



MOJAVE DESERT AIR QUALITY MANAGEMENT DISTRICT

14306 Park Avenue Victorville, CA 92392-2310
760.245.1661 -- 800.635.4617 -- FAX 760.245.2022

AUTHORITY TO CONSTRUCT

B013423

If construction is not completed by the expiration date of this permit, it may be renewed for one additional year upon payment of applicable fees. Any additional extension will require the written approval of the Air Pollution Control Officer. This Authority to Construct may serve as a temporary Permit to Operate provided the APCO is given prior notice of intent to operate and the Permit to Operate is not specifically denied.

EXPIRES LAST DAY OF: OCTOBER 2025

OWNER OF OPERATOR (Co. #31)

Southern California Gas Co. - MD
9400 Oakdale Avenue
Chatsworth, CA 91313

EQUIPMENT LOCATION (Fac. #68)

SCG - South Needles
on Hwy 95, 11 miles South of
Needles, CA 92363

Description:

NATURAL GAS POWERED PNEUMATIC DEVICES consisting of: Pneumatic Device means an automation device that uses natural gas, compressed air, or electricity to control a process. Continuous Low Bleed Pneumatic Devices means the continuous venting of natural gas from a gas powered pneumatic device to the atmosphere. Continuous bleed pneumatic devices must vent continuously in order to operate. Intermittent Bleed Pneumatic Devices means the intermittent venting of natural gas from a gas powered pneumatic device to the atmosphere. Intermittent bleed pneumatic devices may vent all or a portion of their supply gas when control action is necessary but do not vent continuously. Facility elevation is 1349 feet above sea level.

EQUIPMENT

| Capacity | Equipment Description |
|----------|--------------------------------------|
| 27 | Intermittent Bleed Pneumatic Devices |
| 1 | Exempted Separator (Scrubber) |

CONDITIONS:

1. Conditions 1 through 15 are specific to the requirements California Code of Regulations Title 17, Division 3, Chapter 1, Subchapter 10 Climate Change, Article 4 - Greenhouse Gas Emission Standards for Crude Oil and Natural Gas Facilities. In the event of conflict between conditions the more stringent requirements shall govern.

[17 CCR 95668 (e)(1)]

Fee Schedule: 7 (i)

Rating: 1 device

SIC: 4922

SCC: 20200202

Location/UTM(Km): 719E/3842N

This permit does not authorize the emission of air contaminants in excess of those allowed by law, including Division 26 of the Health and Safety Code of the State of California and the Rules and Regulations of the District. This permit cannot be construed as permission to violate existing laws, ordinances, statutes or regulations of this or other governmental agencies. This permit must be renewed by the expiration date above. If billing for renewal fee required by Rule 301(c) is not received by expiration date above, please contact the District.

Southern California Gas Co. - MD
PO Box 2300, SC 9314
Chatsworth, CA 91313-2300

By: **COPY**
Brad Poiriez
Air Pollution Control Officer

2.Beginning January 1, 2019, continuous bleed natural gas pneumatic devices shall not vent natural gas to the atmosphere and shall comply with the leak detection and repair requirements specified in 17 CCR 95669 (as outlined in conditions 6 through 12).
[17 CCR 95668(e)(2)]

Continuous bleed natural gas powered pneumatic devices installed prior to January 1, 2016 may be used provided they meet all of the following requirements as of January 1, 2019:

- a. No device shall vent natural gas at a rate greater than six (6) standard cubic feet per hour (scfh) when the device is idle and not actuating.
- b. All devices are clearly marked with a permanent tag that identifies the natural gas flow rate as less than or equal to six (6) scfh.
- c. All devices are tested annually using a direct measurement method (high volume sampling, bagging, calibrated flow measuring instrument); and,
- d. Any device with a measured emissions flow rate greater than six (6) scfh shall be successfully repaired within 14 calendar days from the date of the initial emission flow rate measurement.
- e. The owner/operator shall maintain, and make available upon request by the ARB Executive Officer and/or District, a record of the flow rate measurement as specified in Appendix A, Table A7 and shall report the result to ARB and the District once per calendar year as specified in section 95673 of this subarticle.
[17 CCR 95668(e)(2)(A)]

