



2-Way and 3-Way Splitter Kit Installation

Instruction 3015-5415
Rev. 0 - April 2010

These instructions describe how to install Bacharach's 2-way and 3-way splitter kits. The splitter kits allow Bacharach's Single-Zone and Multi-Zone monitors to take gas sample readings from several sample points while utilizing just one zone.

It is assumed the user is familiar with the operation and menu system of the monitor in use. If necessary, refer to the unit's main instruction manual for more detailed operation and maintenance information.

ITEMS REQUIRED:

- Bacharach Single-Zone or Multi-Zone Refrigerant Monitor
- 2-way (P/N 3015-5404) or 3-way (P/N 3015-5405) splitter kit
- 1/4" outside diameter (0.040" wall) flex tubing (3015-3235) or equivalent

IMPORTANT APPLICATION NOTES:

- The splitter kits are designed for use **ONLY** in confined/defined spaces with high potential for leaks, such as food cases, cold rooms, refrigeration rack rooms, etc.
- Sample intake lines coming off the 2 or 3-way splitter **MUST BE OF EQUAL LENGTH AND MUST NOT EXCEED 100 FEET EACH**. Failure to do so could result in inaccurate readings.

IMPORTANT: When using the splitter kits, the PPM reading for the zone with the splitter kit installed is the average value for the number of intakes on the splitter. For a 2-way splitter, the PPM reading is the average concentration seen between the two pickup points. For a 3-way splitter, the PPM reading is the average value measured between all three pickup points. As a result of these readings being averages, Bacharach recommends that the alarm set points be lowered appropriately to accurately notify of a leak

- When using a 2-way splitter, the alarms should be **50%** of the default values.



- For a 3-way splitter they should be lowered to **33%** of the defaults.
- For accurate flow timing the zone distance entry must be the combined length of each section of tubing (ex. A 100 foot run to a 3-way splitter with 20 foot sections off the splitter must be entered as 160 feet).

WARNING: Splitter kits are not to be used for the monitoring of ammonia.

PROCEDURE:

Individual sample lines are run from the Multi-Zone unit to each area of the facility to be monitored. Additionally, a purge should be installed to provide clean air for resetting the infrared zero baseline. All air connections are located on the left side of the unit.

1. Cut the tubing to the desired length cleanly with a sharp knife. Care should be taken not to distort the tubing ends.

NOTE: Sample intake lines can be up to 1,200 feet when no exhaust tubing is used. Otherwise, the combined length of the sample line and the exhaust line cannot exceed 1,200 feet. Each section off the splitter must also be included in the total length. For example a 500 foot run to a 3-way splitter with 50 foot lengths off the splitter is considered 650 feet of sample line.

2. Connect the initial intake line to the monitor by pushing the tubing firmly into the desired connector on the instrument.
3. Connect the splitter to the end of the initial intake line by pushing the connector firmly onto the tubing.
4. Connect the secondary intake lines to the open connections on the splitter. DO NOT leave any of the splitter connections empty.
5. Position the secondary intake lines with line end filters attached (P/N 3015-3420, included in splitter kit) near the area to be monitored.

See Figure 1 for an example of a typical splitter kit application.

For more detailed instructions on the placement of intake lines and applications of Bacharach's Multi-Zone monitors, refer to the main instruction manual for the specific unit.

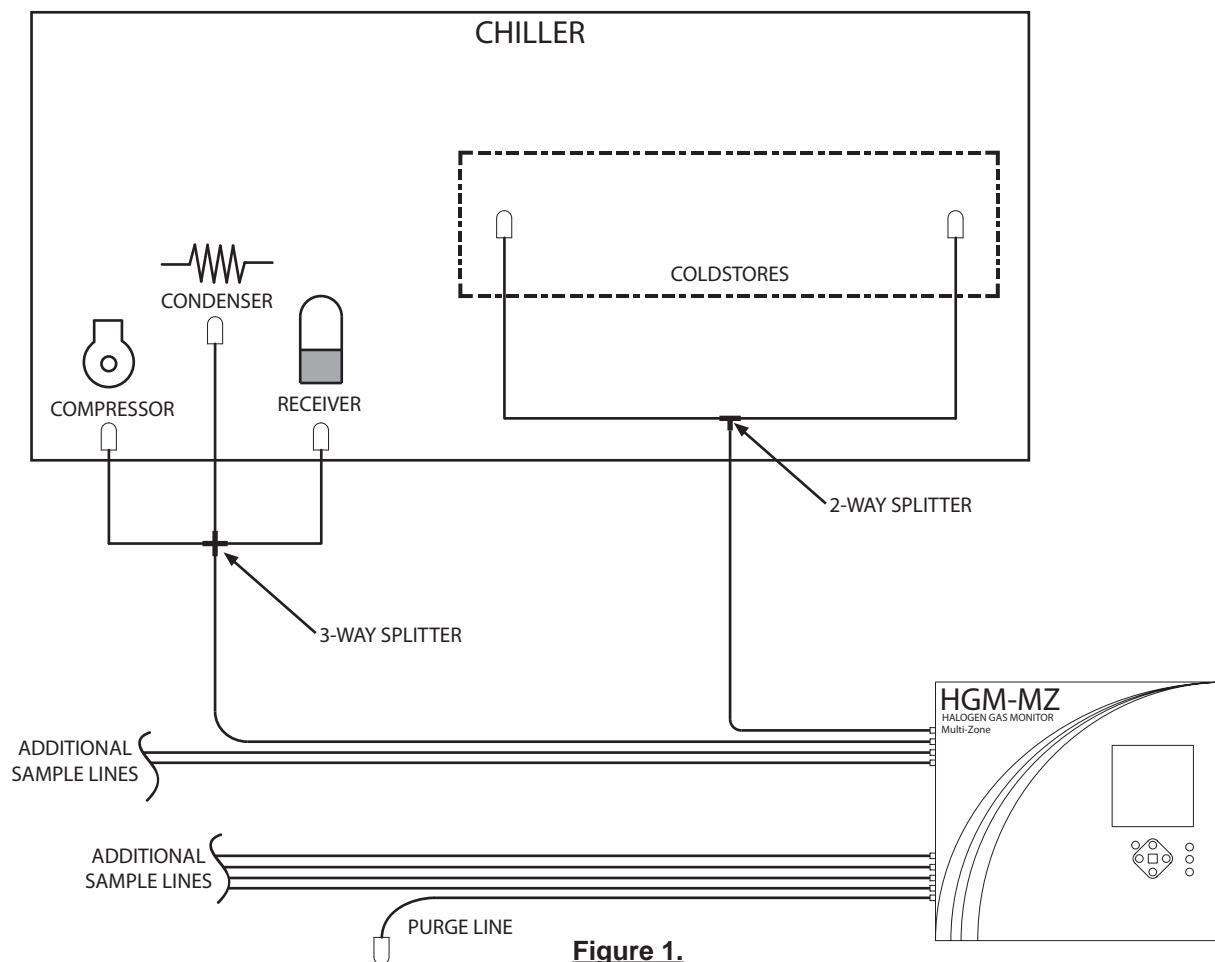


Figure 1.

IMPORTANT: When using the splitter kits, each length of tubing must be of equal length to ensure accurate readings.