



A revolution in gas purifying of GC and GC/MS gases

Unique «POINT-OF-USE» and «SEMI IN-LINE» glass/metal, diffusionproof Super-Clean Gas Filters, purify the delicate carrier and burner gases for your GC and GC/MS system for Hydrocarbons, Oxygen (colour indicated) and Moisture (colour indicated) to better-as 6.0 gas (99,9999%) quality, independent of the original gas quality.

Analytical advantages of SGT Super-Clean Gas Filters

- Longer lifetime of analytical columns, avoids bleeding, espec. important for MS and ECD.
- Better sensitivity, decreases baseline noise, eliminates spikes.
- Filter-change during analysis within seconds, system stays online.

Purifier Cartridge Capacity

Type of Purifier	Outlet Gas Quality	Usable for	Indicator Color Change	Capacity		
				H ₂ O(gr)	O ₂	Hydrocarbons
Moisture	> 6.0	Inert carrier gas, air hydrogen	Brown to white	7.2		
Oxygen	> 6.0	Inert carrier gas	Green to grey		150 mL	
Hydrocarbon	> 6.0	Inert carrier gas, air hydrogen	No indicator			12 g (as n-butane)
Combi (moisture/hydrocarbon)	> 6.0	Inert carrier gas, air hydrogen	Brown to white	3.5		6 g (as n-butane)
Triple (moisture/oxygen/hydrocarbon)	> 6.0		Brown to white Green to grey	1.8	75 mL	4 g (as n-butane)

Tk Super-Clean Gas Filters

Specifications on GST Super-Clean Gas Filters

- The specified lifetimes are strongly depending of the quality of the incoming gas.
- Effectivity: <0.1 ppm at a flowrate of 2 liters/minute



One position platform

Quick-Fit System

Benefits of the "quick-fit" system:

- Filter replacement within seconds.
 - **Eliminates GC downtime.**
- Tool-less filter replacement.
 - **Easy handling**
- Diffusion-proof Baseplate (also during filter replacement).
 - **Eliminates analytical disturbance.**
- Baseplates can be wall-mounted.
 - **Convenient positioning**

Different Standard Configurations

GC/MS Carrier Gas Purification System

- Removal of Oxygen, moisture and hydrocarbons for longer column lifetime and cleaner baseline.
- This configuration is excellent for Carrier Gas and ECD, MS applications.

In this configuration, you need to use: 1-position baseplate + 1 Triple Filter

SG-F0301	Triple Filter (O ₂ /Moisture/Hydrocarbons)
SG-B0010-B8	1-position baseplate - 1/8" Brass

GC/MS Carrier Gas Helium Specific Purification System

System for Purifying Helium in GC/MS systems

In this configuration, you need to use: 1-position baseplate + 1 Triple filter gas specific Helium

SG-F0302	Triple Filter; conditioned with Helium (O ₂ /Moisture/Hydrocarbons)
SG-B0010-B8	1-position baseplate - 1/8" Brass

Fuel Gas Purification System used in a FID

Removal of moisture and hydrocarbons in the gases of the FID for a better baseline

In this configuration, you need to use: 2 units of 1-position baseplate + 2 Combi filters (hydrocarbons/moisture)

One combi filter for purifying Air and other combi filter for purifying hydrogen

2 x SG-B0010-B8	1-position baseplate 1/8 " Brass
2 x SG-F0201	Combi Filter -hydrocarbons/moisture

Carrier Gas Purification and FID Gases

The full solution for your GC/FID system
Purifying all gases used in a FID operated GC

In this configuration, you need to use: 3 units of 1-position baseplate + 1 triple filter (O₂/Moisture/Hydrocarbons) for purifying carrier gas + 2 Combi Filter (Hydrocarbons/Moisture) for purifying gases used in a FID.

3 x SG-B0010-B8	1-position baseplate 1/8 " Brass
1 x SG-F0301	Triple Filter (O ₂ /Moisture/Hydrocarbons)
2 x SG-F0201	Combi Filter (Noisture/Hydrocarbons)

High Capacity Purifiers for Carrier and FID Gases

Recommended for low quality gases
Purifying all gases used in a FID operated GC
Use Ultra Capacity Moisture and Oxygen filters for Carrier and 2 Ultra Capacity Hydrocarbon Filter one for Air & one for Hydrogen.

