



PGE050

Pirani Gauge Enhanced

The INFICON Pirani Gauge Enhanced 050 (PGE050) is the passive version of our active convection enhanced Pirani gauges PGE300 and PGE500. Equipped with the same sensor technology, the PEG050 works in conjunction with our VGC031 passive gauge controller unit to produce the same higher accuracy readings in the measurement range between 100 to 1000 mbar.

With its wider measuring range and higher accuracy, especially at lower pressures, the PGE050 is the first choice when replacing thermocouple gauges in your vacuum system. The rugged gauge and sensor design makes the PGE050 a high value/low cost of ownership choice and qualifies this gauge for many applications where an economical vacuum measurement from low to high vacuum range is required.



ADVANTAGES

- Convection Enhanced Pirani Technology for wide measurement range and higher accuracy near atmosphere
- Gold plated tungsten filament
- Mechanical strength, highly robust and less susceptible to mechanical shock and vibration
- Choice of flange options
- Compliance & standards: CE, RoHS
- Direct drop in replaces Granville-Phillips[®] Convectron[®] gauge sensor (same plug/ pinouts)
- PGE050 accepts Granville-Phillips® Convectron® controllers, cables and modules
- Ideal gauge sensor for upgrading your installed thermocouple gauges

APPLICATIONS

- Fore vacuum pressure measurement
- General vacuum measurement and control form low to the high vacuum range

ORDERING INFORMATION

Туре	PGE050 Gauge
	Tungsten gold-plated
DN 16 ISO-KF	352-500
DN 25 ISO-KF	352-501
DN 40 ISO-KF	352-502
DN 16 CF-R	352-503
DN 40 CF-R	352-504
4 VCR female	352-505
8 VCR female	352-506
1/8" NPT	352-507

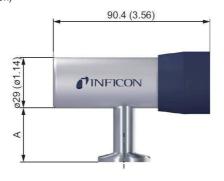
SPECIFICATIONS

Type Filament			PGE050 Tungsten gold-plated
Measurement range	,	mbar	1.3 × 10 ⁻⁴ 1333
-		Torr	1 × 10 ⁻⁴ 1000
		Pa	1.3 × 10⁻² Pa 133 kPa
Accuracy (N ₂) 1)	1.3 × 10 ⁻⁴ 1.3 × 10 ⁻³	mbar	0.1×10^{-3} mbar resolution
	$1.3 \times 10^{-3} \dots 530 \text{ mbar}$	% of reading	±10
	530 1333 mbar	% of reading	±2.5
	1 × 10-4 1×10-3 Torr		0.1 mTorr resolution
	1 × 10 ⁻³ 400 Torrr	% of reading	±10
	400 1000 Torrr	% of reading	±2.5
Repeatability (N ₂) 1)		% of reading	±2
Admissible tempera	ture		
Operation		°C	0 +50
Bakeout 2)		°C	≤150
Materials exposed t	o vacuum		gold-plated tungsten, 304 & 316 stainless steel, glass, nickel, Teflon [®]
Internal volume		cm³ (in³)	26 (1.589)
Internal surface are	a	cm ² (in ²)	59.7 (9.25)
Weight		g (oz)	85 (3)

¹⁾ typically

DIMENSIONS

mm (inch)





Dimension A	mm	(in)
DN 16 ISO-KF	33	(1.3)
DN 25 ISO-KF	33	(1.3)
DN 40 ISO-KF	33	(1.3)
DN 16 CF-R	27.4	(1.08)
DN 40 CF-R	37.3	(1.47)
4 VCR female	47.2	(1.86)
8 VCR female	44.5	(1.75)
1/8" NPT male	25.4	(1)



²⁾ non-operating, with electronics cable detached