

20. Except during start-up and shutdown, emission rates shall not exceed any of the following PM10: 0.014 lb/MMBtu, NOx (as NO2): 0.0182 lb/MMBtu or 15 ppmv @ 3% O2, VOC: 0.003 lb/MMBtu, or CO: 0.021 lb/MMBtu. [District Rules 2201, 4305, 4306, 4320 and 4351] Federally Enforceable Through Title V Permit
21. The combined sulfur content of all fuels supplied to this steam generator shall not exceed 5 grains S/100 scf. [District Rule 4320]
22. Duration of start-up or shutdown shall not exceed two hours each per occurrence. During start-up or shutdown, the emissions control system shall be in operation, and emissions shall be minimized insofar as technologically possible. The operator shall maintain daily records of the duration of start-up and shutdown periods exceeding 2 hours. [District Rules 4305, 5.5.6, 4306, 5.3 and 4320] Federally Enforceable Through Title V Permit
23. Start-up is defined as the period of time during which a unit is brought from a shutdown status to its operating temperature and pressure, including the time required by the unit's emission control system to reach full operation. Shutdown is defined as the period of time during which a unit is taken from an operational to a non-operational status by allowing it to cool down from its operating temperature to ambient temperature as the fuel supply to the unit is completely turned off. [District Rules 4306, 3.25 and 3.22 and 4320] Federally Enforceable Through Title V Permit
24. During start-up and shutdown periods, emissions from the natural gas/vapor recovery gas-fired steam generator shall not exceed either of the following limits: 0.1 lb-NOx/MMBtu or 0.084 lb-CO/MMBtu. [District Rule 4320]
25. 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 analyzer 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 4305, 4306 and 4320]
26. 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 in lieu of performing the notification and testing required by this condition. [District Rules 2520, 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
27. 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 4305, 4306 and 4320]
28. {4066} The permittee shall maintain records of: (1) the date and time of NOX, CO, and O2 measurements, (2) the O2 concentration in percent by volume 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 4305 and 4306]
29. Source testing shall be conducted using the methods and procedures approved by the District. The District must be notified 30 days prior to any compliance source test, and a source test plan must be submitted for approval 15 days prior to testing. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
30. Compliance with SOx emission limits shall be demonstrated within 60 days of initial operation under this ATC. [District Rules 2201 and 4320]
31. The results of each source test shall be submitted to the District within 60 days thereafter. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

32. The permittee shall keep records of the following: sulfur content of the vapor recovery gas on an annual basis; amount of natural gas and amount of vapor recovery gas combusted on a daily basis. [District Rules 1070 and 2520, 9.4.2] Federally Enforceable Through Title V Permit
33. Emissions for this unit shall be calculated using the arithmetic mean, pursuant to District Rule 1081 (Amended December 16, 1993), of 3 thirty-minute test runs for NO_x and CO. This mean shall be multiplied by the appropriate factor. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
34. Source testing to measure natural gas-combustion 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 4305, 4306, 4320 and 4351]
35. Compliance demonstration (source testing) shall be by District witnessed, or authorized, sample collection by ARB certified testing laboratory. [District Rule 1081] Federally Enforceable Through Title V Permit
36. The following test methods shall be used: NO_x (ppmv) - EPA Method 7E or ARB Method 100, NO_x (lb/MMBtu) - EPA Method 19, CO (ppmv) - EPA Method 10 or ARB Method 100, stack gas oxygen - EPA Method 3 or 3A or ARB Method 100, stack gas velocities - EPA Method 2, and stack gas moisture content - EPA Method 4. [District Rules 1081, 4305, 4320 and 4351] Federally Enforceable Through Title V Permit
37. Permittee shall maintain records of fuel hhv and cumulative annual fuel use for a period of 5 years and shall make such records readily available for District inspection upon request. [District Rules 4320 and 4351] Federally Enforceable Through Title V Permit
38. Steam generator may be operated with ring or perforated type burner diffuser plate. Changes between ring or perforated type burner diffuser plates shall be recorded in a contemporaneous log. [District Rule 2520 section 6.4.2] Federally Enforceable Through Title V Permit

DRAFT

APPENDIX B

Draft ATCs

San Joaquin Valley
Air Pollution Control District

AUTHORITY TO CONSTRUCT

ISSUANCE DATE: DRAFT
DRAFT

PERMIT NO: S-1127-22-28

LEGAL OWNER OR OPERATOR: CHEVRON USA INC
MAILING ADDRESS: PO BOX 1392
BAKERSFIELD, CA 93302

LOCATION: HEAVY OIL CENTRAL

SECTION: SW3 **TOWNSHIP:** 29S **RANGE:** 28E

EQUIPMENT DESCRIPTION:

MODIFICATION OF 62.5 MMBTU/HR STRUTHERS NATURAL GAS/VAPOR RECOVERY GAS-FIRED STEAM GENERATOR (CUSA ID #34-3, DIS #43006-74) WITH A NORTH AMERICAN MODEL GLE LOW NOX BURNER AND FLUE GAS RECIRCULATION (FGR) SYSTEM: LIMIT NOX TO 9 PPM @ 3% O2 (0.011 LB-NOX/MMBTU) OR TO 12 PPMV @ 3% O2 (0.014 LB-NOX/MMBTU) FOR RULE 4320 COMPLIANCE

CONDITIONS

1. {1830} 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 NSR Rule] Federally Enforceable Through Title V Permit
2. {1831} 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. This Authority to Construct shall be implemented according to the date proposed in the District-approved Rule 4320 Emission Control Plan. [District Rule 4320]
4. {98} No air contaminant shall be released into the atmosphere which causes a public nuisance. [District Rule 4102]
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
6. All required source testing shall conform to the compliance testing procedures described in District Rule 1081. [District Rule 1081] 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.

Seyed Sadredin, Executive Director, APCO

DAVID WARNER, Director of Permit Services

S-1127-22-28 : May 28 2010 12:12PM - GOUGHD : Joint Inspection NOT Required

7. Particulate matter emissions shall not exceed 0.1 grain/dscf, 0.1 grain/dscf calculated to 12% CO₂, nor 10 lb/hr. [District Rules 4201, 3.1 and 4301, 5.1 and 5.2.3] Federally Enforceable Through Title V Permit
8. If the steam generator is fired on PUC-regulated natural gas, then the permittee shall maintain on file copies of all natural gas bills or fuel throughput records for a period of five years. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
9. If the steam generator is not fired on PUC-regulated natural gas, then the sulfur content of the natural gas being fired shall be determined using ASTM D 1072, D 3031, D 4084, D 3246, D 6228, double GC for H₂S and mercaptans, or grab sample analysis by GC-FPD/TCD performed in the laboratory. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
10. If the steam generator is not fired on PUC-regulated natural gas, the sulfur content of each fuel source shall be tested weekly except that if compliance with the fuel sulfur content limit has been demonstrated for 8 consecutive weeks for a fuel source, then the testing frequency shall be quarterly. If a test shows noncompliance with the sulfur content requirement, the source must return to weekly testing until eight consecutive weeks show compliance. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
11. If the steam generator is not fired on PUC-regulated natural gas and compliance is achieved through fuel sulfur content limitations, then the sulfur content of the fuel shall be determined by testing sulfur content at a location after all fuel sources are combined prior to incineration, or by performing mass balance calculations based on monitoring the sulfur content and volume of each fuel source. The sulfur content of the fuel shall be determined using the test methods referenced in this permit. [District Rule 4320]
12. Compliance with permit conditions in the Title V permit shall be deemed compliance with the requirements of County Rules 108 (Kings), 108.1 (Fresno, Merced, San Joaquin, Tulare, Kern, and Stanislaus), and 110 (Madera), 402 (Madera), 404 (Fresno, Kern, Tulare, Kings, Stanislaus, Merced, and San Joaquin), 405 (Madera), 408 (Fresno, Kern, Tulare, Kings, Stanislaus, Merced, and San Joaquin), 407.2 (Kern, Tulare, Kings, Stanislaus, and San Joaquin), and 408.2 (Merced). A permit shield is granted from these requirements. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
13. Compliance with permit conditions in the Title V permit shall be deemed compliance with the following requirements: SJVUAPCD Rules 4201 (Last Amended December 17, 1992), 4301 (Last Amended December 17, 1992), 4305 sections 4.2, 5.1, 5.5.1, 5.5.2, 6.1.1, 6.2 (except 6.2.3), 6.3.1, 6.3.2, and 8.1 (Last Amended December 17, 1992), and 4351, sections 4.2, 5.2.2, 6.1.1, 6.2, and 8.1 (Last Amended October 19, 1995). A permit shield is granted from these requirements. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
14. The requirements of 40 CFR 72.6(b) and 40 CFR 60.40c do not apply to this source. A permit shield is granted from this requirement. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
15. Duration of start-up or shutdown shall not exceed two hours each per occurrence. During start-up or shutdown, the emissions control system shall be in operation, and emissions shall be minimized insofar as technologically possible. The operator shall maintain a record of the duration of each start-up and shutdown. [District Rules 4305, 5.5.6, 4306, 5.3 and 4320] Federally Enforceable Through Title V Permit
16. Start-up is defined as the period of time during which a unit is brought from a shutdown status to its operating temperature and pressure, including the time required by the unit's emission control system to reach full operation. Shutdown is defined as the period of time during which a unit is taken from an operational to a non-operational status by allowing it to cool down from its operating temperature to ambient temperature as the fuel supply to the unit is completely turned off. [District Rules 4306, 3.25 and 3.22 and 4320] Federally Enforceable Through Title V Permit
17. Emissions from the natural gas/vapor recovery gas-fired steam generator shall not exceed any of the following limits: 0.014 lb-PM₁₀/MMBtu, or 0.003 lb-VOC/MMBtu. [District Rules 2201 and 4320] Federally Enforceable Through Title V Permit
18. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when this unit is burning 50% or greater by volume PUC quality gas on a monthly average basis: 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 29 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

19. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when the unit is burning less than 50% by volume PUC quality gas on a monthly average basis: 12 ppmvd NO_x @ 3% O₂ or 0.014 lb-NO_x/MMBtu and 29 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]
20. The applicable NO_x and CO emissions concentration for each month shall be determined based on the volume and type of fuel combusted in the unit (< 50% by volume PUC quality gas or greater than or equal to 50% by volume PUC quality gas). Permittee shall maintain supporting records that determine the type of fuel combusted. [District Rules 2201 and 4320]
21. PUC quality natural gas is any gaseous fuel where the sulfur content is no more than one-fourth (0.25) grain of hydrogen sulfide per one hundred (100) standard cubic feet, no more than five (5) grains of total sulfur per one hundred (100 standard cubic feet) and at least 80% methane by volume. [District Rule 4320]
22. During a shakedown period not to exceed 60 calendar days from initial operation of the modifications authorized by this ATC, NO_x emission rate shall not exceed 15 ppmvd @ 3% O₂ or 0.0182 lb/MMBtu. The shakedown period shall be concluded prior to the applicable Rule 4320 compliance deadline selected for this unit. Permittee shall maintain a record of the date of initial operation and shall make such records readily available for District inspection upon request. [District Rule 4320]
23. During start-up and shutdown periods, emissions from the natural gas/vapor recovery gas-fired steam generator shall not exceed either of the following limits: 0.1 lb-NO_x/MMBtu or 0.084 lb-CO/MMBtu. [District Rule 2201] Federally Enforceable Through Title V Permit
24. Emissions from the natural gas/vapor recovery gas-fired steam generator shall not exceed either of the following limits: 54.0 lb-NO_x/day or 31.5 lb-CO/day. [District Rule 2201] Federally Enforceable Through Title V Permit
25. The combined sulfur content of all fuels supplied to this steam generator shall not exceed 5 grains S/100 scf. [District Rule 4320]
26. The following test methods shall be used: NO_x (ppmv) - EPA Method 7E or ARB Method 100, NO_x (lb/MMBtu) - EPA Method 19, CO (ppmv) - EPA Method 10 or ARB Method 100, stack gas oxygen - EPA Method 3 or 3A or ARB Method 100, stack gas moisture content - EPA Method 4, and stack gas velocities - EPA Method 2. [District Rules 1081, 4305, 4306, 6.2, 4320, and 4351] Federally Enforceable Through Title V Permit
27. A source test to demonstrate compliance with NO_x and CO emission limits shall be performed within 60 days of startup of this unit. The NO_x limit in effect at the time of the startup source testing will be determined based on the volume and type of fuel combusted (greater than or equal to 50% PUC quality or < 50% PUC quality gas) and shall be identified in the source test protocol. Whenever the fuel type is switched from the fuel type combusted during the initial startup of this unit, compliance source testing for NO_x and CO shall be conducted within 90 days of the date the fuel type is switched. [District Rules 2201 and 4320]
28. Source testing is required at least once every twelve (12) months from the initial source test date of each fuel type (greater than or equal to 50% PUC quality gas or < 50% PUC quality gas). After an initial compliance demonstration with the NO_x and CO emission limits for each fuel type on two (2) consecutive source tests, the unit shall be tested not less than once every thirty-six (36) months from the last test date for that fuel type. Testing shall not be required for any fuel type not in use during the 36 month period until such time the fuel type is switched, after which testing shall be performed within 90 days of switching fuel types. [District Rules 2201 and 4320]
29. Compliance source testing after switching fuel types is not required if the unit continues to demonstrate compliance with 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 29 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas. In which case, source testing shall only be required every thirty-six(36) months for the less than 50% by PUC quality gas. If the result of a source test demonstrates that the unit does not meet 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 29 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas, the source test frequency shall revert to at least one test every 36 months for each fuel type. [District Rules 2201 and 4320]
30. 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 4320. [District Rules 4305, 5.5.2, 4306, 5.5.2 and 4320] Federally Enforceable Through Title V Permit

CONDITIONS CONTINUE ON NEXT PAGE

31. Source testing shall be conducted using the methods and procedures approved by the District. The District must be notified 30 days prior to any compliance source test, and a source test plan must be submitted for approval 15 days prior to testing. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
32. The source test plan shall identify which basis (ppmv or lb/MMBtu) will be used to demonstrate compliance. [District Rules 4320]
33. The results of each source test shall be submitted to the District within 60 days thereafter. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
34. 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, 2520, 9.3.2, 4305, 5.5.5, 4306, 5.5.5 and 4320] Federally Enforceable Through Title V Permit
35. All equipment, facilities, and systems installed or used to achieve compliance with the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003) shall at all times be maintained in good working order and be operated as efficiently as possible so as to minimize air pollutant emissions. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
36. The Regional Administrator shall be notified in writing within (15) days following any failure of air pollution control equipment, process equipment, or of a process to operate in a normal manner which results in an increase in emissions above any allowable emissions limit stated in Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003). This notification shall include a description of the malfunctioning equipment or abnormal operation, the date of the initial failure, the period of time over which emissions were increased due to the failure, the cause of the failure, the estimated resultant emissions in excess of those allowed under Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003), and the methods utilized to restore normal operations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
37. The Regional Administrator, the head of the State Air Pollution Control Agency, the head of the responsible local air pollution control agency, and/or their authorized representatives, upon the presentation of credentials, shall be permitted: A) to enter upon the premises where the source is located or in which any records are required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and B) at reasonable times to have access to and copy any records required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and C) to inspect any equipment, operation, or method required in Federal Permit SJ 80-14 (as amended August 15, 2003); and D) to sample emissions from the source. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
38. In the event of any changes in control or ownership of facilities, Federal Permit SJ 80-14 (as amended August 15, 2003) shall be binding on all subsequent owners and operators. The applicant shall notify the succeeding owner and operator of the existence of Federal Permit SJ 80-14 (as amended August 15, 2003) and its conditions by letter, a copy of which shall be forwarded to the Regional Administrator and the State and local Air Pollution Control Agency. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
39. The provisions of Federal Permit SJ 80-14 (as amended August 15, 2003) are severable, and, if any provision of amended Federal Permit SJ 80-14 is held invalid, the remainder of amended Federal Permit SJ 80-14 shall not be affected thereby. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
40. The owner and operator of the proposed project shall construct and operate the proposed stationary source in compliance with all other applicable provisions of 40 CFR Parts 52, 60, and 61 and all other applicable Federal, State and local regulations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
41. 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 4305, 4306 and 4320] Federally Enforceable Through Title V Permit

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

42. 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 in lieu of the performing the notification and testing required by this condition. [District Rules 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
43. 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 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
44. 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 4305 and 4306] Federally Enforceable Through Title V Permit
45. Source sampling to determine the compliance status of an emissions source shall be witnessed or authorized by District personnel. [District Rule 1081] Federally Enforceable Through Title V Permit
46. Permittee shall maintain daily records of total combined volume of fuel gas and vapor recovery gas burned, the dates of any fuel type switching, the monthly NO_x and CO emissions limit determinations, the sulfur content and higher heat value as determined by periodic analytical testing or fuel supplier invoices/certifications, and permit number(s) of systems providing gas for incineration. [District Rules 2201, 2520 and 4320]
47. All records shall be maintained and retained on-site for a minimum of five (5) years, and shall be made available for District inspection upon request. [District Rules 1070, 4305, 6.1, 4306, 6.1, and 4320] Federally Enforceable Through Title V Permit
48. This ATC shall be implemented concurrently or after ATC S-1127-22-29. [District Rule 2201]

DRAFT

San Joaquin Valley
Air Pollution Control District

AUTHORITY TO CONSTRUCT

ISSUANCE DATE: DRAFT
DRAFT

PERMIT NO: S-1127-25-28

LEGAL OWNER OR OPERATOR: CHEVRON USA INC
MAILING ADDRESS: PO BOX 1392
BAKERSFIELD, CA 93302

LOCATION: HEAVY OIL CENTRAL

SECTION: 32 **TOWNSHIP:** 28S **RANGE:** 28E

EQUIPMENT DESCRIPTION:

MODIFICATION OF 62.5 MMBTU/HR NATURAL GAS/VAPOR RECOVERY GAS-FIRED STEAM GENERATOR (CUSA ID# 40-32, DIS# 43001-75) WITH NORTH AMERICAN GLE MAGNA FLAME LOW NOX BURNER AND PRESSURE FUEL INDUCED RECIRCULATION: INSTALL OPTIONAL USE FLUE GAS RECIRCULATION (FGR) AND LIMIT NOX TO 9 PPM @ 3% O2 (0.011 LB-NOX/MMBTU) OR TO 12 PPMV @ 3% O2 (0.014 LB-NOX/MMBTU) FOR RULE 4320 COMPLIANCE

CONDITIONS

1. {1830} 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 NSR Rule] Federally Enforceable Through Title V Permit
2. {1831} 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. This Authority to Construct shall be implemented according to the date proposed in the District-approved Rule 4320 Emission Control Plan. [District Rule 4320]
4. All required source testing shall conform to the compliance testing procedures described in District Rule 1081 (Last Amended December 16, 1993). [District Rule 1081, and County Rules 108 (Kings), 108.1 (Fresno, Merced, San Joaquin, Tulare, Kern, and Stanislaus), and 110 (Madera)] Federally Enforceable Through Title V Permit
5. Copies of all gas purchase contracts, supplier certifications, and test results to determine compliance with the conditions of this permit shall be maintained. The operator shall record daily amount and type(s) of fuel(s) combusted and all dates on which unit is fired on any noncertified fuel and record specific type of noncertified fuel used. [District Rule 2520, 9.3.2] 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.

Seyed Sadredin, Executive Director / APCO

DRAFT

DAVID WARNER, Director of Permit Services

S-1127-25-28 : May 28 2010 12:12PM - GOUGHID : Joint Inspection NOT Required

6. The operator shall maintain all records of required monitoring data and support information for inspection at any time for a period of five years. [District Rule 2520, 9.4.2] Federally Enforceable Through Title V Permit
7. Particulate matter emissions shall not exceed 0.1 grain/dscf, 0.1 grain/dscf calculated to 12% CO₂, nor 10 lb/hr. [District Rules 4201, 3.1 and 4301, 5.1 and 5.2.3] Federally Enforceable Through Title V Permit
8. If the unit is fired on PUC-regulated natural gas, valid purchase contracts, supplier certifications, tariff sheets, or transportation contracts may be used to satisfy the fuel sulfur content analysis, provided they establish the fuel sulfur concentration and higher heating value. [District Rules 2520 and 4320]
9. If the steam generator is not fired on PUC-regulated natural gas, then the sulfur content of the natural gas being fired shall be determined using ASTM D 1072, D 3031, D 4084, D 3246, D 6228, double GC for H₂S and mercaptans, or grab sample analysis by GC-FPD/TCD performed in the laboratory. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
10. When complying with sulfur emission limits by fuel analysis or by a combination of source testing and fuel analysis, each fuel source shall be tested weekly for sulfur content and higher heating value. If compliance with the fuel sulfur content limit and sulfur emission limits has been demonstrated for 8 consecutive weeks for a fuel source, then the fuel testing frequency shall be semi-annually. If a semi-annual fuel content test fails to show compliance, weekly testing shall resume until compliance is demonstrated for 8 consecutive weeks. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
11. If the steam generator is not fired on PUC-regulated natural gas and compliance is achieved through fuel sulfur content limitations, then the sulfur content of the fuel shall be determined by testing sulfur content at a location after all fuel sources are combined prior to incineration, or by performing mass balance calculations based on monitoring the sulfur content and volume of each fuel source. The sulfur content of the fuel shall be determined using the test methods referenced in this permit. [District Rule 4320]
12. If fuel analysis is used to demonstrate compliance with conditions of this permit, the fuel higher heating value for each fuel shall be certified by a third party fuel supplier or determined by ASTM D 1826 or D 1945 in conjunction with ASTM D 3588 for gaseous fuels. [District Rule 2520, 9.3.2; 4305, 6.2.1, 4320; and 4351, 6.2.1] Federally Enforceable Through Title V Permit
13. Compliance with permit conditions in the Title V permit shall be deemed compliance with the requirements of County Rules 108 (Kings), 108.1 (Fresno, Merced, San Joaquin, Tulare, Kern, and Stanislaus), and 110 (Madera), 402 (Madera), 404 (Fresno, Kern, Tulare, Kings, Stanislaus, Merced, and San Joaquin), 405 (Madera), 408 (Fresno, Kern, Tulare, Kings, Stanislaus, Merced, and San Joaquin), 407.2 (Kern, Tulare, Kings, Stanislaus, and San Joaquin), and 408.2 (Merced). A permit shield is granted from these requirements. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
14. Compliance with permit conditions in the Title V permit shall be deemed compliance with the following requirements: SJVUAPCD Rules 4201 (Last Amended December 17, 1992), 4301 (Last Amended December 17, 1992), 4305 sections 4.2, 5.1, 5.5.1, 5.5.2, 6.1.1, 6.2 (except 6.2.3), 6.3.1, 6.3.2, and 8.1 (Last Amended December 17, 1992), and 4351, sections 4.2, 5.2.2, 6.1.1, 6.2, and 8.1 (Last Amended October 19, 1995). A permit shield is granted from these requirements. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
15. The requirements of 40 CFR 72.6(b) and 40 CFR 60.40c do not apply to this source. A permit shield is granted from this requirement. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
16. Except during startup and shutdown, emission rates shall not exceed any of the following PM₁₀: 0.014 lb/MMBtu or VOC: 0.003 lb/MMBtu. [District Rules 2201, 4305, 4306, 4351 and 4320] Federally Enforceable Through Title V Permit
17. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when this unit is burning 50% or greater by volume PUC quality gas on a monthly average basis: 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]
18. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when the unit is burning less than 50% by volume PUC quality gas on a monthly average basis: 12 ppmvd NO_x @ 3% O₂ or 0.014 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

19. The applicable NO_x and CO emissions concentration for each month shall be determined based on the volume and type of fuel combusted in the unit (< 50% by volume PUC quality gas or greater than or equal to 50% by volume PUC quality gas). Permittee shall maintain supporting records that determine the type of fuel combusted. [District Rules 2201 and 4320]
20. PUC quality natural gas is any gaseous fuel where the sulfur content is no more than one-fourth (0.25) grain of hydrogen sulfide per one hundred (100) standard cubic feet, no more than five (5) grains of total sulfur per one hundred (100 standard cubic feet) and at least 80% methane by volume. [District Rule 4320]
21. During a shakedown period not to exceed 60 calendar days from initial operation of the modifications authorized by this ATC, NO_x emission rate shall not exceed 15 ppmvd @ 3% O₂ or 0.0182 lb/MMBtu. The shakedown period shall be concluded prior to the applicable Rule 4320 compliance deadline selected for this unit. Permittee shall maintain a record of the date of initial operation and shall make such records readily available for District inspection upon request. [District Rule 4320]
22. The combined sulfur content of all fuels supplied to this steam generator shall not exceed 5 grains S/100 scf. [District Rule 4320]
23. During start-up and shutdown periods, emissions from the natural gas/vapor recovery gas-fired steam generator shall not exceed either of the following limits: 0.1 lb-NO_x/MMBtu or 0.084 lb-CO/MMBtu. [District Rule 4420]
24. Duration of start-up or shutdown shall not exceed two hours each per occurrence. During start-up or shutdown, the emissions control system shall be in operation, and emissions shall be minimized insofar as technologically possible. The operator shall maintain daily records of the duration of start-up and shutdown periods. [District Rule 4320]
25. Start-up is defined as the period of time during which a unit is brought from a shutdown status to its operating temperature and pressure, including the time required by the unit's emission control system to reach full operation. Shutdown is defined as the period of time during which a unit is taken from an operational to a non-operational status by allowing it to cool down from its operating temperature to ambient temperature as the fuel supply to the unit is completely turned off. [District Rule 4320]
26. Vapor recovery gas sulfur analysis and heating value determination shall be conducted by District-witnessed, or approved sample collection by an independent laboratory on an annual basis. [District Rule 1081, 7.2 and 2520, 9.5.1] Federally Enforceable Through Title V Permit
27. A source test to demonstrate compliance with NO_x and CO emission limits shall be performed within 60 days of startup of this unit. The NO_x limit in effect at the time of the startup source testing will be determined based on the volume and type of fuel combusted (greater than or equal to 50% PUC quality or < 50% PUC quality gas) and shall be identified in the source test protocol. Whenever the fuel type is switched from the fuel type combusted during the initial startup of this unit, compliance source testing for NO_x and CO shall be conducted within 90 days of the date the fuel type is switched. [District Rules 2201 and 4320]
28. Source testing is required at least once every twelve (12) months from the initial source test date of each fuel type (greater than or equal to 50% PUC quality gas or < 50% PUC quality gas). After an initial compliance demonstration with the NO_x and CO emission limits for each fuel type on two (2) consecutive source tests, the unit shall be tested not less than once every thirty-six (36) months from the last test date for that fuel type. Testing shall not be required for any fuel type not in use during the 36 month period until such time the fuel type is switched, after which testing shall be performed within 90 days of switching fuel types. [District Rules 2201 and 4320]
29. Compliance source testing after switching fuel types is not required if the unit continues to demonstrate compliance with 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas. In which case, source testing shall only be required every thirty-six(36) months for the less than 50% by PUC quality gas. If the result of a source test demonstrates that the unit does not meet 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas, the source test frequency shall revert to at least one test every 36 months for each fuel type. [District Rules 2201 and 4320]
30. Source testing shall be conducted using the methods and procedures approved by the District. The District must be notified 30 days prior to any compliance source test, and a source test plan must be submitted for approval 15 days prior to testing. [District Rules 1081 and 2520-9.3.2] Federally Enforceable Through Title V Permit

