

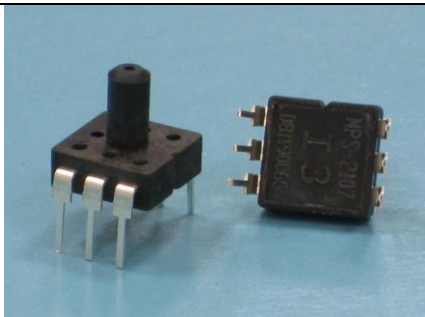
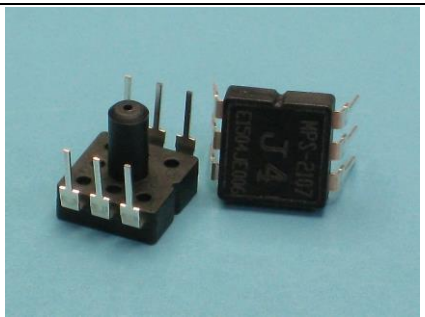
## MPS-2100 series Pressure Sensor

### ■ Features

- Competitive price dual in-line package
- Wide operating temperature range:- 40 to +85°C
- Solid-state reliability
- Easy to Use
- Easily embedded in OEM equipment
- Gauge pressure type ( 1 、 5.8 、 15 、 30 、 100 PSI )

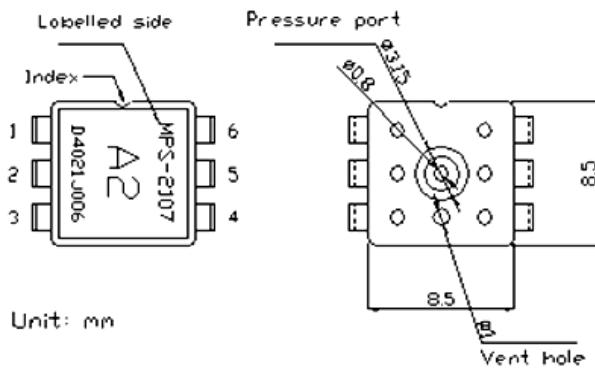
### ■ Applications

- Digital blood pressure meter
- Digital pressure gauges
- Environmental monitoring
- Consumer & Sports
- Medical instrumentation & monitoring
- Disposable blood pressure sensor