3.Beginning January 1, 2018, intermittent bleed natural gas powered pneumatic devices shall comply with the leak detection and repair requirements specified in 17 CCR 95669 (as outlined in conditions 6 through 12) when the device is idle and not controlling.
[17 CCR 95668(e)(3)]

4.Beginning January 1, 2019, natural gas powered pneumatic pumps shall not vent natural gas to the atmosphere and shall comply with the leak detection and repair requirements specified in 17 CCR 95669 (as outlined in conditions 6 through 12) when the device is idle and not controlling.
[17 CCR 95668(e)(4)]

5.Continuous bleed natural gas powered pneumatic devices which need to be replaced or retrofitted to comply with the requirements specified shall do so by one of the following methods:

- a. Collect all vented natural gas with the use of a vapor collection system as specified in 17 CCR 95671 (as outlined by condition 13, below); or,
- b. Use compressed air or electricity to operate.
[17 CCR 95668(e)(5)]

6.Beginning January 1, 2018, all components, including components found on tanks, separators, wells, and pressure vessels not identified in 17 CCR 95669(b) shall be inspected and repaired as follows. The ARB Executive Officer may perform inspections at facilities at any time to determine compliance with the requirements specified. [17 CCR 95669(c)&(d)]

Except for inaccessible or unsafe to monitor components, the owner/operator shall audio-visually inspect (by hearing and by sight) all hatches, pressure-relief valves, well casings, stuffing boxes, and pump seals for leaks or indications of leaks at least once every 24 hours for facilities that are visited daily, or at least once per calendar week for facilities that are not visited at least once every 24 hours; and, the owner/operator shall audio-visually inspect all pipes for leaks or indications of leaks at least once every 12 months. [17 CCR 95669(e)]

Any audio-visual inspection specified above that indicates a leak that cannot be repaired within 24 hours shall be tested using US EPA Reference Method 21 (October 1, 2017) within 24 hours after initial leak detection, and the leak shall be repaired in accordance with the repair timeframes specified:

- a. For leaks detected during normal business hours, the leak measurement shall be performed within 24 hours. For leaks detected after normal business hours or on a weekend or holiday, the deadline is shifted to the end of the next normal business day.
- b. Any leaks measured above the minimum leak threshold shall be successfully repaired within the timeframes specified. [17 CCR 95669(f)]

7.At least once each calendar quarter, all components shall be tested for leaks of total hydrocarbons in units of parts per million volume (ppmv) calibrated as methane in accordance with US EPA Reference Method 21 (October 1, 2017) excluding the use of PID instruments.

Optical Gas Imaging (OGI) instruments may be used as a leak screening device, but may not be used in place of US EPA Reference

Method 21 (October 1, 2017) during quarterly leak inspections, provided they are approved for use by the ARB Executive Officer and used by a technician with a certification or training in infrared theory, infrared inspections, and heat transfer principles (e.g., Level II Thermography or equivalent training); and, all leaks detected with the use of an OGI instrument shall be measured using US EPA Reference Method 21 (October 1, 2017) within two calendar days of initial OGI leak detection or within 14 calendar days of initial OGI leak detection of an inaccessible or unsafe to monitor component to determine compliance with the leak thresholds and repair timeframes specified in this subarticle.

All inaccessible or unsafe to monitor components shall be inspected at least once annually using US EPA Reference Method 21 (October 1, 2017).
[17 CCR 95669(g)]

8. On or after January 1, 2020, any component with a leak concentration measured above the following standards shall be repaired within the time period specified:
- a. Leaks with measured total hydrocarbon concentrations greater than or equal to 1,000 ppmv but not greater than 9,999 ppmv shall be successfully repaired or removed from service within 14 calendar days of initial leak detection.
 - b. Leaks with measured total hydrocarbon concentrations greater than or equal to 10,000 ppmv but not greater than 49,999 ppmv shall be successfully repaired or removed from service within five (5) calendar days of initial leak detection.
 - c. Leaks with measured total hydrocarbon concentrations greater than or equal to 50,000 ppmv shall be successfully repaired or removed from service within two (2) calendar days of initial leak detection.
 - d. Critical components or critical process units shall be successfully repaired by the end of the next process shutdown or within 12 months from the date of initial leak detection, whichever is sooner.