CONDITIONS CONTINUE ON NEXT PAGE

31. The source test plan shall identify which basis (ppmv or lb/MMBtu) will be used to demonstrate compliance. [District Rule 4320]
32. The results of each source test shall be submitted to the District within 60 days thereafter. [District Rule 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
33. Permittee shall keep daily records of the sulfur content of the vapor recovery gas, amount of natural gas combusted, and the amount of vapor recovery gas combusted. [District Rules 1070 and 2520, 9.5.1] Federally Enforceable Through Title V Permit
34. Emissions for this unit shall be calculated using the arithmetic mean, pursuant to District Rule 1081 (Amended December 16, 1993), of 3 thirty-minute test runs for NO_x and CO. [District Rules 1081, 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
35. All equipment, facilities, and systems installed or used to achieve compliance with the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003) shall at all times be maintained in good working order and be operated as efficiently as possible so as to minimize air pollutant emissions. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
36. The Regional Administrator shall be notified in writing within (15) days following any failure of air pollution control equipment, process equipment, or of a process to operate in a normal manner which results in an increase in emissions above any allowable emissions limit stated in Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003). This notification shall include a description of the malfunctioning equipment or abnormal operation, the date of the initial failure, the period of time over which emissions were increased due to the failure, the cause of the failure, the estimated resultant emissions in excess of those allowed under Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003), and the methods utilized to restore normal operations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
37. The Regional Administrator, the head of the State Air Pollution Control Agency, the head of the responsible local air pollution control agency, and/or their authorized representatives, upon the presentation of credentials, shall be permitted: A) to enter upon the premises where the source is located or in which any records are required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and B) at reasonable times to have access to and copy any records required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and C) to inspect any equipment, operation, or method required in Federal Permit SJ 80-14 (as amended August 15, 2003); and D) to sample emissions from the source. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
38. In the event of any changes in control or ownership of facilities, Federal Permit SJ 80-14 (as amended August 15, 2003) shall be binding on all subsequent owners and operators. The applicant shall notify the succeeding owner and operator of the existence of Federal Permit SJ 80-14 (as amended August 15, 2003) and its conditions by letter, a copy of which shall be forwarded to the Regional Administrator and the State and local Air Pollution Control Agency. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
39. The provisions of Federal Permit SJ 80-14 (as amended August 15, 2003) are severable, and, if any provision of amended Federal Permit SJ 80-14 is held invalid, the remainder of amended Federal Permit SJ 80-14 shall not be affected thereby. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
40. The owner and operator of the proposed project shall construct and operate the proposed stationary source in compliance with all other applicable provisions of 40 CFR Parts 52, 60, and 61 and all other applicable Federal, State and local regulations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
41. 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 4305, 4306 and 4320] Federally Enforceable Through Title V Permit

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

42. 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 in lieu of the performing the notification and testing required by this condition. [District Rules 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
43. 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 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
44. 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 4305 and 4306] Federally Enforceable Through Title V Permit
45. Compliance demonstration (source testing) shall be by District witnessed, or authorized, sample collection by ARB certified testing laboratory. [District Rule 1081] Federally Enforceable Through Title V Permit
46. The following test methods shall be used: NO_x (ppmv) - EPA Method 7E or ARB Method 100, NO_x (lb/MMBtu) - EPA Method 19, CO (ppmv) - EPA Method 10 or ARB Method 100, stack gas oxygen - EPA Method 3 or 3A or ARB Method 100, stack gas velocities - EPA Method 2, and stack gas moisture content - EPA Method 4. [District Rules 1081, 4305, 4320 and 4351] Federally Enforceable Through Title V Permit
47. Permittee shall maintain daily records of total combined volume of fuel gas and vapor recovery gas burned, the dates of any fuel type switching, the monthly NO_x and CO emissions limit determinations, the sulfur content and higher heat value as determined by periodic analytical testing or fuel supplier invoices/certifications, and permit number(s) of systems providing gas for incineration. [District Rules 2201, 2520 and 4320]
48. Permittee shall maintain records of fuel hhv and cumulative annual fuel use for a period of 5 years and shall make such records readily available for District inspection upon request. [District Rule 4351] Federally Enforceable Through Title V Permit
49. Steam generator may be operated with ring or perforated type burner diffuser plate. Changes between ring or perforated type burner diffuser plates shall be recorded in a contemporaneous log. [District Rule 2520, 6.4.2] Federally Enforceable Through Title V Permit
50. This ATC shall be implemented concurrently or after ATC S-1127-25-29. [District Rule 2201]

DRAFT

San Joaquin Valley
Air Pollution Control District

AUTHORITY TO CONSTRUCT

ISSUANCE DATE: DRAFT
DRAFT

PERMIT NO: S-1127-28-29

LEGAL OWNER OR OPERATOR: CHEVRON USA INC
MAILING ADDRESS: PO BOX 1392
BAKERSFIELD, CA 93302

LOCATION: HEAVY OIL CENTRAL

SECTION: NW09 **TOWNSHIP:** 29S **RANGE:** 28E

EQUIPMENT DESCRIPTION:

MODIFICATION OF 62.5 MMBTU/HR NATURAL GAS/VAPOR RECOVERY GAS-FIRED STEAM GENERATOR (CUSA ID# 43-9, DIS# 43010-75) WITH A NORTH AMERICAN MODEL #GLE-4231 LOW-NOX BURNER AND FLUE GAS RECIRCULATION: LIMIT NOX TO 9 PPM @ 3% O2 (0.011 LB-NOX/MMBTU) OR TO 12 PPMV @ 3% O2 (0.014 LB-NOX/MMBTU) FOR RULE 4320 COMPLIANCE

CONDITIONS

1. { 1830 } 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 NSR Rule] Federally Enforceable Through Title V Permit
2. { 1831 } 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. This Authority to Construct shall be implemented according to the date proposed in the District-approved Rule 4320 Emission Control Plan. [District Rule 4320]
4. All required source testing shall conform to the compliance testing procedures described in District Rule 1081(Last Amended December 16, 1993). [District Rule 1081, and County Rules 108 (Kings), 108.1 (Fresno, Merced, San Joaquin, Tulare, Kern, and Stanislaus), and 110 (Madera)] Federally Enforceable Through Title V Permit
5. Copies of all gas purchase contracts, supplier certifications, and test results to determine compliance with the conditions of this permit shall be maintained. The operator shall record daily amount and type(s) of fuel(s) combusted, fuel source, and all dates on which unit is fired on any noncertified fuel and record specific type of noncertified fuel used. [District Rule 2520, 9.3.2] 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.

Seyed Sadredin, Executive Director APCO

DAVID WARNER, Director of Permit Services

S-1127-28-29 : May 28 2010 12:12PM - GOUGHD : Joint Inspection NOT Required

6. The operator shall maintain all records of required monitoring data and support information for inspection at any time for a period of five years. [District Rule 2520, 9.4.2] Federally Enforceable Through Title V Permit
7. Particulate matter emissions shall not exceed 0.1 grain/dscf, 0.1 grain/dscf calculated to 12% CO₂, nor 10 lb/hr. [District Rules 4201, 3.1 and 4301, 5.1 and 5.2.3] Federally Enforceable Through Title V Permit
8. If the unit is fired on PUC-regulated natural gas, valid purchase contracts, supplier certifications, tariff sheets, or transportation contracts may be used to satisfy the fuel sulfur content analysis, provided they establish the fuel sulfur concentration and higher heating value. [District Rules 2520 and 4320]
9. If the steam generator is not fired on PUC-regulated natural gas, then the sulfur content of the natural gas being fired shall be determined using ASTM D 1072, D 3031, D 4084, D 3246, D 6228, double GC for H₂S and mercaptans, or grab sample analysis by GC-FPD/TCD performed in the laboratory. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
10. When complying with sulfur emission limits by fuel analysis or by a combination of source testing and fuel analysis, each fuel source shall be tested weekly for sulfur content and higher heating value. If compliance with the fuel sulfur content limit and sulfur emission limits has been demonstrated for 8 consecutive weeks for a fuel source, then the fuel testing frequency shall be semi-annually. If a semi-annual fuel content test fails to show compliance, weekly testing shall resume until compliance is demonstrated for 8 consecutive weeks. [District Rule 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
11. If the steam generator is not fired on PUC-regulated natural gas and compliance is achieved through fuel sulfur content limitations, then the sulfur content of the fuel shall be determined by testing sulfur content at a location after all fuel sources are combined prior to incineration, or by performing mass balance calculations based on monitoring the sulfur content and volume of each fuel source. The sulfur content of the fuel shall be determined using the test methods referenced in this permit. [District Rule 4320]
12. If fuel analysis is used to demonstrate compliance with conditions of this permit, the fuel higher heating value for each fuel shall be certified by a third party fuel supplier or determined by ASTM D 1826 or D 1945 in conjunction with ASTM D 3588 for gaseous fuels. [District Rules 2520, 9.3.2; 4305, 6.2.1; 4351, 6.2.1, 4306 and 4320] Federally Enforceable Through Title V Permit
13. Compliance with permit conditions in the Title V permit shall be deemed compliance with the following requirements: SJVUAPCD Rules 4201 (Last Amended December 17, 1992), 4301 (Last Amended December 17, 1992), 4305 sections 4.2, 5.1, 5.5.1, 5.5.2, 6.1.1, 6.2 (except 6.2.3), 6.3.1, 6.3.2, and 8.1 (Last Amended December 17, 1992), and 4351, sections 4.2, 5.2.2, 6.1.1, 6.2, and 8.1 (Last Amended October 19, 1995). A permit shield is granted from these requirements. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
14. The requirements of 40 CFR 72.6(b) and 40 CFR 60.40c do not apply to this source. A permit shield is granted from this requirement. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
15. Emission rates shall not exceed any of the following PM₁₀: 0.014 lb/MMBtu or VOC: 0.003 lb/MMBtu. [District Rules 2201 and 4320] Federally Enforceable Through Title V Permit
16. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when this unit is burning 50% or greater by volume PUC quality gas on a monthly average basis: 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]
17. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when the unit is burning less than 50% by volume PUC quality gas on a monthly average basis: 12 ppmvd NO_x @ 3% O₂ or 0.014 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]
18. The applicable NO_x and CO emissions concentration for each month shall be determined based on the volume and type of fuel combusted in the unit (< 50% by volume PUC quality gas or greater than or equal to 50% by volume PUC quality gas). Permittee shall maintain supporting records that determine the type of fuel combusted. [District Rules 2201 and 4320]
19. PUC quality natural gas is any gaseous fuel where the sulfur content is no more than one-fourth (0.25) grain of hydrogen sulfide per one hundred (100) standard cubic feet, no more than five (5) grains of total sulfur per one hundred (100 standard cubic feet) and at least 80% methane by volume. [District Rule 4320]

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

20. During a shakedown period not to exceed 60 calendar days from initial operation of the modifications authorized by this ATC, NO_x emission rate shall not exceed 15 ppmvd @ 3% O₂ or 0.0182 lb/MMBtu. The shakedown period shall be concluded prior to the applicable Rule 4320 compliance deadline selected for this unit. Permittee shall maintain a record of the date of initial operation and shall make such records readily available for District inspection upon request. [District Rule 4320]
21. The combined sulfur content of all fuels supplied to this steam generator shall not exceed 5 grains S/100 scf. [District Rule 4320]
22. During start-up and shutdown periods, emissions from the natural gas/vapor recovery gas-fired steam generator shall not exceed either of the following limits: 0.1 lb-NO_x/MMBtu or 0.084 lb-CO/MMBtu. [District Rule 4320]
23. Duration of start-up or shutdown shall not exceed two hours each per occurrence. During start-up or shutdown, the emissions control system shall be in operation, and emissions shall be minimized insofar as technologically possible. The operator shall maintain daily records of the duration of start-up and shutdown periods. [District Rule 4320]
24. Start-up is defined as the period of time during which a unit is brought from a shutdown status to its operating temperature and pressure, including the time required by the unit's emission control system to reach full operation. Shutdown is defined as the period of time during which a unit is taken from an operational to a non-operational status by allowing it to cool down from its operating temperature to ambient temperature as the fuel supply to the unit is completely turned off. [District Rule 4320]
25. Vapor recovery gas sulfur analysis and heating value determination shall be conducted by District-witnessed, or approved sample collection by an independent laboratory on an annual basis. [District Rules 1081, 7.2 and 2520, 9.5.1] Federally Enforceable Through Title V Permit
26. If the NO_x and CO concentrations, as measured by the portable analyzer, exceed the allowable emission rate, the permittee shall notify the District and take corrective action within one (1) hour after detection. If the portable analyzer readings continue to exceed the allowable emission rate, the permittee shall conduct an emissions test within 60 days, utilizing District-approved test methods, to demonstrate compliance with the applicable emission limits. [District Rules 4305, 5.4.2.1, 4306, 5.4.2.1, 4320 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
27. A source test to demonstrate compliance with NO_x and CO emission limits shall be performed within 60 days of startup of this unit. The NO_x limit in effect at the time of the startup source testing will be determined based on the volume and type of fuel combusted (greater than or equal to 50% PUC quality or < 50% PUC quality gas) and shall be identified in the source test protocol. Whenever the fuel type is switched from the fuel type combusted during the initial startup of this unit, compliance source testing for NO_x and CO shall be conducted within 90 days of the date the fuel type is switched. [District Rules 2201 and 4320]
28. Source testing is required at least once every twelve (12) months from the initial source test date of each fuel type (greater than or equal to 50% PUC quality gas or < 50% PUC quality gas). After an initial compliance demonstration with the NO_x and CO emission limits for each fuel type on two (2) consecutive source tests, the unit shall be tested not less than once every thirty-six (36) months from the last test date for that fuel type. Testing shall not be required for any fuel type not in use during the 36 month period until such time the fuel type is switched, after which testing shall be performed within 90 days of switching fuel types. [District Rules 2201 and 4320]
29. Compliance source testing after switching fuel types is not required if the unit continues to demonstrate compliance with 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas. In which case, source testing shall only be required every thirty-six (36) months for the less than 50% by PUC quality gas. If the result of a source test demonstrates that the unit does not meet 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas, the source test frequency shall revert to at least one test every 36 months for each fuel type. [District Rules 2201 and 4320]
30. Source testing shall be conducted using the methods and procedures approved by the District. The District must be notified 30 days prior to any compliance source test, and a source test plan must be submitted for approval 15 days prior to testing. [District Rule 1081] Federally Enforceable Through Title V Permit
31. The source test plan shall identify which basis (ppmv or lb/MMBtu) will be used to demonstrate compliance. [District Rule 4320]

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

32. The results of each source test shall be submitted to the District within 60 days thereafter. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
33. Permittee shall keep daily records of the sulfur content of the vapor recovery gas, amount of natural gas combusted, and the amount of vapor recovery gas combusted. [District Rule 1070 and 2520, 9.5.1] Federally Enforceable Through Title V Permit
34. Permittee shall maintain records of duration of each start-up and shutdown for a period of five years and make such records readily available for District inspection upon request. [District Rules 4306, 6.1 and 4320] Federally Enforceable Through Title V Permit
35. Emissions for this unit shall be calculated using the arithmetic mean, pursuant to District Rule 1081 (Amended December 16, 1993), of 3 thirty-minute test runs for NO_x and CO. [District Rules 1081, 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
36. All equipment, facilities, and systems installed or used to achieve compliance with the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003) shall at all times be maintained in good working order and be operated as efficiently as possible so as to minimize air pollutant emissions. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
37. The Regional Administrator shall be notified in writing within (15) days following any failure of air pollution control equipment, process equipment, or of a process to operate in a normal manner which results in an increase in emissions above any allowable emissions limit stated in Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003). This notification shall include a description of the malfunctioning equipment or abnormal operation, the date of the initial failure, the period of time over which emissions were increased due to the failure, the cause of the failure, the estimated resultant emissions in excess of those allowed under Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003), and the methods utilized to restore normal operations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
38. The Regional Administrator, the head of the State Air Pollution Control Agency, the head of the responsible local air pollution control agency, and/or their authorized representatives, upon the presentation of credentials, shall be permitted: A) to enter upon the premises where the source is located or in which any records are required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and B) at reasonable times to have access to and copy any records required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and C) to inspect any equipment, operation, or method required in Federal Permit SJ 80-14 (as amended August 15, 2003); and D) to sample emissions from the source. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
39. In the event of any changes in control or ownership of facilities, Federal Permit SJ 80-14 (as amended August 15, 2003) shall be binding on all subsequent owners and operators. The applicant shall notify the succeeding owner and operator of the existence of Federal Permit SJ 80-14 (as amended August 15, 2003) and its conditions by letter, a copy of which shall be forwarded to the Regional Administrator and the State and local Air Pollution Control Agency. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
40. The provisions of Federal Permit SJ 80-14 (as amended August 15, 2003) are severable, and, if any provision of amended Federal Permit SJ 80-14 is held invalid, the remainder of amended Federal Permit SJ 80-14 shall not be affected thereby. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
41. The owner and operator of the proposed project shall construct and operate the proposed stationary source in compliance with all other applicable provisions of 40 CFR Parts 52, 60, and 61 and all other applicable Federal, State and local regulations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
42. The stack concentration of NO_x (as NO₂), CO, and O₂ shall be measured at least on a monthly basis and when the mode of operation of the FGR system (open or closed) is changed, using District approved portable analyzers, in any calendar month in which the unit operates. [District Rules 2520, 9.3.2, 4305 and 4306] Federally Enforceable Through Title V Permit

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

43. The permittee shall maintain records of the date and time of NO_x, CO, and O₂ measurements, the measured NO₂ and CO concentrations corrected to 3% O₂, and the O₂ concentration. The records shall also include a description of any corrective action taken to maintain the emissions in the acceptable range and shall identify any unit that did not operate at any time during the calendar month. These records shall be retained at the facility for a period of no less than 5 years and shall be made readily available for District inspection upon request. [District Rules 1070, 4305, 5.4.2.1, 4306, 5.4.2.1, 4320, 4351] Federally Enforceable Through Title V Permit
44. Compliance demonstration (source testing) shall be by District witnessed, or authorized, sample collection by ARB certified testing laboratory. [District Rule 1081] Federally Enforceable Through Title V Permit
45. The following test methods shall be used: NO_x (ppmv) - EPA Method 7E or ARB Method 100, NO_x (lb/MMBtu) - EPA Method 19, CO (ppmv) - EPA Method 10 or ARB Method 100, stack gas oxygen - EPA Method 3 or 3A or ARB Method 100, stack gas velocities - EPA Method 2, stack gas moisture content - EPA Method 4. [District Rules 1081, 4305, 6.2, 4306, 6.2, 4320 and 4351] Federally Enforceable Through Title V Permit
46. Permittee shall maintain daily records of total combined volume of fuel gas and vapor recovery gas burned, the dates of any fuel type switching, the monthly NO_x and CO emissions limit determinations, the sulfur content and higher heat value as determined by periodic analytical testing or fuel supplier invoices/certifications, and permit number(s) of systems providing gas for incineration. [District Rules 2201, 2520 and 4320]
47. Permittee shall maintain records of fuel hhv and cumulative annual fuel use for a period of 5 years and shall make such records readily available for District inspection upon request. [District Rule 4351] Federally Enforceable Through Title V Permit
48. This ATC shall be implemented concurrently or after ATC S-1127-28-30. [District Rule 2201]

DRAFT

San Joaquin Valley
Air Pollution Control District

AUTHORITY TO CONSTRUCT

ISSUANCE DATE: DRAFT
DRAFT

PERMIT NO: S-1127-29-25

LEGAL OWNER OR OPERATOR: CHEVRON USA INC
MAILING ADDRESS: PO BOX 1392
BAKERSFIELD, CA 93302

LOCATION: HEAVY OIL CENTRAL

SECTION: NW09 **TOWNSHIP:** 29S **RANGE:** 28E

EQUIPMENT DESCRIPTION:

MODIFICATION OF 62.5 MMBTU/HR STRUTHERS NATURAL GAS/VAPOR RECOVERY GAS-FIRED STEAM GENERATOR (CUSA ID #44-9, DIS #43007-75) WITH FLUE GAS RECIRCULATION AND WITH A NORTH AMERICAN MODEL GLE LOW NOX BURNER: LIMIT NOX TO 9 PPM @ 3% O2 (0.011 LB-NOX/MMBTU) OR TO 12 PPMV @ 3% O2 (0.014 LB-NOX/MMBTU) FOR RULE 4320 COMPLIANCE

CONDITIONS

1. {1830} 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 NSR Rule] Federally Enforceable Through Title V Permit
2. {1831} 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. This Authority to Construct shall be implemented according to the date proposed in the District-approved Rule 4320 Emission Control Plan. [District Rule 4320]
4. {98} No air contaminant shall be released into the atmosphere which causes a public nuisance. [District Rule 4102]
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
6. Flue gas recirculation shall be utilized, as needed, in conjunction with low-NOx burner to maintain ongoing compliance with permitted emission limits. [District NSR Rule]

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.

Seyed Sadredin, Executive Director, APCO

DAVID WARNER, Director of Permit Services

S-1127-29-25 : May 28 2010 12:12PM - GOUGHD : Joint Inspection NOT Required

7. All required source testing shall conform to the compliance testing procedures described in District Rule 1081. [District Rule 1081] Federally Enforceable Through Title V Permit
8. Particulate matter emissions shall not exceed 0.1 grain/dscf, 0.1 grain/dscf calculated to 12% CO₂, nor 10 lb/hr. [District Rules 4201, 3.1 and 4301, 5.1 and 5.2.3] Federally Enforceable Through Title V Permit
9. If the unit is fired on PUC-regulated natural gas, valid purchase contracts, supplier certifications, tariff sheets, or transportation contracts may be used to satisfy the fuel sulfur content analysis, provided they establish the fuel sulfur concentration and higher heating value. [District Rules 2520 and 4320]
10. If the steam generator is not fired on PUC-regulated natural gas, then the sulfur content of the natural gas being fired shall be determined using ASTM D 1072, D 3031, D 4084, D 3246, D 6228, double GC for H₂S and mercaptans, or grab sample analysis by GC-FPD/TCD performed in the laboratory. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
11. If the steam generator is not fired on PUC-regulated natural gas, the sulfur content of each fuel source shall be tested weekly except that if compliance with the fuel sulfur content limit has been demonstrated for 8 consecutive weeks for a fuel source, then the testing frequency shall be quarterly. If a test shows noncompliance with the sulfur content requirement, the source must return to weekly testing until eight consecutive weeks show compliance. [District Rule 2520, 9.3.2] Federally Enforceable Through Title V Permit
12. If the steam generator is not fired on PUC-regulated natural gas and compliance is achieved through fuel sulfur content limitations, then the sulfur content of the fuel shall be determined by testing sulfur content at a location after all fuel sources are combined prior to incineration, or by performing mass balance calculations based on monitoring the sulfur content and volume of each fuel source. The sulfur content of the fuel shall be determined using the test methods referenced in this permit. [District Rule 4320]
13. Compliance with permit conditions in the Title V permit shall be deemed compliance with the requirements of County Rules 108 (Kings), 108.1 (Fresno, Merced, San Joaquin, Tulare, Kern, and Stanislaus), and 110 (Madera), 402 (Madera), 404 (Fresno, Kern, Tulare, Kings, Stanislaus, Merced, and San Joaquin), 405 (Madera), 408 (Fresno, Kern, Tulare, Kings, Stanislaus, Merced, and San Joaquin), 407.2 (Kern, Tulare, Kings, Stanislaus, and San Joaquin), and 408.2 (Merced). A permit shield is granted from these requirements. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
14. Compliance with permit conditions in the Title V permit shall be deemed compliance with the following requirements: SJVUAPCD Rules 4201 (Last Amended December 17, 1992), 4301 (Last Amended December 17, 1992), 4305 sections 4.2, 5.1, 5.5.1, 5.5.2, 6.1.1, 6.2 (except 6.2.3), 6.3.1, 6.3.2, and 8.1 (Last Amended December 17, 1992), and 4351, sections 4.2, 5.2.2, 6.1.1, 6.2, and 8.1 (Last Amended October 19, 1995). A permit shield is granted from these requirements. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
15. The requirements of 40 CFR 72.6(b) and 40 CFR 60.40c do not apply to this source. A permit shield is granted from this requirement. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
16. Duration of start-up or shutdown shall not exceed two hours each per occurrence. During start-up or shutdown, the emissions control system shall be in operation, and emissions shall be minimized insofar as technologically possible. The operator shall maintain daily records of the duration of start-up and shutdown periods. [District Rules 4305, 5.5.6, 4306, 5.3, and 4320] Federally Enforceable Through Title V Permit
17. Start-up is defined as the period of time during which a unit is brought from a shutdown status to its operating temperature and pressure, including the time required by the unit's emission control system to reach full operation. Shutdown is defined as the period of time during which a unit is taken from an operational to a non-operational status by allowing it to cool down from its operating temperature to ambient temperature as the fuel supply to the unit is completely turned off. [District Rules 4306, 3.25 and 3.22, and 4320] Federally Enforceable Through Title V Permit
18. Emissions from the natural gas/vapor recovery gas-fired steam generator shall not exceed any of the following limits: 0.014 lb-PM₁₀/MMBtu or 0.003 lb-VOC/MMBtu. [District Rules 2201 and 4320] Federally Enforceable Through Title V Permit
19. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when this unit is burning 50% or greater by volume PUC quality gas on a monthly average basis: 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 29 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]

CONDITIONS CONTINUE ON NEXT PAGE

20. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when the unit is burning less than 50% by volume PUC quality gas on a monthly average basis: 12 ppmvd NO_x @ 3% O₂ or 0.014 lb-NO_x/MMBtu and 29 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]
21. The applicable NO_x and CO emissions concentration for each month shall be determined based on the volume and type of fuel combusted in the unit (< 50% by volume PUC quality gas or greater than or equal to 50% by volume PUC quality gas). Permittee shall maintain supporting records that determine the type of fuel combusted. [District Rules 2201 and 4320]
22. PUC quality natural gas is any gaseous fuel where the sulfur content is no more than one-fourth (0.25) grain of hydrogen sulfide per one hundred (100) standard cubic feet, no more than five (5) grains of total sulfur per one hundred (100 standard cubic feet) and at least 80% methane by volume. [District Rule 4320]
23. During a shakedown period not to exceed 60 calendar days from initial operation of the modifications authorized by this ATC, NO_x emission rate shall not exceed 15 ppmvd @ 3% O₂ or 0.0182 lb/MMBtu. The shakedown period shall be concluded prior to the applicable Rule 4320 compliance deadline selected for this unit. Permittee shall maintain a record of the date of initial operation and shall make such records readily available for District inspection upon request. [District Rule 4320]
24. During start-up and shutdown periods, emissions from the natural gas/vapor recovery gas-fired steam generator shall not exceed either of the following limits: 0.1 lb-NO_x/MMBtu or 0.084 lb-CO/MMBtu. [District Rule 2201] Federally Enforceable Through Title V Permit
25. Emissions from the natural gas/vapor recovery gas-fired steam generator shall not exceed either of the following limits: 54.0 lb-NO_x/day or 31.5 lb-CO/day. [District Rule 2201] Federally Enforceable Through Title V Permit
26. The combined sulfur content of all fuels supplied to this steam generator shall not exceed 5 grains S/100 scf. [District Rule 4320]
27. The following test methods shall be used: NO_x (ppmv) - EPA Method 7E or ARB Method 100, NO_x (lb/MMBtu) - EPA Method 19, CO (ppmv) - EPA Method 10 or ARB Method 100, stack gas oxygen - EPA Method 3 or 3A or ARB Method 100, stack gas moisture content - EPA Method 4, and stack gas velocities - EPA Method 2. [District Rules 1081, 4305, 4306, 6.2, 4320 and 4351] Federally Enforceable Through Title V Permit
28. Whenever the flue gas recirculation (FGR) system on this unit is switched from the open to the closed position, or from the closed to the open position, compliance source testing for NO_x and CO emissions shall be conducted within 60 days of change of FGR operation date unless source testing with FGR system in both the open and closed position has occurred within the previous 12 months. [District Rule 1070]
29. 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 4305, 5.5.2, 4306, 5.5.2 and 4320] Federally Enforceable Through Title V Permit
30. A source test to demonstrate compliance with NO_x and CO emission limits shall be performed within 60 days of startup of this unit. The NO_x limit in effect at the time of the startup source testing will be determined based on the volume and type of fuel combusted (greater than or equal to 50% PUC quality or < 50% PUC quality gas) and shall be identified in the source test protocol. Whenever the fuel type is switched from the fuel type combusted during the initial startup of this unit, compliance source testing for NO_x and CO shall be conducted within 90 days of the date the fuel type is switched. [District Rules 2201 and 4320]
31. Source testing is required at least once every twelve (12) months from the initial source test date of each fuel type (greater than or equal to 50% PUC quality gas or < 50% PUC quality gas). After an initial compliance demonstration with the NO_x and CO emission limits for each fuel type on two (2) consecutive source tests, the unit shall be tested not less than once every thirty-six (36) months from the last test date for that fuel type. Testing shall not be required for any fuel type not in use during the 36 month period until such time the fuel type is switched, after which testing shall be performed within 90 days of switching fuel types. [District Rules 2201 and 4320]

