		E _ _ X _ _ F _ _ G _ _	• • • r		
		Hast C [3, 6]	Hast C [3]	Hast C [3]	Hast C [3]		J _ _	•		
		Monel 400 [4 7]	Monel 400 [10]	Monel 400 [4]	Monel 400 [4]		L _ _	r		
	Extended	Carbon [1] Steel	316 SS	316L SS Hast C [3]	316L SS	316L SS	M _ _ N _ _	• •		
		316 SS [5]		316L SS Hast C [3]			R _ _ S _ _	• •		
	Pseudo Flange	Carbon [1] Steel	316 SS	316L SS Hast C [3] Monel 400 [4]	N/A	N/A	A _ _ B _ _ C _ _		• • r	• •
		316 SS [5]		316L SS Hast C [3] Monel 400 [4]			E _ _ F _ _ G _ _		• • r	• •
Fill Fluid (Meter Body &	DC®200 Silicone CTFE						_ 1 _ _ 2 _	• •	• •	•
Process Connection	**Reference Head**			**Flange**			**Sel.**			
	1/4 NPT 1/4 NPT 1/2 NPT (with Adapter) 1/2 NPT (with Adapter)			High Pressure Side Low Pressure Side High Pressure Side Low Pressure Side			_ _ A _ _ C _ _ H _ _ K	• t 	• • t t	• • t t

[1] Carbon Steel heads are zinc-plated and not recommended for water service due to hydrogen migration. For that service, use the 316 stainless steel Wetted Reference Head.
[2] Vent/Drains are Teflon or PTFE coated for lubricity.
[3] Hastelloy® C-276 or UNS N10276
[4] Monel 400® or UNS N04400
[5] Supplied as 316SS or as Grade CF8M, the casting equivalent of 316SS
[6] Supplied as indicated or as Grade CW12MW, the casting equivalent of Hastelloy® C-276
[7] Supplied as indicated or as Grade M30C, the casting equivalent of Monel 400®
[10] Monel 400® or UNS N04400 or UNS N04405

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TABLE II - FLANGE ASSEMBLY

		Flange Material	Threaded Nut Ring Material	Selection	Availability STFW1xx 28 32	2F 3F	4F
No Selection		None	None	0 _ _ _ _	●	●	●
Flange (ANSI Flanges have 125-500 AARH Surface Finish)	3" ANSI Class 150	Carbon Steel (non-wetted)	Carbon Steel (non-wetted)	_ 1 _ _ _	●		
	3" ANSI Class 300			_ 2 _ _ _	●		
	DN80-PN40 DIN			_ 3 _ _ _	●		
	4" ANSI Class 150			_ 4 _ _ _	●		
	4" ANSI Class 300			_ 5 _ _ _	●		
	DN100-PN40 DIN			_ 6 _ _ _	●		
	2" ANSI Class 150			_ 7 _ _ _	●		
	2" ANSI Class 300			_ 8 _ _ _	●		
	DN50-PN40 DIN			_ 9 _ _ _	●		
	3" ANSI Class 150	304 SS (non-wetted)	304 SS (non-wetted)	_ A _ _ _	●		
	3" ANSI Class 300			_ B _ _ _	●		
	DN80-PN40 DIN			_ C _ _ _	●		
	4" ANSI Class 150			_ D _ _ _	●		
	4" ANSI Class 300			_ E _ _ _	●		
	DN100-PN40 DIN			_ F _ _ _	●		
	2" ANSI Class 150			_ Q _ _ _	●		
	2" ANSI Class 300			_ U _ _ _	●		
	DN50-PN40 DIN			_ V _ _ _	●		
	3" ANSI Class 150	316 SS (non-wetted)	304 SS (non-wetted)	_ H _ _ _	●		
	3" ANSI Class 300			_ J _ _ _	●		
	DN80-PN40 DIN			_ K _ _ _	●		
	4" ANSI Class 150			_ L _ _ _	●		
	4" ANSI Class 300			_ M _ _ _	●		
	DN100-PN40 DIN			_ N _ _ _	●		
	2" ANSI Class 150			_ W _ _ _	●		
	2" ANSI Class 300			_ X _ _ _	●		
	DN50-PN40 DIN			_ Y _ _ _	●		
	Pseudo Flange on Standard DP						
	2" ANSI Class 150 without Vent/Drain	316L SS (wetted)	Not Applicable	_ S _ _ _		●	●
	2" ANSI Class 150 with Vent/Drain			_ T _ _ _		●	●
	3" ANSI Class 150 without Vent/Drain	316L SS (wetted)	Not Applicable	_ P _ _ _		●	●
	3" ANSI Class 150 with Vent/Drain			_ R _ _ _		●	●
Gasket Ring (wetted)	No Selection			_ _ 0 _ _		●	●
	Flush Design		316L SS	_ _ 1 _ _	g		
			Hastelloy® C [3]	_ _ 2 _ _	g		
			Monel 400® [4]	_ _ 3 _ _	q		
	Extended Design		316/316L SS	_ _ 5 _ _	v		
Extension (wetted)	No Selection			_ _ _ 0 _		●	●
	Flush			_ _ _ F _	h		
	Diameter		**Length**				
	1.87 Inches (for 2", 3" or 4 " spud)		2 inches	_ _ _ C _	v		
			4 inches	_ _ _ D _	v		
			6 inches	_ _ _ E _	v		
No Selection	No Selection			_ _ _ _ 0	●	●	●