A delay of repair may be granted by the ARB Executive Officer under the following conditions:

- i. The owner or operator can provide proof that the parts or equipment required to make necessary repairs have been ordered. A delay of repair to obtain parts or equipment shall not exceed 30 calendar days from the dates specified above by which repairs must be made, unless the owner or operator notifies the ARB Executive Officer to report the delay and provides an estimated time by which the repairs will be completed.
- ii. A gas service utility can provide documentation that a system has been temporarily classified as critical to reliable public gas system operation as ordered by the utility's gas control office.

[17 CCR 95669(i)]

On or after January 1, 2020, no facility shall exceed the number of allowable leaks listed below during an ARB Executive Officer or district inspection as determined in accordance with US EPA Reference Method 21 (October 1, 2017), excluding the use of PID instruments [17 CCR 95669(o)(2)&(3)]:

// Leak Threshold // 200 or Less Components // More than 200 Components

1,000-9,999 ppmv // 5 // 2% of total inspected

10,000-49,999 ppmv // 2 // 1% of total inspected

50,000 ppmv or greater // 0 // 0

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9. The failure of an owner/operator to repair leaks within the timeframes specified, during any inspection period, shall constitute a violation. Except for the fourth (4th) quarterly inspection of each calendar year, leaks discovered during an operator-conducted inspection shall not constitute a violation if the leaking components are repaired within the timeframes.

[17 CCR 95669(o)(4)&(5)]

10. Upon detection of a component with a leak concentration measured above the standards specified, the owner/operator shall affix to that component a weatherproof readily visible tag that identifies the date and time of leak detection measurement and the measured leak concentration. The tag shall remain affixed to the component until all of the following conditions are met:

- a. The leaking component has been successfully repaired or replaced; and,
- b. The component has been re-inspected and measured below the lowest standard specified for the inspection year when measured in accordance with US EPA Reference Method 21 (October 1, 2017), excluding the use of PID instruments.
- c. Tags shall be removed from components following successful repair.

[17 CCR 95669(j)]

11. Owner/operator shall maintain, and make available upon request by the ARB Executive Officer or district, a record of all leaks found at the facility as specified in Appendix A, Tables A4 and A5, and shall report the results to ARB and the district once per calendar year as specified in section 17 CCR 95673.

[17 CCR 95669(k)]

12. Additional Leak Detection and Repair Requirements:

Hatches shall remain closed at all times except during sampling, adding process material, or attended maintenance operations. [17 CCR 95669(l)]

Open-ended lines and valves located at the end of lines shall be sealed with a blind flange, plug, cap or a second closed valve, at all times except during operations requiring liquid or gaseous process fluid flow through the open-ended line. Open-ended lines do not include vent stacks used to vent natural gas from equipment and cannot be sealed for safety reasons. Open-ended lines shall be repaired as follows [17 CCR 95669(m)]:

- a. Open-ended lines that are not capped or sealed shall be capped or sealed within 14 calendar days from the date of initial inspection.
- b. Open-ended lines that are capped or sealed and found leaking shall be repaired in accordance with the timeframes specified in 17 CCR 95669(h) and 95669(i).

Components or component parts which incur five (5) repair actions within a continuous 12-month period shall be replaced with a compliant component in working order and must be re-measured using US EPA Reference Method 21 (October 1, 2017), to determine that the component is below the minimum leak threshold. A record of the replacement must be maintained in a log at the facility, and shall be made available upon request by the ARB Executive Officer or district.

[17 CCR 95669(n)]

13. Beginning January 1, 2019, the following requirements apply to equipment at facilities located in sectors listed in 17 CCR 95666 that must be controlled with the use of a vapor collection system and control device as a result of the requirements specified in section 95668 of this subarticle:

The vapor collection system shall direct the collected vapors to one of the following:

- a. Sales gas system; or,
- b. Fuel gas system; or,
- c. Gas disposal well not currently under review by the Division of Oil and Gas and Geothermal Resources. [17 CCR 95671(b)]

If no sales gas system, fuel gas system, or gas disposal well specified above is available at the facility, the owner or operator must control the collected vapors with either:

- a. A non-destructive vapor control device that achieves at least 95 percent vapor control efficiency of total emissions and does not result in emissions of nitrogen oxides (NO_x); or,
- b. A vapor control device that achieves at least 95 percent vapor control efficiency of total emissions and does not generate more than 15 parts per million volume (ppmv) NO_x when measured at 3 percent oxygen and does not require the use of supplemental fuel gas, other than gas required for a pilot burner, to operate. [17 CCR 95671(d)]