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

32. Compliance source testing after switching fuel types is not required if the unit continues to demonstrate compliance with 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 29 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas. In which case, source testing shall only be required every thirty-six(36) months for the less than 50% by PUC quality gas. If the result of a source test demonstrates that the unit does not meet 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 29 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas, the source test frequency shall revert to at least one test every 36 months for each fuel type. [District Rules 2201 and 4320]
33. Source testing shall be conducted using the methods and procedures approved by the District. The District must be notified 30 days prior to any compliance source test, and a source test plan must be submitted for approval 15 days prior to testing. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
34. The results of each source test shall be submitted to the District within 60 days thereafter. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
35. 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, 2520, 9.3.2, 4305, 5.5.5, 4306, 5.5.5 and 4320] Federally Enforceable Through Title V Permit
36. All equipment, facilities, and systems installed or used to achieve compliance with the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003) shall at all times be maintained in good working order and be operated as efficiently as possible so as to minimize air pollutant emissions. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
37. The Regional Administrator shall be notified in writing within (15) days following any failure of air pollution control equipment, process equipment, or of a process to operate in a normal manner which results in an increase in emissions above any allowable emissions limit stated in Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003). This notification shall include a description of the malfunctioning equipment or abnormal operation, the date of the initial failure, the period of time over which emissions were increased due to the failure, the cause of the failure, the estimated resultant emissions in excess of those allowed under Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003), and the methods utilized to restore normal operations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
38. The Regional Administrator, the head of the State Air Pollution Control Agency, the head of the responsible local air pollution control agency, and/or their authorized representatives, upon the presentation of credentials, shall be permitted: A) to enter upon the premises where the source is located or in which any records are required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and B) at reasonable times to have access to and copy any records required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and C) to inspect any equipment, operation, or method required in Federal Permit SJ 80-14 (as amended August 15, 2003); and D) to sample emissions from the source. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
39. In the event of any changes in control or ownership of facilities, Federal Permit SJ 80-14 (as amended August 15, 2003) shall be binding on all subsequent owners and operators. The applicant shall notify the succeeding owner and operator of the existence of Federal Permit SJ 80-14 (as amended August 15, 2003) and its conditions by letter, a copy of which shall be forwarded to the Regional Administrator and the State and local Air Pollution Control Agency. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
40. The provisions of Federal Permit SJ 80-14 (as amended August 15, 2003) are severable, and, if any provision of amended Federal Permit SJ 80-14 is held invalid, the remainder of amended Federal Permit SJ 80-14 shall not be affected thereby. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
41. The owner and operator of the proposed project shall construct and operate the proposed stationary source in compliance with all other applicable provisions of 40 CFR Parts 52, 60, and 61 and all other applicable Federal, State and local regulations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

42. 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 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
43. 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 in lieu of the performing the notification and testing required by this condition. [District Rules 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
44. 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 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
45. 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 4305 and 4306] Federally Enforceable Through Title V Permit
46. Source sampling to determine the compliance status of an emissions source shall be witnessed or authorized by District personnel. [District Rule 1081] Federally Enforceable Through Title V Permit
47. Copies of all gas purchase contracts, supplier certifications, and test results to determine compliance with the conditions of this permit shall be maintained. The operator shall record daily amount and type(s) of fuel(s) combusted, fuel source, and all dates on which unit is fired on any noncertified fuel and record specific type of noncertified fuel used. [District Rule 2520, 9.3.2] Federally Enforceable Through Title V Permit
48. Permittee shall maintain daily records of total combined volume of fuel gas and vapor recovery gas burned, the dates of any fuel type switching, the monthly NO_x and CO emissions limit determinations, the sulfur content and higher heat value as determined by periodic analytical testing or fuel supplier invoices/certifications, and permit number(s) of systems providing gas for incineration. [District Rules 2201, 2520 and 4320]
49. All records shall be maintained and retained on-site for a minimum of five (5) years, and shall be made available for District inspection upon request. [District Rules 1070, 4305, 6.1, 4306, 6.1 and 4320] Federally Enforceable Through Title V Permit
50. This ATC shall be implemented concurrently or after ATC S-1127-29-26. [District Rule 2201]

DRAFT

San Joaquin Valley
Air Pollution Control District

AUTHORITY TO CONSTRUCT

ISSUANCE DATE: DRAFT
DRAFT

PERMIT NO: S-1127-30-26

LEGAL OWNER OR OPERATOR: CHEVRON USA INC
MAILING ADDRESS: PO BOX 1392
BAKERSFIELD, CA 93302

LOCATION: HEAVY OIL CENTRAL

SECTION: 9 TOWNSHIP: 29S RANGE: 28E

EQUIPMENT DESCRIPTION:

MODIFICATION OF 62.5 MMBTU/HR STRUTHERS NATURAL GAS/VAPOR RECOVERY GAS-FIRED STEAM GENERATOR (CUSA ID #45-9, DIS #43008-75) WITH FLUE GAS RECIRCULATION AND WITH A NORTH AMERICAN MODEL GLE LOW NOX BURNER: LIMIT NOX TO 9 PPM @ 3% O2 (0.011 LB-NOX/MMBTU) OR TO 12 PPMV @ 3% O2 (0.014 LB-NOX/MMBTU) FOR RULE 4320 COMPLIANCE

CONDITIONS

1. {1830} 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 NSR Rule] Federally Enforceable Through Title V Permit
2. {1831} 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. This Authority to Construct shall be implemented according to the date proposed in the District-approved Rule 4320 Emission Control Plan. [District Rule 4320]
4. {98} No air contaminant shall be released into the atmosphere which causes a public nuisance. [District Rule 4102]
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
6. Flue gas recirculation shall be utilized, as needed, in conjunction with low-NOx burner to maintain ongoing compliance with permitted emission limits. [District NSR Rule]

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.

Seyed Sadredin, Executive Director APCO

DRAFT

DAVID WARNER, Director of Permit Services
S-1127-30-26 : May 28 2010 12:12PM - GOUGHD : Joint Inspection NOT Required

7. All required source testing shall conform to the compliance testing procedures described in District Rule 1081. [District Rule 1081] Federally Enforceable Through Title V Permit
8. Particulate matter emissions shall not exceed 0.1 grain/dscf, 0.1 grain/dscf calculated to 12% CO₂, nor 10 lb/hr. [District Rules 4201, 3.1 and 4301, 5.1 and 5.2.3] Federally Enforceable Through Title V Permit
9. If the steam generator is fired on PUC-regulated natural gas, then the permittee shall maintain on file copies of all natural gas bills or fuel throughput records for a period of five years. [District Rule 2520, 9.3.2] Federally Enforceable Through Title V Permit
10. If the unit is fired on PUC-regulated natural gas, valid purchase contracts, supplier certifications, tariff sheets, or transportation contracts may be used to satisfy the fuel sulfur content analysis, provided they establish the fuel sulfur concentration and higher heating value. [District Rules 2520 and 4320]
11. If the steam generator is not fired on PUC-regulated natural gas, then the sulfur content of the natural gas being fired shall be determined using ASTM D 1072, D 3031, D 4084, D 3246, D 6228, double GC for H₂S and mercaptans, or grab sample analysis by GC-FPD/TCD performed in the laboratory. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
12. If the steam generator is not fired on PUC-regulated natural gas, the sulfur content of each fuel source shall be tested weekly except that if compliance with the fuel sulfur content limit has been demonstrated for 8 consecutive weeks for a fuel source, then the testing frequency shall be quarterly. If a test shows noncompliance with the sulfur content requirement, the source must return to weekly testing until eight consecutive weeks show compliance. [District Rule 2520, 9.3.2] Federally Enforceable Through Title V Permit
13. If the steam generator is not fired on PUC-regulated natural gas and compliance is achieved through fuel sulfur content limitations, then the sulfur content of the fuel shall be determined by testing sulfur content at a location after all fuel sources are combined prior to incineration, or by performing mass balance calculations based on monitoring the sulfur content and volume of each fuel source. The sulfur content of the fuel shall be determined using the test methods referenced in this permit. [District Rule 4320]
14. Compliance with permit conditions in the Title V permit shall be deemed compliance with the requirements of County Rules 108 (Kings), 108.1 (Fresno, Merced, San Joaquin, Tulare, Kern, and Stanislaus), and 110 (Madera), 402 (Madera), 404 (Fresno, Kern, Tulare, Kings, Stanislaus, Merced, and San Joaquin), 405 (Madera), 408 (Fresno, Kern, Tulare, Kings, Stanislaus, Merced, and San Joaquin), 407.2 (Kern, Tulare, Kings, Stanislaus, and San Joaquin), and 408.2 (Merced). A permit shield is granted from these requirements. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
15. Compliance with permit conditions in the Title V permit shall be deemed compliance with the following requirements: SJVUAPCD Rules 4201 (Last Amended December 17, 1992), 4301 (Last Amended December 17, 1992), 4305 sections 4.2, 5.1, 5.5.1, 5.5.2, 6.1.1, 6.2 (except 6.2.3), 6.3.1, 6.3.2, and 8.1 (Last Amended December 17, 1992), and 4351, sections 4.2, 5.2.2, 6.1.1, 6.2, and 8.1 (Last Amended October 19, 1995). A permit shield is granted from these requirements. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
16. The requirements of 40 CFR 72.6(b) and 40 CFR 60.40c do not apply to this source. A permit shield is granted from this requirement. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
17. Duration of start-up or shutdown shall not exceed two hours each per occurrence. During start-up or shutdown, the emissions control system shall be in operation, and emissions shall be minimized insofar as technologically possible. The operator shall maintain daily records of the duration of start-up and shutdown periods. [District Rules 4305, 5.5.6, 4306, 5.3, and 4320] Federally Enforceable Through Title V Permit
18. Start-up is defined as the period of time during which a unit is brought from a shutdown status to its operating temperature and pressure, including the time required by the unit's emission control system to reach full operation. Shutdown is defined as the period of time during which a unit is taken from an operational to a non-operational status by allowing it to cool down from its operating temperature to ambient temperature as the fuel supply to the unit is completely turned off. [District Rule 4306, 3.25 and 3.22] Federally Enforceable Through Title V Permit
19. Emissions from the natural gas/vapor recovery gas-fired steam generator shall not exceed any of the following limits: 0.014 lb-PM₁₀/MMBtu or 0.003 lb-VOC/MMBtu. [District Rules 2201 and 4320] Federally Enforceable Through Title V Permit

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

20. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when this unit is burning 50% or greater by volume PUC quality gas on a monthly average basis: 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 29 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]
21. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when the unit is burning less than 50% by volume PUC quality gas on a monthly average basis: 12 ppmvd NO_x @ 3% O₂ or 0.014 lb-NO_x/MMBtu and 29 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]
22. The applicable NO_x and CO emissions concentration for each month shall be determined based on the volume and type of fuel combusted in the unit (< 50% by volume PUC quality gas or greater than or equal to 50% by volume PUC quality gas). Permittee shall maintain supporting records that determine the type of fuel combusted. [District Rules 2201 and 4320]
23. PUC quality natural gas is any gaseous fuel where the sulfur content is no more than one-fourth (0.25) grain of hydrogen sulfide per one hundred (100) standard cubic feet, no more than five (5) grains of total sulfur per one hundred (100 standard cubic feet) and at least 80% methane by volume. [District Rule 4320]
24. During a shakedown period not to exceed 60 calendar days from initial operation of the modifications authorized by this ATC, NO_x emission rate shall not exceed 15 ppmvd @ 3% O₂ or 0.0182 lb/MMBtu. The shakedown period shall be concluded prior to the applicable Rule 4320 compliance deadline selected for this unit. Permittee shall maintain a record of the date of initial operation and shall make such records readily available for District inspection upon request. [District Rule 4320]
25. During start-up and shutdown periods, emissions from the natural gas/vapor recovery gas-fired steam generator shall not exceed either of the following limits: 0.1 lb-NO_x/MMBtu or 0.084 lb-CO/MMBtu. [District Rule 2201] Federally Enforceable Through Title V Permit
26. Emissions from the natural gas/vapor recovery gas-fired steam generator shall not exceed either of the following limits: 54.0 lb-NO_x/day or 31.5 lb-CO/day. [District Rule 2201] Federally Enforceable Through Title V Permit
27. The combined sulfur content of all fuels supplied to this steam generator shall not exceed 5 grains S/100 scf. [District Rule 4320]
28. The following test methods shall be used: NO_x (ppmv) - EPA Method 7E or ARB Method 100, NO_x (lb/MMBtu) - EPA Method 19, CO (ppmv) - EPA Method 10 or ARB Method 100, stack gas oxygen - EPA Method 3 or 3A or ARB Method 100, stack gas moisture content - EPA Method 4, and stack gas velocities - EPA Method 2. [District Rules 1081, 4305, 4306, 6.2, 4320, and 4351] Federally Enforceable Through Title V Permit
29. Whenever the flue gas recirculation (FGR) system on this unit is switched from the open to the closed position, or from the closed to the open position, compliance source testing for NO_x and CO emissions shall be conducted within 60 days of change of FGR operation date unless source testing with FGR system in both the open and closed position has occurred within the previous 12 months. [District Rule 1070]
30. A source test to demonstrate compliance with NO_x and CO emission limits shall be performed within 60 days of startup of this unit. The NO_x limit in effect at the time of the startup source testing will be determined based on the volume and type of fuel combusted (greater than or equal to 50% PUC quality or < 50% PUC quality gas) and shall be identified in the source test protocol. Whenever the fuel type is switched from the fuel type combusted during the initial startup of this unit, compliance source testing for NO_x and CO shall be conducted within 90 days of the date the fuel type is switched. [District Rules 2201 and 4320]
31. Source testing is required at least once every twelve (12) months from the initial source test date of each fuel type (greater than or equal to 50% PUC quality gas or < 50% PUC quality gas). After an initial compliance demonstration with the NO_x and CO emission limits for each fuel type on two (2) consecutive source tests, the unit shall be tested not less than once every thirty-six (36) months from the last test date for that fuel type. Testing shall not be required for any fuel type not in use during the 36 month period until such time the fuel type is switched, after which testing shall be performed within 90 days of switching fuel types. [District Rules 2201 and 4320]

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

32. Compliance source testing after switching fuel types is not required if the unit continues to demonstrate compliance with 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 29 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas. In which case, source testing shall only be required every thirty-six(36) months for the less than 50% by PUC quality gas. If the result of a source test demonstrates that the unit does not meet 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 29 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas, the source test frequency shall revert to at least one test every 36 months for each fuel type. [District Rules 2201 and 4320]
33. 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 4305, 5.5.2, 4306, 5.5.2 and 4320] Federally Enforceable Through Title V Permit
34. Source testing shall be conducted using the methods and procedures approved by the District. The District must be notified 30 days prior to any compliance source test, and a source test plan must be submitted for approval 15 days prior to testing. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
35. The results of each source test shall be submitted to the District within 60 days thereafter. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
36. 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, 2520, 9.3.2, 4305, 5.5.5, 4306, 5.5.5 and 4320] Federally Enforceable Through Title V Permit
37. All equipment, facilities, and systems installed or used to achieve compliance with the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003) shall at all times be maintained in good working order and be operated as efficiently as possible so as to minimize air pollutant emissions. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
38. The Regional Administrator shall be notified in writing within (15) days following any failure of air pollution control equipment, process equipment, or of a process to operate in a normal manner which results in an increase in emissions above any allowable emissions limit stated in Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003). This notification shall include a description of the malfunctioning equipment or abnormal operation, the date of the initial failure, the period of time over which emissions were increased due to the failure, the cause of the failure, the estimated resultant emissions in excess of those allowed under Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003), and the methods utilized to restore normal operations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
39. The Regional Administrator, the head of the State Air Pollution Control Agency, the head of the responsible local air pollution control agency, and/or their authorized representatives, upon the presentation of credentials, shall be permitted: A) to enter upon the premises where the source is located or in which any records are required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and B) at reasonable times to have access to and copy any records required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and C) to inspect any equipment, operation, or method required in Federal Permit SJ 80-14 (as amended August 15, 2003); and D) to sample emissions from the source. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
40. In the event of any changes in control or ownership of facilities, Federal Permit SJ 80-14 (as amended August 15, 2003) shall be binding on all subsequent owners and operators. The applicant shall notify the succeeding owner and operator of the existence of Federal Permit SJ 80-14 (as amended August 15, 2003) and its conditions by letter, a copy of which shall be forwarded to the Regional Administrator and the State and local Air Pollution Control Agency. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
41. The provisions of Federal Permit SJ 80-14 (as amended August 15, 2003) are severable, and, if any provision of amended Federal Permit SJ 80-14 is held invalid, the remainder of amended Federal Permit SJ 80-14 shall not be affected thereby. [PSD SJ 80-14] Federally Enforceable Through Title V Permit

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

42. The owner and operator of the proposed project shall construct and operate the proposed stationary source in compliance with all other applicable provisions of 40 CFR Parts 52, 60, and 61 and all other applicable Federal, State and local regulations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
43. 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 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
44. 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 in lieu of the performing the notification and testing required by this condition. [District Rules 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
45. 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 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
46. 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 4305 and 4306] Federally Enforceable Through Title V Permit
47. Source sampling to determine the compliance status of an emissions source shall be witnessed or authorized by District personnel. [District Rule 1081] Federally Enforceable Through Title V Permit
48. Copies of all gas purchase contracts, supplier certifications, and test results to determine compliance with the conditions of this permit shall be maintained. The operator shall record daily amount and type(s) of fuel(s) combusted, fuel source, and all dates on which unit is fired on any noncertified fuel and record specific type of noncertified fuel used. [District Rule 2520, 9.3.2] Federally Enforceable Through Title V Permit
49. Permittee shall maintain daily records of total combined volume of fuel gas and vapor recovery gas burned, the dates of any fuel type switching, the monthly NO_x and CO emissions limit determinations, the sulfur content and higher heat value as determined by periodic analytical testing or fuel supplier invoices/certifications, and permit number(s) of systems providing gas for incineration. [District Rules 2201, 2520 and 4320]
50. All records shall be maintained and retained on-site for a minimum of five (5) years, and shall be made available for District inspection upon request. [District Rules 1070, 4305, 6.1, 4306, 6.1 and 4320] Federally Enforceable Through Title V Permit
51. This ATC shall be implemented concurrently or after ATC S-1127-30-27. [District Rule 2201]

DRAFT

San Joaquin Valley
Air Pollution Control District

AUTHORITY TO CONSTRUCT

ISSUANCE DATE: DRAFT
DRAFT

PERMIT NO: S-1127-31-26

LEGAL OWNER OR OPERATOR: CHEVRON USA INC
MAILING ADDRESS: PO BOX 1392
BAKERSFIELD, CA 93302

LOCATION: HEAVY OIL CENTRAL

SECTION: 9 **TOWNSHIP:** 29S **RANGE:** 28E

EQUIPMENT DESCRIPTION:

MODIFICATION OF 62.5 MMBTU/HR STRUTHERS NATURAL GAS/VAPOR RECOVERY GAS-FIRED STEAM GENERATOR (CUSA ID #46-9, DIS #43009-75) WITH FLUE GAS RECIRCULATION AND WITH A NORTH AMERICAN MODEL GLE MAGNA FLAME LOW NOX BURNER: LIMIT NOX TO 9 PPM @ 3% O2 (0.011 LB-NOX/MMBTU) OR TO 12 PPMV @ 3% O2 (0.014 LB-NOX/MMBTU) FOR RULE 4320 COMPLIANCE

CONDITIONS

1. {1830} 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 NSR Rule] Federally Enforceable Through Title V Permit
2. {1831} 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. This Authority to Construct shall be implemented according to the date proposed in the District-approved Rule 4320 Emission Control Plan. [District Rule 4320]
4. {98} No air contaminant shall be released into the atmosphere which causes a public nuisance. [District Rule 4102]
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
6. {2417} Sulfur compound emissions shall not exceed 0.2% by volume, 2000 ppmv, on a dry basis averaged over 15 consecutive minutes. [County Rules 404 (Madera), 406 (Fresno), and 407 (Kings, Merced, San Joaquin, Tulare, Kern, and Stanislaus)] 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.

Seyed Sadredin, Executive Director, APCO

DRAFT

DAVID WARNER, Director of Permit Services

S-1127-31-26 : May 28 2010 12:12PM - GOUGHD : Joint Inspection NOT Required

7. All required source testing shall conform to the compliance testing procedures described in District Rule 1081. [District Rule 1081] Federally Enforceable Through Title V Permit
8. Particulate matter emissions shall not exceed 0.1 grain/dscf, 0.1 grain/dscf calculated to 12% CO₂, nor 10 lb/hr. [District Rules 4201, 3.1 and 4301, 5.1 and 5.2.3] Federally Enforceable Through Title V Permit
9. If the steam generator is fired on PUC-regulated natural gas, then the permittee shall maintain on file copies of all natural gas bills or fuel throughput records for a period of five years. [District Rule 2520, 9.3.2] Federally Enforceable Through Title V Permit
10. If the unit is fired on PUC-regulated natural gas, valid purchase contracts, supplier certifications, tariff sheets, or transportation contracts may be used to satisfy the fuel sulfur content analysis, provided they establish the fuel sulfur concentration and higher heating value. [District Rules 2520 and 4320]
11. If the steam generator is not fired on PUC-regulated natural gas, then the sulfur content of the natural gas being fired shall be determined using ASTM D 1072, D 3031, D 4084, D 3246, D 6228, double GC for H₂S and mercaptans, or grab sample analysis by GC-FPD/TCD performed in the laboratory. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
12. If the steam generator is not fired on PUC-regulated natural gas, the sulfur content of each fuel source shall be tested weekly except that if compliance with the fuel sulfur content limit has been demonstrated for 8 consecutive weeks for a fuel source, then the testing frequency shall be quarterly. If a test shows noncompliance with the sulfur content requirement, the source must return to weekly testing until eight consecutive weeks show compliance. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
13. If the steam generator is not fired on PUC-regulated natural gas and compliance is achieved through fuel sulfur content limitations, then the sulfur content of the fuel shall be determined by testing sulfur content at a location after all fuel sources are combined prior to incineration, or by performing mass balance calculations based on monitoring the sulfur content and volume of each fuel source. The sulfur content of the fuel shall be determined using the test methods referenced in this permit. [District Rule 4320]
14. Compliance with permit conditions in the Title V permit shall be deemed compliance with the requirements of County Rules 108 (Kings), 108.1 (Fresno, Merced, San Joaquin, Tulare, Kern, and Stanislaus), and 110 (Madera), 402 (Madera), 404 (Fresno, Kern, Tulare, Kings, Stanislaus, Merced, and San Joaquin), 405 (Madera), 408 (Fresno, Kern, Tulare, Kings, Stanislaus, Merced, and San Joaquin), 407.2 (Kern, Tulare, Kings, Stanislaus, and San Joaquin), and 408.2 (Merced). A permit shield is granted from these requirements. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
15. Compliance with permit conditions in the Title V permit shall be deemed compliance with the following requirements: SJVUAPCD Rules 4201 (Last Amended December 17, 1992), 4301 (Last Amended December 17, 1992), 4305 sections 4.2, 5.1, 5.5.1, 5.5.2, 6.1.1, 6.2 (except 6.2.3), 6.3.1, 6.3.2, and 8.1 (Last Amended December 17, 1992), and 4351, sections 4.2, 5.2.2, 6.1.1, 6.2, and 8.1 (Last Amended October 19, 1995). A permit shield is granted from these requirements. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
16. The requirements of 40 CFR 72.6(b) and 40 CFR 60.40c do not apply to this source. A permit shield is granted from this requirement. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
17. Duration of start-up or shutdown shall not exceed two hours each per occurrence. During start-up or shutdown, the emissions control system shall be in operation, and emissions shall be minimized insofar as technologically possible. The operator shall maintain daily records of the duration of start-up and shutdown periods. [District Rules 4305, 5.5.6, 4306, 5.3, and 4320] Federally Enforceable Through Title V Permit
18. Start-up is defined as the period of time during which a unit is brought from a shutdown status to its operating temperature and pressure, including the time required by the unit's emission control system to reach full operation. Shutdown is defined as the period of time during which a unit is taken from an operational to a non-operational status by allowing it to cool down from its operating temperature to ambient temperature as the fuel supply to the unit is completely turned off. [District Rules 4306, 3.25 and 3.22, and 4320] Federally Enforceable Through Title V Permit
19. Emissions from the natural gas/vapor recovery gas-fired steam generator shall not exceed any of the following limits: 0.014 lb-PM₁₀/MMBtu, or 0.003 lb-VOC/MMBtu. [District Rules 2201 and 4320] Federally Enforceable Through Title V Permit

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

20. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when this unit is burning 50% or greater by volume PUC quality gas on a monthly average basis: 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 29 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]
21. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when the unit is burning less than 50% by volume PUC quality gas on a monthly average basis: 12 ppmvd NO_x @ 3% O₂ or 0.014 lb-NO_x/MMBtu and 29 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]
22. The applicable NO_x and CO emissions concentration for each month shall be determined based on the volume and type of fuel combusted in the unit (< 50% by volume PUC quality gas or greater than or equal to 50% by volume PUC quality gas). Permittee shall maintain supporting records that determine the type of fuel combusted. [District Rules 2201 and 4320]
23. PUC quality natural gas is any gaseous fuel where the sulfur content is no more than one-fourth (0.25) grain of hydrogen sulfide per one hundred (100) standard cubic feet, no more than five (5) grains of total sulfur per one hundred (100) standard cubic feet and at least 80% methane by volume. [District Rule 4320]
24. During a shakedown period not to exceed 60 calendar days from initial operation of the modifications authorized by this ATC, NO_x emission rate shall not exceed 15 ppmvd @ 3% O₂ or 0.0182 lb/MMBtu. The shakedown period shall be concluded prior to the applicable Rule 4320 compliance deadline selected for this unit. Permittee shall maintain a record of the date of initial operation and shall make such records readily available for District inspection upon request. [District Rule 4320]
25. During start-up and shutdown periods, emissions from the natural gas/vapor recovery gas-fired steam generator shall not exceed either of the following limits: 0.1 lb-NO_x/MMBtu or 0.084 lb-CO/MMBtu. [District Rule 2201] Federally Enforceable Through Title V Permit
26. Emissions from the natural gas/vapor recovery gas-fired steam generator shall not exceed either of the following limits: 54.0 lb-NO_x/day or 31.5 lb-CO/day. [District Rule 2201] Federally Enforceable Through Title V Permit
27. The combined sulfur content of all fuels supplied to this steam generator shall not exceed 5 grains S/100 scf. [District Rule 4320]
28. The following test methods shall be used: NO_x (ppmv) - EPA Method 7E or ARB Method 100, NO_x (lb/MMBtu) - EPA Method 19, CO (ppmv) - EPA Method 10 or ARB Method 100, stack gas oxygen - EPA Method 3 or 3A or ARB Method 100, stack gas moisture content - EPA Method 4, and stack gas velocities - EPA Method 2. [District Rules 1081, 4305, 4306, 6.2, 4320 and 4351] Federally Enforceable Through Title V Permit
29. A source test to demonstrate compliance with NO_x and CO emission limits shall be performed within 60 days of startup of this unit. The NO_x limit in effect at the time of the startup source testing will be determined based on the volume and type of fuel combusted (greater than or equal to 50% PUC quality or < 50% PUC quality gas) and shall be identified in the source test protocol. Whenever the fuel type is switched from the fuel type combusted during the initial startup of this unit, compliance source testing for NO_x and CO shall be conducted within 90 days of the date the fuel type is switched. [District Rules 2201 and 4320]
30. Source testing is required at least once every twelve (12) months from the initial source test date of each fuel type (greater than or equal to 50% PUC quality gas or < 50% PUC quality gas). After an initial compliance demonstration with the NO_x and CO emission limits for each fuel type on two (2) consecutive source tests, the unit shall be tested not less than once every thirty-six (36) months from the last test date for that fuel type. Testing shall not be required for any fuel type not in use during the 36 month period until such time the fuel type is switched, after which testing shall be performed within 90 days of switching fuel types. [District Rules 2201 and 4320]
31. Compliance source testing after switching fuel types is not required if the unit continues to demonstrate compliance with 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 29 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas. In which case, source testing shall only be required every thirty-six(36) months for the less than 50% by PUC quality gas. If the result of a source test demonstrates that the unit does not meet 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 29 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas, the source test frequency shall revert to at least one test every 36 months for each fuel type. [District Rules 2201 and 4320]

