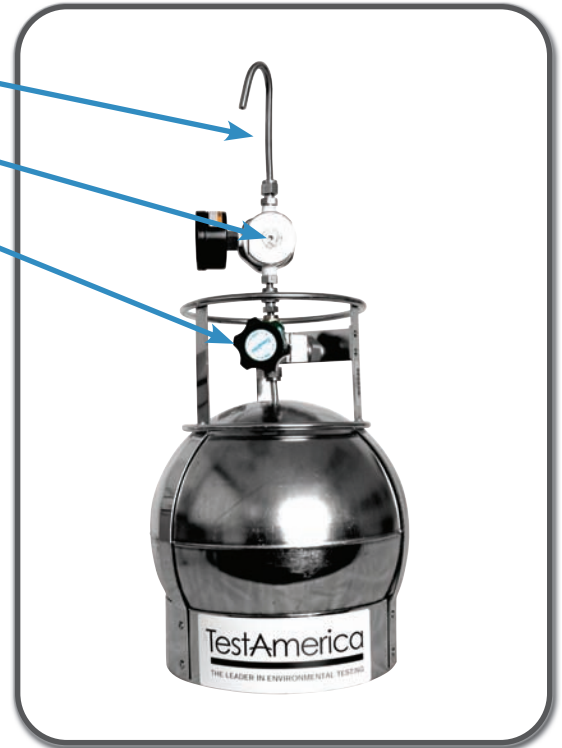




### PARTS:

1. Rain Guard
2. Pre-Filter
3. Flow Controller
4. Vacuum Gauge
5. Canister Valve
6. Canister Inlet



Please read the entire set of instructions prior to beginning your sampling activity.

*If you have questions, please call your TestAmerica Project Manager.*

### GRAB VERSUS INTEGRATED SAMPLES

A **grab sample** can be collected if the air environment is not changing over time or if a qualitative sample is desired. For a grab sample, the canister valve is opened and the sample is collected rapidly until the container reaches equilibrium with atmospheric pressure. Collection should take less than 30 seconds.

A time-weighted or time **integrated sample** is collected to measure the average conditions of the ambient air over a specified period of time. A flow controller or restrictor is used to spread the sample collection over a pre-defined time period. Time integrated samples are often required for an environment that is highly variable such as in a home or an occupational setting.

### INSTRUCTIONS: GRAB SAMPLE

1. If a vacuum gauge is included, remove the dust cap from the canister inlet and use a 9/16" inch flat profile wrench to attach the vacuum gauge to the inlet on top of the canister.
  - Verify the initial vacuum. Leave the brass dust cap on the gauge assembly and rotate the canister valve counterclockwise until fully open. Record the vacuum reading on the chain of custody. Close the valve.
  - NOTE: A 1/4" Stainless Steel Sample Inlet (candy cane-shaped rain guard) may have been provided with your supplies. If included and required, attach the rain guard to the end of the vacuum gauge after verifying the initial vacuum.

2. Remove the brass dust cap using a 9/16" inch flat profile wrench. Save the dust cap.
3. To begin sampling, rotate the canister valve counterclockwise until fully open.
4. To stop sampling, close the canister valve by turning it clockwise until snug. Do not over tighten.
5. Remove the vacuum gauge and rain guard and re-attach the dust cap.
6. Record the final vacuum reading on the attached tag and the chain of custody. It will typically be zero for a grab sample.
7. Complete the chain of custody form, ensuring all fields are populated.
8. Place all equipment back into the packaging material and box in the manner in which they were received. Return the samples to the TestAmerica lab address provided on the tag.

### INSTRUCTIONS: TIME INTEGRATED SAMPLE

1. Remove the brass dust cap from the canister inlet on the top of the canister using a 9/16" inch flat profile wrench. Save the dust cap.
2. Remove the plug at the base of the flow controller.

3. Attach the flow controller (1/4" female Swagelock™ fitting) to the canister inlet (1/4" male Swagelock™ fitting). Hand tighten the threaded nut being careful not to cross the threads. A poorly seated fitting will result in loss of vacuum and/or sample.

- Important: To ensure that the flow controller is threaded properly, hold the flow controller with one hand, rotating it gently back and forth, while hand tightening the nut. If you are unable to hand tighten the nut to the point that the flow controller can no longer be rotated, first check to see that fitting threads are aligned properly. Then, using a 9/16" flat profile wrench, gently tighten the nut while rotating the flow controller. A 1/3 rotation should be sufficient to securely tighten the Swagelock™ fitting. Once tightened to the canister, the flow controller should not be able to be rotated on the top of the canister by hand.