If the collected vapors cannot be controlled as specified in herein, the equipment subject to the vapor collection and control requirements may not be used or installed and must be removed from service by January 1, 2019, and circulation tanks may not be used and must be removed from service by January 1, 2020. [17 CCR 95671(e)]

Vapor collection systems and control devices are allowed to be taken out of service for up to 30 calendar days per calendar year for performing maintenance. A time extension to perform maintenance not to exceed 14 calendar days per calendar year may be granted by the ARB Executive Officer. The owner or operator is responsible for maintaining a record of the number of calendar days per calendar year that the vapor collection system or vapor control device is out of service and shall provide a record of such activity at the request of the ARB Executive Officer. If an alternate vapor control device compliant with this section is installed prior to conducting maintenance and the vapor collection and control system continues to collect and control vapors during the maintenance operation consistent with the applicable standards specified in section 95671, the event does not count towards the 30 calendar day limit. Vapor collection system and control device shutdowns that result from utility power outages are not subject to enforcement action provided the equipment resumes normal operation as soon as normal utility power is restored. Vapor collection system and control device shutdowns that result from utility power outages do not count towards the 30 calendar day limit for maintenance. [17 CCR 95671(f)]

14. The owner/operator shall maintain the following records for this equipment to comply with Title 17, Division 3, Chapter 1, Subchapter 10 Climate Change, Article 4 - Greenhouse Gas Emission Standards for Crude Oil and Natural Gas Facilities. These records must be made available to ARB or district staff upon request.

For Natural Gas Powered Pneumatic Devices [17 CCR 95672 (a)(12)]:

- a. Maintain, for at least five years from the date of each emissions flow rate measurement, a record of the emission flow rate measurement as specified in Appendix A, Table A7.

For Leak Detection and Repair [17 CCR 95672 (a)(17-21)]:

- b. Maintain, for at least five years from each inspection, a record of each leak detection and repair inspection as specified in Appendix A

Table A4.

- c. Maintain, for at least five years from the date of each inspection, a component leak concentration and repair form for each inspection as specified in Appendix A Table A5.
- d. Maintain records that provide proof that parts or equipment required to make necessary repairs have been ordered.
- e. Maintain gas service utility records that demonstrate that a system has been temporarily classified as critical to reliable public gas operation throughout the duration of the classification period.

For Vapor Collection System and Vapor Controls [17 CCR 95672 (a)(22)]:

- f. Maintain records that provide proof that parts or equipment required to make necessary repairs have been ordered.

15. Beginning January 1, 2018, the owner/operator shall report the following information to ARB and the District by July 1st of each calendar year unless otherwise specified:

For Natural Gas Powered Pneumatic Devices [17 CCR 95673 (a)(5)]:

- a. Annually, report the emission flow rate measurement for each pneumatic device with a designed emission flow rate of less than six (6) scfh as specified in Appendix A, Table A7.

For Leak Detection and Repair [17 CCR 95673 (a)(12-13)]:

- b. Annually, report the results of each leak detection and repair inspection conducted during the calendar year as specified in Appendix A, Table A4.
- c. Annually, report the initial and final leak concentration measurements for components measured above the minimum allowable leak threshold as specified in Appendix A Table A5.

Reports shall be submitted as follows:

1. Reports made to the California Air Resources Board (CARB) shall be submitted electronically through their Cal e-GGRT Reporting Portal.
2. Submissions to the District may be submitted electronically to reporting@mdaqmd.ca.gov with the subject line "O&G GHG Regulation Reporting", or mailed to:
Mojave Desert AQMD
Attention: O&G GHG Regulation Reporting
14306 Park Avenue
Victorville, CA 92392

Note: It is anticipated that Districts will be able to retrieve Reports through the Cal-eGGRT portal sometime in 2020. Once that functionality is available, report submittals to the District will no longer be required.

16. A facility wide Comprehensive Emission Inventory (CEI) for all emitted criteria and toxic air pollutants must be submitted to the District, in a format approved by the District, upon District request.
[District Rule 107(b), H&S Code 39607 & 44341-44342, and 40 CFR 51, Subpart A]