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

32. 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 4305, 5.5.2, 4306, 5.5.2 and 4320] Federally Enforceable Through Title V Permit
33. Source testing shall be conducted using the methods and procedures approved by the District. The District must be notified 30 days prior to any compliance source test, and a source test plan must be submitted for approval 15 days prior to testing. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
34. The source test plan shall identify which basis (ppmv or lb/MMBtu) will be used to demonstrate compliance. [District Rule 4320]
35. The results of each source test shall be submitted to the District within 60 days thereafter. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
36. 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, 2520, 9.3.2, 4305, 5.5.5, 4306, 5.5.5 and 4320] Federally Enforceable Through Title V Permit
37. All equipment, facilities, and systems installed or used to achieve compliance with the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003) shall at all times be maintained in good working order and be operated as efficiently as possible so as to minimize air pollutant emissions. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
38. The Regional Administrator shall be notified in writing within (15) days following any failure of air pollution control equipment, process equipment, or of a process to operate in a normal manner which results in an increase in emissions above any allowable emissions limit stated in Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003). This notification shall include a description of the malfunctioning equipment or abnormal operation, the date of the initial failure, the period of time over which emissions were increased due to the failure, the cause of the failure, the estimated resultant emissions in excess of those allowed under Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003), and the methods utilized to restore normal operations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
39. The Regional Administrator, the head of the State Air Pollution Control Agency, the head of the responsible local air pollution control agency, and/or their authorized representatives, upon the presentation of credentials, shall be permitted: A) to enter upon the premises where the source is located or in which any records are required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and B) at reasonable times to have access to and copy any records required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and C) to inspect any equipment, operation, or method required in Federal Permit SJ 80-14 (as amended August 15, 2003); and D) to sample emissions from the source. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
40. In the event of any changes in control or ownership of facilities, Federal Permit SJ 80-14 (as amended August 15, 2003) shall be binding on all subsequent owners and operators. The applicant shall notify the succeeding owner and operator of the existence of Federal Permit SJ 80-14 (as amended August 15, 2003) and its conditions by letter, a copy of which shall be forwarded to the Regional Administrator and the State and local Air Pollution Control Agency. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
41. The provisions of Federal Permit SJ 80-14 (as amended August 15, 2003) are severable, and, if any provision of amended Federal Permit SJ 80-14 is held invalid, the remainder of amended Federal Permit SJ 80-14 shall not be affected thereby. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
42. The owner and operator of the proposed project shall construct and operate the proposed stationary source in compliance with all other applicable provisions of 40 CFR Parts 52, 60, and 61 and all other applicable Federal, State and local regulations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

43. 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 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
44. 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 in lieu of the performing the notification and testing required by this condition. [District Rules 4305, 4320 and 4320] Federally Enforceable Through Title V Permit
45. 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 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
46. 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 4305 and 4306] Federally Enforceable Through Title V Permit
47. Source sampling to determine the compliance status of an emissions source shall be witnessed or authorized by District personnel. [District Rule 1081] Federally Enforceable Through Title V Permit
48. Copies of all gas purchase contracts, supplier certifications, and test results to determine compliance with the conditions of this permit shall be maintained. The operator shall record daily amount and type(s) of fuel(s) combusted, fuel source, and all dates on which unit is fired on any noncertified fuel and record specific type of noncertified fuel used. [District Rule 2520, 9.3.2] Federally Enforceable Through Title V Permit
49. Permittee shall maintain daily records of total combined volume of fuel gas and vapor recovery gas burned, the dates of any fuel type switching, the monthly NO_x and CO emissions limit determinations, the sulfur content and higher heat value as determined by periodic analytical testing or fuel supplier invoices/certifications, and permit number(s) of systems providing gas for incineration. [District Rules 2201, 2520 and 4320]
50. All records shall be maintained and retained on-site for a minimum of five (5) years, and shall be made available for District inspection upon request. [District Rules 1070, 4305, 6.1, 4306, 6.1 and 4320] Federally Enforceable Through Title V Permit
51. This ATC shall be implemented concurrently or after ATC S-1127-31-27. [District Rule 2201]

DRAFT

San Joaquin Valley
Air Pollution Control District

AUTHORITY TO CONSTRUCT

ISSUANCE DATE: DRAFT
DRAFT

PERMIT NO: S-1127-34-24

LEGAL OWNER OR OPERATOR: CHEVRON USA INC
MAILING ADDRESS: PO BOX 1392
BAKERSFIELD, CA 93302

LOCATION: HEAVY OIL CENTRAL

SECTION: 05 **TOWNSHIP:** 29S **RANGE:** 28E

EQUIPMENT DESCRIPTION:

MODIFICATION OF 62.5 MMBTU/HR NATURAL GAS/VAPOR RECOVERY GAS-FIRED STEAM GENERATOR WITH A NORTH AMERICAN MAGNA-FLAME GLE ULTRA-LOW NOX BURNER AND FLUE GAS RECIRCULATION (CUSA ID# 49-5, DIS# 43003-76): LIMIT NOX TO 9 PPM @ 3% O2 (0.011 LB-NOX/MMBTU) OR TO 12 PPMV @ 3% O2 (0.014 LB-NOX/MMBTU) FOR RULE 4320 COMPLIANCE

CONDITIONS

1. {1830} 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 NSR Rule] Federally Enforceable Through Title V Permit
2. {1831} 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. This Authority to Construct shall be implemented according to the date proposed in the District-approved Rule 4320 Emission Control Plan. [District Rule 4320]
4. Particulate matter emissions shall not exceed 0.1 grain/dscf, 0.1 grain/dscf calculated to 12% CO2, nor 10 lb/hr. [District Rules 4201, 3.1 and 4301, 5.1 and 5.2.3] Federally Enforceable Through Title V Permit
5. Emission rates shall not exceed: PM10: 21.0 lb/day or 7665 lb/year, SOx: 21.5 lb/day or 7,829 lb/year, NOx (as NO2): 54.0 lb/day or 9855 lb/year, VOC: 4.5 lb/day or 1643 lb/year, CO: 31.5 lb/day or 11,498 lb/year. [District Rule 2201] Federally Enforceable Through Title V Permit
6. The combined sulfur content of all fuels supplied to this steam generator shall not exceed 5 grains S/100 scf. [District Rule 4320]

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.

Seyed Sadredin, Executive Director APCO

DRAFT

DAVID WARNER, Director of Permit Services
S-1127-34-24 : May 29 2010 12:12PM - GOUGHD : Joint Inspection NOT Required

7. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when this unit is burning 50% or greater by volume PUC quality gas on a monthly average basis: 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]
8. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when the unit is burning less than 50% by volume PUC quality gas on a monthly average basis: 12 ppmvd NO_x @ 3% O₂ or 0.014 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]
9. The applicable NO_x and CO emissions concentration for each month shall be determined based on the volume and type of fuel combusted in the unit (< 50% by volume PUC quality gas or greater than or equal to 50% by volume PUC quality gas). Permittee shall maintain supporting records that determine the type of fuel combusted. [District Rules 2201 and 4320]
10. PUC quality natural gas is any gaseous fuel where the sulfur content is no more than one-fourth (0.25) grain of hydrogen sulfide per one hundred (100) standard cubic feet, no more than five (5) grains of total sulfur per one hundred (100) standard cubic feet and at least 80% methane by volume. [District Rule 4320]
11. During a shakedown period not to exceed 60 calendar days from initial operation of the modifications authorized by this ATC, NO_x emission rate shall not exceed 15 ppmvd @ 3% O₂ or 0.0182 lb/MMBtu. The shakedown period shall be concluded prior to the applicable Rule 4320 compliance deadline selected for this unit. Permittee shall maintain a record of the date of initial operation and shall make such records readily available for District inspection upon request. [District Rule 4320]
12. Duration of start-up or shutdown shall not exceed two hours each per occurrence. During start-up or shutdown, the emissions control system shall be in operation, and emissions shall be minimized insofar as technologically possible. The operator shall maintain daily records of the duration of start-up and shutdown periods. [District Rules 4305, 5.5.6, 4306, 5.3 and 4320] Federally Enforceable Through Title V Permit
13. Start-up is defined as the period of time during which a unit is brought from a shutdown status to its operating temperature and pressure, including the time required by the unit's emission control system to reach full operation. Shutdown is defined as the period of time during which a unit is taken from an operational to a non-operational status by allowing it to cool down from its operating temperature to ambient temperature as the fuel supply to the unit is completely turned off. [District Rules 4306, 3.25 and 3.22 and 4320] Federally Enforceable Through Title V Permit
14. During start-up and shutdown periods, emissions from the natural gas/vapor recovery gas-fired steam generators shall not exceed either of the following limits: 0.1 lb-NO_x/MMBtu or 0.084 lb-CO/MMBtu. [District Rule 4320]
15. If the unit is fired on PUC-regulated natural gas, valid purchase contracts, supplier certifications, tariff sheets, or transportation contracts may be used to satisfy the fuel sulfur content analysis, provided they establish the fuel sulfur concentration and higher heating value. [District Rules 2520 and 4320]
16. If the steam generator is not fired on PUC-regulated natural gas, then the sulfur content of the natural gas being fired shall be determined using ASTM D 1072, D 3031, D 4084, D 3246, D 6228, double GC for H₂S and mercaptans, or grab sample analysis by GC-FPD/TCD performed in the laboratory. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
17. When complying with sulfur emission limits by fuel analysis or by a combination of source testing and fuel analysis, each fuel source shall be tested weekly for sulfur content and higher heating value. If compliance with the fuel sulfur content limit and sulfur emission limits has been demonstrated for 8 consecutive weeks for a fuel source, then the fuel testing frequency shall be semi-annually. If a semi-annual fuel content source test fails to show compliance, weekly testing shall resume until compliance is demonstrated for 8 consecutive weeks. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
18. If the steam generator is not fired on PUC-regulated natural gas and compliance is achieved through fuel sulfur content limitations, then the sulfur content of the fuel shall be determined by testing sulfur content at a location after all fuel sources are combined prior to incineration, or by performing mass balance calculations based on monitoring the sulfur content and volume of each fuel source. The sulfur content of the fuel shall be determined using the test methods referenced in this permit. [District Rule 4320]

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

19. If fuel analysis is used to demonstrate compliance with conditions of this permit, the fuel higher heating value for each fuel shall be certified by a third party fuel supplier or determined by ASTM D 1826 or D 1945 in conjunction with ASTM D 3588 for gaseous fuels. [District Rule 2520, 9.3.2; 4305, 6.2.1; and 4351, 6.2.1] Federally Enforceable Through Title V Permit
20. A source test to demonstrate compliance with NO_x and CO emission limits shall be performed within 60 days of startup of this unit. The NO_x limit in effect at the time of the startup source testing will be determined based on the volume and type of fuel combusted (greater than or equal to 50% PUC quality or < 50% PUC quality gas) and shall be identified in the source test protocol. Whenever the fuel type is switched from the fuel type combusted during the initial startup of this unit, compliance source testing for NO_x and CO shall be conducted within 90 days of the date the fuel type is switched. [District Rules 2201 and 4320]
21. Source testing is required at least once every twelve (12) months from the initial source test date of each fuel type (greater than or equal to 50% PUC quality gas or < 50% PUC quality gas). After an initial compliance demonstration with the NO_x and CO emission limits for each fuel type on two (2) consecutive source tests, the unit shall be tested not less than once every thirty-six (36) months from the last test date for that fuel type. Testing shall not be required for any fuel type not in use during the 36 month period until such time the fuel type is switched, after which testing shall be performed within 90 days of switching fuel types. [District Rules 2201 and 4320]
22. Compliance source testing after switching fuel types is not required if the unit continues to demonstrate compliance with 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas. In which case, source testing shall only be required every thirty-six(36) months for the less than 50% by PUC quality gas. If the result of a source test demonstrates that the unit does not meet 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas, the source test frequency shall revert to at least one test every 36 months for each fuel type. [District Rules 2201 and 4320]
23. 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 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
24. All required source testing shall conform to the compliance testing procedures described in District Rule 1081(Last Amended December 16, 1993). [District Rule 1081 and Kern County Rule 108.1] Federally Enforceable Through Title V Permit
25. The source test plan shall identify which basis (ppmv or lb/MMBtu) will be used to demonstrate compliance. [District Rules 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
26. Vapor recovery gas sulfur analysis and heating value determination shall be conducted by District-witnessed, or approved sample collection by an independent laboratory on an annual basis. [District Rules 1081, 7.2 and 2520, 9.5.1] Federally Enforceable Through Title V Permit
27. The results of each source test shall be submitted to the District within 60 days thereafter. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
28. Emissions for this unit shall be calculated using the arithmetic mean, pursuant to District Rule 1081 (Amended December 16, 1993), of 3 thirty-minute test runs for NO_x and CO. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
29. Compliance demonstration (source testing) shall be by District witnessed, or authorized, sample collection by an ARB certified testing laboratory. [District Rule 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
30. The following test methods shall be used: NO_x (ppmv) - EPA Method 7E or ARB Method 100, NO_x (lb/MMBtu) - EPA Method 19, CO (ppmv) - EPA Method 10 or ARB Method 100, stack gas oxygen - EPA Method 3 or 3A or ARB Method 100, fuel gas sulfur content - ASTM D3246 or double GC for H₂S and mercaptans, stack gas velocities - EPA Method 2, stack gas moisture content - EPA Method 4, and SO_x (lb/MMBtu) - ARB Method 100. [District Rules 1081, 4305, 4306, 4320 and 4351] Federally Enforceable Through Title V Permit

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

31. Steam generator may be operated with ring or perforated type burner diffuser plate. Changes between ring or perforated type burner diffuser plates shall be recorded in a contemporaneous log. [District Rule 2520, 6.4.2] Federally Enforceable Through Title V Permit
32. 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 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
33. 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 in lieu of the performing the notification and testing required by this condition. [District Rules 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
34. 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 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
35. 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 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
36. Copies of all gas purchase contracts, supplier certifications, and test results to determine compliance with the conditions of this permit shall be maintained. The operator shall record daily amount and type(s) of fuel(s) combusted, fuel source, and all dates on which unit is fired on any noncertified fuel and record specific type of noncertified fuel used. [District Rule 2520, 9.3.2] Federally Enforceable Through Title V Permit
37. The operator shall maintain all records of required monitoring data and support information for inspection at any time for a period of five years. [District Rule 2520, 9.4.2] Federally Enforceable Through Title V Permit
38. Permittee shall maintain daily records of total combined volume of fuel gas and vapor recovery gas burned, the dates of any fuel type switching, the monthly NO_x and CO emissions limit determinations, the sulfur content and higher heat value as determined by periodic analytical testing or fuel supplier invoices/certifications, and permit number(s) of systems providing gas for incineration. [District Rules 2201, 2520 and 4320]
39. Permittee shall maintain records of fuel hhv and cumulative annual fuel use for a period of five years and shall make such records readily available for District inspection upon request. [District Rule 4351] Federally Enforceable Through Title V Permit
40. 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, 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
41. Compliance with permit conditions in the Title V permit shall be deemed compliance with the following requirements: SJVUAPCD Rules 4201 (Last Amended December 17, 1992), 4301 (Last Amended December 17, 1992), 4305 sections 4.2, 5.1, 5.5.1, 5.5.2, 6.1.1, 6.2 (except 6.2.3), 6.3.1, 6.3.2, and 8.1 (Last Amended December 17, 1992), and 4351, sections 4.2, 5.2.2, 6.1.1, 6.2, and 8.1 (Last Amended October 19, 1995). A permit shield is granted from these requirements. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit

CONDITIONS CONTINUE ON NEXT PAGE

42. The requirements of 40 CFR 72.6(b) and 40 CFR 60.40c do not apply to this source. A permit shield is granted from this requirement. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
43. All equipment, facilities, and systems installed or used to achieve compliance with the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003) shall at all times be maintained in good working order and be operated as efficiently as possible so as to minimize air pollutant emissions. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
44. The Regional Administrator shall be notified in writing within (15) days following any failure of air pollution control equipment, process equipment, or of a process to operate in a normal manner which results in an increase in emissions above any allowable emissions limit stated in Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003). This notification shall include a description of the malfunctioning equipment or abnormal operation, the date of the initial failure, the period of time over which emissions were increased due to the failure, the cause of the failure, the estimated resultant emissions in excess of those allowed under Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003), and the methods utilized to restore normal operations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
45. The Regional Administrator, the head of the State Air Pollution Control Agency, the head of the responsible local air pollution control agency, and/or their authorized representatives, upon the presentation of credentials, shall be permitted: A) to enter upon the premises where the source is located or in which any records are required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and B) at reasonable times to have access to and copy any records required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and C) to inspect any equipment, operation, or method required in Federal Permit SJ 80-14 (as amended August 15, 2003); and D) to sample emissions from the source. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
46. In the event of any changes in control or ownership of facilities, Federal Permit SJ 80-14 (as amended August 15, 2003) shall be binding on all subsequent owners and operators. The applicant shall notify the succeeding owner and operator of the existence of Federal Permit SJ 80-14 (as amended August 15, 2003) and its conditions by letter, a copy of which shall be forwarded to the Regional Administrator and the State and local Air Pollution Control Agency. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
47. The provisions of Federal Permit SJ 80-14 (as amended August 15, 2003) are severable, and, if any provision of amended Federal Permit SJ 80-14 is held invalid, the remainder of amended Federal Permit SJ 80-14 shall not be affected thereby. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
48. The owner and operator of the proposed project shall construct and operate the proposed stationary source in compliance with all other applicable provisions of 40 CFR Parts 52, 60, and 61 and all other applicable Federal, State and local regulations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
49. This ATC shall be implemented concurrently or after ATC S-1127-34-25. [District Rule 2201]

DRAFT

San Joaquin Valley
Air Pollution Control District

AUTHORITY TO CONSTRUCT

ISSUANCE DATE: DRAFT
DRAFT

PERMIT NO: S-1127-35-25

LEGAL OWNER OR OPERATOR: CHEVRON USA INC
MAILING ADDRESS: PO BOX 1392
BAKERSFIELD, CA 93302

LOCATION: HEAVY OIL CENTRAL

SECTION: 5 TOWNSHIP: 29S RANGE: 28E

EQUIPMENT DESCRIPTION:

MODIFICATION OF 62.5 MMBTU/HR NATURAL GAS/VAPOR RECOVERY GAS-FIRED STEAM GENERATOR WITH A NORTH AMERICAN MAGNA-FLAME GLE ULTRA-LOW NOX BURNER AND FLUE GAS RECIRCULATION (CUSA ID# 50-5, DIS# 43005-76): LIMIT NOX TO 9 PPM @ 3% O2 (0.011 LB-NOX/MMBTU) OR TO 12 PPMV @ 3% O2 (0.014 LB-NOX/MMBTU) FOR RULE 4320 COMPLIANCE

CONDITIONS

1. {1830} 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 NSR Rule] Federally Enforceable Through Title V Permit
2. {1831} 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. This Authority to Construct shall be implemented according to the date proposed in the District-approved Rule 4320 Emission Control Plan. [District Rule 4320]
4. Particulate matter emissions shall not exceed 0.1 grain/dscf, 0.1 grain/dscf calculated to 12% CO2, nor 10 lb/hr. [District Rules 4201, 3.1 and 4301, 5.1 and 5.2.3] Federally Enforceable Through Title V Permit
5. Emission rates shall not exceed: PM10: 21.0 lb/day or 7665 lb/year, SOx: 21.5 lb/day or 7829 lb/year, NOx (as NO2): 54.0 lb/day or 9855 lb/year, VOC: 4.5 lb/day or 1643 lb/year, CO: 31.5 lb/day or 11,498 lb/year. [District Rule 2201] 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.

Seyed Sadredin, Executive Director / APCO

DAVID WARNER, Director of Permit Services

S-1127-35-25 : May 26 2010 12:13PM - GOUGHHD : Joint Inspection NOT Required

6. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when this unit is burning 50% or greater by volume PUC quality gas on a monthly average basis: 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]
7. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when the unit is burning less than 50% by volume PUC quality gas on a monthly average basis: 12 ppmvd NO_x @ 3% O₂ or 0.014 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]
8. The applicable NO_x and CO emissions concentration for each month shall be determined based on the volume and type of fuel combusted in the unit (< 50% by volume PUC quality gas or greater than or equal to 50% by volume PUC quality gas). Permittee shall maintain supporting records that determine the type of fuel combusted. [District Rules 2201 and 4320]
9. PUC quality natural gas is any gaseous fuel where the sulfur content is no more than one-fourth (0.25) grain of hydrogen sulfide per one hundred (100) standard cubic feet, no more than five (5) grains of total sulfur per one hundred (100 standard cubic feet) and at least 80% methane by volume. [District Rule 4320]
10. During a shakedown period not to exceed 60 calendar days from initial operation of the modifications authorized by this ATC, NO_x emission rate shall not exceed 15 ppmvd @ 3% O₂ or 0.0182 lb/MMBtu. The shakedown period shall be concluded prior to the applicable Rule 4320 compliance deadline selected for this unit. Permittee shall maintain a record of the date of initial operation and shall make such records readily available for District inspection upon request. [District Rule 4320]
11. The combined sulfur content of all fuels supplied to this steam generator shall not exceed 5 grains S/100 scf. [District Rule 4320]
12. Duration of start-up or shutdown shall not exceed two hours each per occurrence. During start-up or shutdown, the emissions control system shall be in operation, and emissions shall be minimized insofar as technologically possible. The operator shall maintain daily records of the duration of start-up and shutdown periods. [District Rules 4305, 5.5.6, 4306, 5.3 and 4320] Federally Enforceable Through Title V Permit
13. Start-up is defined as the period of time during which a unit is brought from a shutdown status to its operating temperature and pressure, including the time required by the unit's emission control system to reach full operation. Shutdown is defined as the period of time during which a unit is taken from an operational to a non-operational status by allowing it to cool down from its operating temperature to ambient temperature as the fuel supply to the unit is completely turned off. [District Rules 4306, 3.25 and 3.22 and 4320] Federally Enforceable Through Title V Permit
14. During start-up and shutdown periods, emissions from the natural gas/vapor recovery gas-fired steam generator shall not exceed either of the following limits: 0.1 lb-NO_x/MMBtu or 0.084 lb-CO/MMBtu. [District Rule 4320]
15. If the unit is fired on PUC-regulated natural gas, valid purchase contracts, supplier certifications, tariff sheets, or transportation contracts may be used to satisfy the fuel sulfur content analysis, provided they establish the fuel sulfur concentration and higher heating value. [District Rules 2520 and 4320]
16. If the steam generator is not fired on PUC-regulated natural gas, then the sulfur content of the natural gas being fired shall be determined using ASTM D 1072, D 3031, D 4084, D 3246, D 6228, double GC for H₂S and mercaptans, or grab sample analysis by GC-FPD/TCD performed in the laboratory. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
17. When complying with sulfur emission limits by fuel analysis or by a combination of source testing and fuel analysis, each fuel source shall be tested weekly for sulfur content and higher heating value. If compliance with the fuel sulfur content limit and sulfur emission limits has been demonstrated for 8 consecutive weeks for a fuel source, then the fuel testing frequency shall be semi-annually. If a semi-annual fuel content source test fails to show compliance, weekly testing shall resume until compliance is demonstrated for 8 consecutive weeks. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
18. If the steam generator is not fired on PUC-regulated natural gas and compliance is achieved through fuel sulfur content limitations, then the sulfur content of the fuel shall be determined by testing sulfur content at a location after all fuel sources are combined prior to incineration, or by performing mass balance calculations based on monitoring the sulfur content and volume of each fuel source. The sulfur content of the fuel shall be determined using the test methods referenced in this permit. [District Rule 4320]

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

19. If fuel analysis is used to demonstrate compliance with conditions of this permit, the fuel higher heating value for each fuel shall be certified by a third party fuel supplier or determined by ASTM D 1826 or D 1945 in conjunction with ASTM D 3588 for gaseous fuels. [District Rule 2520, 9.3.2; 4305, 6.2.1; 4320; and 4351, 6.2.1] Federally Enforceable Through Title V Permit
20. A source test to demonstrate compliance with NO_x and CO emission limits shall be performed within 60 days of startup of this unit. The NO_x limit in effect at the time of the startup source testing will be determined based on the volume and type of fuel combusted (greater than or equal to 50% PUC quality or < 50% PUC quality gas) and shall be identified in the source test protocol. Whenever the fuel type is switched from the fuel type combusted during the initial startup of this unit, compliance source testing for NO_x and CO shall be conducted within 90 days of the date the fuel type is switched. [District Rules 2201 and 4320]
21. Source testing is required at least once every twelve (12) months from the initial source test date of each fuel type (greater than or equal to 50% PUC quality gas or < 50% PUC quality gas). After an initial compliance demonstration with the NO_x and CO emission limits for each fuel type on two (2) consecutive source tests, the unit shall be tested not less than once every thirty-six (36) months from the last test date for that fuel type. Testing shall not be required for any fuel type not in use during the 36 month period until such time the fuel type is switched, after which testing shall be performed within 90 days of switching fuel types. [District Rules 2201 and 4320]
22. Compliance source testing after switching fuel types is not required if the unit continues to demonstrate compliance with 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas. In which case, source testing shall only be required every thirty-six (36) months for the less than 50% by PUC quality gas. If the result of a source test demonstrates that the unit does not meet 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas, the source test frequency shall revert to at least one test every 36 months for each fuel type. [District Rules 2201 and 4320]
23. 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 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
24. All required source testing shall conform to the compliance testing procedures described in District Rule 1081 (Last Amended December 16, 1993). [District Rule 1081 and Kern County Rule 108.1] Federally Enforceable Through Title V Permit
25. The source test plan shall identify which basis (ppmv or lb/MMBtu) will be used to demonstrate compliance. [District Rules 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
26. Vapor recovery gas sulfur analysis and heating value determination shall be conducted by District-witnessed, or approved sample collection by an independent laboratory on an annual basis. [District Rules 1081, 7.2 and 2520, 9.5.1] Federally Enforceable Through Title V Permit
27. The results of each source test shall be submitted to the District within 60 days thereafter. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
28. Emissions for this unit shall be calculated using the arithmetic mean, pursuant to District Rule 1081 (Amended December 16, 1993), of 3 thirty-minute test runs for NO_x and CO. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
29. Compliance demonstration (source testing) shall be by District witnessed, or authorized, sample collection by an ARB certified testing laboratory. [District Rule 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
30. The following test methods shall be used: NO_x (ppmv) - EPA Method 7E or ARB Method 100, NO_x (lb/MMBtu) - EPA Method 19, CO (ppmv) - EPA Method 10 or ARB Method 100, stack gas oxygen - EPA Method 3 or 3A or ARB Method 100, stack gas velocities - EPA Method 2, stack gas moisture content - EPA Method 4, and SO_x (lb/MMBtu) - ARB Method 100. [District Rules 1081, 4305, 4306, 4320 and 4351] Federally Enforceable Through Title V Permit

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

31. Steam generator may be operated with ring or perforated type burner diffuser plate. Changes between ring or perforated type burner diffuser plates shall be recorded in a contemporaneous log. [District Rule 2520, 6.4.2] Federally Enforceable Through Title V Permit
32. 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 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
33. 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 in lieu of the performing the notification and testing required by this condition. [District Rules 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
34. 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 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
35. 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 4305 and 4306] Federally Enforceable Through Title V Permit
36. The operator shall maintain all records of required monitoring data and support information for inspection at any time for a period of five years. [District Rule 2520, 9.4.2] Federally Enforceable Through Title V Permit
37. Permittee shall maintain daily records of total combined volume of fuel gas and vapor recovery gas burned, the dates of any fuel type switching, the monthly NO_x and CO emissions limit determinations, the sulfur content and higher heat value as determined by periodic analytical testing or fuel supplier invoices/certifications, and permit number(s) of systems providing gas for incineration. [District Rules 2201, 2520 and 4320]
38. Permittee shall maintain records of fuel hhv and cumulative annual fuel use for a period of five years and shall make such records readily available for District inspection upon request. [District Rule 4351] Federally Enforceable Through Title V Permit
39. 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, 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
40. Compliance with permit conditions in the Title V permit shall be deemed compliance with the following requirements: SJVUAPCD Rules 4201 (Last Amended December 17, 1992), 4301 (Last Amended December 17, 1992), 4305 sections 4.2, 5.1, 5.5.1, 5.5.2, 6.1.1, 6.2 (except 6.2.3), 6.3.1, 6.3.2, and 8.1 (Last Amended December 17, 1992), and 4351, sections 4.2, 5.2.2, 6.1.1, 6.2, and 8.1 (Last Amended October 19, 1995). A permit shield is granted from these requirements. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
41. The requirements of 40 CFR 72.6(b) and 40 CFR 60.40c do not apply to this source. A permit shield is granted from this requirement. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

42. All equipment, facilities, and systems installed or used to achieve compliance with the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003) shall at all times be maintained in good working order and be operated as efficiently as possible so as to minimize air pollutant emissions. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
43. The Regional Administrator shall be notified in writing within (15) days following any failure of air pollution control equipment, process equipment, or of a process to operate in a normal manner which results in an increase in emissions above any allowable emissions limit stated in Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003). This notification shall include a description of the malfunctioning equipment or abnormal operation, the date of the initial failure, the period of time over which emissions were increased due to the failure, the cause of the failure, the estimated resultant emissions in excess of those allowed under Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003), and the methods utilized to restore normal operations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
44. The Regional Administrator, the head of the State Air Pollution Control Agency, the head of the responsible local air pollution control agency, and/or their authorized representatives, upon the presentation of credentials, shall be permitted: A) to enter upon the premises where the source is located or in which any records are required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and B) at reasonable times to have access to and copy any records required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and C) to inspect any equipment, operation, or method required in Federal Permit SJ 80-14 (as amended August 15, 2003); and D) to sample emissions from the source. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
45. In the event of any changes in control or ownership of facilities, Federal Permit SJ 80-14 (as amended August 15, 2003) shall be binding on all subsequent owners and operators. The applicant shall notify the succeeding owner and operator of the existence of Federal Permit SJ 80-14 (as amended August 15, 2003) and its conditions by letter, a copy of which shall be forwarded to the Regional Administrator and the State and local Air Pollution Control Agency. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
46. The provisions of Federal Permit SJ 80-14 (as amended August 15, 2003) are severable, and, if any provision of amended Federal Permit SJ 80-14 is held invalid, the remainder of amended Federal Permit SJ 80-14 shall not be affected thereby. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
47. The owner and operator of the proposed project shall construct and operate the proposed stationary source in compliance with all other applicable provisions of 40 CFR Parts 52, 60, and 61 and all other applicable Federal, State and local regulations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
48. This ATC shall be implemented concurrently or after ATC S-1127-35-26. [District Rule 2201]

DRAFT

San Joaquin Valley
Air Pollution Control District

AUTHORITY TO CONSTRUCT

ISSUANCE DATE: DRAFT
DRAFT

PERMIT NO: S-1127-36-25

LEGAL OWNER OR OPERATOR: CHEVRON USA INC
MAILING ADDRESS: PO BOX 1392
BAKERSFIELD, CA 93302

LOCATION: HEAVY OIL CENTRAL

SECTION: 05 **TOWNSHIP:** 29S **RANGE:** 28

EQUIPMENT DESCRIPTION:

MODIFICATION OF 62.5 MMBTU/HR STRUTHERS NATURAL GAS/VAPOR RECOVERY GAS-FIRED STEAM GENERATOR (CUSA ID #51-5, DIS #43004-76) WITH A NORTH AMERICAN MODEL GLE 4231 LOW NOX BURNER WITH FLUE GAS RECIRCULATION: LIMIT NOX TO 9 PPM @ 3% O2 (0.011 LB-NOX/MMBTU) OR TO 12 PPMV @ 3% O2 (0.014 LB-NOX/MMBTU) FOR RULE 4320 COMPLIANCE

CONDITIONS

1. {1830} 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 NSR Rule] Federally Enforceable Through Title V Permit
2. {1831} 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. This Authority to Construct shall be implemented according to the date proposed in the District-approved Rule 4320 Emission Control Plan. [District Rule 4320]
4. {98} No air contaminant shall be released into the atmosphere which causes a public nuisance. [District Rule 4102]
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
6. All required source testing shall conform to the compliance testing procedures described in District Rule 1081. [District Rule 1081] 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.