[3] Hastelloy® C-276 or UNS N10276
[4] Monel 400® or UNS N04400

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TABLE III - ANTENNA OPTIONS		Selection	STFW1xx Availability 28 32	2F 3F	4F
Antenna's	Integral Right-angle, vertical 2dBi	V _ _ _ _	d	d	d
	Integral Straight, horizontal 2dBi	S _ _ _ _	d	d	d
	Integral Right-angle, vertical 4dBi	R _ _ _ _	d	d	d
	Remote Omnidirectional, 8 dBi	M _ _ _ _	e	e	e
	Remote Directional, 14 dBi	D _ _ _ _	e	e	e
	Remote Antenna Adapter, Type N Connection	A _ _ _ _	d	d	d
Cable A for Remote Antenna	None	_ 0 0 _ _	•	•	•
	1.0m remote Cable A, Type N (Req'd to connect to XYR 6000)	_ 2 1 _ _	•	•	•
	3.0m remote Cable A, Type N (Req'd to connect to XYR 6000)	_ 2 3 _ _	•	•	•
	10.0m remote Cable A, Type N (Req'd to connect to XYR 6000)	_ 2 9 _ _	•	•	•
Cable B for Remote Antenna w/Accessories*	None	_ _ _ 0 0	•	•	•
	Accessory + 1.0m Cable B to Antenna, N - N	_ _ _ 0 1	•	•	•
	Accessory + 3.0m Cable B to Antenna, N - N	_ _ _ 0 3	•	•	•
	Accessory + 10.0m Cable B to Antenna, N - N	_ _ _ 1 0	•	•	•

