

Application Work Sheet (Pressure)

Quotation

Purchase Order

For better support to the customer, please fill this form out when you request a quotation or place an order. It will help us to provide you the correct solution and minimize a risk which is our goal for the customer.

General Information

Client _____ Date _____
Name _____ End-User _____
TEL. No. _____ Project _____
FAX. No. _____ Required delivery _____
Model _____
Quantity _____

Performance Specifications

Pressure Range _____
Operating Range _____
Measuring Unit MPa bar kPa mmHg mmH2O mbar
Pressure reference kgf/cm2 Torr psi °C °F
Output Signal mV/V 4 ~ 20 mA 1 ~ 5 V 0 ~ 10 V
Power Supply 24 V DC 12 V DC

Physical Specifications

Process Connection PT 1/4" PT 3/8" PT 1/2" G1/4" G1/2"
 PF 1/4" PF 3/8" PF 1/2" NPT1/4" NPT1/2"
 Flush 1/2" Flush 3/4" Flush 1"
 40A Flange 50A Flange 80A Flange 100A Flange
 Sanitary Diaphragm _____ Other _____
Electrical Connection Terminal DIN 43650 M12 Connector Cable(1,5 m)
Local Display Unit None LCD LED

Process Conditions

Process Media _____
Operating Temperature _____
Humidity _____
Vibration _____
Explosion Protection Required No required
Weather Protection Required No required

Pressure Range Code

CODE	kgf/cm ²	bar	psi	MPa
0001	0~1	0~1	0~15	0~0.1
0003	0~3	0~3	0~45	0~0.3
0005	0~5	0~5	0~70	0~0.5
0006	0~6	0~6	0~90	0~0.6
0010	0~10	0~10	0~150	0~1
0015	0~15	0~15	0~200	0~1.5
0020	0~20	0~20	0~300	0~2
0025	0~25	0~25	0~350	0~2.5
0030	0~30	0~30	0~450	0~3
0035	0~35	0~35	0~500	0~3.5
0050	0~50	0~50	0~700	0~5
0070	0~70	0~70	0~1000	0~7
0100	0~100	0~100	0~1500	0~10
0200	0~200	0~200	0~3000	0~20
0250	0~250	0~250	0~3500	0~25
0300	0~300	0~300	0~4500	0~30
0350	0~350	0~350	0~5000	0~35
0500	0~500	0~500	0~7000	0~50
0700	0~700	0~700	0~10000	0~70
1000	0~1000	0~1000	0~15000	0~100
2000	0~2000	0~2000	0~28000	0~200
V0000	-76~0 cmHg	-1013~0 mbar	-30~0 inHg	-0.1~0
V0001	-76 cmHg~1	-1013 mbar~1	-30 inHg~15	-0.1~0.1
V0002	-76 cmHg~2	-1013 mbar~2	-30 inHg~30	-0.1~0.2
V0003	-76 cmHg~3	-1013 mbar~3	-30 inHg~45	-0.1~0.3
V0004	-76 cmHg~4	-1013 mbar~4	-30 inHg~60	-0.1~0.4
V0006	-76 cmHg~6	-1013 mbar~6	-30 inHg~90	-0.1~0.6
V0010	-76 cmHg~10	-1013 mbar~10	-30 inHg~150	-0.1~1
V0015	-76 cmHg~15	-1013 mbar~15	-30 inHg~200	-0.1~1.5
V0020	-76 cmHg~20	-1013 mbar~20	-30 inHg~300	-0.1~2
L0600	0~600 mmH2O	0~60 mbar	0~0.9	0~0.006
L1000	0~1000 mmH2O	0~100 mbar	0~1.5	0~0.01
L2000	0~2000 mmH2O	0~200 mbar	0~3	0~0.02
L3000	0~3000 mmH2O	0~300 mbar	0~4.5	0~0.03
L4000	0~4000 mmH2O	0~400 mbar	0~5.5	0~0.04
L5000	0~5000 mmH2O	0~500 mbar	0~7	0~0.05
00000	Other Range			