Seyed Sadredin, Executive Director APCO

DRAFT

DAVID WARNER, Director of Permit Services
S-1127-36-25 : May 28 2010 12:13PM - GOUGHD : Joint Inspection NOT Required

7. Particulate matter emissions shall not exceed 0.1 grain/dscf, 0.1 grain/dscf calculated to 12% CO₂, nor 10 lb/hr. [District Rules 4201, 3.1 and 4301, 5.1 and 5.2.3] Federally Enforceable Through Title V Permit
8. If the steam generator is fired on PUC-regulated natural gas, then the permittee shall maintain on file copies of all natural gas bills or fuel throughput records for a period of five years. [District Rule 2520, 9.3.2] Federally Enforceable Through Title V Permit
9. If the unit is fired on PUC-regulated natural gas, valid purchase contracts, supplier certifications, tariff sheets, or transportation contracts may be used to satisfy the fuel sulfur content analysis, provided they establish the fuel sulfur concentration and higher heating value. [District Rules 2520 and 4320]
10. If the steam generator is not fired on PUC-regulated natural gas, then the sulfur content of the natural gas being fired shall be determined using ASTM D 1072, D 3031, D 4084, D 3246, D 6228, double GC for H₂S and mercaptans, or grab sample analysis by GC-FPD/TCD performed in the laboratory. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
11. If the steam generator is not fired on PUC-regulated natural gas, the sulfur content of each fuel source shall be tested weekly except that if compliance with the fuel sulfur content limit has been demonstrated for 8 consecutive weeks for a fuel source, then the testing frequency shall be quarterly. If a test shows noncompliance with the sulfur content requirement, the source must return to weekly testing until eight consecutive weeks show compliance. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
12. If the steam generator is not fired on PUC-regulated natural gas and compliance is achieved through fuel sulfur content limitations, then the sulfur content of the fuel shall be determined by testing sulfur content at a location after all fuel sources are combined prior to incineration, or by performing mass balance calculations based on monitoring the sulfur content and volume of each fuel source. The sulfur content of the fuel shall be determined using the test methods referenced in this permit. [District Rule 4320]
13. Compliance with permit conditions in the Title V permit shall be deemed compliance with the following requirements: SJVUAPCD Rules 4201 (Last Amended December 17, 1992), 4301 (Last Amended December 17, 1992), 4305 sections 4.2, 5.1, 5.5.1, 5.5.2, 6.1.1, 6.2 (except 6.2.3), 6.3.1, 6.3.2, and 8.1 (Last Amended December 17, 1992), and 4351, sections 4.2, 5.2.2, 6.1.1, 6.2, and 8.1 (Last Amended October 19, 1995). A permit shield is granted from these requirements. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
14. The requirements of 40 CFR 72.6(b) and 40 CFR 60.40c do not apply to this source. A permit shield is granted from this requirement. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
15. Duration of start-up or shutdown shall not exceed two hours each per occurrence. During start-up or shutdown, the emissions control system shall be in operation, and emissions shall be minimized insofar as technologically possible. The operator shall maintain daily records of the duration of start-up and shutdown periods. [District Rules 4305, 5.5.6 and 4306, 5.3] Federally Enforceable Through Title V Permit
16. Start-up is defined as the period of time during which a unit is brought from a shutdown status to its operating temperature and pressure, including the time required by the unit's emission control system to reach full operation. Shutdown is defined as the period of time during which a unit is taken from an operational to a non-operational status by allowing it to cool down from its operating temperature to ambient temperature as the fuel supply to the unit is completely turned off. [District Rule 4306, 3.25 and 3.22] Federally Enforceable Through Title V Permit
17. Emissions from the natural gas/vapor recovery gas-fired steam generator shall not exceed any of the following limits: 0.014 lb-PM₁₀/MMBtu, or 0.003 lb-VOC/MMBtu. [District Rules 2201 and 4320] Federally Enforceable Through Title V Permit
18. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when this unit is burning 50% or greater by volume PUC quality gas on a monthly average basis: 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 29 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]
19. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when the unit is burning less than 50% by volume PUC quality gas on a monthly average basis: 12 ppmvd NO_x @ 3% O₂ or 0.014 lb-NO_x/MMBtu and 29 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

20. The applicable NO_x and CO emissions concentration for each month shall be determined based on the volume and type of fuel combusted in the unit (< 50% by volume PUC quality gas or greater than or equal to 50% by volume PUC quality gas). Permittee shall maintain supporting records that determine the type of fuel combusted. [District Rules 2201 and 4320]
21. PUC quality natural gas is any gaseous fuel where the sulfur content is no more than one-fourth (0.25) grain of hydrogen sulfide per one hundred (100) standard cubic feet, no more than five (5) grains of total sulfur per one hundred (100 standard cubic feet) and at least 80% methane by volume. [District Rule 4320]
22. During a shakedown period not to exceed 60 calendar days from initial operation of the modifications authorized by this ATC, NO_x emission rate shall not exceed 15 ppmvd @ 3% O₂ or 0.0182 lb/MMBtu. The shakedown period shall be concluded prior to the applicable Rule 4320 compliance deadline selected for this unit. Permittee shall maintain a record of the date of initial operation and shall make such records readily available for District inspection upon request. [District Rule 4320]
23. During start-up and shutdown periods, emissions from the natural gas/vapor recovery gas-fired steam generator shall not exceed either of the following limits: 0.1 lb-NO_x/MMBtu or 0.084 lb-CO/MMBtu. [District Rule 2201] Federally Enforceable Through Title V Permit
24. Emissions from the natural gas/vapor recovery gas-fired steam generator shall not exceed either of the following limits: 54.0 lb-NO_x/day or 31.5 lb-CO/day. [District Rule 2201] Federally Enforceable Through Title V Permit
25. The combined sulfur content of all fuels supplied to this steam generator shall not exceed 5 grains S/100 scf. [District Rule 4320]
26. The following test methods shall be used: NO_x (ppmv) - EPA Method 7E or ARB Method 100, NO_x (lb/MMBtu) - EPA Method 19, CO (ppmv) - EPA Method 10 or ARB Method 100, stack gas oxygen - EPA Method 3 or 3A or ARB Method 100, stack gas moisture content - EPA Method 4, and stack gas velocities - EPA Method 2. [District Rules 1081, 4305, 4306, 6.2., 4320 and 4351] Federally Enforceable Through Title V Permit
27. A source test to demonstrate compliance with NO_x and CO emission limits shall be performed within 60 days of startup of this unit. The NO_x limit in effect at the time of the startup source testing will be determined based on the volume and type of fuel combusted (greater than or equal to 50% PUC quality or < 50% PUC quality gas) and shall be identified in the source test protocol. Whenever the fuel type is switched from the fuel type combusted during the initial startup of this unit, compliance source testing for NO_x and CO shall be conducted within 90 days of the date the fuel type is switched. [District Rules 2201 and 4320]
28. Source testing is required at least once every twelve (12) months from the initial source test date of each fuel type (greater than or equal to 50% PUC quality gas or < 50% PUC quality gas). After an initial compliance demonstration with the NO_x and CO emission limits for each fuel type on two (2) consecutive source tests, the unit shall be tested not less than once every thirty-six (36) months from the last test date for that fuel type. Testing shall not be required for any fuel type not in use during the 36 month period until such time the fuel type is switched, after which testing shall be performed within 90 days of switching fuel types. [District Rules 2201 and 4320]
29. Compliance source testing after switching fuel types is not required if the unit continues to demonstrate compliance with 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 29 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas. In which case, source testing shall only be required every thirty-six(36) months for the less than 50% by PUC quality gas. If the result of a source test demonstrates that the unit does not meet 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 29 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas, the source test frequency shall revert to at least one test every 36 months for each fuel type. [District Rules 2201 and 4320]
30. 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 4320. [District Rules 4305, 5.5.2, 4306, 5.5.2 and 4320] Federally Enforceable Through Title V Permit
31. Source testing shall be conducted using the methods and procedures approved by the District. The District must be notified 30 days prior to any compliance source test, and a source test plan must be submitted for approval 15 days prior to testing. [District Rules 1081 and 2520, 9.3.8] Federally Enforceable Through Title V Permit

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

32. The results of each source test shall be submitted to the District within 60 days thereafter. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
33. 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, 2520, 9.3.2, 4305, 5.5.5, 4306, 5.5.5 and 4320] Federally Enforceable Through Title V Permit
34. All equipment, facilities, and systems installed or used to achieve compliance with the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003) shall at all times be maintained in good working order and be operated as efficiently as possible so as to minimize air pollutant emissions. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
35. The Regional Administrator shall be notified in writing within (15) days following any failure of air pollution control equipment, process equipment, or of a process to operate in a normal manner which results in an increase in emissions above any allowable emissions limit stated in Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003). This notification shall include a description of the malfunctioning equipment or abnormal operation, the date of the initial failure, the period of time over which emissions were increased due to the failure, the cause of the failure, the estimated resultant emissions in excess of those allowed under Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003), and the methods utilized to restore normal operations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
36. The Regional Administrator, the head of the State Air Pollution Control Agency, the head of the responsible local air pollution control agency, and/or their authorized representatives, upon the presentation of credentials, shall be permitted: A) to enter upon the premises where the source is located or in which any records are required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and B) at reasonable times to have access to and copy any records required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and C) to inspect any equipment, operation, or method required in Federal Permit SJ 80-14 (as amended August 15, 2003); and D) to sample emissions from the source. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
37. In the event of any changes in control or ownership of facilities, Federal Permit SJ 80-14 (as amended August 15, 2003) shall be binding on all subsequent owners and operators. The applicant shall notify the succeeding owner and operator of the existence of Federal Permit SJ 80-14 (as amended August 15, 2003) and its conditions by letter, a copy of which shall be forwarded to the Regional Administrator and the State and local Air Pollution Control Agency. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
38. The provisions of Federal Permit SJ 80-14 (as amended August 15, 2003) are severable, and, if any provision of amended Federal Permit SJ 80-14 is held invalid, the remainder of amended Federal Permit SJ 80-14 shall not be affected thereby. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
39. The owner and operator of the proposed project shall construct and operate the proposed stationary source in compliance with all other applicable provisions of 40 CFR Parts 52, 60, and 61 and all other applicable Federal, State and local regulations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
40. 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 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
41. 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 in lieu of the performing the notification and testing required by this condition. [District Rules 4305, 4306 and 4320] Federally Enforceable Through Title V Permit

CONDITIONS CONTINUE ON NEXT PAGE

42. 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 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
43. 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 4305 and 4306] Federally Enforceable Through Title V Permit
44. Source sampling to determine the compliance status of an emissions source shall be witnessed or authorized by District personnel. [District Rule 1081] Federally Enforceable Through Title V Permit
45. Copies of all gas purchase contracts, supplier certifications, and test results to determine compliance with the conditions of this permit shall be maintained. The operator shall record daily amount and type(s) of fuel(s) combusted, fuel source, and all dates on which unit is fired on any noncertified fuel and record specific type of noncertified fuel used. [District Rule 2520, 9.3.2] Federally Enforceable Through Title V Permit
46. Permittee shall maintain daily records of total combined volume of fuel gas and vapor recovery gas burned, the dates of any fuel type switching, the monthly NO_x and CO emissions limit determinations, the sulfur content and higher heat value as determined by periodic analytical testing or fuel supplier invoices/certifications, and permit number(s) of systems providing gas for incineration. [District Rules 2201, 2520 and 4320]
47. All records shall be maintained and retained on-site for a minimum of five (5) years, and shall be made available for District inspection upon request. [District Rules 1070, 4305, 6.1, 4306, 6.1, and 4320] Federally Enforceable Through Title V Permit
48. This ATC shall be implemented concurrently or after ATC S-1127-36-26. [District Rule 2201]

DRAFT

San Joaquin Valley
Air Pollution Control District

AUTHORITY TO CONSTRUCT

ISSUANCE DATE: DRAFT
DRAFT

PERMIT NO: S-1127-38-27

LEGAL OWNER OR OPERATOR: CHEVRON USA INC
MAILING ADDRESS: PO BOX 1392
BAKERSFIELD, CA 93302

LOCATION: HEAVY OIL CENTRAL

SECTION: SW03 **TOWNSHIP:** 29S **RANGE:** 28E

EQUIPMENT DESCRIPTION:

MODIFICATION OF 62.5 MMBTU/HR NATURAL GAS/VAPOR RECOVERY GAS FIRED STEAM GENERATOR (CUSA ID# 35-3, DIS# 43007-74) WITH A NORTH AMERICAN MODEL GLE 4231 LOW NOX BURNER AND FGR: LIMIT NOX TO 9 PPM @ 3% O2 (0.011 LB-NOX/MMBTU) OR TO 12 PPMV @ 3% O2 (0.014 LB-NOX/MMBTU) FOR RULE 4320 COMPLIANCE

CONDITIONS

1. {1830} 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 NSR Rule] Federally Enforceable Through Title V Permit
2. {1831} 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. This Authority to Construct shall be implemented according to the date proposed in the District-approved Rule 4320 Emission Control Plan. [District Rule 4320]
4. All required source testing shall conform to the compliance testing procedures described in District Rule 1081(Last Amended December 16, 1993). [District Rule 1081, and County Rules 108 (Kings), 108.1 (Fresno, Merced, San Joaquin, Tulare, Kern, and Stanislaus), and 110 (Madera)] Federally Enforceable Through Title V Permit
5. Copies of all gas purchase contracts, supplier certifications, and test results to determine compliance with the conditions of this permit shall be maintained. The operator shall record daily amount and type(s) of fuel(s) combusted, fuel source, and all dates on which unit is fired on any noncertified fuel and record specific type of noncertified fuel used. [District Rule 2520, 9.3.2] 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.

Seyed Sadredin, Executive Director APCO

DAVID WARNER, Director of Permit Services

S-1127-38-27 : May 28 2010 12:13PM - GOUHHD : Joint Inspection NOT Required

6. The operator shall maintain all records of required monitoring data and support information for inspection at any time for a period of five years. [District Rule 2520, 9.4.2] Federally Enforceable Through Title V Permit
7. Particulate matter emissions shall not exceed 0.1 grain/dscf, 0.1 grain/dscf calculated to 12% CO₂, nor 10 lb/hr. [District Rules 4201, 3.1 and 4301, 5.1 and 5.2.3] Federally Enforceable Through Title V Permit
8. If the unit is fired on PUC-regulated natural gas, valid purchase contracts, supplier certifications, tariff sheets, or transportation contracts may be used to satisfy the fuel sulfur content analysis, provided they establish the fuel sulfur concentration and higher heating value. [District Rules 2520 and 4320]
9. If the steam generator is not fired on PUC-regulated natural gas, then the sulfur content of the natural gas being fired shall be determined using ASTM D 1072, D 3031, D 4084, D 3246, D 6228, double GC for H₂S and mercaptans, or grab sample analysis by GC-FPD/TCD performed in the laboratory. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
10. When complying with sulfur emission limits by fuel analysis or by a combination of source testing and fuel analysis, each fuel source shall be tested weekly for sulfur content and higher heating value. If compliance with the fuel sulfur content limit and sulfur emission limits has been demonstrated for 8 consecutive weeks for a fuel source, then the fuel testing frequency shall be semi-annually. If a semi-annual fuel content source test fails to show compliance, weekly testing shall resume until compliance is demonstrated for 8 consecutive weeks. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
11. If the steam generator is not fired on PUC-regulated natural gas and compliance is achieved through fuel sulfur content limitations, then the sulfur content of the fuel shall be determined by testing sulfur content at a location after all fuel sources are combined prior to incineration, or by performing mass balance calculations based on monitoring the sulfur content and volume of each fuel source. The sulfur content of the fuel shall be determined using the test methods referenced in this permit. [District Rule 4320]
12. If fuel analysis is used to demonstrate compliance with conditions of this permit, the fuel higher heating value for each fuel shall be certified by a third party fuel supplier or determined by ASTM D 1826 or D 1945 in conjunction with ASTM D 3588 for gaseous fuels. [District Rule 2520, 9.3.2; 4305, 6.2.1; 4351, 6.2.1; Rule 4306, and 4320] Federally Enforceable Through Title V Permit
13. Compliance with permit conditions in the Title V permit shall be deemed compliance with the following requirements: SJVUAPCD Rules 4201 (Last Amended December 17, 1992), 4301 (Last Amended December 17, 1992), 4305 sections 4.2, 5.1, 5.5.1, 5.5.2, 6.1.1, 6.2 (except 6.2.3), 6.3.1, 6.3.2, and 8.1 (Last Amended December 17, 1992), and 4351, sections 4.2, 5.2.2, 6.1.1, 6.2, and 8.1 (Last Amended October 19, 1995). A permit shield is granted from these requirements. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
14. The requirements of 40 CFR 72.6(b) and 40 CFR 60.40c do not apply to this source. A permit shield is granted from this requirement. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
15. Emission rates shall not exceed any of the following PM₁₀: 0.014 lb/MMBtu or VOC: 0.003 lb/MMBtu. [District Rules 2201 and 4320] Federally Enforceable Through Title V Permit
16. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when this unit is burning 50% or greater by volume PUC quality gas on a monthly average basis: 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]
17. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when the unit is burning less than 50% by volume PUC quality gas on a monthly average basis: 12 ppmvd NO_x @ 3% O₂ or 0.014 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]
18. The applicable NO_x and CO emissions concentration for each month shall be determined based on the volume and type of fuel combusted in the unit (< 50% by volume PUC quality gas or greater than or equal to 50% by volume PUC quality gas). Permittee shall maintain supporting records that determine the type of fuel combusted. [District Rules 2201 and 4320]
19. PUC quality natural gas is any gaseous fuel where the sulfur content is no more than one-fourth (0.25) grain of hydrogen sulfide per one hundred (100) standard cubic feet, no more than five (5) grains of total sulfur per one hundred (100) standard cubic feet and at least 80% methane by volume. [District Rule 4320]

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

20. During a shakedown period not to exceed 60 calendar days from initial operation of the modifications authorized by this ATC, NO_x emission rate shall not exceed 15 ppmvd @ 3% O₂ or 0.0182 lb/MMBtu. The shakedown period shall be concluded prior to the applicable Rule 4320 compliance deadline selected for this unit. Permittee shall maintain a record of the date of initial operation and shall make such records readily available for District inspection upon request. [District Rule 4320]
21. The combined sulfur content of all fuels supplied to this steam generator shall not exceed 5 grains S/100 scf. [District Rule 4320]
22. Duration of start-up or shutdown shall not exceed two hours each per occurrence. During start-up or shutdown, the emissions control system shall be in operation, and emissions shall be minimized insofar as technologically possible. The operator shall maintain daily records of the duration of start-up and shutdown periods. [District Rules 4305, 5.5.6, 4306, 5.3 and 4320] Federally Enforceable Through Title V Permit
23. Start-up is defined as the period of time during which a unit is brought from a shutdown status to its operating temperature and pressure, including the time required by the unit's emission control system to reach full operation. Shutdown is defined as the period of time during which a unit is taken from an operational to a non-operational status by allowing it to cool down from its operating temperature to ambient temperature as the fuel supply to the unit is completely turned off. [District Rules 4306, 3.25 and 3.22 and 4320] Federally Enforceable Through Title V Permit
24. During start-up and shutdown periods, emissions from the natural gas/vapor recovery gas-fired steam generator shall not exceed either of the following limits: 0.1 lb-NO_x/MMBtu or 0.084 lb-CO/MMBtu. [District Rule 4320]
25. Vapor recovery gas sulfur analysis and heating value determination shall be conducted by District-witnessed, or approved sample collection by an independent laboratory on an annual basis. [District Rules 1081, 7.2 and 2520, 9.5.1] Federally Enforceable Through Title V Permit
26. Permittee shall maintain records of duration of each start-up and shutdown for a period of five years and make such records readily available for District inspection upon request. [District Rules 4305, 5.5.6 and 4306, 5.3]
27. Emissions for this unit shall be calculated using the arithmetic mean, pursuant to District Rule 1081 (Amended December 16, 1993), of 3 thirty-minute test runs for NO_x and CO. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
28. All equipment, facilities, and systems installed or used to achieve compliance with the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003) shall at all times be maintained in good working order and be operated as efficiently as possible so as to minimize air pollutant emissions. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
29. The Regional Administrator shall be notified in writing within (15) days following any failure of air pollution control equipment, process equipment, or of a process to operate in a normal manner which results in an increase in emissions above any allowable emissions limit stated in Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003). This notification shall include a description of the malfunctioning equipment or abnormal operation, the date of the initial failure, the period of time over which emissions were increased due to the failure, the cause of the failure, the estimated resultant emissions in excess of those allowed under Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003), and the methods utilized to restore normal operations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
30. The Regional Administrator, the head of the State Air Pollution Control Agency, the head of the responsible local air pollution control agency, and/or their authorized representatives, upon the presentation of credentials, shall be permitted: A) to enter upon the premises where the source is located or in which any records are required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and B) at reasonable times to have access to and copy any records required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and C) to inspect any equipment, operation, or method required in Federal Permit SJ 80-14 (as amended August 15, 2003); and D) to sample emissions from the source. [PSD SJ 80-14] Federally Enforceable Through Title V Permit

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

31. In the event of any changes in control or ownership of facilities, Federal Permit SJ 80-14 (as amended August 15, 2003) shall be binding on all subsequent owners and operators. The applicant shall notify the succeeding owner and operator of the existence of Federal Permit SJ 80-14 (as amended August 15, 2003) and its conditions by letter, a copy of which shall be forwarded to the Regional Administrator and the State and local Air Pollution Control Agency. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
32. The provisions of Federal Permit SJ 80-14 (as amended August 15, 2003) are severable, and, if any provision of amended Federal Permit SJ 80-14 is held invalid, the remainder of amended Federal Permit SJ 80-14 shall not be affected thereby. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
33. The owner and operator of the proposed project shall construct and operate the proposed stationary source in compliance with all other applicable provisions of 40 CFR Parts 52, 60, and 61 and all other applicable Federal, State and local regulations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
34. 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 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
35. 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 in lieu of the performing the notification and testing required by this condition. [District Rules 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
36. 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 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
37. 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 4305 and 4306] Federally Enforceable Through Title V Permit
38. A source test to demonstrate compliance with NO_x and CO emission limits shall be performed within 60 days of startup of this unit. The NO_x limit in effect at the time of the startup source testing will be determined based on the volume and type of fuel combusted (greater than or equal to 50% PUC quality or < 50% PUC quality gas) and shall be identified in the source test protocol. Whenever the fuel type is switched from the fuel type combusted during the initial startup of this unit, compliance source testing for NO_x and CO shall be conducted within 90 days of the date the fuel type is switched. [District Rules 2201 and 4320]
39. Source testing is required at least once every twelve (12) months from the initial source test date of each fuel type (greater than or equal to 50% PUC quality gas or < 50% PUC quality gas). After an initial compliance demonstration with the NO_x and CO emission limits for each fuel type on two (2) consecutive source tests, the unit shall be tested not less than once every thirty-six (36) months from the last test date for that fuel type. Testing shall not be required for any fuel type not in use during the 36 month period until such time the fuel type is switched, after which testing shall be performed within 90 days of switching fuel types. [District Rules 2201 and 4320]

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

40. Compliance source testing after switching fuel types is not required if the unit continues to demonstrate compliance with 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas. In which case, source testing shall only be required every thirty-six(36) months for the less than 50% by PUC quality gas. If the result of a source test demonstrates that the unit does not meet 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas, the source test frequency shall revert to at least one test every 36 months for each fuel type. [District Rules 2201 and 4320]
41. Source testing shall be conducted using the methods and procedures approved by the District. The District must be notified 30 days prior to any compliance source test, and a source test plan must be submitted for approval 15 days prior to testing. [District Rule 1081] Federally Enforceable Through Title V Permit
42. The results of each source test shall be submitted to the District within 60 days thereafter. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
43. Compliance demonstration (source testing) shall be by District witnessed, or authorized, sample collection by ARB certified testing laboratory. [District Rule 1081] Federally Enforceable Through Title V Permit
44. The following test methods shall be used: NO_x (ppmv) - EPA Method 7E or ARB Method 100, NO_x (lb/MMBtu) - EPA Method 19, CO (ppmv) - EPA Method 10 or ARB Method 100, stack gas oxygen - EPA Method 3 or 3A or ARB Method 100, stack gas velocities - EPA Method 2, stack gas moisture content - EPA Method 4. [District Rules 1081, 4305, 6.2, 4306, 6.2 , 4320 and 4351] Federally Enforceable Through Title V Permit
45. Permittee shall maintain daily records of total combined volume of fuel gas and vapor recovery gas burned, the dates of any fuel type switching, the monthly NO_x and CO emissions limit determinations, the sulfur content and higher heat value as determined by periodic analytical testing or fuel supplier invoices/certifications, and permit number(s) of systems providing gas for incineration. [District Rules 2201, 2520 and 4320]
46. Permittee shall maintain records of fuel hhv and cumulative annual fuel use for a period of 5 years and shall make such records readily available for District inspection upon request. [District Rule 4351] Federally Enforceable Through Title V Permit
47. This ATC shall be implemented concurrently or after ATC S-1127-37-28. [District Rule 2201]

DRAFT

San Joaquin Valley
Air Pollution Control District

AUTHORITY TO CONSTRUCT

ISSUANCE DATE: DRAFT
DRAFT

PERMIT NO: S-1127-39-27

LEGAL OWNER OR OPERATOR: CHEVRON USA INC
MAILING ADDRESS: PO BOX 1392
BAKERSFIELD, CA 93302

LOCATION: HEAVY OIL CENTRAL

SECTION: 03 **TOWNSHIP:** 29S **RANGE:** 28E

EQUIPMENT DESCRIPTION:

MODIFICATION OF 62.5 MMBTU/HR NATURAL GAS/VAPOR RECOVERY GAS-FIRED STEAM GENERATOR (CUSA ID #36-3, DIS# 43008-74) WITH NORTH AMERICAN GLE MAGNA FLAME LOW NOX BURNER AND LOW PRESSURE FUEL INDUCED RECIRCULATION: INSTALL OPTIONAL USE FLUE GAS RECIRCULATION AND LIMIT NOX TO 9 PPM @ 3% O2 (0.011 LB-NOX/MMBTU) OR TO 12 PPMV @ 3% O2 (0.014 LB-NOX/MMBTU) FOR RULE 4320 COMPLIANCE

CONDITIONS

1. {1830} 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 NSR Rule] Federally Enforceable Through Title V Permit
2. {1831} 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. This Authority to Construct shall be implemented according to the date proposed in the District-approved Rule 4320 Emission Control Plan. [District Rule 4320]
4. All required source testing shall conform to the compliance testing procedures described in District Rule 1081 (Last Amended December 16, 1993). [District Rule 1081, and County Rules 108 (Kings), 108.1 (Fresno, Merced, San Joaquin, Tulare, Kern, and Stanislaus), and 110 (Madera)] Federally Enforceable Through Title V Permit
5. Copies of all gas purchase contracts, supplier certifications, and test results to determine compliance with the conditions of this permit shall be maintained. The operator shall record daily amount and type(s) of fuel(s) combusted, fuel source, and all dates on which unit is fired on any noncertified fuel and record specific type of noncertified fuel used. [District Rule 2520, 9.3.2] 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.

