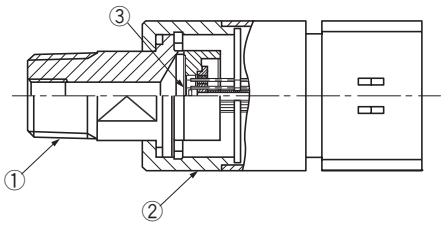
PRESSURE TRANSDUCERS WITH AMP. PA-758



INTERNAL STRUCTURE
PA-758 (R 1/4)



	Part name	Material
①	Fitting	SUS 304
②	Housing	PPS
③	Stainless steel diaphragm	SUS 316L

■ FEATURES

- High corrosion resistance and drip-proof construction
  Pressure port attachment made of SUS 316L
  Proven IP65 grade gauge body (IP-65 in accordance with IEC)
- Cable connector connection
- Buit-in temperature compensation function (0 ~ 50℃)
- Absolute pressure type and compound pressure type which can control negative to positive pressure with only a single pressure gauge are all in line
- Current output mode

■ MODEL NUMBER DESIGNATION

PA-758 - 102 R - R2 - 1

Series name

Pressure reference
G : Gauge
V : Gauge(Vacuum)
R : Compound
A : Absolute

Rated pressure range
102 : 0 ~ 100 kPa
352 : 0 ~ 350 kPa
103 : 0 ~ 1 MPa
353 : 0 ~ 3.5 MPa
102 : 0 ~ – 100 kPa
102 : – 100 ~ 100 kPa
302 : – 100 ~ 300 kPa
102 : 0 ~ 100 kPa abs

Fitting
R1 : R 1/8 with M 5 female screw
R2 : R 1/4 with M 5 female screw

Cable
Blank : 1.5m cable
1 : Not attached

※Please refer to the LIST OF MODEL NUMBERS when placing orders.

PA-758
PRESSURE TRANSDUCERS WITH AMP.

■ LIST OF MODEL NUMBERS

Fitting	Pressure reference	Gauge							Absolute
	Cable / kPa Rated pressure range	0 ~ 100	0 ~ 350	0 ~ 1000	0 ~ 3500	0 ~ – 100	– 100 ~ 100	– 100 ~ 300	0 ~ 100 (abs)
R1	Attached	PA-758-➔ 102G-R1	PA-758-➔ 352G-R1	PA-758-103G-R1	PA-758-353G-R1	PA-758-➔ 102V-R1	PA-758-102R-R1	PA-758-302R-R1	PA-758-102A-R1
	Not attached	PA-758-➔ 102G-R1-1	PA-758-➔ 352G-R1-1	PA-758-103G-R1-1	PA-758-353G-R1-1	PA-758-➔ 102V-R1-1	PA-758-102R-R1-1	PA-758-302R-R1-1	PA-758-102A-R1-1
R2	Attached	PA-758-➔ 102G-R2	PA-758-➔ 352G-R2	PA-758-103G-R2	PA-758-353G-R2	PA-758-➔ 102V-R2	PA-758-102R-R2	PA-758-302R-R2	PA-758-102A-R2
	Not attached	PA-758-➔ 102G-R2-1	PA-758-➔ 352G-R2-1	PA-758-103G-R2-1	PA-758-353G-R2-1	PA-758-➔ 102V-R2-1	PA-758-102R-R2-1	PA-758-302R-R2-1	PA-758-102A-R2-1

※Verify the above model numbers when placing orders.
The products marked ➔ are manufactured upon receipt of order basis.

■ STANDARD SPECIFICATIONS

●Unless otherwise specified, the specs are defined at an ambient temperature of 25 ± 5 °C and excitation voltage of 24 V DC, load resistance of 250 Ω.

