

Granville-Phillips Vacuum Gauge Controller for Versatile, Accurate Pressure Measurement



Granville-Phillips 340 Vacuum Gauge Controller (VGC) measures pressure from less than 1×10^{-9} Torr to atmosphere, utilizing an ionization gauge and two Convectron gauges. Pressure from each gauge is indicated independently on three front panel digital displays and by rear panel analog outputs. Resistance heating degas of the ionization gauge is standard.

Infrequently used controls are housed behind a hinged front panel to reduce front panel clutter. The 3 1/2" high controller is available as a compact 8" wide bench mount unit.

Excellent efficiency of the integral power supply and low internal power consumption allows the 340 to run cool without requiring ventilation openings in its aluminum enclosure. This helps avoid failures that can be induced by heat or foreign materials.

- Uses one Bayard-Alpert Ion Gauge tube and two Convectron Gauge Tubes
- Resistance heating degas
- Convenient bench top design
- Three independent digital LED readouts

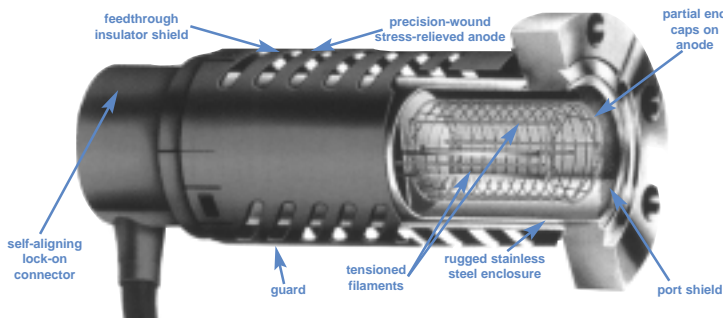
Specifications	
Display	3 independent LED digital
Pressure Range	1000 to 1×10^{-9} Torr using both ion gauge and Convectron Gauge Tubes
Emission Current	Controlled, Adjustable 0.01-10.0 mA
Degas	I2R: 8V, 10A max.
Weight	11.0 lbs
Dimensions	9.0" wide x 3.0" high x 11" deep.

Part No.	Description	Price ea.
VGC340*	Model 340 Vac. Gauge Controller	
340C10	10' Cable, Ionization	
340DC10	10' Dual Convectron Cable	
G75K	Kovar 3/4" Ion Gauge Tube	
G75P	Pyrex Ion Gauge Tube	
275071	1/8" NPT Convectron Tube	
275196	NW25 Convectron Tube	

*This is controller only. Purchase cables and tubes separately.

STABIL-ION® VACUUM MEASUREMENT SYSTEM

Highest Long-Term Accuracy Vacuum Gauge from Granville Phillips



Improved Long-Term Accuracy

Long-term accuracy of pressure measurement is essential in vacuum processing to achieve maximum throughput. Conventional IG Systems will typically provide pressure indications that are uncertain by 30 to 40% at mid-range and by several hundred percent at higher pressures when new. Even accurate calibration does nothing to improve the accuracy of readout on non STABIL-ION Systems. With these older systems, you must use lookup tables to get accurate information and, with use, the calibration typically changes resulting in unavoidable errors. Only STABIL-ION Systems can automatically correct for the inherent nonlinearity in sensitivity in all Bayard-Alpert type gauges. Compare the 2, 3, or 6% uncertainty of readout at mid-range of STABIL-ION Systems (depending on the system ordered) with the approximately 10 times larger uncertainty of older systems and you will choose STABIL-ION Systems.

Reliability is Designed In

With STABIL-ION Gauges, there is no glass breakage, glass decomposition, or helium permeation. Conventional nude ionization gauges also have no glass envelopes; however, the lack of a fixed metal envelope and shields around the electrodes means that any change on the position or potential of any surface in the vicinity of the nude gauge affects its accuracy.

GPC uses a proprietary filament coating process with greatly improved adhesion and uniformity of coating for longer cathode life. A number of pre-production STABIL-ION Gauges have been operating continuously for over 42 months.

Ordering Information

The STABIL-ION System from SIS includes the following components and parts.

1. STABIL-ION Controller (#360102) rack mounted controller with remote power supply.
2. STABIL-ION Gauge with CF flange mount (#360120)
3. 10 ft. STABIL-ION Cable (#360113)

The system is calibrated for output in Torr and wired for 120 VAC, 60Hz, USA type plug.

Part No.	Description	Price
GP360102K	STABIL-ION System, includes STABIL-ION Gauge	
360120	STABIL-ION Gauge	