In this configuration, you need to use: 4 units of 1-position baseplate + 1 Moisture Filter, Standard, Ultra Capacity + 1 Oxygen Filter, Standard, Ultra Capacity + 2 Hydrocarbons Filter, Standard, Ultra Capacity.

4 x SG-B0010-B8	1-position baseplate 1/8 " Brass
1 x SG-F0101	Moisture Filter, Standard, Ultra Capacity
1 x SG-F0102	Oxygen Filter, Standard, Ultra Capacity
2 x SG-F0103	Hydrocarbons Filter, Standard, Ultra Capacity, pk/1.

LC-MS Gas Purification System High Flow

Unique 2-Position Super Clean System for purifying the nitrogen gas and zero air utilized in LC/MS instruments.

In this configuration, you need to use: 1 unit of 2-position baseplate + 1 Set of Hydrocarbons purifiers for nitrogen gas + particle filter

1 x SG-B0021-B4	2-position baseplate, 1/4" Brass for 2 High Flow Gas Filters
1 x SG-F0720	Hydrocarbons Filter, Standard, Ultra capacity, pk/2
1 x SG-B0060	0.5 micron Particle Filter 1/4", pk/4



Click-On Inline Super-Clean™ Purifiers®



Original Inline Super -Clean™ Purifier



- High-purity output ensures 99.9999% pure gas
- Click-On fittings for easy, leak-tight cartridge changes; brass or stainless steel, 1/4" or 1/8"
- Helium-Specific Triple Purifier is ideal for GC/MS

The SGT Click-On Inline Super-Clean™ purifiers are the latest in in-line gas filtration. Click-On adaptor connectors allow purifiers to be exchanged without introducing oxygen. Spring-loaded check valves seal when a filter is removed and open only when a new

filter has been locked in place. There is no need for loosening and tightening fittings every time a purifier is changed, and your system will not become contaminated during the process.

The Triple Click-On Purifier is ideal for purifying carrier gas-it contains oxygen, moisture, and hydrocarbon scrubbers in one cartridge.

The Fuel Gas Click-On Purifier is ideal for purifying flame ionization detector (FIC) fuel gases, removing both moisture and hydrocarbons.

The Helium-Specific Triple Click-On Purifier is ideal for purifying helium in GC/MS systems. This Click-On purifier under helium contains oxygen, moisture, and hydrocarbon scrubbers in one cartridge, and is packed and purged.

Click-On purifier replacement depends on the quality of the incoming gas. Use the double connector and install an indicating cartridge after a purifier to indicate when the purifier should be replaced.

Inline Super-Clean™ Specifications

Type	Output Quality	Max Pressure	Max Flow	Used For	Capacity	Estimated Lifetime (years)
Moisture	>6.0 (99.9999%)	160 psi (11 bar)	25 L/min	Inert Carrier, Helium, Air, H2	21 g H2O	>3
Oxygen	>6.0 (99.9999%)	160 psi (11 bar)	25 L/min	Inert Carrier	3000 mL	>3
Hydrocarbon	>6.0 (99.9999%)	160 psi (11 bar)	25 L/min	Inert Carrier, Helium, Air, H2	36 g HCs ³	>3
Fuel Gas ¹	>6.0 (99.9999%)	160 psi (11 bar)	25 L/min	Inert Carrier, Helium, Air, H2	10 g H2O; 18 g HCs ³	>2
Triple ²	>6.0 (99.9999%)	160 psi (11 bar)	25 L/min	Inert Carrier	6 g H2O; 12 g HCs ³	>2

¹ Removes hydrocarbons, moisture

² Removes hydrocarbons, moisture, oxygen

³ As n-butane.

Note: Super-Clean™ Gas Filters are recommended for purifying non-corrosive gases with low concentration of contaminants. The maximum concentration of O2 in the incoming gas stream for oxygen purifiers is 0.5%.