	Item / Model number		PA-758							
			102G	352G	103G	353G	102V	102R	302R	102A
General specifications	Pressure reference		Gauge							Absolute
	Rated pressure range	kPa	100	350	1000	3500	– 100	– 100 ~ 100	– 100 ~ 300	100 (abs)
	Maximum pressure	kPa	200	700	2000	5000	200	200	600	200 (abs)
	Break-down pressure	kPa	300	1050	3000	7000	300	300	900	300 (abs)
	Operating temp. range	°C	– 20 ~ 70							
	Compensated temp. range	°C	0 ~ 50							
	Operating humidity	%RH	35 ~ 85 (No condensation)							
	Storage temp.	°C	– 20 ~ 80 (Atmospheric pressure, humidity 65 %RH maximum)							
	Pressure medium		Corrosive gases/liquids compatible with SUS 316L or SUS304							
	Insulation resistance	MΩ minimum	100 (500 V DC)							
	Dielectric strength		500 V AC, 60 s (Leakage current 1 mA maximum)							
	Sealed liquid		Silicone oil							
	Pressure port		R 1/8、R 1/4							
	Net weight	g	R2 : Approx. 50							
	Drip-proof structure		IP65							
Power	Supply voltage	V DC	24 ± 10 % (Including ripple percentage)							

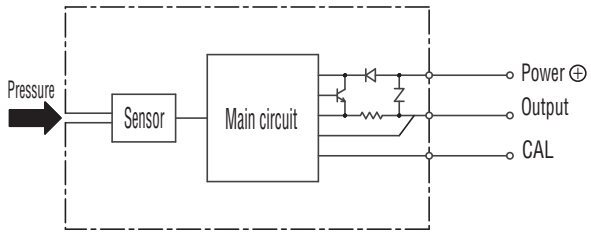
PA-758
PRESSURE TRANSDUCERS WITH AMP.

Item			Model number	PA-758							
				102G	352G	103G	353G	102V	102R	302R	102A
Analog output	Output current		mA	4 ~ 20 mA							
	Zero current		mA (at 25 °C)	4 ± 0.2					12 ± 0.2	8 ± 0.2	4 ± 0.2
	Span current		mA (at 25 °C)	16 ± 0.2							
	Load resistance			0 ~ 500 Ω							
	Linearity/Hysteresis		%F.S.	± 0.5							
	Thermal error	ZERO	%F.S./°C	± 0.05							
		SPAN	%F.S./°C	± 0.05							
	Response		ms	Approx. 2							
	resolving power			Approx. 0.016 mA (Approx. 0.1%F.S.)							
	Gravitational effect (From horizontal position to vertical position)		%F.S.	± 0.3	± 0.1	± 0.05		± 0.3		± 0.1	± 0.3

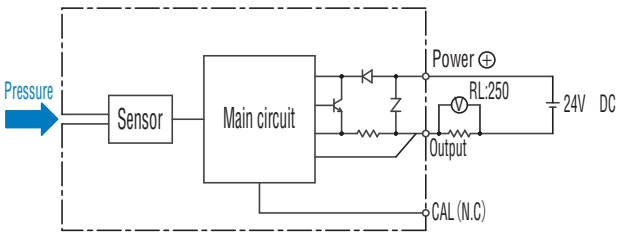
ENVIRONMENTAL CHARACTERISTICS

Test item	Test conditions (At 25 ± 5 °C)	Permissible change
Vibration	10 ~ 500 Hz, 1.5 mm maximum/98.1 m/s², 3 directions for 2 hours each	Zero current, Span current: ± 1 %F.S. maximum each
Shock	490 m/s² 3 directions for 3 times each	
Pressure cycling	0 ~ Rated pressure/Rated pressure range, 10^6 cycles	
Moisture resistance	40 °C, 90 ~ 95 %RH, 240 hrs.	

INTERNAL ELECTRICAL SCHEMATICS



RECOMMENDED EXTERNAL SCHEMATICS



※Do not wire the CAL connection.
It may cause malfunction when voltage is applied.