Seyed Sadredin, Executive Director APCO

DRAFT

DAVID WARNER, Director of Permit Services

S-1127-39-27 : May 28 2010 12:13PM - GOUGHD : Joint Inspection NOT Required

6. The operator shall maintain all records of required monitoring data and support information for inspection at any time for a period of five years. [District Rule 2520, 9.4.2] Federally Enforceable Through Title V Permit
7. Particulate matter emissions shall not exceed 0.1 grain/dscf, 0.1 grain/dscf calculated to 12% CO₂, nor 10 lb/hr. [District Rules 4201, 3.1 and 4301, 5.1 and 5.2.3] Federally Enforceable Through Title V Permit
8. If the unit is fired on PUC-regulated natural gas, valid purchase contracts, supplier certifications, tariff sheets, or transportation contracts may be used to satisfy the fuel sulfur content analysis, provided they establish the fuel sulfur concentration and higher heating value. [District Rules 2520 and 4320]
9. If the steam generator is not fired on PUC-regulated natural gas, then the sulfur content of the natural gas being fired shall be determined using ASTM D 1072, D 3031, D 4084, D 3246, D 6288, double GC for H₂S and mercaptans, or grab sample analysis by GC-FPD/TCD performed in the laboratory. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
10. When complying with sulfur emission limits by fuel analysis or by a combination of source testing and fuel analysis, each fuel source shall be tested weekly for sulfur content and higher heating value. If compliance with the fuel sulfur content limit and sulfur emission limits has been demonstrated for 8 consecutive weeks for a fuel source, then the fuel testing frequency shall be semi-annually. If a semi-annual fuel content source test fails to show compliance, weekly testing shall resume until compliance is demonstrated for 8 consecutive weeks. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
11. If the steam generator is not fired on PUC-regulated natural gas and compliance is achieved through fuel sulfur content limitations, then the sulfur content of the fuel shall be determined by testing sulfur content at a location after all fuel sources are combined prior to incineration, or by performing mass balance calculations based on monitoring the sulfur content and volume of each fuel source. The sulfur content of the fuel shall be determined using the test methods referenced in this permit. [District Rule 4320]
12. If fuel analysis is used to demonstrate compliance with conditions of this permit, the fuel higher heating value for each fuel shall be certified by a third party fuel supplier or determined by ASTM D 1826 or D 1945 in conjunction with ASTM D 3588 for gaseous fuels. [District Rule 2520, 9.3.2; 4305, 6.2.1; 4320, and 4351, 6.2.1] Federally Enforceable Through Title V Permit
13. Compliance with permit conditions in the Title V permit shall be deemed compliance with the following requirements: SJVUAPCD Rules 4201 (Last Amended December 17, 1992), 4301 (Last Amended December 17, 1992), 4305 sections 4.2, 5.1, 5.5.1, 5.5.2, 6.1.1, 6.2 (except 6.2.3), 6.3.1, 6.3.2, and 8.1 (Last Amended December 17, 1992), and 4351, sections 4.2, 5.2.2, 6.1.1, 6.2, and 8.1 (Last Amended October 19, 1995). A permit shield is granted from these requirements. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
14. The requirements of 40 CFR 72.6(b) and 40 CFR 60.40c do not apply to this source. A permit shield is granted from this requirement. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
15. Emission rates shall not exceed any of the following PM₁₀: 0.014 lb/MMBtu or VOC: 0.003 lb/MMBtu. [District Rules 2201, 4305, 4306, 4320 and 4351] Federally Enforceable Through Title V Permit
16. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when this unit is burning 50% or greater by volume PUC quality gas on a monthly average basis: 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]
17. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when the unit is burning less than 50% by volume PUC quality gas on a monthly average basis: 12 ppmvd NO_x @ 3% O₂ or 0.014 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]
18. The applicable NO_x and CO emissions concentration for each month shall be determined based on the volume and type of fuel combusted in the unit (< 50% by volume PUC quality gas or greater than or equal to 50% by volume PUC quality gas). Permittee shall maintain supporting records that determine the type of fuel combusted. [District Rules 2201 and 4320]
19. PUC quality natural gas is any gaseous fuel where the sulfur content is no more than one-fourth (0.25) grain of hydrogen sulfide per one hundred (100) standard cubic feet, no more than five (5) grains of total sulfur per one hundred (100 standard cubic feet) and at least 80% methane by volume. [District Rule 4320]

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

20. During a shakedown period not to exceed 60 calendar days from initial operation of the modifications authorized by this ATC, NO_x emission rate shall not exceed 15 ppmvd @ 3% O₂ or 0.0182 lb/MMBtu. The shakedown period shall be concluded prior to the applicable Rule 4320 compliance deadline selected for this unit. Permittee shall maintain a record of the date of initial operation and shall make such records readily available for District inspection upon request. [District Rule 4320]
21. The combined sulfur content of all fuels supplied to this steam generator shall not exceed 5 grains S/100 scf. [District Rule 4320]
22. Duration of start-up or shutdown shall not exceed two hours each per occurrence. During start-up or shutdown, the emissions control system shall be in operation, and emissions shall be minimized insofar as technologically possible. The operator shall maintain daily records of the duration of start-up and shutdown periods. [District Rules 4305, 5.5.6, 4306, 5.3 and 4320] Federally Enforceable Through Title V Permit
23. Start-up is defined as the period of time during which a unit is brought from a shutdown status to its operating temperature and pressure, including the time required by the unit's emission control system to reach full operation. Shutdown is defined as the period of time during which a unit is taken from an operational to a non-operational status by allowing it to cool down from its operating temperature to ambient temperature as the fuel supply to the unit is completely turned off. [District Rules 4306, 3.25 and 3.22 and 4320] Federally Enforceable Through Title V Permit
24. During start-up and shutdown periods, emissions from the natural gas/vapor recovery gas-fired steam generator shall not exceed either of the following limits: 0.1 lb-NO_x/MMBtu or 0.084 lb-CO/MMBtu. [District Rule 4320]
25. Vapor recovery gas sulfur analysis and heating value determination shall be conducted by District-witnessed, or approved sample collection by an independent laboratory on an annual basis. [District Rule 1081, 7.2 and 2520, 9.5.1] Federally Enforceable Through Title V Permit
26. Source testing shall be conducted using the methods and procedures approved by the District. The District must be notified 30 days prior to any compliance source test, and a source test plan must be submitted for approval 15 days prior to testing. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
27. The results of each source test shall be submitted to the District within 60 days thereafter. [District Rule 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
28. Permittee shall keep daily records of the sulfur content of the vapor recovery gas, amount of natural gas combusted, and the amount of vapor recovery gas combusted. [District Rules 1070 and 2520, 9.5.1] Federally Enforceable Through Title V Permit
29. Emissions for this unit shall be calculated using the arithmetic mean, pursuant to District Rule 1081 (Amended December 16, 1993), of 3 thirty-minute test runs for NO_x and CO. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
30. All equipment, facilities, and systems installed or used to achieve compliance with the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003) shall at all times be maintained in good working order and be operated as efficiently as possible so as to minimize air pollutant emissions. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
31. The Regional Administrator shall be notified in writing within (15) days following any failure of air pollution control equipment, process equipment, or of a process to operate in a normal manner which results in an increase in emissions above any allowable emissions limit stated in Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003). This notification shall include a description of the malfunctioning equipment or abnormal operation, the date of the initial failure, the period of time over which emissions were increased due to the failure, the cause of the failure, the estimated resultant emissions in excess of those allowed under Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003), and the methods utilized to restore normal operations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit

DRAFT

CONDITIONS CONTINUE ON NEXT PAGE

32. The Regional Administrator, the head of the State Air Pollution Control Agency, the head of the responsible local air pollution control agency, and/or their authorized representatives, upon the presentation of credentials, shall be permitted: A) to enter upon the premises where the source is located or in which any records are required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and B) at reasonable times to have access to and copy any records required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and C) to inspect any equipment, operation, or method required in Federal Permit SJ 80-14 (as amended August 15, 2003); and D) to sample emissions from the source. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
33. In the event of any changes in control or ownership of facilities, Federal Permit SJ 80-14 (as amended August 15, 2003) shall be binding on all subsequent owners and operators. The applicant shall notify the succeeding owner and operator of the existence of Federal Permit SJ 80-14 (as amended August 15, 2003) and its conditions by letter, a copy of which shall be forwarded to the Regional Administrator and the State and local Air Pollution Control Agency. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
34. The provisions of Federal Permit SJ 80-14 (as amended August 15, 2003) are severable, and, if any provision of amended Federal Permit SJ 80-14 is held invalid, the remainder of amended Federal Permit SJ 80-14 shall not be affected thereby. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
35. The owner and operator of the proposed project shall construct and operate the proposed stationary source in compliance with all other applicable provisions of 40 CFR Parts 52, 60, and 61 and all other applicable Federal, State and local regulations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
36. 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 4305; 4306 and 4320] Federally Enforceable Through Title V Permit
37. 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 in lieu of the performing the notification and testing required by this condition. [District Rules 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
38. 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 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
39. 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 4305 and 4306] Federally Enforceable Through Title V Permit

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

40. A source test to demonstrate compliance with NO_x and CO emission limits shall be performed within 60 days of startup of this unit. The NO_x limit in effect at the time of the startup source testing will be determined based on the volume and type of fuel combusted (greater than or equal to 50% PUC quality or < 50% PUC quality gas) and shall be identified in the source test protocol. Whenever the fuel type is switched from the fuel type combusted during the initial startup of this unit, compliance source testing for NO_x and CO shall be conducted within 90 days of the date the fuel type is switched. [District Rules 2201 and 4320]
41. Source testing is required at least once every twelve (12) months from the initial source test date of each fuel type (greater than or equal to 50% PUC quality gas or < 50% PUC quality gas). After an initial compliance demonstration with the NO_x and CO emission limits for each fuel type on two (2) consecutive source tests, the unit shall be tested not less than once every thirty-six (36) months from the last test date for that fuel type. Testing shall not be required for any fuel type not in use during the 36 month period until such time the fuel type is switched, after which testing shall be performed within 90 days of switching fuel types. [District Rules 2201 and 4320]
42. Compliance source testing after switching fuel types is not required if the unit continues to demonstrate compliance with 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas. In which case, source testing shall only be required every thirty-six(36) months for the less than 50% by PUC quality gas. If the result of a source test demonstrates that the unit does not meet 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas, the source test frequency shall revert to at least one test every 36 months for each fuel type. [District Rules 2201 and 4320]
43. Compliance demonstration (source testing) shall be by District witnessed, or authorized, sample collection by ARB certified testing laboratory. [District Rule 1081] Federally Enforceable Through Title V Permit
44. The following test methods shall be used: NO_x (ppmv) - EPA Method 7E or ARB Method 100, NO_x (lb/MMBtu) - EPA Method 19, CO (ppmv) - EPA Method 10 or ARB Method 100, stack gas oxygen - EPA Method 3 or 3A or ARB Method 100, stack gas velocities - EPA Method 2, stack gas moisture content - EPA Method 4, and fuel gas sulfur content - ASTM D3246 or double GC for H₂S and mercaptans. [District Rules 1081, 4305, and 4351] Federally Enforceable Through Title V Permit
45. Permittee shall maintain records of fuel hhv and cumulative annual fuel use for a period of 5 years and shall make such records readily available for District inspection upon request. [District Rule 4351] Federally Enforceable Through Title V Permit
46. Permittee shall maintain daily records of total combined volume of fuel gas and vapor recovery gas burned, the dates of any fuel type switching, the monthly NO_x and CO emissions limit determinations, the sulfur content and higher heat value as determined by periodic analytical testing or fuel supplier invoices/certifications, and permit number(s) of systems providing gas for incineration. [District Rules 2201, 2520 and 4320]
47. Steam generator may be operated with ring or perforated type burner diffuser plate. Changes between ring or perforated type burner diffuser plates shall be recorded in a contemporaneous log. [District Rule 2520, 6.4.2] Federally Enforceable Through Title V Permit
48. This ATC shall be implemented concurrently or after ATC S-1127-39-28. [District Rule 2201]

DRAFT

San Joaquin Valley
Air Pollution Control District

AUTHORITY TO CONSTRUCT

ISSUANCE DATE: DRAFT
DRAFT

PERMIT NO: S-1127-42-26

LEGAL OWNER OR OPERATOR: CHEVRON USA INC
MAILING ADDRESS: PO BOX 1392
BAKERSFIELD, CA 93302

LOCATION: HEAVY OIL CENTRAL

SECTION: 03 **TOWNSHIP:** 29S **RANGE:** 28E

EQUIPMENT DESCRIPTION:

MODIFICATION OF DORMANT 62.5 MMBTU/HR NATURAL GAS/VAPOR RECOVERY GAS FIRED STEAM GENERATOR (CUSA ID# 42-3, DIS# 43003-75) WITH NORTH AMERICAN GLE MAGNA FLAME LOW NOX BURNER AND LOW PRESSURE FUEL INDUCED RECIRCULATION: INSTALL OPTIONAL USE FLUE GAS RECIRCULATION AND LIMIT NOX TO 9 PPM @ 3% O2 (0.011 LB-NOX/MMBTU) OR TO 12 PPMV @ 3% O2 (0.014 LB-NOX/MMBTU) FOR RULE 4320 COMPLIANCE

CONDITIONS

1. {1830} 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 NSR Rule] Federally Enforceable Through Title V Permit
2. {1831} 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. This Authority to Construct shall be implemented according to the date proposed in the District-approved Rule 4320 Emission Control Plan. [District Rule 4320]
4. All required source testing shall conform to the compliance testing procedures described in District Rule 1081 (Last Amended December 16, 1993). [District Rule 1081, and County Rules 108 (Kings), 108.1 (Fresno, Merced, San Joaquin, Tulare, Kern, and Stanislaus), and 110 (Madera)] 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.

Seyed Sadredin, Executive Director APCO

DAVID WARNER, Director of Permit Services

S-1127-42-26 : May 28 2010 12:13PM - GOUGHID : Joint Inspection NOT Required

5. Copies of all gas purchase contracts, supplier certifications, and test results to determine compliance with the conditions of this permit shall be maintained. The operator shall record daily amount and type(s) of fuel(s) combusted, fuel source, and all dates on which unit is fired on any noncertified fuel and record specific type of noncertified fuel used. [District Rule 2520, 9.3.2] Federally Enforceable Through Title V Permit
6. The operator shall maintain all records of required monitoring data and support information for inspection at any time for a period of five years. [District Rule 2520, 9.4.2] Federally Enforceable Through Title V Permit
7. Particulate matter emissions shall not exceed 0.1 grain/dscf, 0.1 grain/dscf calculated to 12% CO₂, nor 10 lb/hr. [District Rules 4201, 3.1 and 4301, 5.1 and 5.2.3] Federally Enforceable Through Title V Permit
8. If the unit is fired on PUC-regulated natural gas, valid purchase contracts, supplier certifications, tariff sheets, or transportation contracts may be used to satisfy the fuel sulfur content analysis, provided they establish the fuel sulfur concentration and higher heating value. [District Rules 2520 and 4320]
9. If the steam generator is not fired on PUC-regulated natural gas, then the sulfur content of the natural gas being fired shall be determined using ASTM D 1072, D 3031, D 4084, D 3246, D 6228, double GC for H₂S and mercaptans, or grab sample analysis by GC-FPD/TCD performed in the laboratory. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
10. When complying with sulfur emission limits by fuel analysis or by a combination of source testing and fuel analysis, each fuel source shall be tested weekly for sulfur content and higher heating value. If compliance with the fuel sulfur content limit and sulfur emission limits has been demonstrated for 8 consecutive weeks for a fuel source, then the fuel testing frequency shall be semi-annually. If a semi-annual fuel content source test fails to show compliance, weekly testing shall resume until compliance is demonstrated for 8 consecutive weeks. [District Rule 2520, 9.3.2] Federally Enforceable Through Title V Permit
11. If the steam generator is not fired on PUC-regulated natural gas and compliance is achieved through fuel sulfur content limitations, then the sulfur content of the fuel shall be determined by testing sulfur content at a location after all fuel sources are combined prior to incineration, or by performing mass balance calculations based on monitoring the sulfur content and volume of each fuel source. The sulfur content of the fuel shall be determined using the test methods referenced in this permit. [District Rule 4320]
12. If fuel analysis is used to demonstrate compliance with conditions of this permit, the fuel higher heating value for each fuel shall be certified by a third party fuel supplier or determined by ASTM D 1826 or D 1945 in conjunction with ASTM D 3588 for gaseous fuels. [District Rule 2520, 9.3.2; 4305, 6.2.1; and 4351, 6.2.1] Federally Enforceable Through Title V Permit
13. Compliance with permit conditions in the Title V permit shall be deemed compliance with the requirements of County Rules 108 (Kings), 108.1 (Fresno, Merced, San Joaquin, Tulare, Kern, and Stanislaus), and 110 (Madera), 402 (Madera), 404 (Fresno, Kern, Tulare, Kings, Stanislaus, Merced, and San Joaquin), 405 (Madera), 408 (Fresno, Kern, Tulare, Kings, Stanislaus, Merced, and San Joaquin), 407.2 (Kern, Tulare, Kings, Stanislaus, and San Joaquin), and 408.2 (Merced). A permit shield is granted from these requirements. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
14. Compliance with permit conditions in the Title V permit shall be deemed compliance with the following requirements: SJVUAPCD Rules 4201 (Last Amended December 17, 1992), 4301 (Last Amended December 17, 1992), 4305 sections 4.2, 5.1, 5.5.1, 5.5.2, 6.1.1, 6.2 (except 6.2.3), 6.3.1, 6.3.2, and 8.1 (Last Amended December 17, 1992), and 4351, sections 4.2, 5.2.2, 6.1.1, 6.2, and 8.1 (Last Amended October 19, 1995). A permit shield is granted from these requirements. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
15. The requirements of 40 CFR 72.6(b) and 40 CFR 60.40c do not apply to this source. A permit shield is granted from this requirement. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
16. Emission rates shall not exceed any of the following PM₁₀: 0.014 lb/MMBtu or VOC: 0.003 lb/MMBtu. [District Rules 2201, 4305, 4306, 4320, and 4351] Federally Enforceable Through Title V Permit
17. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when this unit is burning 50% or greater by volume PUC quality gas on a monthly average basis: 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

18. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when the unit is burning less than 50% by volume PUC quality gas on a monthly average basis: 12 ppmvd NO_x @ 3% O₂ or 0.014 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]
19. The applicable NO_x and CO emissions concentration for each month shall be determined based on the volume and type of fuel combusted in the unit (< 50% by volume PUC quality gas or greater than or equal to 50% by volume PUC quality gas). Permittee shall maintain supporting records that determine the type of fuel combusted. [District Rules 2201 and 4320]
20. PUC quality natural gas is any gaseous fuel where the sulfur content is no more than one-fourth (0.25) grain of hydrogen sulfide per one hundred (100) standard cubic feet, no more than five (5) grains of total sulfur per one hundred (100 standard cubic feet) and at least 80% methane by volume. [District Rule 4320]
21. During a shakedown period not to exceed 60 calendar days from initial operation of the modifications authorized by this ATC, NO_x emission rate shall not exceed 15 ppmvd @ 3% O₂ or 0.0182 lb/MMBtu. The shakedown period shall be concluded prior to the applicable Rule 4320 compliance deadline selected for this unit. Permittee shall maintain a record of the date of initial operation and shall make such records readily available for District inspection upon request. [District Rule 4320]
22. The combined sulfur content of all fuels supplied to this steam generator shall not exceed 5 grains S/100 scf. [District Rule 4320]
23. Duration of start-up or shutdown shall not exceed two hours each per occurrence. During start-up or shutdown, the emissions control system shall be in operation, and emissions shall be minimized insofar as technologically possible. The operator shall maintain daily records of the duration of start-up and shutdown periods. [District Rules 4305, 5.5.6, 4306, 5.3 and 4320] Federally Enforceable Through Title V Permit
24. Start-up is defined as the period of time during which a unit is brought from a shutdown status to its operating temperature and pressure, including the time required by the unit's emission control system to reach full operation. Shutdown is defined as the period of time during which a unit is taken from an operational to a non-operational status by allowing it to cool down from its operating temperature to ambient temperature as the fuel supply to the unit is completely turned off. [District Rules 4306, 3.25 and 3.22 and 4320] Federally Enforceable Through Title V Permit
25. During start-up and shutdown periods, emissions from the natural gas/vapor recovery gas-fired steam generator shall not exceed either of the following limits: 0.1 lb-NO_x/MMBtu or 0.084 lb-CO/MMBtu. [District Rule 4320]
26. Vapor recovery gas sulfur analysis and heating value determination shall be conducted by District-witnessed, or approved sample collection by an independent laboratory on an annual basis. [District Rule 1070 and 2520, 9.5.1] Federally Enforceable Through Title V Permit
27. A source test to demonstrate compliance with NO_x and CO emission limits shall be performed within 60 days of startup of this unit. The NO_x limit in effect at the time of the startup source testing will be determined based on the volume and type of fuel combusted (greater than or equal to 50% PUC quality or < 50% PUC quality gas) and shall be identified in the source test protocol. Whenever the fuel type is switched from the fuel type combusted during the initial startup of this unit, compliance source testing for NO_x and CO shall be conducted within 90 days of the date the fuel type is switched. [District Rules 2201 and 4320]
28. Source testing is required at least once every twelve (12) months from the initial source test date of each fuel type (greater than or equal to 50% PUC quality gas or < 50% PUC quality gas). After an initial compliance demonstration with the NO_x and CO emission limits for each fuel type on two (2) consecutive source tests, the unit shall be tested not less than once every thirty-six (36) months from the last test date for that fuel type. Testing shall not be required for any fuel type not in use during the 36 month period until such time the fuel type is switched, after which testing shall be performed within 90 days of switching fuel types. [District Rules 2201 and 4320]
29. Compliance source testing after switching fuel types is not required if the unit continues to demonstrate compliance with 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas. In which case, source testing shall only be required every thirty-six(36) months for the less than 50% by PUC quality gas. If the result of a source test demonstrates that the unit does not meet 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas, the source test frequency shall revert to at least one test every 36 months for each fuel type. [District Rules 2201 and 4320]

CONDITIONS CONTINUE ON NEXT PAGE

30. Source testing shall be conducted using the methods and procedures approved by the District. The District must be notified 30 days prior to any compliance source test, and a source test plan must be submitted for approval 15 days prior to testing. [District Rule 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
31. The results of each source test shall be submitted to the District within 60 days thereafter. [District Rule 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
32. The permittee shall keep daily records of the sulfur content of the natural gas, amount of natural gas combusted, and the amount of vapor recovery gas combusted and shall make records available for inspection upon request. [District NSR Rule] Federally Enforceable Through Title V Permit
33. Emissions for this unit shall be calculated using the arithmetic mean, pursuant to District Rule 1081 (Amended December 16, 1993), of 3 thirty-minute test runs for NO_x and CO. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
34. All equipment, facilities, and systems installed or used to achieve compliance with the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003) shall at all times be maintained in good working order and be operated as efficiently as possible so as to minimize air pollutant emissions. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
35. The Regional Administrator shall be notified in writing within (15) days following any failure of air pollution control equipment, process equipment, or of a process to operate in a normal manner which results in an increase in emissions above any allowable emissions limit stated in Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003). This notification shall include a description of the malfunctioning equipment or abnormal operation, the date of the initial failure, the period of time over which emissions were increased due to the failure, the cause of the failure, the estimated resultant emissions in excess of those allowed under Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003), and the methods utilized to restore normal operations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
36. The Regional Administrator, the head of the State Air Pollution Control Agency, the head of the responsible local air pollution control agency, and/or their authorized representatives, upon the presentation of credentials, shall be permitted: A) to enter upon the premises where the source is located or in which any records are required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and B) at reasonable times to have access to and copy any records required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and C) to inspect any equipment, operation, or method required in Federal Permit SJ 80-14 (as amended August 15, 2003); and D) to sample emissions from the source. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
37. In the event of any changes in control or ownership of facilities, Federal Permit SJ 80-14 (as amended August 15, 2003) shall be binding on all subsequent owners and operators. The applicant shall notify the succeeding owner and operator of the existence of Federal Permit SJ 80-14 (as amended August 15, 2003) and its conditions by letter, a copy of which shall be forwarded to the Regional Administrator and the State and local Air Pollution Control Agency. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
38. The provisions of Federal Permit SJ 80-14 (as amended August 15, 2003) are severable, and, if any provision of amended Federal Permit SJ 80-14 is held invalid, the remainder of amended Federal Permit SJ 80-14 shall not be affected thereby. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
39. The owner and operator of the proposed project shall construct and operate the proposed stationary source in compliance with all other applicable provisions of 40 CFR Parts 52, 60, and 61 and all other applicable Federal, State and local regulations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
40. 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 analyzer 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 4305, 4306 and 4320] Federally Enforceable Through Title V Permit

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

41. 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 in lieu of performing the notification and testing required by this condition. [District Rules 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
42. 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 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
43. {4066} The permittee shall maintain records of: (1) the date and time of NOX, CO, and O₂ measurements, (2) the O₂ concentration in percent by volume 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 4305 and 4306]
44. Compliance demonstration (source testing) shall be by District witnessed, or authorized, sample collection by ARB certified testing laboratory. [District Rule 1081] Federally Enforceable Through Title V Permit
45. The following test methods shall be used: NO_x (ppmv) - EPA Method 7E or ARB Method 100, NO_x (lb/MMBtu) - EPA Method 19, CO (ppmv) - EPA Method 10 or ARB Method 100, stack gas oxygen - EPA Method 3 or 3A or ARB Method 100, stack gas velocities - EPA Method 2, and stack gas moisture content - EPA Method 4. [District Rules 1081, 4305, 4320 and 4351] Federally Enforceable Through Title V Permit
46. Permittee shall maintain daily records of total combined volume of fuel gas and vapor recovery gas burned, the dates of any fuel type switching, the monthly NO_x and CO emissions limit determinations, the sulfur content and higher heat value as determined by periodic analytical testing or fuel supplier invoices/certifications, and permit number(s) of systems providing gas for incineration. [District Rules 2201 and 4320]
47. Permittee shall maintain records of fuel hhv and cumulative annual fuel use for a period of 5 years and shall make such records readily available for District inspection upon request. [District Rule 4351] Federally Enforceable Through Title V Permit
48. Steam generator may be operated with ring or perforated type burner diffuser plate. Changes between ring or perforated type burner diffuser plates shall be recorded in a contemporaneous log. [District Rule 2520, 6.4.2] Federally Enforceable Through Title V Permit
49. This ATC shall be implemented concurrently or after ATC S-1127-42-27. [District Rule 2201]

DRAFT

San Joaquin Valley
Air Pollution Control District

AUTHORITY TO CONSTRUCT

ISSUANCE DATE: DRAFT
DRAFT

PERMIT NO: S-1127-55-26

LEGAL OWNER OR OPERATOR: CHEVRON USA INC
MAILING ADDRESS: PO BOX 1392
BAKERSFIELD, CA 93302

LOCATION: HEAVY OIL CENTRAL

SECTION: 03 **TOWNSHIP:** 29S **RANGE:** 28E

EQUIPMENT DESCRIPTION:

MODIFICATION OF DORMANT 62.5 MMBTU/HR NATURAL GAS/VAPOR RECOVERY GAS-FIRED STEAM GENERATOR (CUSA ID# 65-3, DIS# 43006-80) WITH NORTH AMERICAN GLE MAGNA FLAME LOW NOX BURNER AND LOW PRESSURE FUEL INDUCED RECIRCULATION: INSTALL OPTIONAL USE FLUE GAS RECIRCULATION AND LIMIT NOX TO 9 PPM @ 3% O2 (0.011 LB-NOX/MMBTU) OR TO 12 PPMV @ 3% O2 (0.014 LB-NOX/MMBTU) FOR RULE 4320 COMPLIANCE

CONDITIONS

1. {1830} 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 NSR Rule] Federally Enforceable Through Title V Permit
2. {1831} 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. This Authority to Construct shall be implemented according to the date proposed in the District-approved Rule 4320 Emission Control Plan. [District Rule 4320]
4. All required source testing shall conform to the compliance testing procedures described in District Rule 1081 (Last Amended December 16, 1993). [District Rule 1081, and County Rules 108 (Kings), 108.1 (Fresno, Merced, San Joaquin, Tulare, Kern, and Stanislaus), and 110 (Madera)] 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.

