

July 25, 2023

Mr. Gary Grillette
TRC Cypress Group LLC
PO Box 227
Taft, CA 93268

Re: Final - Authorities to Construct / Certificates of Conformity (Significant Mod)
Facility Number: S-3088
Project Number: S-1221387

Dear Mr. Grillette:

The Air Pollution Control Officer has issued Authorities to Construct (ATCs) S-3088-7-12, -20-10, and -24-8 with Certificates of Conformity to TRC Cypress Group LLC in the southwest (SW) quarter of Section 22, Township 32S, Range 23E, Mount Diablo Meridian in the Midway Sunset Oil Field in the Heavy Oil Western Stationary Source in Kern County. TRC Cypress Group LLC proposed to modify three existing 62.5 MMBtu/hr natural gas/produced gas-fired oilfield steam generators to reduce their NOx emissions 5 ppmv @ 3% O₂ to comply with District Rules 4306 and 4320 and to limit total SOx emissions from the stationary source to 139,999 lb/year. Enclosed are the ATCs and a copy of the notice of final action that has been posted on the District's website (www.valleyair.org).

Notice of the District's preliminary decision to issue the ATCs was posted on June 8, 2023. The District's analysis of the proposal was also sent to CARB and US EPA Region IX on June 8, 2023. No comments were received following the District's preliminary decision on this project.

Also enclosed is an invoice for the engineering evaluation fees pursuant to District Rule 3010. Please remit the amount owed, along with a copy of the attached invoice, within 60 days.

Prior to operating with the modifications authorized by the ATCs, you must submit an application to modify the Title V permit as an administrative amendment in accordance with District Rule 2520, Section 11.5. Application forms are found on the District's website at www.valleyair.org/permits/TVforms.

Samir Sheikh
Executive Director/Air Pollution Control Officer

Northern Region
4800 Enterprise Way
Modesto, CA 95356-8718
Tel: (209) 557-6400 FAX: (209) 557-6475

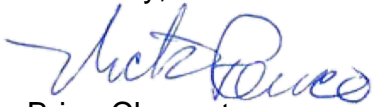
Central Region (Main Office)
1990 E. Gettysburg Avenue
Fresno, CA 93726-0244
Tel: (559) 230-6000 FAX: (559) 230-6061

Southern Region
34946 Flyover Court
Bakersfield, CA 93308-9725
Tel: (661) 392-5500 FAX: (661) 392-5585

Mr. Gary Grillette
Page 2

Thank you for your cooperation in this matter. If you have any questions, please contact Mr. Nick Peirce, Permit Services Manager, at (209) 557-6400.

Sincerely,

A handwritten signature in blue ink, appearing to read "Nick Peirce", is written over the printed name of Brian Clements.

Brian Clements
Director of Permit Services

Enclosures

cc: Courtney Graham, CARB (w/enclosure) via email
cc: Gerardo Rios, EPA (w/enclosure) via EPS



July 25, 2023

Facility # S-3088
TRC CYPRESS GROUP LLC
PO BOX 227
TAFT, CA 93268

AUTHORITY TO CONSTRUCT (ATC)

QUICK START GUIDE

1. **Pay Invoice:** Please pay enclosed invoice before due date.
2. **Modify Your Title V Permit.** Prior to operating the equipment authorized under this ATC, submit an application to modify your Title V permit. See application forms at <http://www.valleyair.org/permits/TVforms>.
3. **Fully Understand ATC:** Make sure you understand ALL conditions in the ATC prior to construction, modification and/or operation.
4. **Follow ATC:** You must construct, modify and/or operate your equipment as specified on the ATC. Any unspecified changes may require a new ATC.
5. **Notify District:** You must notify the District's Compliance Department, at the telephone numbers below, upon start-up and/or operation under the ATC. Please record the date construction or modification commenced and the date the equipment began operation under the ATC. You may NOT operate your equipment until you have notified the District's Compliance Department. A startup inspection may be required prior to receiving your Permit to Operate.
6. **Source Test:** Schedule and perform any required source testing. See http://www.valleyair.org/busind/comply/source_testing.htm for source testing resources.
7. **Maintain Records:** Maintain all records required by ATC. Records are reviewed during every inspection (or upon request) and must be retained for at least 5 years. Sample record keeping forms can be found at http://www.valleyair.org/busind/comply/compliance_forms.htm.

By operating in compliance, you are doing your part to improve air quality for all Valley residents.

**For assistance, please contact District Compliance staff at
any of the telephone numbers listed below.**

Samir Sheikh

Executive Director/Air Pollution Control Officer

Northern Region
4800 Enterprise Way
Modesto, CA 95356-8718
Tel: (209) 557-6400 FAX: (209) 557-6475

Central Region (Main Office)
1990 E. Gettysburg Avenue
Fresno, CA 93726-0244
Tel: (559) 230-6000 FAX: (559) 230-6061

Southern Region
34946 Flyover Court
Bakersfield, CA 93308-9725
Tel: (661) 392-5500 FAX: (661) 392-5585



AUTHORITY TO CONSTRUCT

PERMIT NO: S-3088-7-12

ISSUANCE DATE: 07/25/2023

LEGAL OWNER OR OPERATOR: TRC CYPRESS GROUP LLC

MAILING ADDRESS: PO BOX 227
TAFT, CA 93268

LOCATION: HEAVY OIL WESTERN STATIONARY SOURCE
CA

SECTION: SW22 **TOWNSHIP:** 32S **RANGE:** 23E

EQUIPMENT DESCRIPTION:

MODIFICATION OF 62.5 MMBTU/HR NATURAL GAS/PRODUCED GAS FIRED STEAM GENERATOR WITH A NORTH AMERICAN MODEL MAGNA-FLAME G-LE ULTRA-LOW NOX BURNER AND FLUE GAS RECIRCULATION (FGR) (CYPRESS LEASE); INSTALL NEW PROGRAMMABLE LOGIC CONTROLLER (PLC), MODIFY FUEL TRAIN, AND UPGRADE EXISTING FGR SYSTEM TO REDUCE NOX EMISSIONS TO 5 PPMV @ 3% O₂ TO COMPLY WITH DISTRICT RULES 4306 AND 4320; AND LIMIT TOTAL STATIONARY SOURCE SOX EMISSIONS TO 139,999 LB/YEAR

CONDITIONS

1. This Authority to Construct serves as a written certificate of conformity with the procedural requirements of 40 CFR 70.7 and 70.8 and with the compliance requirements of 40 CFR 70.6(c). [District Rule 2201] Federally Enforceable Through Title V Permit
2. Prior to operating with modifications authorized by this Authority to Construct, the facility shall submit an application to modify the Title V permit with an administrative amendment in accordance with District Rule 2520 Section 5.3.4. [District Rule 2520, 5.3.4] Federally Enforceable Through Title V Permit
3. No air contaminant shall be released into the atmosphere which causes a public nuisance. [District Rule 4102]
4. All equipment shall be maintained in good operating condition and shall be operated in a manner to minimize emissions of air contaminants into the atmosphere. [District Rule 2201] Federally Enforceable Through Title V Permit
5. No air contaminant shall be discharged into the atmosphere for a period or periods aggregating more than three minutes in any one hour which is as dark as, or darker than, Ringelmann 1 or 20% opacity. [District Rule 4101] Federally Enforceable Through Title V Permit

CONDITIONS CONTINUE ON NEXT PAGE

YOU MUST NOTIFY THE DISTRICT COMPLIANCE DIVISION AT (661) 392-5500 WHEN CONSTRUCTION IS COMPLETED AND PRIOR TO OPERATING THE EQUIPMENT OR MODIFICATIONS AUTHORIZED BY THIS AUTHORITY TO CONSTRUCT. This is NOT a PERMIT TO OPERATE. Approval or denial of a PERMIT TO OPERATE will be made after an inspection to verify that the equipment has been constructed in accordance with the approved plans, specifications and conditions of this Authority to Construct, and to determine if the equipment can be operated in compliance with all Rules and Regulations of the San Joaquin Valley Unified Air Pollution Control District. Unless construction has commenced pursuant to Rule 2050, this Authority to Construct shall expire and application shall be cancelled two years from the date of issuance. The applicant is responsible for complying with all laws, ordinances and regulations of all other governmental agencies which may pertain to the above equipment.