4. If included and required, attach the rain guard to the end of the flow controller.

5. To start sampling, turn the canister valve counterclockwise until fully opened. Record the start time on the sample tag attached to the canister.

6. Record the initial vacuum of the canister on the sample tag attached to the canister.

7. To stop sampling, close the canister valve by turning clockwise until snug. Record the stop time and final vacuum on the sample tag attached to the canister.

8. Remove the flow controller from the canister. Replace the brass dust cap on the canister valve. Replace the plug and cap on the flow controller.

9. Complete the chain of custody form, ensuring all fields are populated.

10. Place all equipment back into the packaging material and box in the manner in which they were received. Return the samples to the TestAmerica lab address provided on the tag.

### Important Notes

- DO NOT OVER-TIGHTEN THE ON/OFF VALVES. Hand tighten only.
- Flow controllers must be securely wrapped in their original shipping materials (foam insert or bubble wrap) before returning them to the laboratory.
- Do not remove the bar code or serial number labels from the canisters.
- Do not make any markings directly on the canister or affix any labels.
- Flow controllers are calibrated so that some residual vacuum will remain after sampling. Please call the laboratory with any questions regarding the beginning or ending vacuum reading of canisters before or after sampling.

## Example Tag:

Batch ID # \_\_\_\_\_  
 Can # \_\_\_\_\_ Cleaning/Certified Date \_\_\_\_\_  
 Vacuum of Canister \_\_\_\_\_ Analyst \_\_\_\_\_  
 This canister has been cleaned and certified as of the above date to be acceptable for use in the field sampling.  
 Sample ID # \_\_\_\_\_  
 Project# \_\_\_\_\_ Method \_\_\_\_\_  
 Date \_\_\_\_\_ Time \_\_\_\_\_  
 Pressure of can \_\_\_\_\_ Sampler \_\_\_\_\_  
 Grab  Timed \_\_\_\_\_ hr Flow Control # \_\_\_\_\_

**PLEASE READ BEFORE USING CANISTER**

1. Do not use gum-type labels on canister. Please use the back of this tag to record sampling notes.
2. Never allow water, liquids, or corrosive vapors to enter the canister, as this will destroy the canister and void your sample.
3. The valve seals with moderate pressure. Over-tightening will result in damage to the valve.

## Example Chain of Custody:

Canister Samples Chain of Custody Record										TestAmerica THE LEADER IN ENVIRONMENTAL TESTING	
<small>TestAmerica Laboratories, Inc. assumes no liability with respect to the collection and shipment of these samples. © 2015, TestAmerica Laboratories, Inc. All rights reserved. "TestAmerica &amp; Design" are trademarks of TestAmerica Laboratories, Inc.</small>										of _____ COCs	
<b>Client Contact Information</b>			<b>Project Manager:</b>			<b>Samples Collected By:</b>					
Company: _____			Phone: _____			Name: _____					
Address: _____			Email: _____			Signature: _____					
City/State/Zip: _____			Site Contact: _____			Date: _____					
Phone: _____			LAB Contact: _____			Time: _____					
FAX: _____			Analysis Turnaround Time			Standard (Specify): _____					
Project Name: _____			Rush (Specify): _____			Flow Controller ID: _____					
Site: _____			Canister Vacuum in Field, %g (Start)			Canister Vacuum in Field, %g (Stop)					
PO # _____			Sample Dates			Sample ID					
			Time Start			Time Stop					
			Canister Vacuum in Field, %g (Start)			Canister Vacuum in Field, %g (Stop)					
			Flow Controller ID			Canister ID					
			TD-15			TD-14A					
			TD-3			EPA 3C					
			EPA 3C			EPA 3C					
			ASTM D-1541			Other (Please specify in notes section)					
			Sample Type			Indoor Air					
			Ambient Air			Soil Gas					
			Landfill Gas			Other (Please specify in notes section)					
			Temperature (Fahrenheit)			Pressure (inches of Hg)					
			Interior			Ambient					
			Start			Stop					
			Interior			Ambient					
			Start			Stop					
<b>Special Instructions/QC Requirements &amp; Comments:</b>											
Samples Shipped by: _____			Date/Time: _____			Samples Received by: _____			Date/Time: _____		
Samples Relinquished by: _____			Date/Time: _____			Received by: _____			Date/Time: _____		
Relinquished by: _____			Date/Time: _____			Received by: _____			Date/Time: _____		
Lab Use Only		Shipper Name: _____		Opened by: _____		Condition: _____					