TABLE IV - OPTIONS	Selection	28 32	2F 3F	4F	
Radio Options (Must Choose a Radio Option)					
2.4 GHz Direct Sequence Spread Spectrum (802.15.4 DSSS-FH)	XD	•	•	•	b
ISA 100.11a Compliant (2.4 GHz Direct Sequence Spread Spectrum 802.15.4 DSSS-FH)	XS	•	•	•	
Power Option (Must Choose Power Option)					
Battery Holder Only - No Battery Included	00	•	•	•	b
Battery Power	BA	•	•	•	
24VDC	DC	•	•	•	
Transmitter Housing & Electronics Options					
Custom Calibration and I.D. in Memory	CC	•	•	•	
Transmitter Configuration and I.D. in Memory	TC	•	•	•	
M20 Conduit Thread (1/2" NPT is standard)	A1	f	f	f	b
1/2" NPT to 3/4" NPT 316 SS Conduit Adapter	A2	i	i	i	
316 SS [5,9] Housing with 1/2" NPT Conduit Connection	A3	•	•	•	b
316 SS [5,9] Electronics Housing - *with M20 Conduit Connections*	SH	•	•	•	
Stainless Steel Customer Wired-On Tag (4 lines, 28 characters per line, customer supplied information)	TG	•	•	•	b
Stainless Steel Customer Wired-On Tag (blank)	TB	•	•	•	
End Cap Warning Label in Spanish	SP	•	•	•	
End Cap Warning Label in Portuguese	PG	•	•	•	b
End Cap Warning Label in Italian	TL	•	•	•	
End Cap Warning Label in German	GE	•	•	•	
Process Head Options (Carbon Steel standard)					
NACE A286 SS Bolts	CR	•	•	•	
316 SS Bolts	SS	•	•	•	b
B7M Bolts	B7	•	•	•	
316 SS[5] Adapter Flange - 1/2" NPT with CS Bolts	S2	c	c	c	
316 SS[5] Adapter Flange - 1/2" NPT with 316 SS Bolts	S3	c	c	c	
316 SS[5] Adapter Flange - 1/2" NPT with NACE A286 SS Bolts	S4	c	c	c	
316 SS[5] Adapter Flange - 1/2" NPT with B7M Bolts	S5	c	c	c	
Hastelloy® C-276 [3, 6] Adapter Flange - 1/2" NPT with CS Bolts	T2	c	c	c	b
Hastelloy® C-276 [3, 6] Adapter Flange - 1/2" NPT with 316 SS Bolts	T3	c	c	c	
Monel 400® [4, 7] Adapter Flange - 1/2" NPT with CS Bolts	V2	c	c	c	
Monel 400® [4, 7] Adapter Flange - 1/2" NPT with 316 SS Bolts	V3	c	c	c	
316 SS[5] Blind Adapter Flange with CS Bolts	B3	•	•	•	
316 SS[5] Blind Adapter Flange with 316 SS Bolts	B4	•	•	•	
316 SS[5] Blind Adapter Flange with NACE A286 SS Bolts	B5	•	•	•	b
316 SS[5] Blind Adapter Flange with B7M Bolts	B6	•	•	•	
Viton® [8] Process Head Gaskets (adapter gaskets ordered separately)	VT	•	•	•	
Viton® [8] Adapter Flange Gaskets	VF	m	m	m	
Services/Certificates/Marine Type Approval Options					
User's Manual Paper Copy (Standard, HC/H6, or FF ships accordingly)	UM	•	•	•	
Clean Transmitter for Oxygen or Chlorine Service with Certificate	0X	j	j	j	
Over-Pressure Leak Test with F3392 Certificate	TP	•	•	•	
Calibration Test Report and Certificate of Conformance (F3399)	F1	•	•	•	b
Certificate of Conformance (F3391)	F3	•	•	•	
Certificate of Origin (F0195)	F5	•	•	•	
NACE Certificate (Process-Wetted & Non-Process Wetted) (FC33339)	F7	k	k	k	b
NACE Certificate (Process-Wetted Only) (FC33338)	FG	•	•	•	
Material Traceability Certification per EN 10204 3.1 *(FC33341)*	FX	•	•	•	
Warranty Options					
Additional Warranty - 1 year	W1	•	•	•	b
Additional Warranty - 2 years	W2	•	•	•	

Table IV continued next page

[3] Hastelloy® C-276 or UNS N10276
[4] Monel 400® or UNS N04400
[5] Supplied as 316 SS or as Grade CF8M, the casting equivalent of 316 SS.
[6] Supplied as indicated or as Grade CW12MW, the casting equivalent of Hastelloy® C-276
[7] Supplied as indicated or as Grade M30C, the casting equivalent of Monel 400®
[8] Viton® or Fluorocarbon Elastomer
[9] If ordered with Remote Antenna option, Table III Selection M _ _ _ _ or D _ _ _ _, antenna parts are not SS or Marine type cables

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TABLE IV - OPTIONS (continued)