Samir Sheikh, Executive Director / APCO

Brian Clements, Director of Permit Services

S-3088-7-12 : Jul 25 2023 8:28AM - NORMANR : Joint Inspection NOT Required

6. Particulate matter emissions shall not exceed 0.1 grains/dscf in concentration. [District Rule 4201] Federally Enforceable Through Title V Permit
7. This unit shall not operate at the same time as the standby flare authorized as part of Permit Unit S-3088-8, except as required during start-up and shutdown periods to continue to incinerate produced gas and such periods shall be minimized. [District Rule 2201] Federally Enforceable Through Title V Permit
8. This unit shall only be fired on natural gas, oilfield produced gas, or a blend of natural gas and oilfield produced gas. [District Rule 2201] Federally Enforceable Through Title V Permit
9. Emissions from this steam generator shall not exceed any of the following limits: 5 ppmvd NOx @ 3% O2 and 0.0063 lb-NOx/MMBtu, 0.219 lb-SOx/MMBtu, 0.0076 lb-PM10/MMBtu, 104 ppmvd CO @ 3% O2 and 0.080 lb-CO/MMBtu, or 0.0027 lb-VOC/MMBtu (as CH4). [District Rules 2201, 4305, 4306, 4320, 4405, 4406, and 4801] Federally Enforceable Through Title V Permit
10. This unit shall comply with one of the following options for control of SOx and particulate matter (PM) emissions: 1) The total sulfur content of the fuel gas used this steam generator shall not exceed 1 grain S per 100 standard cubic feet (1 gr-S/100 scf); or 2) A scrubber that reduces SOx emissions by at least 95% by weight shall be installed and properly operated; or 3) The SO2 concentration in the exhaust of this unit shall not exceed 9 ppmv SO2 corrected to 3.0% O2. [District Rules 2201 and 4320] Federally Enforceable Through Title V Permit
11. The total combined SOx emissions from the steam generators permitted as Units S-3088-7, -20, and -24 shall not exceed 328.5 lb-SOx/day. [District Rule 2201] Federally Enforceable Through Title V Permit
12. The permittee shall monitor and record the stack concentration of NOx, CO, and O2 at least once every month (in which a source test is not performed) using a portable emission monitor that meets District specifications. Monitoring shall not be required if the unit is not in operation, i.e. the unit need not be started solely to perform monitoring. Monitoring shall be performed within 5 days of restarting the unit unless monitoring has been performed within the last month. [District Rules 2201, 4305, 4306, and 4320] Federally Enforceable Through Title V Permit
13. If either the NOx or CO concentrations corrected to 3% O2, as measured by the portable analyzer, exceed the allowable emissions concentration, the permittee shall return the emissions to within the acceptable range as soon as possible, but no longer than 1 hour of operation after detection. If the portable analyzer readings continue to exceed the allowable emissions concentration after 1 hour of operation after detection, the permittee shall notify the District within the following 1 hour and conduct a certified source test within 60 days of the first exceedance. In lieu of conducting a source test, the permittee may stipulate a violation has occurred, subject to enforcement action. The permittee must then correct the violation, show compliance has been re-established, and resume monitoring procedures. If the deviations are the result of a qualifying breakdown condition pursuant to Rule 1100, the permittee may fully comply with Rule 1100. [District Rules 2201, 4305, 4306, and 4320] Federally Enforceable Through Title V Permit
14. All alternate monitoring parameter emission readings shall be taken with the unit operating either at conditions representative of normal operations or conditions specified in the Permit to Operate. The analyzer shall be calibrated, maintained, and operated in accordance with the manufacturer's specifications and recommendations or a protocol approved by the APCO. Emission readings taken shall be averaged over a 15 consecutive-minute period by either taking a cumulative 15 consecutive-minute sample reading or by taking at least five (5) readings, evenly spaced out over the 15 consecutive-minute period. [District Rules 2201, 4305, 4306, and 4320] Federally Enforceable Through Title V Permit
15. The permittee shall maintain records of: (1) the date and time of NOx, CO, and O2 measurements, (2) the O2 concentration in percent and the measured NOx and CO concentrations corrected to 3% O2, (3) make and model of exhaust gas analyzer, (4) exhaust gas analyzer calibration records, and (5) a description of any corrective action taken to maintain the emissions within the acceptable range. [District Rules 2201, 4305, 4306, and 4320] Federally Enforceable Through Title V Permit
16. Source testing to measure NOx, CO, and VOC emissions from this unit shall be conducted within 60 days of initial operation of the unit under this Authority to Construct (ATC) permit. [District Rules 2201, 4306, and 4320] Federally Enforceable Through Title V Permit

