Wafergard® MAX In-line PTFE Gas Filters

Superior particulate filtration in high-purity gas and general nitrogen and CDA applications

Wafergard® MAX in-line gas filters provide the industry's best filters for ultrapure gas systems. The PTFE filter element is compatible with high-purity gases as well as general nitrogen and CDA applications.

Available in Bronze and Silver performance levels, our MAX series filters are specifically designed for high flow and low delta pressure applications and provide ultimate process protection by removing contaminants that could affect process quality.

Wafergard MAX filters are suitable for facility hook-up, valve manifold boxes, and point-of-use gas panel applications.



Specifically designed for high flow and low delta pressure applications

APPLICATIONS

- Compatible with all classes of semiconductor process gases
- Compatible with general nitrogen and CDA applications

FEATURES & BENEFITS

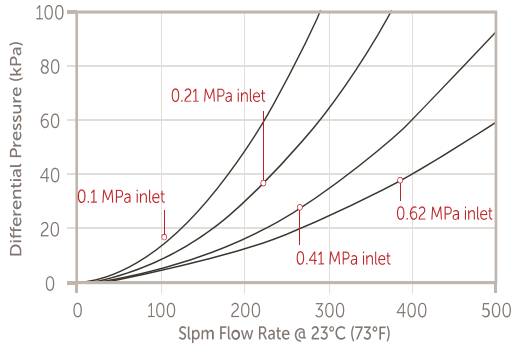
Low pressure drop filter design	Saves time and costs
Removes particles greater than 0.0015 µm from incoming gas	Minimizes process defects
PTFE filter element	Provides excellent compatibility with high-purity gases, including nitrogen and CDA
Small, compact footprint	Saves valuable equipment space and allows for easier implementation
Pre-conditioned (silver only)	Enables fast start-up

SPECIFICATIONS

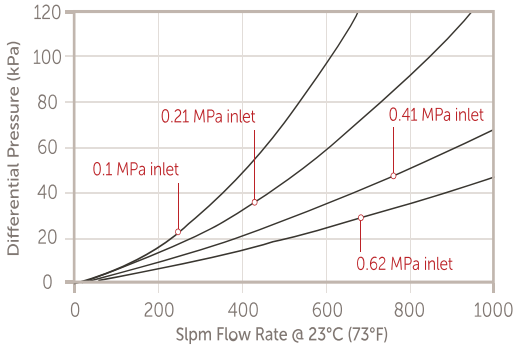
Materials	Filter element	Hydrophobic PTFE membrane supported by molded PFA structures
	Housing	Electropolished low sulfur 316L stainless housing
Downstream cleanliness	Particles	Less than 0.03 particles/liter (<1 particle/ft^3) greater than 0.01 µm
	Volatiles (Silver)	<10 ppb H_2O and O_2. Below LDL THC (lower detection limit is 5 ppb)
Removal rating	≥0.0015 µm	
Surface finish interior	WGMX (Bronze) MB XXXX	≤20 µin Ra
	WGMX (Silver/Bronze Plus) MS XXX/XXX	≤7 µin Ra
Helium leak rating	Qualified	2 x 10^{-10} atm-cc/sec
	Tested	1 x 10^{-9} atm-cc/sec
Operating conditions	Maximum inlet pressure	Silver and Bronze Plus 1/4" and 1/2" VCR® compatible fittings: 7.0 MPa (70 bar, 1015 psig)
		Bronze 1/4" and 1/2" VCR compatible fittings: 6.0 MPa (60 bar, 870 psig)
		Bronze and Bronze Plus 1/4", 3/8" and 1/2" Swagelok® compatible fitting: 6.0 MPa (60 bar, 870 psig)
	Maximum forward differential pressure	7 bar (102 psid)
	Maximum reverse differential pressure	2.5 bar (36 psid)
	Maximum operating temperature	120°C (248°F)
Flow rating	Refer to performance data	
Warranty	Bronze	1 year
	Silver	3 years
Particle retention	Greater than 99.9999999% (9 LRV) removal of all particles (referenced at the most penetrating particle size)	