Approval Body	Approval Type	Location or Classification	Selection	Availability STFW1xx 28 32	2F 3F	4F
No hazardous location approvals			9X	•	•	•
FM	Intrinsically Safe	Class I, II, III, Div. 1, Groups A,B,C,D,E,F,G; T4, Ta ≤ 85°C; Type 4X Class I, AEx ia IIC; T4, Ta ≤ 85°C, Zone 0; IP66	1C	•	•	•
	Explosion-proof	Class I, Div. 1, Groups A,B,C,D; Cl II, Div. 1,Groups E, F & G; Cl III, Div. 1, T4, Ta ≤ 85°C; Type 4X Class I, AEx d IIC; T4, Ta ≤ 85°C, Zone 1; IP66				
	Nonincendive	Class I, Div. 2, Groups A,B,C,D; T4, Ta ≤ 85°C; Type 4X				
	Non-Sparking	Class I, AEx nA IIC; T4, Ta ≤ 85°C, Zone 2; IP66				
CSA cus	Nonincendive	Nonincendive, CL I, Div 2, Groups A,B,C & D, CL II & III, Div 2, Groups F & G, T4 Ta = 85°C	2N	•	•	•
	Non-Sparking	Class I, Ex/AEx nA IIC; T4, Ta ≤ 85°C, Zone 2; IP66				
	Intrinsically Safe	Class I, Div. 1, Gp A,B,C,D; Class II, Div 1, Gp E,F,G; Class III, Div 1; T4, Ta ≤ 85°C; Type 4X Class I, Ex/AEx ia IIC; T4, Ta ≤ 85°C, Zone 0; IP66	2C	•	•	•
	Explosion-proof	Class I, Div. 1, Groups A,B,C,D; Class II, Div. 1,Groups E, F & G; Class III, Div. 1, T4, Ta ≤ 85°C; Type 4X Class I, Ex/AEx d IIC; T4, Ta ≤ 85°C, Zone 1; IP66				
	Nonincendive	Class I, Div. 2, Groups A,B,C,D; T4, Ta ≤ 85°C; Type 4X				
	Non-Sparking	Class I, Ex/AEx nA IIC; T4, Ta ≤ 85°C, Zone 2; IP66				
ATEX	Intrinsically Safe	⟨Ex⟩ II 1 GD; Ex ia IIB; T4, Ta ≤ 70°C, Zone 0; IP66 Ex tD A20 IP66 T90ºC	3U	•	•	•
	Flameproof	⟨Ex⟩ II 2 GD; Ex d [ia] IIB; T4, Ta ≤ 70°C, Zone 1; IP66 Ex tD A21 IP66 T90ºC	3B	•	•	•
	Non-Sparking	⟨Ex⟩ II 3 GD; Ex nA [nL] IIC; T4, Ta ≤ 84°C, Zone 2 Ex tD A22 IP66 T90ºC	3Y	•	•	•
	Intrinsically Safe	⟨Ex⟩ II 1 GD; Ex ia IIB; T4, Ta ≤ 70°C, Zone 0; IP66 Ex tD A20 IP66 T90ºC	3C*	•	•	•
	Flameproof	⟨Ex⟩ II 2 GD; Ex d [ia] IIB; T4, Ta ≤ 70°C, Zone 1; IP66 Ex tD A21 IP66 T90ºC				
	Non-Sparking	⟨Ex⟩ II 3 GD; Ex nA [nL] IIC; T4, Ta ≤ 84°C, Zone 2 Ex tD A22 IP66 T90ºC				
IECEx Australia & New Zealand	Intrinsically Safe	Ex ia IIB; T4, Ta ≤ 70°C, Zone 0; IP66 Ex tD A20 IP66 T90ºC	CU	•	•	•
	Flameproof	Ex d [ia] IIB; T4, Ta ≤ 70°C, Zone 1; IP66 Ex tD A21 IP66 T90ºC	CB	•	•	•
	Non-Sparking	Ex nA IIC; T4, Ta ≤ 84°C, Zone 2; IP66 Ex tD A22 IP66 T90ºC	CY	•	•	•
	Intrinsically Safe	Ex ia IIB; T4, Ta ≤ 70°C, Zone 0; IP66 Ex tD A20 IP66 T90ºC	C1*	•	•	•
	Flameproof	Ex d [ia] IIB; T4, Ta ≤ 70°C, Zone 1; IP66 Ex tD A21 IP66 T90ºC				
	Non-Sparking	Ex nA [nL] IIC; T4, Ta ≤ 84°C, Zone 2; IP66 Ex tD A22 IP66 T90ºC				
SAEx South Africa	Intrinsically Safe	Ex ia IIB; T4, Ta ≤ 70°C, Zone 0; IP66 Ex tD A20 IP66 T90ºC	ZU	•	•	•
	Flameproof	Ex d [ia] IIB; T4, Ta ≤ 70°C, Zone 1; IP66 Ex tD A21 IP66 T90ºC	ZB	•	•	•
	Non-Sparking	Ex nA [nL] IIC; T4, Ta ≤ 84°C, Zone 2; IP66 Ex tD A22 IP66 T90ºC	ZY	•	•	•
	Intrinsically Safe	Ex ia IIB; T4, Ta ≤ 70°C, Zone 0; IP66 Ex tD A20 IP66 T90ºC	ZC*	•	•	•
	Flameproof	Ex d [ia] IIB; T4, Ta ≤ 70°C, Zone 1; IP66 Ex tD A21 IP66 T90ºC				
	Non-Sparking	Ex nA [nL] IIC; T4, Ta ≤ 84°C, Zone 2; IP66 Ex tD A22 IP66 T90ºC				
INMETRO Brazil	Intrinsically Safe Flameproof Non-Sparking	Ex ia IIC; T4, Ta ≤ 85°C, Zone 0; IP 66 Ex d IIC; T4, Ta ≤ 85°C, Zone 1; IP 66 Ex nA IIC; T4, Ta ≤ 85°C, Zone 2; IP 66	6C*	•	•	•