CONDITIONS CONTINUE ON NEXT PAGE

17. Source testing to measure NO_x and CO emissions from this unit shall be conducted at least once every twelve (12) months. After demonstrating compliance on two (2) consecutive annual source tests, the unit shall be tested not less than once every thirty-six (36) months. If the result of the 36-month source test demonstrates that the unit does not meet the applicable emission limits, the source testing frequency shall revert to at least once every twelve (12) months. [District Rules 2201, 4305, 4306, and 4320] Federally Enforceable Through Title V Permit
18. The source test plan shall identify which basis (ppmv or lb/MMBtu) will be used to demonstrate compliance. [District Rules 2201, 4305, 4306, and 4320] Federally Enforceable Through Title V Permit
19. All emissions measurements shall be made with the unit operating either at conditions representative of normal operations or conditions specified in the Permit to Operate. No determination of compliance shall be established within two hours after a continuous period in which fuel flow to the unit is shut off for 30 minutes or longer, or within 30 minutes after a re-ignition as defined in Section 3.0 of District Rule 4306. [District Rules 2201, 4305, 4306, and 4320] Federally Enforceable Through Title V Permit
20. Source testing shall be conducted using the methods and procedures approved by the District. The District must be notified at least 30 days prior to any compliance source test, and a source test plan must be submitted for approval at least 15 days prior to testing. [District Rule 1081] Federally Enforceable Through Title V Permit
21. The results of each source test shall be submitted to the District within 60 days after completion of the source test. [District Rule 1081] Federally Enforceable Through Title V Permit
22. NO_x emissions for source test purposes shall be determined using EPA Method 7E or ARB Method 100 on a ppmv basis, or EPA Method 19 on a heat input basis. [District Rules 4305, 4306, and 4320] Federally Enforceable Through Title V Permit
23. CO emissions for source test purposes shall be determined using EPA Method 10 or ARB Method 100. [District Rules 4305, 4306, and 4320] Federally Enforceable Through Title V Permit
24. VOC emissions for source test purposes shall be determined using EPA Method 25A or 25B, or ARB Method 100. EPA Method 18, ARB Method 422 "Determination of Volatile Organic Compounds in Emission from Stationary Sources", or alternative method(s) approved by the District shall be used for the measurement and subtraction of exempt compounds (e.g. methane and ethane). [District Rule 2201] Federally Enforceable Through Title V Permit
25. Stack gas oxygen (O₂) shall be determined using EPA Method 3 or 3A or ARB Method 100. [District Rules 4305, 4306, and 4320] Federally Enforceable Through Title V Permit
26. SO_x emissions for source test purposes shall be determined using EPA Method 6C, EPA Method 8, or ARB Method 100. [District Rule 4320] Federally Enforceable Through Title V Permit
27. For emissions source testing, the arithmetic average of three 30-consecutive-minute test runs shall apply. If two of three runs are above an applicable limit the test cannot be used to demonstrate compliance with an applicable limit. [District Rules 1081, 4305, 4306, and 4320] Federally Enforceable Through Title V Permit
28. The higher heating value (HHV) of the fuel gas shall be determined using ASTM D1826, ASTM 1945 in conjunction with ASTM D3588, or an alternative method approved by EPA and the District. [District Rules 2201, 4306, and 4320] Federally Enforceable Through Title V Permit
29. When complying with the SO_x and PM control requirements of this permit by limiting the total sulfur content of the fuel gas or by reducing SO_x emissions by at least 95% using a scrubber that removes sulfur compounds from the gas prior to combustion, laboratory analysis to determine the sulfur content of the fuel gas or the control efficiency of the scrubber shall be performed at least annually using EPA Method 11 or EPA Method 15, as appropriate; ASTM Method D1072, D1945, D3246, D4084, D4468, or D5504; grab sample analysis by GC-FPD/TCD performed in the laboratory; or other methods approved by the District and EPA. Records of the fuel sulfur analyses shall be maintained and provided to the District upon request. [District Rules 2201 and 4320] Federally Enforceable Through Title V Permit
30. For natural gas that is regulated by the California Public Utilities Commission (PUC) or Federal Energy Regulatory Commission (FERC), valid purchase contracts, supplier certifications, tariff sheets, transportation contracts, or other documentation may be used to satisfy the fuel sulfur content analysis, provided they establish the fuel sulfur content as required by this permit. [District Rules 2201 and 4320] Federally Enforceable Through Title V Permit

CONDITIONS CONTINUE ON NEXT PAGE

31. When complying with the SO_x and PM control requirements of this permit by using a post-combustion scrubber that reduces SO_x emissions by at least 95% by weight or limiting the exhaust SO₂ concentration to 9 ppmv corrected to 3.0% O₂, source testing of SO_x emissions from this unit to demonstrate compliance with the required SO_x emission reduction percentage or SO₂ exhaust concentration limit shall be performed at least annually. [District Rules 1081, 2201, and 4320] Federally Enforceable Through Title V Permit
32. When complying with the SO_x and PM control requirements of this permit by using a scrubber that reduces SO_x emissions by at least 95% by weight, the operator shall monitor key system operating parameters that indicate proper operation of the scrubber (e.g. inlet and outlet H₂S concentrations for scrubbers that remove H₂S prior to combustion) at least once every week. Records of monitoring of the key system operating parameters of the scrubber shall be maintained. [District Rules 2201 and 4320] Federally Enforceable Through Title V Permit
33. The sulfur content of the produced gas and any gas not regulated by the PUC or FERC combusted in this unit shall be monitored and recorded at least once every quarter in which the unit operates. If it is determined that the total combined SO_x emissions limit for Units S-3088-7, -20, and -24 was exceeded, the sulfur content of the non-PUC and non-FERC-regulated gas combusted in the unit shall be monitored and recorded at least once every week until compliance with the SO_x emission limit is demonstrated for each day the unit operates for eight consecutive weeks. After demonstrating compliance with the SO_x emission limit for eight consecutive weeks, the gas sulfur content monitoring frequency may revert to quarterly. Records of the results of monitoring of the sulfur content of the gas combusted in this unit shall be maintained. [District Rule 2201] Federally Enforceable Through Title V Permit
34. Monitoring of the sulfur content of the gas combusted in this unit shall be performed using gas detection tubes calibrated for H₂S; EPA Method 11 or EPA Method 15, as appropriate, ASTM Method D1072, D1945, D3246, D4084, D4468, D4810 or D5504; grab sample analysis by GC-FPD/TCD performed in the laboratory; a continuous analyzer employing gas chromatography; a continuous fuel gas monitor that meets the requirements specified in SCAQMD Rule 431.1, Attachment A; or an alternative method approved by EPA and the District. The permittee shall maintain records of any monitors used to demonstrate compliance with the SO_x limit of this permit, including the make, model, and detection limits of the monitor(s). The required quarterly analysis of the sulfur content of the gas and the first of the weekly analyses required to reestablish compliance shall only be performed using methods that use laboratory analysis. The remainder of the weekly analyses required to demonstrate compliance may be performed using approved methods that do not use laboratory analysis. [District Rule 2201] Federally Enforceable Through Title V Permit
35. Records shall be maintained of the dates that each specific option is used to comply with the SO_x and PM control requirements of this permit. [District Rules 1070, 2201, and 4320] Federally Enforceable Through Title V Permit
36. On a monthly basis, the permittee shall calculate and record the total SO_x emissions in pounds from this unit each day for the prior calendar month. [District Rules 1070 and 2201] Federally Enforceable Through Title V Permit
37. The SO_x emissions from this unit shall be calculated using the following equation: lb-SO_x emitted/day = (total volume of gas incinerated per day, in scf) x (ppm sulfur as H₂S prior to incineration) x 0.00000017. [District Rule 2201] Federally Enforceable Through Title V Permit
38. Compliance with the SO_x emission limit(s) of this permit may be demonstrated either by monitoring sulfur content at location(s) after all fuel sources are combined prior to incineration, or by monitoring the sulfur content and volume of each fuel source and performing mass balance calculations. Records of monitoring locations, detected sulfur concentrations, and mass balance calculations, if necessary, shall be maintained and made readily available for District inspection upon request. [District Rule 2201] Federally Enforceable Through Title V Permit
39. On a monthly basis, the permittee shall calculate and record the total combined SO_x emissions, in pounds, for each day from the steam generators permitted as Units S-3088-7, -20, and -24 for the prior calendar month. [District Rules 1070 and 2201] Federally Enforceable Through Title V Permit
40. Total combined SO_x emissions from all permitted units at the stationary source (District Facilities S-2622 and S-3088) shall not exceed 139,999 pounds in any 12-consecutive month rolling period. [District Rule 2201] Federally Enforceable Through Title V Permit

41. On a monthly basis, the permittee shall calculate and record the total combined SO_x emissions from the stationary source in pounds for the prior 12 calendar month period. The total combined SO_x emissions shall be calculated by summing the SO_x emissions from the previous 12 calendar months from every permitted unit at the stationary source. [District Rules 1070 and 2201] Federally Enforceable Through Title V Permit
42. For gas used to fuel this unit that is not regulated by the PUC or FERC, the permittee shall maintain records of the higher heating value (HHV), in Btu per standard cubic foot (scf), for each calendar quarter in which the unit operates. For PUC or FERC-regulated gas used to fuel this unit, the permittee shall maintain records of the HHV, in Btu per standard cubic foot (scf), for each calendar year in which the unit operates. The records shall include the method(s) used to determine the HHV of the fuel and the dates the HHV was determined. For PUC or FERC-regulated natural gas, documentation from the utility may be used to establish the HHV of the gas. [District Rule 1070] Federally Enforceable Through Title V Permit
43. Records of the fuel sulfur content of the natural gas and produced gas combusted in this unit; the daily amounts of each fuel used in this unit, in standard cubic feet (scf) and MMBtu; and calculations to verify compliance with the total combined SO_x emission limit(s) for the steam generators permitted as Units S-3088-7, -20, and -24 for each day the units are operated shall be maintained and made readily available for District inspection upon request. [District Rules 1070, 4001, 2201, and 4320, and 40 CFR Part 60, Subpart Dc] Federally Enforceable Through Title V Permit
44. All records shall be maintained for a minimum of five (5) years, and shall be made available for District inspection upon request. [District Rules 1070, 2201, 4305, 4306, and 4320, and 40 CFR Part 60, Subpart Dc] Federally Enforceable Through Title V Permit