Click-On Inline Purifier Steel

Cat.No	Description	pK
SG-CO1005	Click-On Inline Triple Trap (Oxygen/Moisture/Hydrocarbons) Cartridge - Stainless Steel	1 unit
SG-CO1061	Click-On Inline Indicating Triple He Trap (Oxygen/Moisture/Hydrocarbons) Cartridge-Glass	1un
SG-CO1001	Click-On Inline Moisture Cartridge - Stainless Steel	1 unit
SG-CO1002	Click-On Inline Oxygen Cartridge - Stainless Steel	1 unit
SG-CO1003	Click-On Inline Hydrocarbon Cartridge - Stainless Steel	1 unit
SG-CO1004	Click-On Inline Combi (Oxygen/Moisture) Cartridge - Stainless Steel	1 unit
SG-CO1007	Click-On Inline Combi (Hydrocarbons/Moisture) Cartridge - Stainless Steel	1 unit

Click-On Connectors

Cat.No	Description	pK
SG-CO2001	Click-On Connectors 1/4" Brass	2 units
SG-CO2002	Click-On Connectors 1/8" Brass	2 units
SG-CO2010	Click-On Connectors 1/4" SS	2 units
SG-CO2011	Click-On Connectors 1/8" SS	2 units
SG-CO2020	Click-On Double Connectors to connect SS Trap with indicating trap	1 unit



TK SGT Super Big Traps

Click-On Inline Purifier Glass



Cat.No	Description	pK
SG-CO1041	Click-On Inline Combi Trap (Oxygen/Moisture) Cartridge with indicator - Glass	1 unit
SG-CO1051	Click-On Inline Triple Trap (Oxygen/Moisture/Hydrocarbons) Cartridge with indicator - Glass	1 unit
SG-CO1011	Click-On Inline Moisture Cartridge with indicator - Glass	1 unit
SG-CO1021	Click-On Inline Oxygen Cartridge with indicator - Glass	1 unit
SG-CO1031	Click-On Inline Hydrocarbon Cartridge with indicator - Glass	1 unit

SGT Super Big Traps with electronic indicator



- Ideal for Central Purifying Solutions
- Largest Big Trap Available
- High-purity output ensures 99.9999% Pure gas
- Click-On fittings for easy, leaktight cartridge changes
- High Pressure Stainless Steel

Click-On Inline Super-Clean™ Big Traps are inline traps designed with Click-On adaptor connectors which allows inline cartridges to be exchanged without introducing oxygen. Spring loaded check valves seal when a filter is removed and open only when a new filter has been locked in place. There is no need for loosening and tightening fittings every time a trap is changed and your system will not become contaminated during the process

Specifications

Material	Stainless Steel
Length	22 inch
Diameter	2,5 inch
Max. Inlet Pressure	1000 psi
Max. Flow (GC/MS)	8 L/min
Max. Flow (LC/MS)	25 L/min
Pressure Drop *	0,30 psi

Virtual Indicator Compatible



Compatible with the Virtual Indicator platform, allows you to monitor the status with the CLIK device.

Capacity Data

Contaminant		Capacity					
Contaminant	Gas Purify	Triple (Oxy/Moist/Hydr)	Moisture	Oxygen	Hydrocarbons	Combi (Hidr/Moist)	Combi (Oxy/Moist)
Oxygen	< 5 ppm	2.0 L	-	4.5 L	-	-	2,25 L
Hydrocarbon	< 5 ppm	30 g	-	-	90 g	45 g	-
Moisture	< 5 ppm	70 g	210 g	-	-	105 g	105 g

Replacement cartridges for Big Traps

Cat.No	Description	Gas Type
SG-COBT1008	Triple H2 (Oxy/Moist/Hydr) Big Trap	Hydrogen
SG-COBT1006 *1	Triple He (Oxy/Moist/Hydr) Big Trap	Helium
SG-COBT1005	Triple (Oxy/Moist/Hydr) Big Trap	Nitrogen
SG-COBT1001	Moisture Big Trap	(He/Ar/Me)
SG-COBT1002	Oxygen Big Trap	(He/Ar/Me)
SG-COBT1003 *2	LC/MS Hydrocarbon Big Trap	(He/Ar/Me)
SG-COBT1007	Combi (Hydr/Moist) Big Trap	(He/Ar/Me)
SG-COBT1004	Combi (Oxy/Moist) Big Trap	(He/Ar/Me)

*1 : recommended for GC/MS *2 : recommended for LC/MS

Installation Kits (includes re-usable fittings)

Catalog No	Catalog No. Extension	(Re-usable) Fitting
	-S8	1/8" Stainless Steel
Choose any catalog no from the table on the left	-S4	1/4" Stainless Steel
	-B8	1/8" Brass
	-B4	1/4" Brass

For Example: to order a Triple He Big Trap Installation Kit with 1/8" Stainless Steel Click-On Connectors, the part number would be: SGT-COBT1006-S8