Seyed Sadredin, Executive Director APCO

DAVID WARNER, Director of Permit Services

S-1127-55-26 : May 28 2010 12:13PM - GOUGH : Joint Inspection NOT Required

5. Copies of all gas purchase contracts, supplier certifications, and test results to determine compliance with the conditions of this permit shall be maintained. The operator shall record daily amount and type(s) of fuel(s) combusted, fuel source, and all dates on which unit is fired on any noncertified fuel and record specific type of noncertified fuel used. [District Rule 2520, 9.3.2] Federally Enforceable Through Title V Permit
6. The operator shall maintain all records of required monitoring data and support information for inspection at any time for a period of five years. [District Rule 2520, 9.4.2] Federally Enforceable Through Title V Permit
7. Particulate matter emissions shall not exceed 0.1 grain/dscf, 0.1 grain/dscf calculated to 12% CO₂, nor 10 lb/hr. [District Rules 4201, 3.1 and 4301, 5.1 and 5.2.3] Federally Enforceable Through Title V Permit
8. If the unit is fired on PUC-regulated natural gas, valid purchase contracts, supplier certifications, tariff sheets, or transportation contracts may be used to satisfy the fuel sulfur content analysis, provided they establish the fuel sulfur concentration and higher heating value. [District Rules 2520 and 4320]
9. If the steam generator is not fired on PUC-regulated natural gas, then the sulfur content of the natural gas being fired shall be determined using ASTM D 1072, D 3031, D 4084, D 3246, D 6228, double GC for H₂S and mercaptans, or grab sample analysis by GC-FPD/TCD performed in the laboratory. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
10. When complying with sulfur emission limits by fuel analysis or by a combination of source testing and fuel analysis, each fuel source shall be tested weekly for sulfur content and higher heating value. If compliance with the fuel sulfur content limit and sulfur emission limits has been demonstrated for 8 consecutive weeks for a fuel source, then the fuel testing frequency shall be semi-annually. If a semi-annual fuel content source test fails to show compliance, weekly testing shall resume until compliance is demonstrated for 8 consecutive weeks. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
11. If the steam generator is not fired on PUC-regulated natural gas and compliance is achieved through fuel sulfur content limitations, then the sulfur content of the fuel shall be determined by testing sulfur content at a location after all fuel sources are combined prior to incineration, or by performing mass balance calculations based on monitoring the sulfur content and volume of each fuel source. The sulfur content of the fuel shall be determined using the test methods referenced in this permit. [District Rule 4320]
12. If fuel analysis is used to demonstrate compliance with conditions of this permit, the fuel higher heating value for each fuel shall be certified by a third party fuel supplier or determined by ASTM D 1826 or D 1945 in conjunction with ASTM D 3588 for gaseous fuels. [District Rule 2520, 9.3.2; 4305, 6.2.1; 4320 and 4351, 6.2.1] Federally Enforceable Through Title V Permit
13. Compliance with permit conditions in the Title V permit shall be deemed compliance with the requirements of County Rules 108 (Kings), 108.1 (Fresno, Merced, San Joaquin, Tulare, Kern, and Stanislaus), and 110 (Madera), 402 (Madera), 404 (Fresno, Kern, Tulare, Kings, Stanislaus, Merced, and San Joaquin), 405 (Madera), 408 (Fresno, Kern, Tulare, Kings, Stanislaus, Merced, and San Joaquin), 407.2 (Kern, Tulare, Kings, Stanislaus, and San Joaquin), and 408.2 (Merced). A permit shield is granted from these requirements. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
14. Compliance with permit conditions in the Title V permit shall be deemed compliance with the following requirements: SJVUAPCD Rules 4201 (Last Amended December 17, 1992), 4301 (Last Amended December 17, 1992), 4305 sections 4.2, 5.1, 5.5.1, 5.5.2, 6.1.1, 6.2 (except 6.2.3), 6.3.1, 6.3.2, and 8.1 (Last Amended December 17, 1992), and 4351, sections 4.2, 5.2.2, 6.1.1, 6.2, and 8.1 (Last Amended October 19, 1995). A permit shield is granted from these requirements. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
15. The requirements of 40 CFR 72.6(b) and 40 CFR 60.40c do not apply to this source. A permit shield is granted from this requirement. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
16. The combined sulfur content of all fuels supplied to this steam generator shall not exceed 5 grains S/100scf. [District Rule 4320]
17. Emission rates shall not exceed any of the following PM₁₀: 0.014 lb/MMBtu or VOC: 0.003 lb/MMBtu. [District Rules 2201, 4305, 4306, 4320 and 4351] Federally Enforceable Through Title V Permit

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

18. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when this unit is burning 50% or greater by volume PUC quality gas on a monthly average basis: 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]
19. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when the unit is burning less than 50% by volume PUC quality gas on a monthly average basis: 12 ppmvd NO_x @ 3% O₂ or 0.014 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]
20. The applicable NO_x and CO emissions concentration for each month shall be determined based on the volume and type of fuel combusted in the unit (< 50% by volume PUC quality gas or greater than or equal to 50% by volume PUC quality gas). Permittee shall maintain supporting records that determine the type of fuel combusted. [District Rules 2201 and 4320]
21. PUC quality natural gas is any gaseous fuel where the sulfur content is no more than one-fourth (0.25) grain of hydrogen sulfide per one hundred (100) standard cubic feet, no more than five (5) grains of total sulfur per one hundred (100) standard cubic feet and at least 80% methane by volume. [District Rule 4320]
22. During a shakedown period not to exceed 60 calendar days from initial operation of the modifications authorized by this ATC, NO_x emission rate shall not exceed 15 ppmvd @ 3% O₂ or 0.0182 lb/MMBtu. The shakedown period shall be concluded prior to the applicable Rule 4320 compliance deadline selected for this unit. Permittee shall maintain a record of the date of initial operation and shall make such records readily available for District inspection upon request. [District Rule 4320]
23. Duration of start-up or shutdown shall not exceed two hours each per occurrence. During start-up or shutdown, the emissions control system shall be in operation, and emissions shall be minimized insofar as technologically possible. The operator shall maintain daily records of the duration of start-up and shutdown periods. [District Rules 4305, 5.5.6, 4306, 5.3 and 4320] Federally Enforceable Through Title V Permit
24. Start-up is defined as the period of time during which a unit is brought from a shutdown status to its operating temperature and pressure, including the time required by the unit's emission control system to reach full operation. Shutdown is defined as the period of time during which a unit is taken from an operational to a non-operational status by allowing it to cool down from its operating temperature to ambient temperature as the fuel supply to the unit is completely turned off. [District Rules 4306, 3.25 and 3.22 and 4320] Federally Enforceable Through Title V Permit
25. During start-up and shutdown periods, emissions from the natural gas/vapor recovery gas-fired steam generator shall not exceed either of the following limits: 0.1 lb-NO_x/MMBtu or 0.084 lb-CO/MMBtu. [District Rule 4320]
26. Vapor recovery gas sulfur analysis and heating value determination shall be conducted by District-witnessed, or approved sample collection by an independent laboratory on an annual basis. [District Rule 1081, 7.2 and 2520, 9.5.1] Federally Enforceable Through Title V Permit
27. A source test to demonstrate compliance with NO_x and CO emission limits shall be performed within 60 days of startup of this unit. The NO_x limit in effect at the time of the startup source testing will be determined based on the volume and type of fuel combusted (greater than or equal to 50% PUC quality or < 50% PUC quality gas) and shall be identified in the source test protocol. Whenever the fuel type is switched from the fuel type combusted during the initial startup of this unit, compliance source testing for NO_x and CO shall be conducted within 90 days of the date the fuel type is switched. [District Rules 2201 and 4320]
28. Source testing is required at least once every twelve (12) months from the initial source test date of each fuel type (greater than or equal to 50% PUC quality gas or < 50% PUC quality gas). After an initial compliance demonstration with the NO_x and CO emission limits for each fuel type on two (2) consecutive source tests, the unit shall be tested not less than once every thirty-six (36) months from the last test date for that fuel type. Testing shall not be required for any fuel type not in use during the 36 month period until such time the fuel type is switched, after which testing shall be performed within 90 days of switching fuel types. [District Rules 2201 and 4320]

DRAFT

CONDITIONS CONTINUE ON NEXT PAGE

29. Compliance source testing after switching fuel types is not required if the unit continues to demonstrate compliance with 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas. In which case, source testing shall only be required every thirty-six(36) months for the less than 50% by PUC quality gas. If the result of a source test demonstrates that the unit does not meet 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas, the source test frequency shall revert to at least one test every 36 months for each fuel type. [District Rules 2201 and 4320]
30. Source testing shall be conducted using the methods and procedures approved by the District. The District must be notified 30 days prior to any compliance source test, and a source test plan must be submitted for approval 15 days prior to testing. [District Rule 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
31. The results of each source test shall be submitted to the District within 60 days thereafter. [District Rule 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
32. The permittee shall keep records of the following: sulfur content of the vapor recovery gas on an annual basis; amount of natural gas and amount of vapor recovery gas combusted on a daily basis; and percentage O₂, NO_x concentration, and CO concentration on a monthly basis. [District Rules 1070, 4305, and 2520, 9.5.1] Federally Enforceable Through Title V Permit
33. Emissions for this unit shall be calculated using the arithmetic mean, pursuant to District Rule 1081 (Amended December 16, 1993), of 3 thirty-minute test runs for NO_x and CO. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
34. All equipment, facilities, and systems installed or used to achieve compliance with the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003) shall at all times be maintained in good working order and be operated as efficiently as possible so as to minimize air pollutant emissions. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
35. The Regional Administrator shall be notified in writing within (15) days following any failure of air pollution control equipment, process equipment, or of a process to operate in a normal manner which results in an increase in emissions above any allowable emissions limit stated in Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003). This notification shall include a description of the malfunctioning equipment or abnormal operation, the date of the initial failure, the period of time over which emissions were increased due to the failure, the cause of the failure, the estimated resultant emissions in excess of those allowed under Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003), and the methods utilized to restore normal operations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
36. The Regional Administrator, the head of the State Air Pollution Control Agency, the head of the responsible local air pollution control agency, and/or their authorized representatives, upon the presentation of credentials, shall be permitted: A) to enter upon the premises where the source is located or in which any records are required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and B) at reasonable times to have access to and copy any records required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and C) to inspect any equipment, operation, or method required in Federal Permit SJ 80-14 (as amended August 15, 2003); and D) to sample emissions from the source. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
37. In the event of any changes in control or ownership of facilities, Federal Permit SJ 80-14 (as amended August 15, 2003) shall be binding on all subsequent owners and operators. The applicant shall notify the succeeding owner and operator of the existence of Federal Permit SJ 80-14 (as amended August 15, 2003) and its conditions by letter, a copy of which shall be forwarded to the Regional Administrator and the State and local Air Pollution Control Agency. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
38. The provisions of Federal Permit SJ 80-14 (as amended August 15, 2003) are severable, and, if any provision of amended Federal Permit SJ 80-14 is held invalid, the remainder of amended Federal Permit SJ 80-14 shall not be affected thereby. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
39. The owner and operator of the proposed project shall construct and operate the proposed stationary source in compliance with all other applicable provisions of 40 CFR Parts 52, 60, and 61 and all other applicable Federal, State and local regulations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit

CONDITIONS CONTINUE ON NEXT PAGE

40. 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 analyzer 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 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
41. 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 in lieu of performing the notification and testing required by this condition. [District Rules 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
42. 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 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
43. {4066} The permittee shall maintain records of: (1) the date and time of NOX, CO, and O2 measurements, (2) the O2 concentration in percent by volume 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 4305 and 4306]
44. Compliance demonstration (source testing) shall be by District witnessed, or authorized, sample collection by ARB certified testing laboratory. [District Rule 1081] Federally Enforceable Through Title V Permit
45. The following test methods shall be used: NOx (ppmv) - EPA Method 7E or ARB Method 100, NOx (lb/MMBtu) - EPA Method 19, CO (ppmv) - EPA Method 10 or ARB Method 100, stack gas oxygen - EPA Method 3 or 3A or ARB Method 100, and fuel gas sulfur content - ASTM D3246 or double GC for H2S and mercaptans. [District Rules 1081, 4305, 4320 and 4351] Federally Enforceable Through Title V Permit
46. Permittee shall maintain daily records of total combined volume of fuel gas and vapor recovery gas burned, the dates of any fuel type switching, the monthly NOx and CO emissions limit determinations, the sulfur content and higher heat value as determined by periodic analytical testing or fuel supplier invoices/certifications, and permit number(s) of systems providing gas for incineration. [District Rule 2201, 2520 and 4320]
47. Permittee shall maintain records of fuel hhv and cumulative annual fuel use for a period of 5 years and shall make such records readily available for District inspection upon request. [District Rule 4351] Federally Enforceable Through Title V Permit
48. Steam generator may be operated with ring or perforated type burner diffuser plate. Changes between ring or perforated type burner diffuser plates shall be recorded in a contemporaneous log. [District Rule 2520, 6.4.2] Federally Enforceable Through Title V Permit
49. This ATC shall be implemented concurrently or after ATC S-1127-55-27. [District Rule 2201]

DRAFT

San Joaquin Valley
Air Pollution Control District

AUTHORITY TO CONSTRUCT

ISSUANCE DATE: DRAFT
DRAFT

PERMIT NO: S-1127-57-26

LEGAL OWNER OR OPERATOR: CHEVRON USA INC
MAILING ADDRESS: PO BOX 1392
BAKERSFIELD, CA 93302

LOCATION: HEAVY OIL CENTRAL

SECTION: 03 **TOWNSHIP:** 29S **RANGE:** 28E

EQUIPMENT DESCRIPTION:

MODIFICATION OF 62.5 MMBTU/HR NATURAL GAS/VAPOR RECOVERY GAS FIRED STEAM GENERATOR (CUSA ID# 67-3, DIS# 43008-80) EQUIPPED WITH NORTH AMERICAN MODEL GLE 4231 LOW-NOX BURNER WITH FLUE GAS RECIRCULATION (FGR): LIMIT NOX TO 9 PPM @ 3% O2 (0.011 LB-NOX/MMBTU) OR TO 12 PPMV @ 3% O2 (0.014 LB-NOX/MMBTU) FOR RULE 4320 COMPLIANCE

CONDITIONS

1. {1830} 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 NSR Rule] Federally Enforceable Through Title V Permit
2. {1831} 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. This Authority to Construct shall be implemented according to the date proposed in the District-approved Rule 4320 Emission Control Plan. [District Rule]
4. All required source testing shall conform to the compliance testing procedures described in District Rule 1081 (Last Amended December 16, 1993). [District Rule 1081, and County Rules 108 (Kings), 108.1 (Fresno, Merced, San Joaquin, Tulare, Kern, and Stanislaus), and 110 (Madera)] Federally Enforceable Through Title V Permit
5. Copies of all gas purchase contracts, supplier certifications, and test results to determine compliance with the conditions of this permit shall be maintained. The operator shall record daily amount and type(s) of fuel(s) combusted, fuel source, and all dates on which unit is fired on any noncertified fuel and record specific type of noncertified fuel used. [District Rule 2520, 9.3.2] 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.

Seyed Sadredin, Executive Director APCO

DAVID WARNER, Director of Permit Services

S-1127-57-26 : May 28 2010 12:13PM - GOUGHD : Joint Inspection NOT Required

6. The operator shall maintain all records of required monitoring data and support information for inspection at any time for a period of five years. [District Rule 2520, 9.4.2] Federally Enforceable Through Title V Permit
7. Particulate matter emissions shall not exceed 0.1 grain/dscf, 0.1 grain/dscf calculated to 12% CO₂, nor 10 lb/hr. [District Rules 4201, 3.1 and 4301, 5.1 and 5.2.3] Federally Enforceable Through Title V Permit
8. If the unit is fired on PUC-regulated natural gas, valid purchase contracts, supplier certifications, tariff sheets, or transportation contracts may be used to satisfy the fuel sulfur content analysis, provided they establish the fuel sulfur concentration and higher heating value. [District Rules 2520 and 4320]
9. If the steam generator is not fired on PUC-regulated natural gas, then the sulfur content of the natural gas being fired shall be determined using ASTM D 1072, D 3031, D 4084, D 3246, D 6228, double GC for H₂S and mercaptans, or grab sample analysis by GC-FPD/TCD performed in the laboratory. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
10. When complying with sulfur emission limits by fuel analysis or by a combination of source testing and fuel analysis, each fuel source shall be tested weekly for sulfur content and higher heating value. If compliance with the fuel sulfur content limit and sulfur emission limits has been demonstrated for 8 consecutive weeks for a fuel source, then the fuel testing frequency shall be semi-annually. If a semi-annual fuel content source test fails to show compliance, weekly testing shall resume until compliance is demonstrated for 8 consecutive weeks. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
11. If the steam generator is not fired on PUC-regulated natural gas and compliance is achieved through fuel sulfur content limitations, then the sulfur content of the fuel shall be determined by testing sulfur content at a location after all fuel sources are combined prior to incineration, or by performing mass balance calculations based on monitoring the sulfur content and volume of each fuel source. The sulfur content of the fuel shall be determined using the test methods referenced in this permit. [District Rule 4320]
12. If fuel analysis is used to demonstrate compliance with conditions of this permit, the fuel higher heating value for each fuel shall be certified by a third party fuel supplier or determined by ASTM D 1826 or D 1945 in conjunction with ASTM D 3588 for gaseous fuels. [District Rule 2520, 9.3.2; 4305, 6.2.1; 4351, 6.2.1 and Rule 4306] Federally Enforceable Through Title V Permit
13. Compliance with permit conditions in the Title V permit shall be deemed compliance with the following requirements: SJVUAPCD Rules 4201 (Last Amended December 17, 1992), 4301 (Last Amended December 17, 1992), 4305 sections 4.2, 5.1, 5.5.1, 5.5.2, 6.1.1, 6.2 (except 6.2.3), 6.3.1, 6.3.2, and 8.1 (Last Amended December 17, 1992), and 4351, sections 4.2, 5.2.2, 6.1.1, 6.2, and 8.1 (Last Amended October 19, 1995). A permit shield is granted from these requirements. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
14. The requirements of 40 CFR 72.6(b) and 40 CFR 60.40c do not apply to this source. A permit shield is granted from this requirement. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
15. Emission rates shall not exceed any of the following PM₁₀: 0.014 lb/MMBtu, or VOC: 0.003 lb/MMBtu. [District Rules 2201, 4305 and 4320] Federally Enforceable Through Title V Permit
16. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when this unit is burning 50% or greater by volume PUC quality gas on a monthly average basis: 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]
17. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when the unit is burning less than 50% by volume PUC quality gas on a monthly average basis: 12 ppmvd NO_x @ 3% O₂ or 0.014 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]
18. The applicable NO_x and CO emissions concentration for each month shall be determined based on the volume and type of fuel combusted in the unit (< 50% by volume PUC quality gas or greater than or equal to 50% by volume PUC quality gas). Permittee shall maintain supporting records that determine the type of fuel combusted. [District Rules 2201 and 4320]
19. PUC quality natural gas is any gaseous fuel where the sulfur content is no more than one-fourth (0.25) grain of hydrogen sulfide per one hundred (100) standard cubic feet, no more than five (5) grains of total sulfur per one hundred (100) standard cubic feet and at least 80% methane by volume. [District Rule 4320]

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

20. During a shakedown period not to exceed 60 calendar days from initial operation of the modifications authorized by this ATC, NO_x emission rate shall not exceed 15 ppmvd @ 3% O₂ or 0.0182 lb/MMBtu. The shakedown period shall be concluded prior to the applicable Rule 4320 compliance deadline selected for this unit. Permittee shall maintain a record of the date of initial operation and shall make such records readily available for District inspection upon request. [District Rule 4320]
21. The combined sulfur content of all fuels supplied to this steam generator shall not exceed 5 grains S/100 scf. [District Rule 4320]
22. Duration of start-up or shutdown shall not exceed two hours each per occurrence. During start-up or shutdown, the emissions control system shall be in operation, and emissions shall be minimized insofar as technologically possible. The operator shall maintain daily records of the duration of start-up and shutdown periods. [District Rules 4305, 5.5.6, 4306, 5.3 and 4320] Federally Enforceable Through Title V Permit
23. Start-up is defined as the period of time during which a unit is brought from a shutdown status to its operating temperature and pressure, including the time required by the unit's emission control system to reach full operation. Shutdown is defined as the period of time during which a unit is taken from an operational to a non-operational status by allowing it to cool down from its operating temperature to ambient temperature as the fuel supply to the unit is completely turned off. [District Rules 4306, 3.25 and 3.22 and 4320] Federally Enforceable Through Title V Permit
24. During start-up and shutdown periods, emissions from the natural gas/vapor recovery gas-fired steam generator shall not exceed either of the following limits: 0.1 lb-NO_x/MMBtu or 0.084 lb-CO/MMBtu. [District Rule 4320]
25. Vapor recovery gas sulfur analysis and heating value determination shall be conducted by District-witnessed, or approved sample collection by an independent laboratory on an annual basis. [District Rules 1081, 7.2 and 2520, 9.5.1] Federally Enforceable Through Title V Permit
26. Source testing is required at least once every twelve (12) months from the initial source test date of each fuel type (greater than or equal to 50% PUC quality gas or < 50% PUC quality gas). After an initial compliance demonstration with the NO_x and CO emission limits for each fuel type on two (2) consecutive source tests, the unit shall be tested not less than once every thirty-six (36) months from the last test date for that fuel type. Testing shall not be required for any fuel type not in use during the 36 month period until such time the fuel type is switched, after which testing shall be performed within 90 days of switching fuel types. [District Rule 2201 and 4320]
27. Compliance source testing after switching fuel types is not required if the unit continues to demonstrate compliance with 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas. In which case, source testing shall only be required every thirty-six(36) months for the less than 50% by PUC quality gas. If the result of a source test demonstrates that the unit does not meet 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas, the source test frequency shall revert to at least one test every 36 months for each fuel type. [District Rules 2201 and 4301]
28. Source testing shall be conducted using the methods and procedures approved by the District. The District must be notified 30 days prior to any compliance source test, and a source test plan must be submitted for approval 15 days prior to testing. [District Rule 1081] Federally Enforceable Through Title V Permit
29. The results of each source test shall be submitted to the District within 60 days thereafter. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
30. Permittee shall maintain daily records of total combined volume of fuel gas and vapor recovery gas burned, the dates of any fuel type switching, the monthly NO_x and CO emissions limit determinations, the sulfur content and higher heat value as determined by periodic analytical testing or fuel supplier invoices/certifications, and permit number(s) of systems providing gas for incineration. [District Rules 2201, 2520 and 4320]
31. Permittee shall maintain records of duration of each start-up and shutdown for a period of five years and make such records readily available for District inspection upon request. [District Rule 4306] Federally Enforceable Through Title V Permit
32. Emissions for this unit shall be calculated using the arithmetic mean, pursuant to District Rule 1081 (Amended December 16, 1993), of 3 thirty-minute test runs for NO_x and CO. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

33. All equipment, facilities, and systems installed or used to achieve compliance with the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003) shall at all times be maintained in good working order and be operated as efficiently as possible so as to minimize air pollutant emissions. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
34. The Regional Administrator shall be notified in writing within (15) days following any failure of air pollution control equipment, process equipment, or of a process to operate in a normal manner which results in an increase in emissions above any allowable emissions limit stated in Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003). This notification shall include a description of the malfunctioning equipment or abnormal operation, the date of the initial failure, the period of time over which emissions were increased due to the failure, the cause of the failure, the estimated resultant emissions in excess of those allowed under Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003), and the methods utilized to restore normal operations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
35. The Regional Administrator, the head of the State Air Pollution Control Agency, the head of the responsible local air pollution control agency, and/or their authorized representatives, upon the presentation of credentials, shall be permitted: A) to enter upon the premises where the source is located or in which any records are required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and B) at reasonable times to have access to and copy any records required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and C) to inspect any equipment, operation, or method required in Federal Permit SJ 80-14 (as amended August 15, 2003); and D) to sample emissions from the source. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
36. In the event of any changes in control or ownership of facilities, Federal Permit SJ 80-14 (as amended August 15, 2003) shall be binding on all subsequent owners and operators. The applicant shall notify the succeeding owner and operator of the existence of Federal Permit SJ 80-14 (as amended August 15, 2003) and its conditions by letter, a copy of which shall be forwarded to the Regional Administrator and the State and local Air Pollution Control Agency. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
37. The provisions of Federal Permit SJ 80-14 (as amended August 15, 2003) are severable, and, if any provision of amended Federal Permit SJ 80-14 is held invalid, the remainder of amended Federal Permit SJ 80-14 shall not be affected thereby. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
38. 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 analyzer 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 4305, 4306 and 4306] Federally Enforceable Through Title V Permit
39. 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 in lieu of performing the notification and testing required by this condition. [District Rules 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
40. 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 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 4305, 4306 and 4320] Federally Enforceable Through Title V Permit

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

41. {4066} The permittee shall maintain records of: (1) the date and time of NOX, CO, and O2 measurements, (2) the O2 concentration in percent by volume 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 4305 and 4306]
42. Compliance demonstration (source testing) shall be by District witnessed, or authorized, sample collection by ARB certified testing laboratory. [District Rule 1081] Federally Enforceable Through Title V Permit
43. The following test methods shall be used: NOx (ppmv) - EPA Method 7E or ARB Method 100, NOx (lb/MMBtu) - EPA Method 19, CO (ppmv) - EPA Method 10 or ARB Method 100, stack gas oxygen - EPA Method 3 or 3A or ARB Method 100, stack gas velocities - EPA Method 2, stack gas moisture content - EPA Method 4, and fuel gas sulfur content - ASTM D3246 or double GC for H2S and mercaptans. [District Rules 1081, 4305, 4306, 4320 and 4351] Federally Enforceable Through Title V Permit
44. Permittee shall maintain records of fuel hhv and cumulative annual fuel use for a period of 5 years and shall make such records readily available for District inspection upon request. [District Rule 4351] Federally Enforceable Through Title V Permit
45. Steam generator may be operated with ring or perforated type burner diffuser plate. Changes between ring or perforated type burner diffuser plates shall be recorded in a contemporaneous log. [District Rule 2520, 6.4.2] Federally Enforceable Through Title V Permit
46. This ATC shall be implemented concurrently or after ATC S-1127-57-7. [District Rule 2201]

DRAFT

San Joaquin Valley
Air Pollution Control District

AUTHORITY TO CONSTRUCT

ISSUANCE DATE: DRAFT
DRAFT

PERMIT NO: S-1127-66-30

LEGAL OWNER OR OPERATOR: CHEVRON USA INC
MAILING ADDRESS: PO BOX 1392
BAKERSFIELD, CA 93302

LOCATION: HEAVY OIL CENTRAL

SECTION: 09 TOWNSHIP: 29S RANGE: 28E

EQUIPMENT DESCRIPTION:

MODIFICATION OF 62.5 MMBTU/HR NATURAL GAS/VAPOR RECOVERY GAS FIRED STEAM GENERATOR (CUSA ID# 64-9, DIS# 43005-80) EQUIPPED WITH NORTH AMERICAN MODEL GLE 4231 LOW-NOX BURNER WITH FLUE GAS RECIRCULATION (FGR): LIMIT NOX TO 9 PPM @ 3% O2 (0.011 LB-NOX/MMBTU) OR TO 12 PPMV @ 3% O2 (0.014 LB-NOX/MMBTU) FOR RULE 4320 COMPLIANCE

CONDITIONS

1. {1830} 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 NSR Rule] Federally Enforceable Through Title V Permit
2. {1831} 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. This Authority to Construct shall be implemented according to the date proposed in the District-approved Rule 4320 Emission Control Plan. [District Rule 4320]
4. All required source testing shall conform to the compliance testing procedures described in District Rule 1081 (Last Amended December 16, 1993). [District Rule 1081, and County Rules 108 (Kings), 108.1 (Fresno, Merced, San Joaquin, Tulare, Kern, and Stanislaus), and 110 (Madera)] Federally Enforceable Through Title V Permit
5. Copies of all gas purchase contracts, supplier certifications, and test results to determine compliance with the conditions of this permit shall be maintained. The operator shall record daily amount and type(s) of fuel(s) combusted, fuel source, and all dates on which unit is fired on any noncertified fuel and record specific type of noncertified fuel used. [District Rule 2520, 9.3.2] 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.