AUTHORITY TO CONSTRUCT

PERMIT NO: S-3088-20-10

ISSUANCE DATE: 07/25/2023

LEGAL OWNER OR OPERATOR: TRC CYPRESS GROUP LLC

MAILING ADDRESS: PO BOX 227
TAFT, CA 93268

LOCATION: HEAVY OIL WESTERN STATIONARY SOURCE
CA

SECTION: SW22 **TOWNSHIP:** 32S **RANGE:** 23E

EQUIPMENT DESCRIPTION:

MODIFICATION OF 62.5 MMBTU/HR C.E. NATCO NATURAL GAS/PRODUCED GAS-FIRED STEAM GENERATOR WITH A NORTH AMERICAN MODEL MAGNA-FLAME G-LE ULTRA-LOW NOX BURNER AND FLUE GAS RECIRCULATION (FGR) (CYPRESS LEASE); INSTALL NEW PROGRAMMABLE LOGIC CONTROLLER (PLC), MODIFY FUEL TRAIN, AND UPGRADE EXISTING FGR SYSTEM TO REDUCE NOX EMISSIONS TO 5 PPMV @ 3% O₂ TO COMPLY WITH DISTRICT RULES 4306 AND 4320; AND LIMIT TOTAL STATIONARY SOURCE SOX EMISSIONS TO 139,999 LB/YEAR

CONDITIONS

1. This Authority to Construct serves as a written certificate of conformity with the procedural requirements of 40 CFR 70.7 and 70.8 and with the compliance requirements of 40 CFR 70.6(c). [District Rule 2201] Federally Enforceable Through Title V Permit
2. Prior to operating with modifications authorized by this Authority to Construct, the facility shall submit an application to modify the Title V permit with an administrative amendment in accordance with District Rule 2520 Section 5.3.4. [District Rule 2520, 5.3.4] Federally Enforceable Through Title V Permit
3. No air contaminant shall be released into the atmosphere which causes a public nuisance. [District Rule 4102]
4. All equipment shall be maintained in good operating condition and shall be operated in a manner to minimize emissions of air contaminants into the atmosphere. [District Rule 2201] Federally Enforceable Through Title V Permit
5. No air contaminant shall be discharged into the atmosphere for a period or periods aggregating more than three minutes in any one hour which is as dark as, or darker than, Ringelmann 1 or 20% opacity. [District Rule 4101] Federally Enforceable Through Title V Permit

CONDITIONS CONTINUE ON NEXT PAGE

YOU MUST NOTIFY THE DISTRICT COMPLIANCE DIVISION AT (661) 392-5500 WHEN CONSTRUCTION IS COMPLETED AND PRIOR TO OPERATING THE EQUIPMENT OR MODIFICATIONS AUTHORIZED BY THIS AUTHORITY TO CONSTRUCT. This is NOT a PERMIT TO OPERATE. Approval or denial of a PERMIT TO OPERATE will be made after an inspection to verify that the equipment has been constructed in accordance with the approved plans, specifications and conditions of this Authority to Construct, and to determine if the equipment can be operated in compliance with all Rules and Regulations of the San Joaquin Valley Unified Air Pollution Control District. Unless construction has commenced pursuant to Rule 2050, this Authority to Construct shall expire and application shall be cancelled two years from the date of issuance. The applicant is responsible for complying with all laws, ordinances and regulations of all other governmental agencies which may pertain to the above equipment.

Samir Sheikh, Executive Director / APCO



Brian Clements, Director of Permit Services

S-3088-20-10 : Jul 25 2023 8:29AM -- NORMANR : Joint Inspection NOT Required

6. Particulate matter emissions shall not exceed 0.1 grains/dscf in concentration. [District Rule 4201] Federally Enforceable Through Title V Permit
7. This unit shall not operate at the same time as the standby flare authorized as part of Permit Unit S-3088-8, except as required during start-up and shutdown periods to continue to incinerate produced gas and such periods shall be minimized. [District Rule 2201] Federally Enforceable Through Title V Permit
8. This unit shall only be fired on natural gas, oilfield produced gas, or a blend of natural gas and oilfield produced gas. [District Rule 2201] Federally Enforceable Through Title V Permit
9. Emissions from this steam generator shall not exceed any of the following limits: 5 ppmvd NO_x @ 3% O₂ and 0.0063 lb-NO_x/MMBtu, 0.219 lb-SO_x/MMBtu, 0.0076 lb-PM₁₀/MMBtu, 47.5 ppmvd CO @ 3% O₂ and 0.036 lb-CO/MMBtu, or 0.0027 lb-VOC/MMBtu (as CH₄). [District Rules 2201, 4305, 4306, 4320, 4405, and 4801] Federally Enforceable Through Title V Permit
10. This unit shall comply with one of the following options for control of SO_x and particulate matter (PM) emissions: 1) The total sulfur content of the fuel gas used this steam generator shall not exceed 1 grain S per 100 standard cubic feet (1 gr-S/100 scf); or 2) A scrubber that reduces SO_x emissions by at least 95% by weight shall be installed and properly operated; or 3) The SO₂ concentration in the exhaust of this unit shall not exceed 9 ppmv SO₂ corrected to 3.0% O₂. [District Rules 2201 and 4320] Federally Enforceable Through Title V Permit
11. The total combined SO_x emissions from the steam generators permitted as Units S-3088-7, -20, and -24 shall not exceed 328.5 lb-SO_x/day. [District Rule 2201] Federally Enforceable Through Title V Permit
12. The permittee shall monitor and record the stack concentration of NO_x, CO, and O₂ at least once every month (in which a source test is not performed) using a portable emission monitor that meets District specifications. Monitoring shall not be required if the unit is not in operation, i.e. the unit need not be started solely to perform monitoring. Monitoring shall be performed within 5 days of restarting the unit unless monitoring has been performed within the last month. [District Rules 2201, 4305, 4306, and 4320] Federally Enforceable Through Title V Permit
13. If either the NO_x or CO concentrations corrected to 3% O₂, as measured by the portable analyzer, exceed the allowable emissions concentration, the permittee shall return the emissions to within the acceptable range as soon as possible, but no longer than 1 hour of operation after detection. If the portable analyzer readings continue to exceed the allowable emissions concentration after 1 hour of operation after detection, the permittee shall notify the District within the following 1 hour and conduct a certified source test within 60 days of the first exceedance. In lieu of conducting a source test, the permittee may stipulate a violation has occurred, subject to enforcement action. The permittee must then correct the violation, show compliance has been re-established, and resume monitoring procedures. If the deviations are the result of a qualifying breakdown condition pursuant to Rule 1100, the permittee may fully comply with Rule 1100. [District Rules 2201, 4305, 4306, and 4320] Federally Enforceable Through Title V Permit
14. All alternate monitoring parameter emission readings shall be taken with the unit operating either at conditions representative of normal operations or conditions specified in the Permit to Operate. The analyzer shall be calibrated, maintained, and operated in accordance with the manufacturer's specifications and recommendations or a protocol approved by the APCO. Emission readings taken shall be averaged over a 15 consecutive-minute period by either taking a cumulative 15 consecutive-minute sample reading or by taking at least five (5) readings, evenly spaced out over the 15 consecutive-minute period. [District Rules 2201, 4305, 4306, and 4320] Federally Enforceable Through Title V Permit
15. The permittee shall maintain records of: (1) the date and time of NO_x, CO, and O₂ measurements, (2) the O₂ concentration in percent and the measured NO_x and CO concentrations corrected to 3% O₂, (3) make and model of exhaust gas analyzer, (4) exhaust gas analyzer calibration records, and (5) a description of any corrective action taken to maintain the emissions within the acceptable range. [District Rules 2201, 4305, 4306, and 4320] Federally Enforceable Through Title V Permit
16. Source testing to measure NO_x, CO, and VOC emissions from this unit shall be conducted within 60 days of initial operation of the unit under this Authority to Construct (ATC) permit. [District Rules 2201, 4306, and 4320] Federally Enforceable Through Title V Permit