Pressure type	Gauge	Gauge
	MPS-2107-006GC	MPS-2107-006GRC
Model		

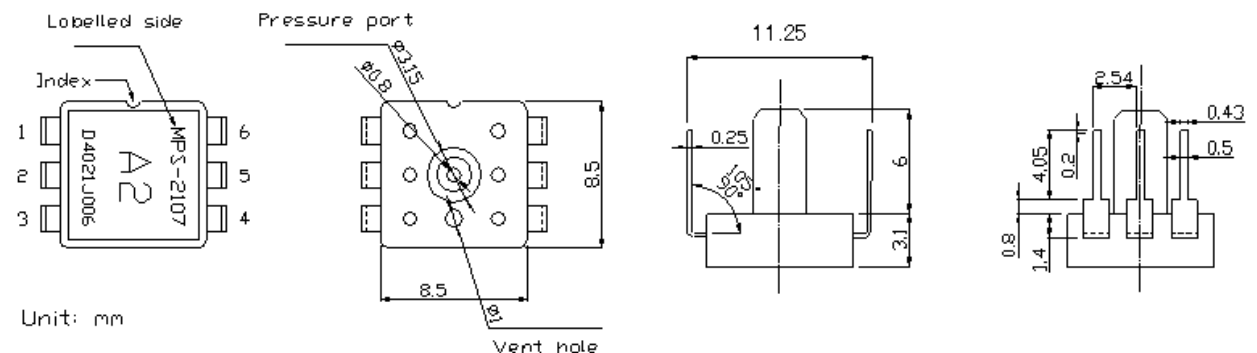
### ■ Outline dimensions

#### MPS-2107-006GC



Unit: mm

#### MPS-2107-006GRC

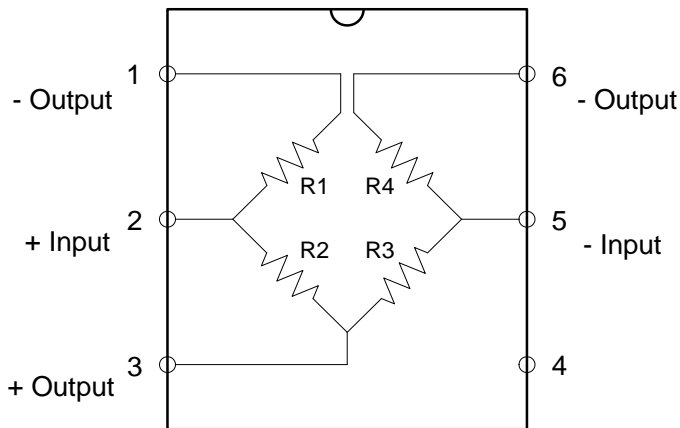


Unit: mm

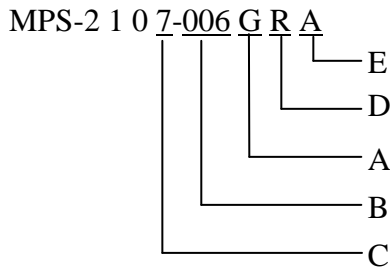
## ■ Specifications

Parameter	Min	Typ	Max	Units	Notes
<b>General</b>					
Pressure Range	1 · 5.8 · 15 · 30 · 100			PSIG	
Maximum Overpressure			2X		Rated pressure
Operating Temperature Range	-40		85	°C	-40°F ~+185°F
Storage Temperature Range	-40		125	°C	-40°F ~+257°F
Operating humidity	15		85	% RH	No condensation
Media Compatibility	Clean, dry air & noncorrosive gases				
<b>Electrical performance<sup>(1)</sup></b>					
Excitation voltage MPS-2103, MPS-2107, MPS-2108 MPS-2106	2 2.7	5 3	15 3.3	Vdc	
Excitation current 3.3 kOhm (MPS-2103) 5 kOhm (MPS-2107, MPS-2108) 5 kOhm (MPS-2106)	0.6 0.4 0.54	1.5 1 0.6	4.5 3 0.66	mA	(5)
Bridge resistance 3.3 kOhm (MPS-2103) 5 kOhm (MPS-2106, MPS-2107, MPS-2108)	2.7 4	3.3 5	3.9 6	kΩ	
Offset Voltage	-25		25	mV	
Full Scale Span Voltage 1 PSI (MPS-2107) 5.8 PSI (MPS-2107) 5.8 PSI (MPS-2103 · MPS-2108) 15 PSI (MPS-2103 · MPS-2108) 30 PSI (MPS-2108) (MPS-2106) 100 PSI (MPS-2108)	20 50 20 70 80 85 70	30 75 45 100 110 115 120	40 100 70 130 140 145 170	mV	
Linearity 1 PSI 5.8, 15, 30, 100P SI	-0.7 -0.3	0.15 0.05	0.7 0.3	% Span	(2)
Temperature Coefficient of Zero Offset 1PSI 5.8, 15, 30, 100 PSI	-0.22 -0.08		0.22 0.08	% Span/°C	(3)
Temperature Coefficient of Span	-0.16	-0.21 <sup>(4)</sup>	-0.26	%Span/°C	Const. Voltage excitation (3)
	-0.05	0.025 <sup>(5)</sup>	0.05		Const. Current excitation (3)
Temperature Coefficient of Resistance	0.17	0.2	0.23	%/°C	(3)
Notes :					
1. Unless otherwise specified, measurements were taken with a supply voltage of 5 Vdc at a temperature of 25±3°C and humidity ranging from 25% ~85% .					
2. Best fit straight line.					
3. Between 0°C and 50°C. Temperature coefficients are typical values.					
4. Measured only with constant voltage excitation ( 5V ) .					
5. Measured only with constant current excitation ( 1mA or 0.6mA for 5kOhm sensor ; 1.5mA for 3.3kOhm sensor ) .					
Metrodyne Microsystem Corp. reserves the right to make changes to the product specification in this publication.					

## ■ Terminal connection diagram



## ■ Ordering information



<b>A</b>	<b>Pressure type</b>	<b>B</b>	<b>Pressure range</b>
G	Gauge	001 006 015 030 100	1 PSI 5.8 PSI 15 PSI 30 PSI 100 PSI
<b>C</b>			
3	3.3kOhm		
6	3V operation voltage		
7	High sensitivity		
8	Low sensitivity		
<b>D</b>	<b>Lead direction</b>	<b>E</b>	<b>Lead plating</b>
R	The same direction as the tube	A	Silver
N/A	Opposite direction to the tube	C	Plastic cover

<b>Part No.</b>	<b>Pressure type</b>	<b>Pressure range</b>	<b>Feature</b>	<b>Note</b>
MPS-2107-001GC	Gauge	1 PSI	5 kOhm	Plastic cover
MPS-2103-006GRC	Gauge	5.8 PSI	3.3 kOhm	Plastic cover
MPS-2107-006GC	Gauge	5.8 PSI	5 kOhm	Plastic cover
MPS-2107-006GRC	Gauge	5.8 PSI	5 kOhm	Plastic cover
MPS-2108-015GC	Gauge	15 PSI	5 kOhm	Plastic cover
MPS-2108-030GC	Gauge	30 PSI	5 kOhm	Plastic cover
MPS-2106-030GC	Gauge	30 PSI	5 kOhm, 3V	Plastic cover
MPS-2108-100GC	Gauge	100 PSI	5 kOhm	Plastic cover

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