P601S Series Diaphragm Sealed Pressure Transmitter



Feature

- Stainless steel flush diaphragm
- All stainless steel 316 construction with Piezoresistive sensing element
- from 0~0.1 to 0~50 MPa
- Shock and vibration resistant
- 200 % overpressure protection
- Excellent long term stability
- HART Communication(Optional)
- 의장등록 제30-0366814호

Applications

- The transmitters can be used for pressure measurement in sticky, high viscous
- Foods and milk process
- Level measurement and storage tank installation
- Concentration plant
- Process and chemical engineering
- Pulp and paper stock measurement
- Chemical and petrochemical industry
- Equipment and machinery for plant, ink, resin and dough process

Input

Technology	Piezoresistive silicon pressure sensor	
Pressure range	0 ~ 0.01 to 50 MPa Gauge, Vacuum or Compound pressure	
	0 ~ 0.1 to 3.5 MPa Absolute pressure	
Pressure reference	Gauge, including vacuum and compound and absolute	
Overload pressure	1.5 times of F.S.	

Output

	Current output	
Electrical connection type	2-wire technique	
Full scale output signal	20 mA	± 0.03 %
Zero measured output	4 mA	± 0.01 %

Electrical Specifications

Power supply	12 ~ 36 V DC (It is not free voltage)	
Load resistance max@24 V	500 Ω at 24 V	
Power ripple	≤ 500 mV P-P	
Insulation resistor	≥ 20 MΩ, 25 V DC	

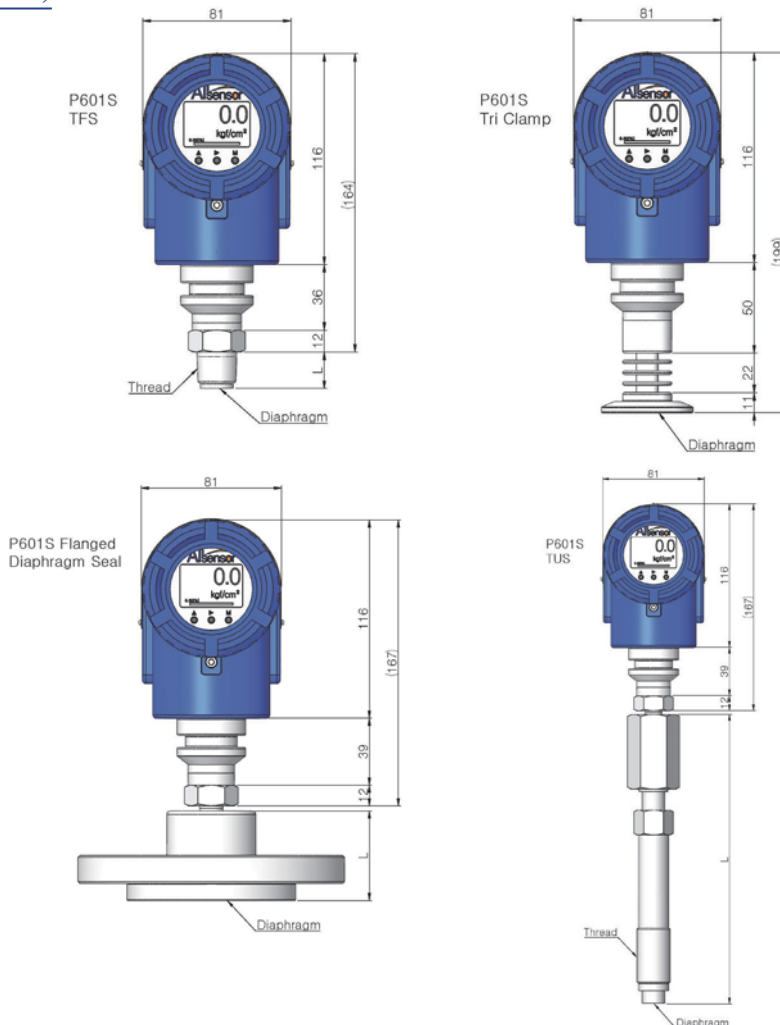
Performance Specifications

Accuracy	≤ ± 0.25 % F.S.	
Non-linearity	± 0.05 % F.S. typical	
Repeatability	± 0.02 % F.S. typical	
Pressure hysteresis	± 0.02 % F.S. typical	
Long term stability	± 0.05 % F.S. over 1 year	
Response time(10 % to 90 %)	≤ 20 ms	
Reference temperature	25 °C	
Working temperature range(Process)	-40 ~ 120 °C	
Compensated temperature range(Process)	-10 ~ 80 °C	
Ambient temperature range	-20 ~ 60 °C	
Thermal sensitivity shift	≤ ± 0.05 % F.S. in reference to 35 °C typical	
Thermal zero shift	≤ ± 0.05 % F.S. in reference to 35 °C typical	