CONDITIONS CONTINUE ON NEXT PAGE

17. Source testing to measure NO_x and CO emissions from this unit shall be conducted at least once every twelve (12) months. After demonstrating compliance on two (2) consecutive annual source tests, the unit shall be tested not less than once every thirty-six (36) months. If the result of the 36-month source test demonstrates that the unit does not meet the applicable emission limits, the source testing frequency shall revert to at least once every twelve (12) months. [District Rules 2201, 4305, 4306, and 4320] Federally Enforceable Through Title V Permit
18. The source test plan shall identify which basis (ppmv or lb/MMBtu) will be used to demonstrate compliance. [District Rules 2201, 4305, 4306, and 4320] Federally Enforceable Through Title V Permit
19. All emissions measurements shall be made with the unit operating either at conditions representative of normal operations or conditions specified in the Permit to Operate. No determination of compliance shall be established within two hours after a continuous period in which fuel flow to the unit is shut off for 30 minutes or longer, or within 30 minutes after a re-ignition as defined in Section 3.0 of District Rule 4306. [District Rules 2201, 4305, 4306, and 4320] Federally Enforceable Through Title V Permit
20. Source testing shall be conducted using the methods and procedures approved by the District. The District must be notified at least 30 days prior to any compliance source test, and a source test plan must be submitted for approval at least 15 days prior to testing. [District Rule 1081] Federally Enforceable Through Title V Permit
21. The results of each source test shall be submitted to the District within 60 days after completion of the source test. [District Rule 1081] Federally Enforceable Through Title V Permit
22. NO_x emissions for source test purposes shall be determined using EPA Method 7E or ARB Method 100 on a ppmv basis, or EPA Method 19 on a heat input basis. [District Rules 4305, 4306, and 4320] Federally Enforceable Through Title V Permit
23. CO emissions for source test purposes shall be determined using EPA Method 10 or ARB Method 100. [District Rules 4305, 4306, and 4320] Federally Enforceable Through Title V Permit
24. VOC emissions for source test purposes shall be determined using EPA Method 25A or 25B, or ARB Method 100. EPA Method 18, ARB Method 422 "Determination of Volatile Organic Compounds in Emission from Stationary Sources", or alternative method(s) approved by the District shall be used for the measurement and subtraction of exempt compounds (e.g. methane and ethane). [District Rule 2201] Federally Enforceable Through Title V Permit
25. Stack gas oxygen (O₂) shall be determined using EPA Method 3 or 3A or ARB Method 100. [District Rules 4305, 4306, and 4320] Federally Enforceable Through Title V Permit
26. SO_x emissions for source test purposes shall be determined using EPA Method 6C, EPA Method 8, or ARB Method 100. [District Rule 4320] Federally Enforceable Through Title V Permit
27. For emissions source testing, the arithmetic average of three 30-consecutive-minute test runs shall apply. If two of three runs are above an applicable limit the test cannot be used to demonstrate compliance with an applicable limit. [District Rules 1081, 4305, 4306, and 4320] Federally Enforceable Through Title V Permit
28. The higher heating value (HHV) of the fuel gas shall be determined using ASTM D1826, ASTM 1945 in conjunction with ASTM D3588, or an alternative method approved by EPA and the District. [District Rules 2201, 4306, and 4320] Federally Enforceable Through Title V Permit
29. When complying with the SO_x and PM control requirements of this permit by limiting the total sulfur content of the fuel gas or by reducing SO_x emissions by at least 95% using a scrubber that removes sulfur compounds from the gas prior to combustion, laboratory analysis to determine the sulfur content of the fuel gas or the control efficiency of the scrubber shall be performed at least annually using EPA Method 11 or EPA Method 15, as appropriate; ASTM Method D1072, D1945, D3246, D4084, D4468, or D5504; grab sample analysis by GC-FPD/TCD performed in the laboratory; or other methods approved by the District and EPA. Records of the fuel sulfur analyses shall be maintained and provided to the District upon request. [District Rules 2201 and 4320] Federally Enforceable Through Title V Permit
30. For natural gas that is regulated by the California Public Utilities Commission (PUC) or Federal Energy Regulatory Commission (FERC), valid purchase contracts, supplier certifications, tariff sheets, transportation contracts, or other documentation may be used to satisfy the fuel sulfur content analysis, provided they establish the fuel sulfur content as required by this permit. [District Rules 2201 and 4320] Federally Enforceable Through Title V Permit

