

Air Monitoring



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| | |
|---|-----------------------|
| SilcoCan Canisters | 402-403 |
| Canister Carrying Supplies | 403 |
| TO-Can Canisters | 404 |
| Canister Supplies | 405-406 |
| Canister Reconditioning | 406 |
| Passive Air Sampling Kits & Parts | 407-408 |
| Miniature Air Sampling Canisters | 409 |
| Thermal Desorption Unit Tubes | 410 |
| Resin, PUFs | 411 |
| Gas Sampling Bags | 412 |
| Gas Standards | 413-418 |
| Reference Cylinder Regulators | 415, 417-418 |
| High-Pressure Sample Cylinders | 419 |
| Air Monitoring Syringes | 292 |
| Reference Books | www.restek.com |



Canisters are the gold standard for ambient VOC monitoring.

for more info

For more information about Siltek® deactivation, refer to the Restek Performance Coatings section of this catalog. See [page 380](#).

did you know?

SilcoCan™ Canisters are cleaned prior to shipping.

- Excellent stability for long-term storage of sulfur-containing volatile organic compounds.
- More accurate sampling.

SilcoCan™ Air Monitoring Canisters

Ideal for low-level reactive sulfur (1-20ppb), TO-14, or TO-15 compounds

| Features | Benefits |
|---|--|
| Siltek® treated. | High inertness—ensures sample stability. |
| High-purity, 3/8"-turn valve with stainless steel diaphragms. | No sample adsorption at the valve, for more accurate results; easy to use. |
| Vacuum/pressure gauge (optional). | Ascertain internal conditions at a glance. |
| Variety of sizes. | Meet extensive range of sampling needs. |
| Stable to 250°C. | Heat canister to 250°C for superior cleaning. |
| Siltek® valve available (add suffix "-650" to cat.#). | Completely passive sample pathway for maximum sample stability. |

Optional gauge

- Quickly confirm vacuum or pressure inside canister.
- Monitor pressure changes.
- Fully protected by canister frame.
- Can be heated to 90°C during cleaning.

Newest surface technology

To ensure sample stability, SilcoCan™ canisters are deactivated with Restek's innovative Siltek® surface treatment, which chemically bonds a fused silica layer to the metal inner surface of the canister. This layer offers unsurpassed inertness for active compounds, including polar and sulfur-containing molecules. It will not crack, chip, or flake off, despite harsh handling in the field or during transport.

Benefits

- High inertness—ensures sample stability.
- No sample adsorption at the valve, for more accurate results; easy to use.
- Ascertain internal conditions at a glance.
- Meet extensive range of sampling needs.
- Heat canister to 250°C for superior cleaning.
- Completely passive sample pathway for maximum sample stability.



Enhanced valve and canister bracket

Canister holder and valve bracket protect canister, tube stub, and valve.

1/4" tube stub

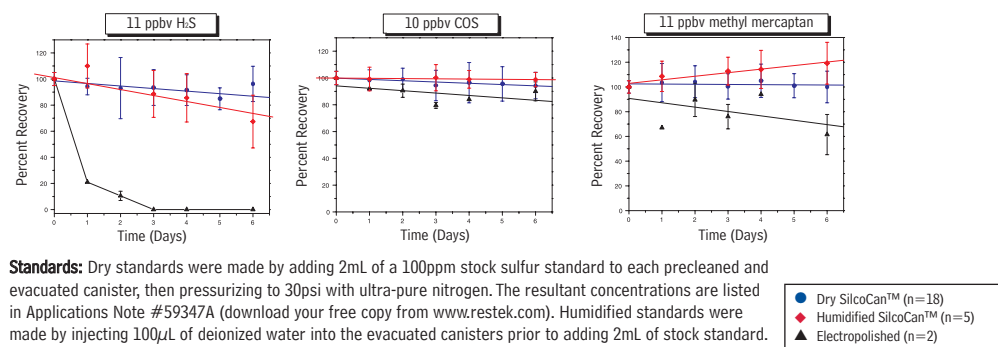
Allows user to interchange valves.

Serial-controlled label

For quick, sure identification.

Whether you are monitoring for TO-14, TO-15, or reactive sulfur compounds, SilcoCan™ canisters are your best choice for inertness. In Tedlar® bags, the stability of low-level (100ppbv) sulfur volatile organic compounds (VOCs) is poor, even within 24 hours of sampling. Sulfur compounds react with the metal surface in electropolished canisters, so these canisters are unsuitable for collecting and storing low-level sulfur VOCs. SilcoCan™ air monitoring canisters, which feature a Siltek® treated surface, offer excellent storage stability for sulfur VOCs at very low levels (1–20ppbv), under dry or humid conditions. The versatility of the SilcoCan™ canister makes it an excellent choice for collecting and storing TO-14 or TO-15 compounds.