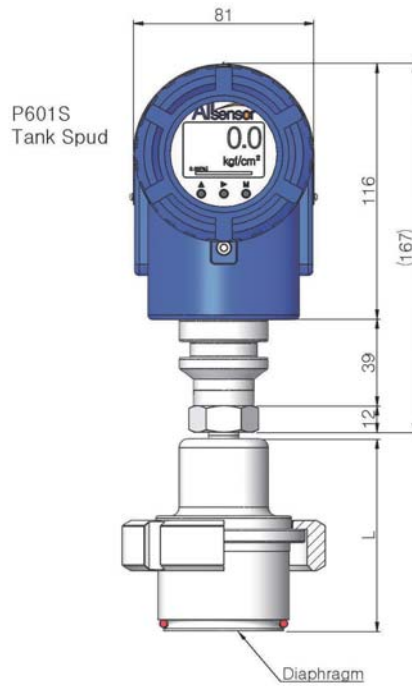
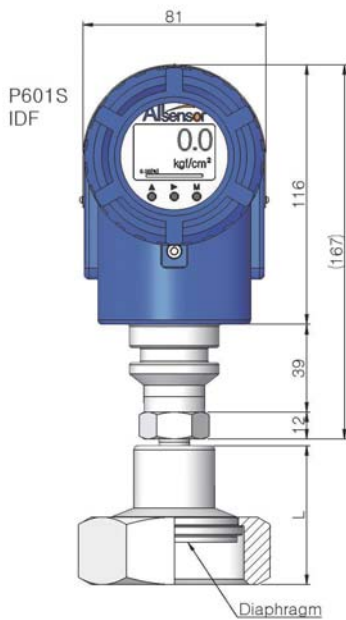
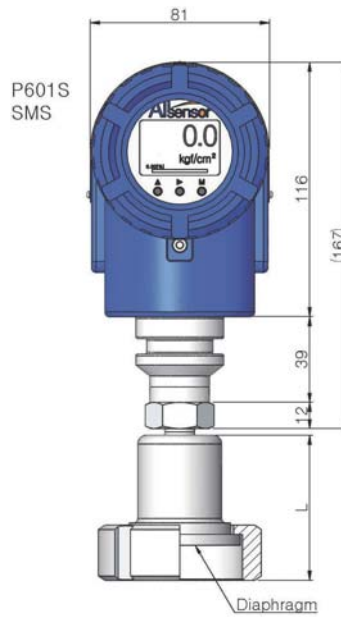
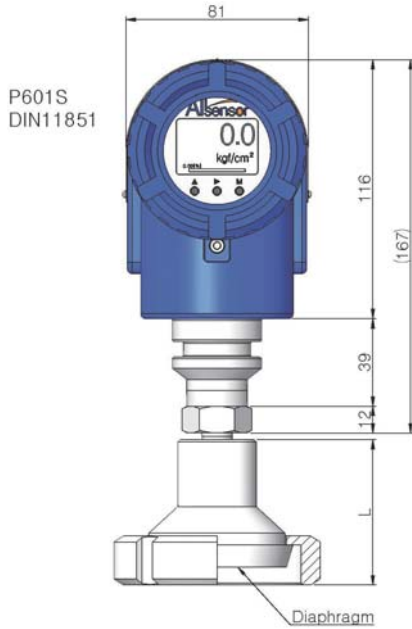
Physical Specifications