31. When complying with the SO_x and PM control requirements of this permit by using a post-combustion scrubber that reduces SO_x emissions by at least 95% by weight or limiting the exhaust SO₂ concentration to 9 ppmv corrected to 3.0% O₂, source testing of SO_x emissions from this unit to demonstrate compliance with the required SO_x emission reduction percentage or SO₂ exhaust concentration limit shall be performed at least annually. [District Rules 1081, 2201, and 4320] Federally Enforceable Through Title V Permit
32. When complying with the SO_x and PM control requirements of this permit by using a scrubber that reduces SO_x emissions by at least 95% by weight, the operator shall monitor key system operating parameters that indicate proper operation of the scrubber (e.g. inlet and outlet H₂S concentrations for scrubbers that remove H₂S prior to combustion) at least once every week. Records of monitoring of the key system operating parameters of the scrubber shall be maintained. [District Rules 2201 and 4320] Federally Enforceable Through Title V Permit
33. The sulfur content of the produced gas and any gas not regulated by the PUC or FERC combusted in this unit shall be monitored and recorded at least once every quarter in which the unit operates. If it is determined that the total combined SO_x emissions limit for Units S-3088-7, -20, and -24 was exceeded, the sulfur content of the non-PUC and non-FERC-regulated gas combusted in the unit shall be monitored and recorded at least once every week until compliance with the SO_x emission limit is demonstrated for each day the unit operates for eight consecutive weeks. After demonstrating compliance with the SO_x emission limit for eight consecutive weeks, the gas sulfur content monitoring frequency may revert to quarterly. Records of the results of monitoring of the sulfur content of the gas combusted in this unit shall be maintained. [District Rule 2201] Federally Enforceable Through Title V Permit
34. Monitoring of the sulfur content of the gas combusted in this unit shall be performed using gas detection tubes calibrated for H₂S; EPA Method 11 or EPA Method 15, as appropriate, ASTM Method D1072, D1945, D3246, D4084, D4468, D4810 or D5504; grab sample analysis by GC-FPD/TCD performed in the laboratory; a continuous analyzer employing gas chromatography; a continuous fuel gas monitor that meets the requirements specified in SCAQMD Rule 431.1, Attachment A; or an alternative method approved by EPA and the District. The permittee shall maintain records of any monitors used to demonstrate compliance with the SO_x limit of this permit, including the make, model, and detection limits of the monitor(s). The required quarterly analysis of the sulfur content of the gas and the first of the weekly analyses required to reestablish compliance shall only be performed using methods that use laboratory analysis. The remainder of the weekly analyses required to demonstrate compliance may be performed using approved methods that do not use laboratory analysis. [District Rule 2201] Federally Enforceable Through Title V Permit
35. Records shall be maintained of the dates that each specific option is used to comply with the SO_x and PM control requirements of this permit. [District Rules 1070, 2201, and 4320] Federally Enforceable Through Title V Permit
36. On a monthly basis, the permittee shall calculate and record the total SO_x emissions in pounds from this unit each day for the prior calendar month. [District Rules 1070 and 2201] Federally Enforceable Through Title V Permit
37. The SO_x emissions from this unit shall be calculated using the following equation: lb-SO_x emitted/day = (total volume of gas incinerated per day, in scf) x (ppm sulfur as H₂S prior to incineration) x 0.00000017. [District Rule 2201] Federally Enforceable Through Title V Permit
38. Compliance with the SO_x emission limit(s) of this permit may be demonstrated either by monitoring sulfur content at location(s) after all fuel sources are combined prior to incineration, or by monitoring the sulfur content and volume of each fuel source and performing mass balance calculations. Records of monitoring locations, detected sulfur concentrations, and mass balance calculations, if necessary, shall be maintained and made readily available for District inspection upon request. [District Rule 2201] Federally Enforceable Through Title V Permit
39. On a monthly basis, the permittee shall calculate and record the total combined SO_x emissions, in pounds, for each day from the steam generators permitted as Units S-3088-7, -20, and -24 for the prior calendar month. [District Rules 1070 and 2201] Federally Enforceable Through Title V Permit
40. Total combined SO_x emissions from all permitted units at the stationary source (District Facilities S-2622 and S-3088) shall not exceed 139,999 pounds in any 12-consecutive month rolling period. [District Rule 2201] Federally Enforceable Through Title V Permit

41. On a monthly basis, the permittee shall calculate and record the total combined SO_x emissions from the stationary source in pounds for the prior 12 calendar month period. The total combined SO_x emissions shall be calculated by summing the SO_x emissions from the previous 12 calendar months from every permitted unit at the stationary source. [District Rules 1070 and 2201] Federally Enforceable Through Title V Permit
42. For gas used to fuel this unit that is not regulated by the PUC or FERC, the permittee shall maintain records of the higher heating value (HHV), in Btu per standard cubic foot (scf), for each calendar quarter in which the unit operates. For PUC or FERC-regulated gas used to fuel this unit, the permittee shall maintain records of the HHV, in Btu per standard cubic foot (scf), for each calendar year in which the unit operates. The records shall include the method(s) used to determine the HHV of the fuel and the dates the HHV was determined. For PUC or FERC-regulated natural gas, documentation from the utility may be used to establish the HHV of the gas. [District Rule 1070] Federally Enforceable Through Title V Permit
43. Records of the fuel sulfur content of the natural gas and produced gas combusted in this unit; the daily amounts of each fuel used in this unit, in standard cubic feet (scf) and MMBtu; and calculations to verify compliance with the total combined SO_x emission limit(s) for the steam generators permitted as Units S-3088-7, -20, and -24 for each day the units are operated shall be maintained and made readily available for District inspection upon request. [District Rules 1070, 4001, 2201, and 4320, and 40 CFR Part 60, Subpart Dc] Federally Enforceable Through Title V Permit
44. All records shall be maintained for a minimum of five (5) years, and shall be made available for District inspection upon request. [District Rules 1070, 2201, 4305, 4306, and 4320, and 40 CFR Part 60, Subpart Dc] Federally Enforceable Through Title V Permit



AUTHORITY TO CONSTRUCT

PERMIT NO: S-3088-24-8

ISSUANCE DATE: 07/25/2023

LEGAL OWNER OR OPERATOR: TRC CYPRESS GROUP LLC

MAILING ADDRESS: PO BOX 227
TAFT, CA 93268

LOCATION: HEAVY OIL WESTERN STATIONARY SOURCE
CA

SECTION: SW22 **TOWNSHIP:** 32S **RANGE:** 23E

EQUIPMENT DESCRIPTION:

MODIFICATION OF 62.5 MMBTU/HR C.E. NATCO NATURAL GAS/PRODUCED GAS FIRED STEAM GENERATOR (#92 DIS# 27572-80) WITH A NORTH AMERICAN MAGNA FLAME GLE ULTRA-LOW NOX BURNER: INSTALL NEW PROGRAMMABLE LOGIC CONTROLLER (PLC), MODIFY FUEL TRAIN, AND INSTALL FLUE GAS RECIRCULATION (FGR) SYSTEM TO REDUCE NOX EMISSIONS TO 5 PPMV @ 3% O₂ TO COMPLY WITH DISTRICT RULES 4306 AND 4320; AND LIMIT TOTAL STATIONARY SOURCE SOX EMISSIONS TO 139,999 LB/YEAR

CONDITIONS

1. This Authority to Construct serves as a written certificate of conformity with the procedural requirements of 40 CFR 70.7 and 70.8 and with the compliance requirements of 40 CFR 70.6(c). [District Rule 2201] Federally Enforceable Through Title V Permit
2. Prior to operating with modifications authorized by this Authority to Construct, the facility shall submit an application to modify the Title V permit with an administrative amendment in accordance with District Rule 2520 Section 5.3.4. [District Rule 2520, 5.3.4] Federally Enforceable Through Title V Permit
3. No air contaminant shall be released into the atmosphere which causes a public nuisance. [District Rule 4102]
4. All equipment shall be maintained in good operating condition and shall be operated in a manner to minimize emissions of air contaminants into the atmosphere. [District Rule 2201] Federally Enforceable Through Title V Permit
5. No air contaminant shall be discharged into the atmosphere for a period or periods aggregating more than three minutes in any one hour which is as dark as, or darker than, Ringelmann 1 or 20% opacity. [District Rule 4101] Federally Enforceable Through Title V Permit

CONDITIONS CONTINUE ON NEXT PAGE

YOU MUST NOTIFY THE DISTRICT COMPLIANCE DIVISION AT (661) 392-5500 WHEN CONSTRUCTION IS COMPLETED AND PRIOR TO OPERATING THE EQUIPMENT OR MODIFICATIONS AUTHORIZED BY THIS AUTHORITY TO CONSTRUCT. This is NOT a PERMIT TO OPERATE. Approval or denial of a PERMIT TO OPERATE will be made after an inspection to verify that the equipment has been constructed in accordance with the approved plans, specifications and conditions of this Authority to Construct, and to determine if the equipment can be operated in compliance with all Rules and Regulations of the San Joaquin Valley Unified Air Pollution Control District. Unless construction has commenced pursuant to Rule 2050, this Authority to Construct shall expire and application shall be cancelled two years from the date of issuance. The applicant is responsible for complying with all laws, ordinances and regulations of all other governmental agencies which may pertain to the above equipment.