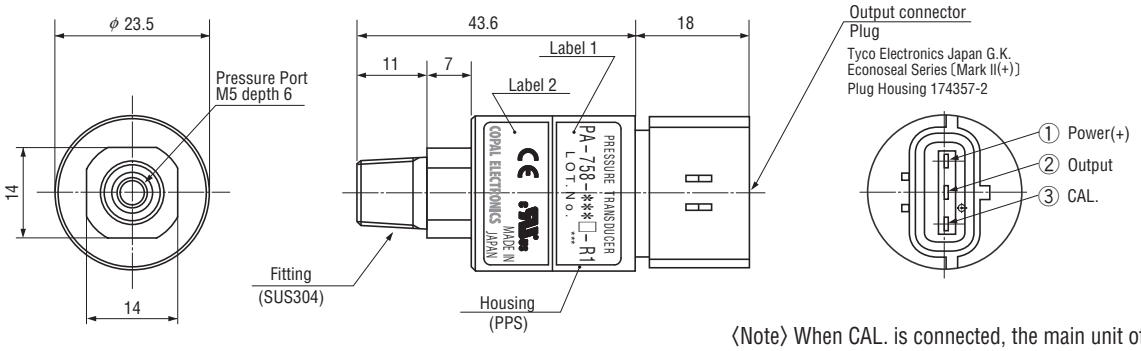
**…Calibration

PA-758
PRESSURE TRANSDUCERS WITH AMP.

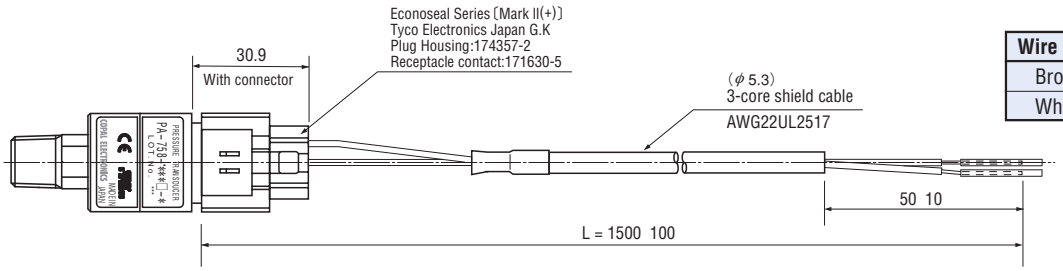
■ OUTLINE DIMENSIONS

Unless otherwise specified, tolerance : 0.5 (Unit: mm)

● Configurations of joint R1 (R1/8) type

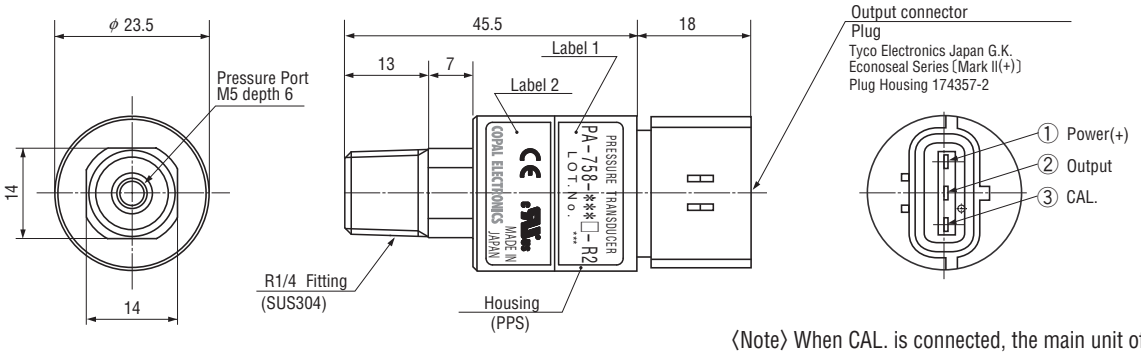


〈Note〉 When CAL. is connected, the main unit of the sensor might malfunction or be damaged.



Wire color	Connection
Brown	Power ⊕
White	Output

● Configurations of joint R2 (R1/4) type



〈Note〉 When CAL. is connected, the main unit of the sensor might malfunction or be damaged.