Figure 1 SilcoCan™ canisters effectively store very low levels of sulfur compounds.



SilcoCan™ Air Monitoring Canisters

- High quality, metal-to-metal seal, 2/3-turn valve with stainless steel diaphragms.
- Sizes to support a wide range of sampling needs.
- 2-port or 3-port valve available; 3-port valve includes 30" Hg/60psi vacuum/pressure gauge (other gauges available).
- Unsurpassed inertness, even for sulfur-containing or brominated compounds.
- For critical applications, order a Siltek® treated valve—add suffix “-650” to the catalog number of the canister.

Get the ultimate insurance plan—order your SilcoCan™ canister with a Siltek® treated valve.

| Description | qty. | 1L Volume | 3L Volume | 6L Volume | 15L Volume |
|---|------|-----------|-----------|-----------|------------|
| | | cat.# | cat.# | cat.# | cat.# |
| SilcoCan™ Canister, 1/4" Valve | ea. | 24180 | 24181 | 24182 | 24183 |
| SilcoCan™ Canister, Siltek® Treated 1/4" Valve | ea. | 24180-650 | 24181-650 | 24182-650 | 24183-650 |
| SilcoCan™ Canister with Gauge, 1/4" Valve | ea. | 24140 | 24141 | 24142 | 24143 |
| SilcoCan™ Canister with Gauge, Siltek® Treated 1/4" Valve | ea. | 24140-650 | 24141-650 | 24142-650 | 24143-650 |
| SilcoCan™ Canister with No Valve | ea. | 22090 | 22091 | 22092 | 22093 |

Restek canisters are originally equipped with high-quality Parker Hannifin diaphragm valves. Each valve is helium leak-tested to 4×10^{-9} cc/sec. The all-stainless steel construction eliminates contamination and withstands temperatures from -100°C to 250°C. Other features include a compression outlet fitting and a 1/4" inlet and outlet.

Dimensions/Weights of SilcoCan™ Air Canisters

| Can Volume | Dimensions (height x sphere diameter) | | Weight | |
|------------|---------------------------------------|---------------|---------|--------|
| 1 liter | 8.5 x 5.25" | 21.6 x 13.3cm | 2.5 lbs | 1.13kg |
| 3 liter | 11.5 x 7.25" | 29.2 x 18.4cm | 4 lbs | 1.81kg |
| 6 liter | 12.5 x 9.25" | 31.8 x 23.5cm | 7 lbs | 3.18kg |
| 15 liter | 17 x 12.25" | 43.2 x 31.1cm | 13 lbs* | 5.90kg |

*16 lbs shipped UPS Air, 22 lbs shipped Fed Ex (USA).

for example
applications

Vist www.restek.com

also available

For additional gauge and valve options, see [page 405](#).

please note

SilcoCan™ canisters at quantity discounts. Call Restek for details!

Alternative Mounted Vacuum/Pressure Gauges

The standard vacuum/pressure range on a SilcoCan™ or TO-Can™ canister fitted with a gauge is 30" Hg to 60psi. To have a different gauge mounted on your canister, add the appropriate suffix number to the canister catalog number.*

| Gauge | Suffix |
|--------------|--------|
| 30" Hg/15psi | -651 |
| 30" Hg/30psi | -652 |

*No price difference for these substituted gauges.

Quickly confirm vacuum or pressure. Request a high-quality gauge mounted on your SilcoCan™ or TO-Can™ canister.

Canister Carrying Supplies

Canister Carrying Box Kit

6-liter carrying boxes with plastic handles simplify canister transport. These boxes also accommodate our passive sampling kit. 4 carrying boxes and one shipping box per kit.

| Description | qty. | cat.# |
|---------------------------|------|-------|
| Canister Carrying Box Kit | kit | 24215 |

Canister Carrying Case

- Heavy-duty, all-aluminum design, fits two 6L SilcoCan™ or TO-Can™ canisters tightly without foam.
- Weight: 9 lbs.
- Inside dimensions: length 18", width 9 1/8", height 12 1/2" (46 x 23 x 32cm).
- No organic contaminants from foam or plastics.

| Description | qty. | cat.# |
|-------------------------------|------|-------|
| Deluxe Canister Carrying Case | ea. | 24226 |

Restek canisters are shipped in boxes with handles for easy transportation.