Samir Sheikh, Executive Director / APCO

Brian Clements, Director of Permit Services

S-3088-24-8 : Jul 25 2023 8:29AM - NORMANR : Joint Inspection NOT Required

6. Particulate matter emissions shall not exceed 0.1 grains/dscf in concentration. [District Rule 4201] Federally Enforceable Through Title V Permit
7. This unit shall not operate at the same time as the standby flare authorized as part of Permit Unit S-3088-8, except as required during start-up and shutdown periods to continue to incinerate produced gas and such periods shall be minimized. [District Rule 2201] Federally Enforceable Through Title V Permit
8. This unit shall only be fired on natural gas, oilfield produced gas, or a blend of natural gas and oilfield produced gas. [District Rule 2201] Federally Enforceable Through Title V Permit
9. Emissions from this steam generator shall not exceed any of the following limits: 5 ppmvd NO_x @ 3% O₂ and 0.0063 lb-NO_x/MMBtu, 0.219 lb-SO_x/MMBtu, 0.0076 lb-PM₁₀/MMBtu, 46 ppmvd CO @ 3% O₂ and 0.035 lb-CO/MMBtu, or 0.0027 lb-VOC/MMBtu (as CH₄). [District Rules 2201, 4305, 4306, 4320, 4405, and 4801] Federally Enforceable Through Title V Permit
10. This unit shall comply with one of the following options for control of SO_x and particulate matter (PM) emissions: 1) The total sulfur content of the fuel gas used this steam generator shall not exceed 1 grain S per 100 standard cubic feet (1 gr-S/100 scf); or 2) A scrubber that reduces SO_x emissions by at least 95% by weight shall be installed and properly operated; or 3) The SO₂ concentration in the exhaust of this unit shall not exceed 9 ppmv SO₂ corrected to 3.0% O₂. [District Rules 2201 and 4320] Federally Enforceable Through Title V Permit
11. The total combined SO_x emissions from the steam generators permitted as Units S-3088-7, -20, and -24 shall not exceed 328.5 lb-SO_x/day. [District Rule 2201] Federally Enforceable Through Title V Permit
12. The permittee shall monitor and record the stack concentration of NO_x, CO, and O₂ at least once every month (in which a source test is not performed) using a portable emission monitor that meets District specifications. Monitoring shall not be required if the unit is not in operation, i.e. the unit need not be started solely to perform monitoring. Monitoring shall be performed within 5 days of restarting the unit unless monitoring has been performed within the last month. [District Rules 2201, 4305, 4306, and 4320] Federally Enforceable Through Title V Permit
13. If either the NO_x or CO concentrations corrected to 3% O₂, as measured by the portable analyzer, exceed the allowable emissions concentration, the permittee shall return the emissions to within the acceptable range as soon as possible, but no longer than 1 hour of operation after detection. If the portable analyzer readings continue to exceed the allowable emissions concentration after 1 hour of operation after detection, the permittee shall notify the District within the following 1 hour and conduct a certified source test within 60 days of the first exceedance. In lieu of conducting a source test, the permittee may stipulate a violation has occurred, subject to enforcement action. The permittee must then correct the violation, show compliance has been re-established, and resume monitoring procedures. If the deviations are the result of a qualifying breakdown condition pursuant to Rule 1100, the permittee may fully comply with Rule 1100. [District Rules 2201, 4305, 4306, and 4320] Federally Enforceable Through Title V Permit
14. All alternate monitoring parameter emission readings shall be taken with the unit operating either at conditions representative of normal operations or conditions specified in the Permit to Operate. The analyzer shall be calibrated, maintained, and operated in accordance with the manufacturer's specifications and recommendations or a protocol approved by the APCO. Emission readings taken shall be averaged over a 15 consecutive-minute period by either taking a cumulative 15 consecutive-minute sample reading or by taking at least five (5) readings, evenly spaced out over the 15 consecutive-minute period. [District Rules 2201, 4305, 4306, and 4320] Federally Enforceable Through Title V Permit
15. The permittee shall maintain records of: (1) the date and time of NO_x, CO, and O₂ measurements, (2) the O₂ concentration in percent and the measured NO_x and CO concentrations corrected to 3% O₂, (3) make and model of exhaust gas analyzer, (4) exhaust gas analyzer calibration records, and (5) a description of any corrective action taken to maintain the emissions within the acceptable range. [District Rules 2201, 4305, 4306, and 4320] Federally Enforceable Through Title V Permit
16. Source testing to measure NO_x, CO, and VOC emissions from this unit shall be conducted within 60 days of initial operation of the unit under this Authority to Construct (ATC) permit. [District Rules 2201, 4306, and 4320] Federally Enforceable Through Title V Permit

17. Source testing to measure NO_x and CO emissions from this unit shall be conducted at least once every twelve (12) months. After demonstrating compliance on two (2) consecutive annual source tests, the unit shall be tested not less than once every thirty-six (36) months. If the result of the 36-month source test demonstrates that the unit does not meet the applicable emission limits, the source testing frequency shall revert to at least once every twelve (12) months. [District Rules 2201, 4305, 4306, and 4320] Federally Enforceable Through Title V Permit
18. The source test plan shall identify which basis (ppmv or lb/MMBtu) will be used to demonstrate compliance. [District Rules 2201, 4305, 4306, and 4320] Federally Enforceable Through Title V Permit
19. All emissions measurements shall be made with the unit operating either at conditions representative of normal operations or conditions specified in the Permit to Operate. No determination of compliance shall be established within two hours after a continuous period in which fuel flow to the unit is shut off for 30 minutes or longer, or within 30 minutes after a re-ignition as defined in Section 3.0 of District Rule 4306. [District Rules 2201, 4305, 4306, and 4320] Federally Enforceable Through Title V Permit
20. Source testing shall be conducted using the methods and procedures approved by the District. The District must be notified at least 30 days prior to any compliance source test, and a source test plan must be submitted for approval at least 15 days prior to testing. [District Rule 1081] Federally Enforceable Through Title V Permit
21. The results of each source test shall be submitted to the District within 60 days after completion of the source test. [District Rule 1081] Federally Enforceable Through Title V Permit
22. NO_x emissions for source test purposes shall be determined using EPA Method 7E or ARB Method 100 on a ppmv basis, or EPA Method 19 on a heat input basis. [District Rules 4305, 4306, and 4320] Federally Enforceable Through Title V Permit
23. CO emissions for source test purposes shall be determined using EPA Method 10 or ARB Method 100. [District Rules 4305, 4306, and 4320] Federally Enforceable Through Title V Permit
24. VOC emissions for source test purposes shall be determined using EPA Method 25A or 25B, or ARB Method 100. EPA Method 18, ARB Method 422 "Determination of Volatile Organic Compounds in Emission from Stationary Sources", or alternative method(s) approved by the District shall be used for the measurement and subtraction of exempt compounds (e.g. methane and ethane). [District Rule 2201] Federally Enforceable Through Title V Permit
25. Stack gas oxygen (O₂) shall be determined using EPA Method 3 or 3A or ARB Method 100. [District Rules 4305, 4306, and 4320] Federally Enforceable Through Title V Permit
26. SO_x emissions for source test purposes shall be determined using EPA Method 6C, EPA Method 8, or ARB Method 100. [District Rule 4320] Federally Enforceable Through Title V Permit
27. For emissions source testing, the arithmetic average of three 30-consecutive-minute test runs shall apply. If two of three runs are above an applicable limit the test cannot be used to demonstrate compliance with an applicable limit. [District Rules 1081, 4305, 4306, and 4320] Federally Enforceable Through Title V Permit
28. The higher heating value (HHV) of the fuel gas shall be determined using ASTM D1826, ASTM 1945 in conjunction with ASTM D3588, or an alternative method approved by EPA and the District. [District Rules 2201, 4306, and 4320] Federally Enforceable Through Title V Permit
29. When complying with the SO_x and PM control requirements of this permit by limiting the total sulfur content of the fuel gas or by reducing SO_x emissions by at least 95% using a scrubber that removes sulfur compounds from the gas prior to combustion, laboratory analysis to determine the sulfur content of the fuel gas or the control efficiency of the scrubber shall be performed at least annually using EPA Method 11 or EPA Method 15, as appropriate; ASTM Method D1072, D1945, D3246, D4084, D4468, or D5504; grab sample analysis by GC-FPD/TCD performed in the laboratory; or other methods approved by the District and EPA. Records of the fuel sulfur analyses shall be maintained and provided to the District upon request. [District Rules 2201 and 4320] Federally Enforceable Through Title V Permit
30. For natural gas that is regulated by the California Public Utilities Commission (PUC) or Federal Energy Regulatory Commission (FERC), valid purchase contracts, supplier certifications, tariff sheets, transportation contracts, or other documentation may be used to satisfy the fuel sulfur content analysis, provided they establish the fuel sulfur content as required by this permit. [District Rules 2201 and 4320] Federally Enforceable Through Title V Permit