Process connection	Flush Diaphragm Seal Other connections available on request
Process media	Compatible with STS 316L, Hastelloy C, Nickel or Tantalum
Materials	Wetted parts : STS 316L, Hastelloy C, Nickel, Tantalum or Teflon Coating Housing & rear cover : Aluminum Die-casting(Al-remainder, Si-10.682 Fe-0.722, Cu-2.102, Mn-0.177, Mg-0.246, Sn-0.028, Ni-0.035, Zn-0.978, Ti-0.017, Zr-0.001, Pb-0.005) Front cover : Aluminum Die-casting & Tempered glass adhesion assembly(Cemented joint, Loctite243)
Enclosure rating	IP67
Explosion protection	Exd II C T6 (방호장치 의무안전인증 / 고용노동부고시 제2013-54호)
Vibration	0.1 g(1/M/s/s) Maximum
Weight	Approx.(1,5 kg)

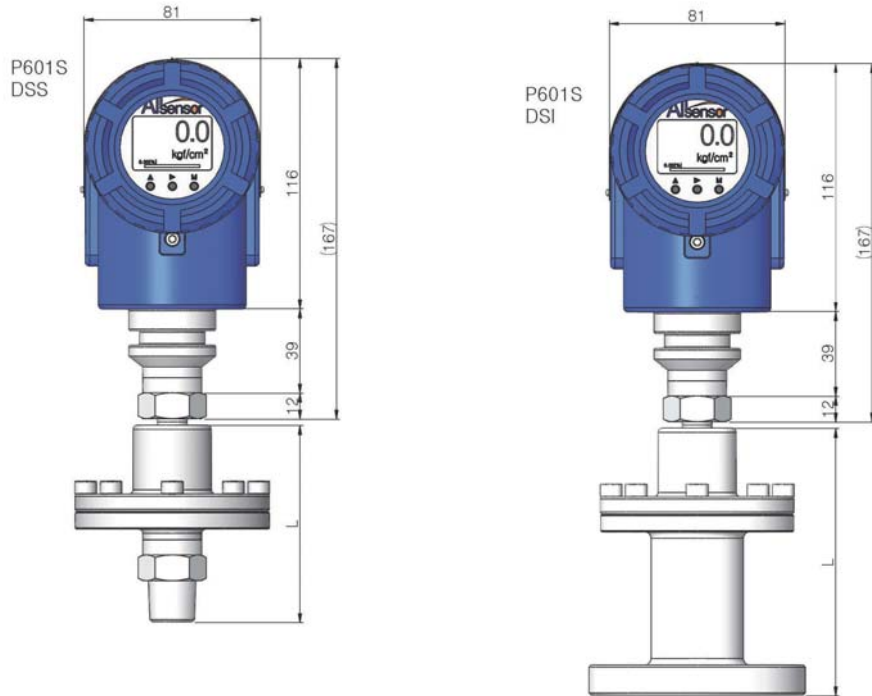
Dimension(mm)



Dimension(mm)



Dimension(mm)

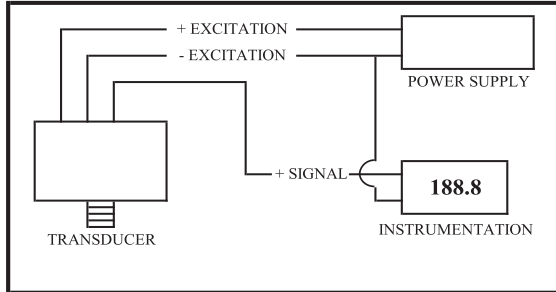


Ordering Information

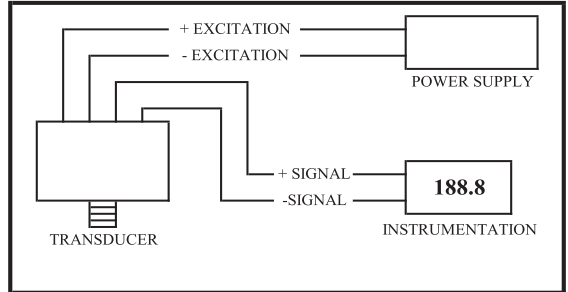
P	6	0	1	S	G	H	0	0	1	0	M	P	U	T	
Model Name P601S : Diaphragm Sealed Pressure Transmitter						Pressure Range Refer to pressure range code					Pressure Unit M : MPa B : bar P : psi K : kgf/cm ² H : mmH ₂ O G : mmHg T : torr			Process Connection A : PT 1/2" H : DSI B : PT 3/4" I : IDF C : PT 1" S : SMS D : DIN 11851 T : Tri-Clamp E : Extended U : Tank Spud F : Flange O : Others G : DSS	
Pressure Type A : Absolute G : Gauge						Out Put H : 2Wire 4-20 mA E : 3Wire 1-5 V					Electrical Cable Entry T : G(PF) 1/2" Female				