b

* The user must determine the type of protection required for installation of the equipment. The user shall then check the box [√] adjacent to the type of protection used on the equipment certification nameplate. Once a type of protection has been check on the nameplate, subsequently the equipment shall not be reinstalled using any of the other certification types.

WARNING – Division 2 / Zone 2 apparatus may only be connected to processes classified as non-hazardous or Division 2 / Zone 2. Connection to hazardous (flammable or ignition capable) Division 1 / Zone 0, or 1 process is not permitted.

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Issue 1
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TABLE V

Country	(Must Choose a Country Code)	STFW1xx Selection: Country Code	Availability			
North America, Canada		NA00	•	•	•	b
European Union		EU00	•	•	•	
Japan		JP00				
Brazil		BZ00	•	•	•	

TABLE VI

	Selection			
Factory Identification	XXXX	•	•	•

RESTRICTIONS

Restriction Letter	Available Only With		Not Available With	
	Table	Selection	Table	Selection
b	Select only one option from this group			
c	I	_ _ H, _ _ K		
d	III	_ 00 _ _ , _ _ _ 00		
e			III	_ 00 _ _
f			IV	SH, A3
g	I	A _ _, B _ _, E _ _, F _ _, J _ _, W _ _, X _ _		
h			I II	M _ _,N _ _,R _ _,S _ _ _ _ 5, _ _ , _ _ 0 _ _
i	III	1C or 2J	IV	BA, SH, A1
j	I	_ 2 _		
k	III	CR	III	S2, S3, S5, T2, T3, B3, B4, B6, V2, V3
m	III	VT		
n			III	1C, 2J
q	I	C _ _, G _ _, L _ _		
r			IV	F7, FG
t		Select S2,S3,S4,S5,T2,T3,V2,V3		
v	I	M _ _, N _ _, R _ _, S _ _		

Ordering Example: STFW128-A1A-01000-R0000-XS,BA,1C-NA00-XXXX

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Supplemental Accessories & Kits

Description	Part Number
1/2 NPT Socket Plug (ZN Plated CS)	50021832-001
1/2 NPT Certified Conduit Plug (SS)	50021832-002
M20 Certified Conduit Plug (SS)	50000547-001
M20 Conduit Plug (ZN Plated CS)	50000547-002
Surge Diverter*	50018279-090
Lithium Thionyl Chloride Batteries (Qty 2)	50026010-501
Lithium Thionyl Chloride Batteries (Qty 4)	50026010-502
Lithium Thionyl Chloride Batteries (Qty 10)	50026010-503

*** Surge Diverter Accessory supplied with Table III, Selections XXX01, XXX03, XXX10**

Specifications are subject to change without notice.

For More Information

Learn more about how Honeywell's XYR 6000 Wireless Transmitter can provide accuracy, reliability and stability in transmitter measurement, visit our website /www.honeywellprocess.com or contact your Honeywell account manager.

Honeywell Process Solutions
1860 West Rose Garden Lane
Phoenix, Arizona 85027
Tel: 1-800-423-9883 or 1-800-343-0228
www.honeywellprocess.com

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