CONDITIONS CONTINUE ON NEXT PAGE

31. When complying with the SO_x and PM control requirements of this permit by using a post-combustion scrubber that reduces SO_x emissions by at least 95% by weight or limiting the exhaust SO₂ concentration to 9 ppmv corrected to 3.0% O₂, source testing of SO_x emissions from this unit to demonstrate compliance with the required SO_x emission reduction percentage or SO₂ exhaust concentration limit shall be performed at least annually. [District Rules 1081, 2201, and 4320] Federally Enforceable Through Title V Permit
32. When complying with the SO_x and PM control requirements of this permit by using a scrubber that reduces SO_x emissions by at least 95% by weight, the operator shall monitor key system operating parameters that indicate proper operation of the scrubber (e.g. inlet and outlet H₂S concentrations for scrubbers that remove H₂S prior to combustion) at least once every week. Records of monitoring of the key system operating parameters of the scrubber shall be maintained. [District Rules 2201 and 4320] Federally Enforceable Through Title V Permit
33. The sulfur content of the produced gas and any gas not regulated by the PUC or FERC combusted in this unit shall be monitored and recorded at least once every quarter in which the unit operates. If it is determined that the total combined SO_x emissions limit for Units S-3088-7, -20, and -24 was exceeded, the sulfur content of the non-PUC and non-FERC-regulated gas combusted in the unit shall be monitored and recorded at least once every week until compliance with the SO_x emission limit is demonstrated for each day the unit operates for eight consecutive weeks. After demonstrating compliance with the SO_x emission limit for eight consecutive weeks, the gas sulfur content monitoring frequency may revert to quarterly. Records of the results of monitoring of the sulfur content of the gas combusted in this unit shall be maintained. [District Rule 2201] Federally Enforceable Through Title V Permit
34. Monitoring of the sulfur content of the gas combusted in this unit shall be performed using gas detection tubes calibrated for H₂S; EPA Method 11 or EPA Method 15, as appropriate, ASTM Method D1072, D1945, D3246, D4084, D4468, D4810 or D5504; grab sample analysis by GC-FPD/TCD performed in the laboratory; a continuous analyzer employing gas chromatography; a continuous fuel gas monitor that meets the requirements specified in SCAQMD Rule 431.1, Attachment A; or an alternative method approved by EPA and the District. The permittee shall maintain records of any monitors used to demonstrate compliance with the SO_x limit of this permit, including the make, model, and detection limits of the monitor(s). The required quarterly analysis of the sulfur content of the gas and the first of the weekly analyses required to reestablish compliance shall only be performed using methods that use laboratory analysis. The remainder of the weekly analyses required to demonstrate compliance may be performed using approved methods that do not use laboratory analysis. [District Rule 2201] Federally Enforceable Through Title V Permit
35. Records shall be maintained of the dates that each specific option is used to comply with the SO_x and PM control requirements of this permit. [District Rules 1070, 2201, and 4320] Federally Enforceable Through Title V Permit
36. On a monthly basis, the permittee shall calculate and record the total SO_x emissions in pounds from this unit each day for the prior calendar month. [District Rules 1070 and 2201] Federally Enforceable Through Title V Permit
37. The SO_x emissions from this unit shall be calculated using the following equation: lb-SO_x emitted/day = (total volume of gas incinerated per day, in scf) x (ppm sulfur as H₂S prior to incineration) x 0.00000017. [District Rule 2201] Federally Enforceable Through Title V Permit
38. Compliance with the SO_x emission limit(s) of this permit may be demonstrated either by monitoring sulfur content at location(s) after all fuel sources are combined prior to incineration, or by monitoring the sulfur content and volume of each fuel source and performing mass balance calculations. Records of monitoring locations, detected sulfur concentrations, and mass balance calculations, if necessary, shall be maintained and made readily available for District inspection upon request. [District Rule 2201] Federally Enforceable Through Title V Permit
39. On a monthly basis, the permittee shall calculate and record the total combined SO_x emissions, in pounds, for each day from the steam generators permitted as Units S-3088-7, -20, and -24 for the prior calendar month. [District Rules 1070 and 2201] Federally Enforceable Through Title V Permit
40. Total combined SO_x emissions from all permitted units at the stationary source (District Facilities S-2622 and S-3088) shall not exceed 139,999 pounds in any 12-consecutive month rolling period. [District Rule 2201] Federally Enforceable Through Title V Permit

41. On a monthly basis, the permittee shall calculate and record the total combined SO_x emissions from the stationary source in pounds for the prior 12 calendar month period. The total combined SO_x emissions shall be calculated by summing the SO_x emissions from the previous 12 calendar months from every permitted unit at the stationary source. [District Rules 1070 and 2201] Federally Enforceable Through Title V Permit
42. For gas used to fuel this unit that is not regulated by the PUC or FERC, the permittee shall maintain records of the higher heating value (HHV), in Btu per standard cubic foot (scf), for each calendar quarter in which the unit operates. For PUC or FERC-regulated gas used to fuel this unit, the permittee shall maintain records of the HHV, in Btu per standard cubic foot (scf), for each calendar year in which the unit operates. The records shall include the method(s) used to determine the HHV of the fuel and the dates the HHV was determined. For PUC or FERC-regulated natural gas, documentation from the utility may be used to establish the HHV of the gas. [District Rule 1070] Federally Enforceable Through Title V Permit
43. Records of the fuel sulfur content of the natural gas and produced gas combusted in this unit; the daily amounts of each fuel used in this unit, in standard cubic feet (scf) and MMBtu; and calculations to verify compliance with the total combined SO_x emission limit(s) for the steam generators permitted as Units S-3088-7, -20, and -24 for each day the units are operated shall be maintained and made readily available for District inspection upon request. [District Rules 1070, 4001, 2201, and 4320, and 40 CFR Part 60, Subpart Dc] Federally Enforceable Through Title V Permit
44. All records shall be maintained for a minimum of five (5) years, and shall be made available for District inspection upon request. [District Rules 1070, 2201, 4305, 4306, and 4320, and 40 CFR Part 60, Subpart Dc] Federally Enforceable Through Title V Permit