Pressure Transducer & Transmitter

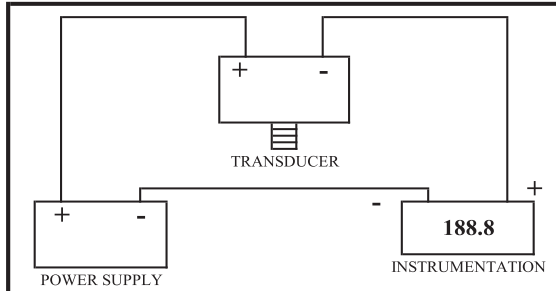
Installation and Wiring



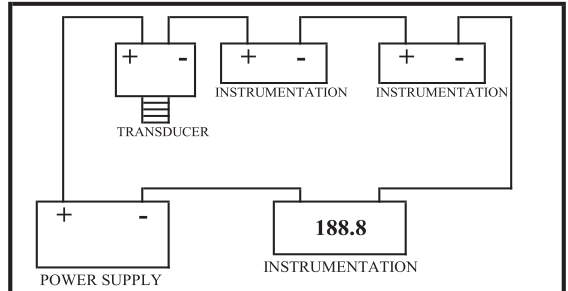
3Wire Configuration for voltage output Transducer
(“-”Excitation and “-”Signal Are Common)



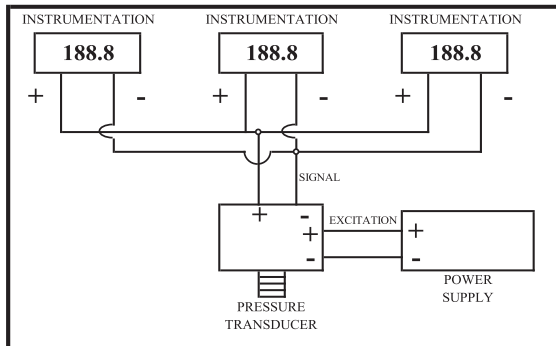
4Wire Configuration Millivolt Output Transducer



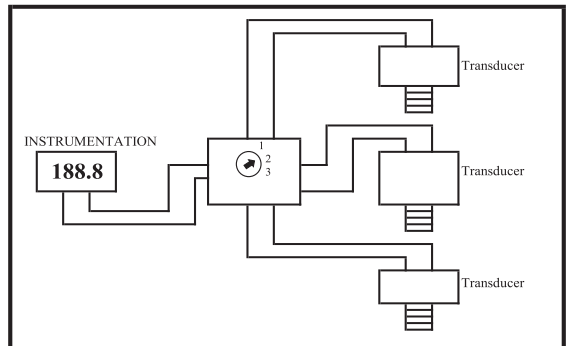
2Wire Configuration for Current output Transducer



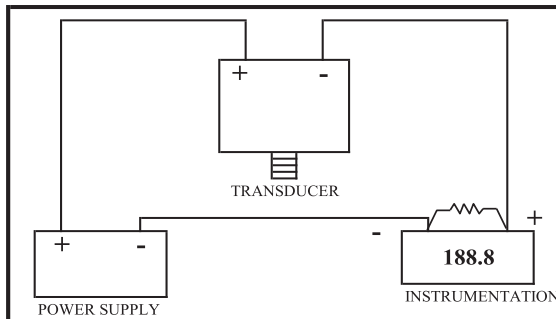
Multi-instrument 4-20mA Current Loop
(Panel Meters, Chart Recorder, Computers, etc)



Multiple Instruments Wired In Parallel to a Voltage Output



Multiple Transducer Wired to One Meter and One Switch
(Transducer With Built-in Zero & Span Adjustments, Same outputs & Same Pressure Range)



Converting Current Into Voltage For Instrumentation Set Up For Voltage