PERFORMANCE DATA

Wafergard MAX In-line (¼" Fittings)

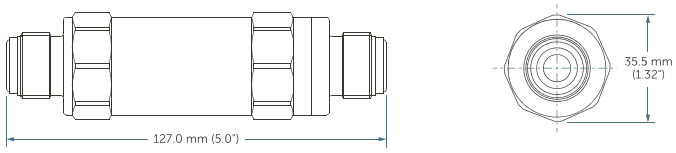


Wafergard MAX In-line (½" Fittings)

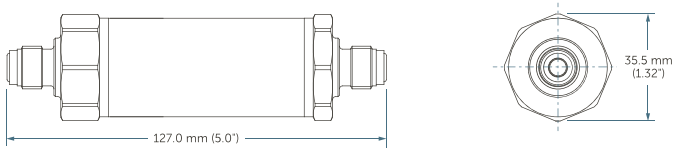


DIMENSIONS

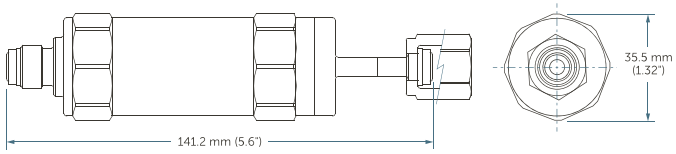
¼" and ½" Gasket Seal, Male Inlet/Outlet (Siver and Bronze Plus)



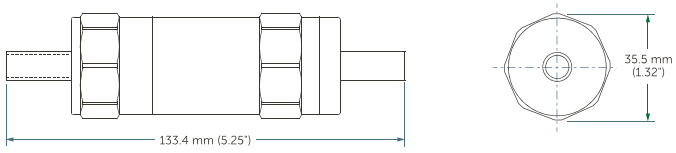
¼" and ½" Gasket Seal, Male Inlet/Outlet (Bronze)



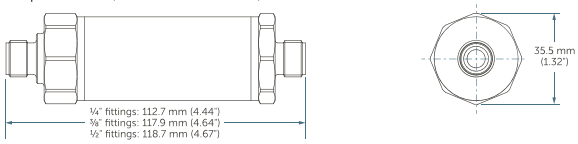
¼" Gasket Seal, Male Inlet/Female Outlet



¼", ⅜", and ½" Butt Weld Tube



Compression Seal (Bronze and Bronze Plus)



ORDERING INFORMATION

PART NUMBER	FITTING SIZE & TYPE	LENGTH
WGMXMBPRF2	1/4" male VCR® inlet, 1/4" female VCR® outlet	141.2 mm (5.6")
WGMXMBRR2	1/4" male VCR®	127 mm (5.00")
WGMXMBRR4	1/2" male VCR®	127 mm (5.00")
WGMXMBSS2	1/4" Swagelok®	112.7 mm (4.44")
WGMXMBSS3	3/8" Swagelok®	117.9 mm (4.64)
WGMXMBSS4	1/2" Swagelok®	118.7 mm (4.67")
WGMXMPRR2	1/4" male VCR®	127 mm (5.00")
WGMXMPRR4	1/2" male VCR®	127 mm (5.00")
WGMXMPSS2	1/4" Swagelok®	112.7 mm (4.44")
WGMXMPSS3	3/8" Swagelok®	117.9 mm (4.64)
WGMXMPSS4	1/2" Swagelok®	118.7 mm (4.67")
WGMXMSBW2	1/4" Butt weld tube	133.4 mm (5.25")
WGMXMSBW3	3/8" butt weld tube	133.4 mm (5.25")
WGMXMSBW4	1/2" Butt weld tube	133.4 mm (5.25")
WGMXMSRR2	1/4" male VCR®	127 mm (5.00")
WGMXMSRR4	1/2" male VCR®	127 mm (5.00")

FOR MORE INFORMATION

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