Seyed Sadredin, Executive Director APCO

DRAFT

DAVID WARNER, Director of Permit Services

S-1127-66-30 : May 28 2010 12:13PM - GOUGHD : Joint Inspection NOT Required

6. The operator shall maintain all records of required monitoring data and support information for inspection at any time for a period of five years. [District Rule 2520, 9.4.2] Federally Enforceable Through Title V Permit
7. Particulate matter emissions shall not exceed 0.1 grain/dscf, 0.1 grain/dscf calculated to 12% CO₂, nor 10 lb/hr. [District Rules 4201, 3.1 and 4301, 5.1 and 5.2.3] Federally Enforceable Through Title V Permit
8. If the unit is fired on PUC-regulated natural gas, valid purchase contracts, supplier certifications, tariff sheets, or transportation contracts may be used to satisfy the fuel sulfur content analysis, provided they establish the fuel sulfur concentration and higher heating value. [District Rules 2520 and 4320]
9. If the steam generator is not fired on PUC-regulated natural gas, then the sulfur content of the natural gas being fired shall be determined using ASTM D 1072, D 3031, D 4084, D 3246, D 6228, double GC for H₂S and mercaptans, or grab sample analysis by GC-FPD/TCD performed in the laboratory. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
10. When complying with sulfur emission limits by fuel analysis or by a combination of source testing and fuel analysis, each fuel source shall be tested weekly for sulfur content and higher heating value. If compliance with the fuel sulfur content limit and sulfur emission limits has been demonstrated for 8 consecutive weeks for a fuel source, then the fuel testing frequency shall be semi-annually. If a semi-annual fuel content source test fails to show compliance, weekly testing shall resume until compliance is demonstrated for 8 consecutive weeks. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
11. If the steam generator is not fired on PUC-regulated natural gas and compliance is achieved through fuel sulfur content limitations, then the sulfur content of the fuel shall be determined by testing sulfur content at a location after all fuel sources are combined prior to incineration, or by performing mass balance calculations based on monitoring the sulfur content and volume of each fuel source. The sulfur content of the fuel shall be determined using the test methods referenced in this permit. [District Rule 4320]
12. If fuel analysis is used to demonstrate compliance with conditions of this permit, the fuel higher heating value for each fuel shall be certified by a third party fuel supplier or determined by ASTM D 1826 or D 1945 in conjunction with ASTM D 3588 for gaseous fuels. [District Rules 2520, 9.3.2; 4305, 6.2.1; 4351, 6.2.1, 4306 and 4320] Federally Enforceable Through Title V Permit
13. Compliance with permit conditions in the Title V permit shall be deemed compliance with the following requirements: SJVUAPCD Rules 4201 (Last Amended December 17, 1992), 4301 (Last Amended December 17, 1992), 4305 sections 4.2, 5.1, 5.5.1, 5.5.2, 6.1.1, 6.2 (except 6.2.3), 6.3.1, 6.3.2, and 8.1 (Last Amended December 17, 1992), and 4351, sections 4.2, 5.2.2, 6.1.1, 6.2, and 8.1 (Last Amended October 19, 1995). A permit shield is granted from these requirements. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
14. The requirements of 40 CFR 72.6(b) and 40 CFR 60.40c do not apply to this source. A permit shield is granted from this requirement. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
15. Emission rates shall not exceed any of the following PM₁₀: 0.014 lb/MMBtu or VOC: 0.003 lb/MMBtu. [District Rules 2201, 4305 and 4320] Federally Enforceable Through Title V Permit
16. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when this unit is burning 50% or greater by volume PUC quality gas on a monthly average basis: 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]
17. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when the unit is burning less than 50% by volume PUC quality gas on a monthly average basis: 12 ppmvd NO_x @ 3% O₂ or 0.014 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]
18. The applicable NO_x and CO emissions concentration for each month shall be determined based on the volume and type of fuel combusted in the unit (< 50% by volume PUC quality gas or greater than or equal to 50% by volume PUC quality gas). Permittee shall maintain supporting records that determine the type of fuel combusted. [District Rules 2201 and 4320]
19. PUC quality natural gas is any gaseous fuel where the sulfur content is no more than one-fourth (0.25) grain of hydrogen sulfide per one hundred (100) standard cubic feet, no more than five (5) grains of total sulfur per one hundred (100) standard cubic feet and at least 80% methane by volume. [District Rule 4320]

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

20. During a shakedown period not to exceed 60 calendar days from initial operation of the modifications authorized by this ATC, NO_x emission rate shall not exceed 15 ppmvd @ 3% O₂ or 0.0182 lb/MMBtu. The shakedown period shall be concluded prior to the applicable Rule 4320 compliance deadline selected for this unit. Permittee shall maintain a record of the date of initial operation and shall make such records readily available for District inspection upon request. [District Rule 4320]
21. The combined sulfur content of all fuels supplied to this steam generator shall not exceed 5 grains S/100 scf. [District Rule 4320]
22. Duration of start-up or shutdown shall not exceed two hours each per occurrence. During start-up or shutdown, the emissions control system shall be in operation, and emissions shall be minimized insofar as technologically possible. The operator shall maintain daily records of the duration of start-up and shutdown periods. [District Rules 4305, 5.5.6, 4306, 5.3 and 4320] Federally Enforceable Through Title V Permit
23. Start-up is defined as the period of time during which a unit is brought from a shutdown status to its operating temperature and pressure, including the time required by the unit's emission control system to reach full operation. Shutdown is defined as the period of time during which a unit is taken from an operational to a non-operational status by allowing it to cool down from its operating temperature to ambient temperature as the fuel supply to the unit is completely turned off. [District Rules 4306, 3.25 and 3.22 and 4320] Federally Enforceable Through Title V Permit
24. During start-up and shutdown periods, emissions from the natural gas/vapor recovery gas-fired steam generator shall not exceed either of the following limits: 0.1 lb-NO_x/MMBtu or 0.084 lb-CO/MMBtu. [District Rule 4320]
25. Vapor recovery gas sulfur analysis and heating value determination shall be conducted by District-witnessed, or approved sample collection by an independent laboratory on an annual basis. [District Rule 1081, 7.2 and 2520, 9.5.1] Federally Enforceable Through Title V Permit
26. Source testing shall be conducted using the methods and procedures approved by the District. The District must be notified 30 days prior to any compliance source test, and a source test plan must be submitted for approval 15 days prior to testing. [District Rule 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
27. The results of each source test shall be submitted to the District within 60 days thereafter. [District Rule 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
28. The permittee shall keep records of the following: sulfur content of the vapor recovery gas on an annual basis; amount of natural gas and amount of vapor recovery gas combusted on a daily basis; and percentage O₂, NO_x concentration, and CO concentration on a monthly basis. [District Rules 1070, 4305, and 2520, 9.5.1] Federally Enforceable Through Title V Permit
29. Permittee shall maintain records of duration of each start-up and shutdown for a period of five years and make such records readily available for District inspection upon request. [District Rule 4306] Federally Enforceable Through Title V Permit
30. Emissions for this unit shall be calculated using the arithmetic mean, pursuant to District Rule 1081 (Amended December 16, 1993), of 3 thirty-minute test runs for NO_x and CO. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
31. All equipment, facilities, and systems installed or used to achieve compliance with the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003) shall at all times be maintained in good working order and be operated as efficiently as possible so as to minimize air pollutant emissions. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
32. The Regional Administrator shall be notified in writing within (15) days following any failure of air pollution control equipment, process equipment, or of a process to operate in a normal manner which results in an increase in emissions above any allowable emissions limit stated in Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003). This notification shall include a description of the malfunctioning equipment or abnormal operation, the date of the initial failure, the period of time over which emissions were increased due to the failure, the cause of the failure, the estimated resultant emissions in excess of those allowed under Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003), and the methods utilized to restore normal operations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

33. The Regional Administrator, the head of the State Air Pollution Control Agency, the head of the responsible local air pollution control agency, and/or their authorized representatives, upon the presentation of credentials, shall be permitted: A) to enter upon the premises where the source is located or in which any records are required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and B) at reasonable times to have access to and copy any records required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and C) to inspect any equipment, operation, or method required in Federal Permit SJ 80-14 (as amended August 15, 2003); and D) to sample emissions from the source. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
34. In the event of any changes in control or ownership of facilities, Federal Permit SJ 80-14 (as amended August 15, 2003) shall be binding on all subsequent owners and operators. The applicant shall notify the succeeding owner and operator of the existence of Federal Permit SJ 80-14 (as amended August 15, 2003) and its conditions by letter, a copy of which shall be forwarded to the Regional Administrator and the State and local Air Pollution Control Agency. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
35. The provisions of Federal Permit SJ 80-14 (as amended August 15, 2003) are severable, and, if any provision of amended Federal Permit SJ 80-14 is held invalid, the remainder of amended Federal Permit SJ 80-14 shall not be affected thereby. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
36. The owner and operator of the proposed project shall construct and operate the proposed stationary source in compliance with all other applicable provisions of 40 CFR Parts 52, 60, and 61 and all other applicable Federal, State and local regulations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
37. 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 analyzer 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 2520, 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
38. 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 in lieu of performing the notification and testing required by this condition. [District Rules 4305 and 4306]
39. 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 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
40. {4066} The permittee shall maintain records of: (1) the date and time of NOX, CO, and O2 measurements, (2) the O2 concentration in percent by volume 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 4305 and 4306]
41. A source test to demonstrate compliance with NOx and CO emission limits shall be performed within 60 days of startup of this unit. The NOx limit in effect at the time of the startup source testing will be determined based on the volume and type of fuel combusted (greater than or equal to 50% PUC quality or < 50% PUC quality gas) and shall be identified in the source test protocol. Whenever the fuel type is switched from the fuel type combusted during the initial startup of this unit, compliance source testing for NOx and CO shall be conducted within 90 days of the date the fuel type is switched. [District Rules 2201 and 4320]

CONDITIONS CONTINUE ON NEXT PAGE

42. Source testing is required at least once every twelve (12) months from the initial source test date of each fuel type (greater than or equal to 50% PUC quality gas or < 50% PUC quality gas). After an initial compliance demonstration with the NO_x and CO emission limits for each fuel type on two (2) consecutive source tests, the unit shall be tested not less than once every thirty-six (36) months from the last test date for that fuel type. Testing shall not be required for any fuel type not in use during the 36 month period until such time the fuel type is switched, after which testing shall be performed within 90 days of switching fuel types. [District Rules 2201 and 4320]
43. Compliance source testing after switching fuel types is not required if the unit continues to demonstrate compliance with 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas. In which case, source testing shall only be required every thirty-six(36) months for the less than 50% by PUC quality gas. If the result of a source test demonstrates that the unit does not meet 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas, the source test frequency shall revert to at least one test every 36 months for each fuel type. [District Rules 2201 and 4320]
44. Compliance demonstration (source testing) shall be by District witnessed, or authorized, sample collection by ARB certified testing laboratory. [District Rule 1081] Federally Enforceable Through Title V Permit
45. The following test methods shall be used: NO_x (ppmv) - EPA Method 7E or ARB Method 100, NO_x (lb/MMBtu) - EPA Method 19, CO (ppmv) - EPA Method 10 or ARB Method 100, stack gas oxygen - EPA Method 3 or 3A or ARB Method 100, and stack gas moisture content - EPA Method 4 [District Rules 1081, 4305, 4306, 4320 and 4351] Federally Enforceable Through Title V Permit
46. Permittee shall maintain daily records of total combined volume of fuel gas and vapor recovery gas burned, the dates of any fuel type switching, the monthly NO_x and CO emissions limit determinations, the sulfur content and higher heat value as determined by periodic analytical testing or fuel supplier invoices/certifications, and permit number(s) of systems providing gas for incineration. [District Rules 2201, 2520 and 4320]
47. Permittee shall maintain records of fuel hhv and cumulative annual fuel use for a period of 5 years and shall make such records readily available for District inspection upon request. [District Rule 4351] Federally Enforceable Through Title V Permit
48. This ATC shall be implemented concurrently or after ATC S-1127-66-31. [District Rule 2201]

DRAFT

San Joaquin Valley
Air Pollution Control District

AUTHORITY TO CONSTRUCT

ISSUANCE DATE: DRAFT
DRAFT

PERMIT NO: S-1127-69-28

LEGAL OWNER OR OPERATOR: CHEVRON USA INC
MAILING ADDRESS: PO BOX 1392
BAKERSFIELD, CA 93302

LOCATION: HEAVY OIL CENTRAL

SECTION: 04 **TOWNSHIP:** 29S **RANGE:** 28E

EQUIPMENT DESCRIPTION:

MODIFICATION OF 62.5 MMBTU/HR NATURAL GAS/VAPOR RECOVERY GAS-FIRED STEAM GENERATOR CUSA ID# 81-4, DIS# 43013-82) WITH NORTH AMERICAN MODEL 4231 GLE LOW-NOX BURNER AND FGR: LIMIT NOX TO 9 PPM @ 3% O2 (0.011 LB-NOX/MMBTU) OR TO 12 PPMV @ 3% O2 (0.014 LB-NOX/MMBTU) FOR RULE 4320 COMPLIANCE

CONDITIONS

1. {1830} 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 NSR Rule] Federally Enforceable Through Title V Permit
2. {1831} 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. This Authority to Construct shall be implemented according to the date proposed in the District-approved Rule 4320 Emission Control Plan. [District Rule 4320]
4. All required source testing shall conform to the compliance testing procedures described in District Rule 1081(Last Amended December 16, 1993). [District Rule 1081] Federally Enforceable Through Title V Permit
5. Copies of all gas purchase contracts, supplier certifications, and test results to determine compliance with the conditions of this permit shall be maintained. The operator shall record daily amount and type(s) of fuel(s) combusted, fuel source and all dates on which unit is fired on any noncertified fuel and record specific type of noncertified fuel used. [District Rule 2520, 9.3.2] 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.

Seyed Sadredin, Executive Director APCO

DRAFT

DAVID WARNER, Director of Permit Services

S-1127-69-28 : May 28 2010 12:13PM - GOUHHD : Joint Inspection NOT Required

6. The operator shall maintain all records of required monitoring data and support information for inspection at any time for a period of five years. [District Rule 2520, 9.4.2] Federally Enforceable Through Title V Permit
7. Particulate matter emissions shall not exceed 0.1 grain/dscf, 0.1 grain/dscf calculated to 12% CO₂, nor 10 lb/hr. [District Rules 4201, 3.1 and 4301, 5.1 and 5.2.3] Federally Enforceable Through Title V Permit
8. If the unit is fired on PUC-regulated natural gas, valid purchase contracts, supplier certifications, tariff sheets, or transportation contracts may be used to satisfy the fuel sulfur content analysis, provided they establish the fuel sulfur concentration and higher heating value. [District Rules 2520 and 4320]
9. If the steam generator is not fired on PUC-regulated natural gas, then the sulfur content of the natural gas being fired shall be determined using ASTM D 1072, D 3031, D 4084, D 3246, D 6228, double GC for H₂S and mercaptans, or grab sample analysis by GC-FPD/TCD performed in the laboratory. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
10. When complying with sulfur emission limits by fuel analysis or by a combination of source testing and fuel analysis, each fuel source shall be tested weekly for sulfur content and higher heating value. If compliance with the fuel sulfur content limit and sulfur emission limits has been demonstrated for 8 consecutive weeks for a fuel source, then the fuel testing frequency shall be semi-annually. If a semi-annual fuel content source test fails to show compliance, weekly testing shall resume until compliance is demonstrated for 8 consecutive weeks. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
11. If the steam generator is not fired on PUC-regulated natural gas and compliance is achieved through fuel sulfur content limitations, then the sulfur content of the fuel shall be determined by testing sulfur content at a location after all fuel sources are combined prior to incineration, or by performing mass balance calculations based on monitoring the sulfur content and volume of each fuel source. The sulfur content of the fuel shall be determined using the test methods referenced in this permit. [District Rule 4320]
12. If fuel analysis is used to demonstrate compliance with conditions of this permit, the fuel higher heating value for each fuel shall be certified by a third party fuel supplier or determined by ASTM D 1826 or D 1945 in conjunction with ASTM D 3588 for gaseous fuels. [District Rule 2520, 9.3.2; 4305, 6.2.1; and 4351, 6.2.1] Federally Enforceable Through Title V Permit
13. Compliance with permit conditions in the Title V permit shall be deemed compliance with the following requirements: SJVUAPCD Rules 4201 (Last Amended December 17, 1992), 4301 (Last Amended December 17, 1992), 4305 sections 4.2, 5.1, 5.5.1, 5.5.2, 6.1.1, 6.2 (except 6.2.3), 6.3.1, 6.3.2, and 8.1 (Last Amended December 17, 1992), and 4351, sections 4.2, 5.2.2, 6.1.1, 6.2, and 8.1 (Last Amended October 19, 1995). A permit shield is granted from these requirements. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
14. The requirements of 40 CFR 72.6(b) and 40 CFR 60.40c do not apply to this source. A permit shield is granted from this requirement. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
15. Emission rates shall not exceed any of the following PM₁₀: 0.014 lb/MMBtu or VOC: 0.003 lb/MMBtu. [District Rules 2201, 4305 and 4320] Federally Enforceable Through Title V Permit
16. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when this unit is burning 50% or greater by volume PUC quality gas on a monthly average basis: 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]
17. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when the unit is burning less than 50% by volume PUC quality gas on a monthly average basis: 12 ppmvd NO_x @ 3% O₂ or 0.014 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]
18. The applicable NO_x and CO emissions concentration for each month shall be determined based on the volume and type of fuel combusted in the unit (< 50% by volume PUC quality gas or greater than or equal to 50% by volume PUC quality gas). Permittee shall maintain supporting records that determine the type of fuel combusted. [District Rules 2201 and 4320]
19. PUC quality natural gas is any gaseous fuel where the sulfur content is no more than one-fourth (0.25) grain of hydrogen sulfide per one hundred (100) standard cubic feet, no more than five (5) grains of total sulfur per one hundred (100) standard cubic feet and at least 80% methane by volume. [District Rule 4320]

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

20. During a shakedown period not to exceed 60 calendar days from initial operation of the modifications authorized by this ATC, NO_x emission rate shall not exceed 15 ppmvd @ 3% O₂ or 0.0182 lb/MMBtu. The shakedown period shall be concluded prior to the applicable Rule 4320 compliance deadline selected for this unit. Permittee shall maintain a record of the date of initial operation and shall make such records readily available for District inspection upon request. [District Rule 4320]
21. The combined sulfur content of all fuels supplied to this steam generator shall not exceed 5 grains S/100 scf. [District Rule 4320]
22. Duration of start-up or shutdown shall not exceed two hours each per occurrence. During start-up or shutdown, the emissions control system shall be in operation, and emissions shall be minimized insofar as technologically possible. The operator shall maintain daily records of the duration of start-up and shutdown periods. [District Rules 4305, 5.5.6, 4306, 5.3 and 4320] Federally Enforceable Through Title V Permit
23. Start-up is defined as the period of time during which a unit is brought from a shutdown status to its operating temperature and pressure, including the time required by the unit's emission control system to reach full operation. Shutdown is defined as the period of time during which a unit is taken from an operational to a non-operational status by allowing it to cool down from its operating temperature to ambient temperature as the fuel supply to the unit is completely turned off. [District Rules 4306, 3.25 and 3.22 and 4320] Federally Enforceable Through Title V Permit
24. During start-up and shutdown periods, emissions from the natural gas/vapor recovery gas-fired steam generator shall not exceed either of the following limits: 0.1 lb-NO_x/MMBtu or 0.084 lb-CO/MMBtu. [District Rule 4320]
25. Vapor recovery gas sulfur analysis and heating value determination shall be conducted by a District-approved independent laboratory on an annual basis. Sample collection for such determination shall be District-witnessed or approved. [District Rules 1081, 7.2 and 2520, 9.5.1] Federally Enforceable Through Title V Permit
26. A source test to demonstrate compliance with NO_x and CO emission limits shall be performed within 60 days of startup of this unit. The NO_x limit in effect at the time of the startup source testing will be determined based on the volume and type of fuel combusted (greater than or equal to 50% PUC quality or < 50% PUC quality gas) and shall be identified in the source test protocol. Whenever the fuel type is switched from the fuel type combusted during the initial startup of this unit, compliance source testing for NO_x and CO shall be conducted within 90 days of the date the fuel type is switched. [District Rules 2201 and 4320]
27. Source testing is required at least once every twelve (12) months from the initial source test date of each fuel type (greater than or equal to 50% PUC quality gas or < 50% PUC quality gas). After an initial compliance demonstration with the NO_x and CO emission limits for each fuel type on two (2) consecutive source tests, the unit shall be tested not less than once every thirty-six (36) months from the last test date for that fuel type. Testing shall not be required for any fuel type not in use during the 36 month period until such time the fuel type is switched, after which testing shall be performed within 90 days of switching fuel types. [District Rules 2201 and 4320]
28. Compliance source testing after switching fuel types is not required if the unit continues to demonstrate compliance with 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas. In which case, source testing shall only be required every thirty-six(36) months for the less than 50% by PUC quality gas. If the result of a source test demonstrates that the unit does not meet 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas, the source test frequency shall revert to at least one test every 36 months for each fuel type. [District Rules 2201 and 4320]
29. NO_x and CO emissions shall be measured with annual source testing conducted by an independent testing laboratory and shall be witnessed or authorized by the District [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
30. Source testing shall be conducted using the methods and procedures approved by the District. The District must be notified 30 days prior to any compliance source test, and a source test plan must be submitted for approval 15 days prior to testing. [District Rule 1081] Federally Enforceable Through Title V Permit
31. The results of each source test shall be submitted to the District within 60 days thereafter. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

32. Permittee shall maintain records of duration of each start-up and shutdown for a period of five years and make such records readily available for District inspection upon request. [District Rule 4306] Federally Enforceable Through Title V Permit
33. Permittee shall keep weekly records of the sulfur content of the vapor recovery gas, amount of natural gas combusted, and the amount of vapor recovery gas combusted. [District Rule 1070 and 2520, 9.4.2] Federally Enforceable Through Title V Permit
34. Emissions for this unit shall be calculated using the arithmetic mean, pursuant to District Rule 1081 (Amended December 16, 1993), of 3 thirty-minute test runs for NO_x and CO. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
35. All equipment, facilities, and systems installed or used to achieve compliance with the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003) shall at all times be maintained in good working order and be operated as efficiently as possible so as to minimize air pollutant emissions. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
36. The Regional Administrator shall be notified in writing within (15) days following any failure of air pollution control equipment, process equipment, or of a process to operate in a normal manner which results in an increase in emissions above any allowable emissions limit stated in Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003). This notification shall include a description of the malfunctioning equipment or abnormal operation, the date of the initial failure, the period of time over which emissions were increased due to the failure, the cause of the failure, the estimated resultant emissions in excess of those allowed under Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003), and the methods utilized to restore normal operations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
37. The Regional Administrator, the head of the State Air Pollution Control Agency, the head of the responsible local air pollution control agency, and/or their authorized representatives, upon the presentation of credentials, shall be permitted: A) to enter upon the premises where the source is located or in which any records are required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and B) at reasonable times to have access to and copy any records required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and C) to inspect any equipment, operation, or method required in Federal Permit SJ 80-14 (as amended August 15, 2003); and D) to sample emissions from the source. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
38. In the event of any changes in control or ownership of facilities, Federal Permit SJ 80-14 (as amended August 15, 2003) shall be binding on all subsequent owners and operators. The applicant shall notify the succeeding owner and operator of the existence of Federal Permit SJ 80-14 (as amended August 15, 2003) and its conditions by letter, a copy of which shall be forwarded to the Regional Administrator and the State and local Air Pollution Control Agency. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
39. The provisions of Federal Permit SJ 80-14 (as amended August 15, 2003) are severable, and, if any provision of amended Federal Permit SJ 80-14 is held invalid, the remainder of amended Federal Permit SJ 80-14 shall not be affected thereby. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
40. The owner and operator of the proposed project shall construct and operate the proposed stationary source in compliance with all other applicable provisions of 40 CFR Parts 52, 60, and 61 and all other applicable Federal, State and local regulations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
41. 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 analyzer 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 4305, 4306 and 4320]

DRAFT

CONDITIONS CONTINUE ON NEXT PAGE

42. 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 in lieu of performing the notification and testing required by this condition. [District Rules 4305, 4306 and 4320]
43. 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 4305, 4306 and 4320]
44. {4066} The permittee shall maintain records of: (1) the date and time of NOX, CO, and O₂ measurements, (2) the O₂ concentration in percent by volume 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 4305 and 4306]
45. Compliance demonstration (source testing) shall be by District witnessed, or authorized, sample collection by ARB certified testing laboratory. [District Rule 1081] Federally Enforceable Through Title V Permit
46. The following test methods shall be used: NO_x (ppmv) - EPA Method 7E or ARB Method 100, NO_x (lb/MMBtu) - EPA Method 19, CO (ppmv) - EPA Method 10 or ARB Method 100, stack gas oxygen - EPA Method 3 or 3A or ARB Method 100, stack gas velocities - EPA Method 2, and stack gas moisture content - EPA Method 4. [District Rules 1081, 4305, 4320 and 4351] Federally Enforceable Through Title V Permit
47. Permittee shall maintain daily records of total combined volume of fuel gas and vapor recovery gas burned, the dates of any fuel type switching, the monthly NO_x and CO emissions limit determinations, the sulfur content and higher heat value as determined by periodic analytical testing or fuel supplier invoices/certifications, and permit number(s) of systems providing gas for incineration. [District Rules 2201, 2520 and 4320]
48. Permittee shall maintain records of fuel hhv and cumulative annual fuel use for a period of 5 years and shall make such records readily available for District inspection upon request. [District Rule 4351] Federally Enforceable Through Title V Permit
49. This ATC shall be implemented concurrently or after ATC S-1127-69-29. [District Rule 2201]

DRAFT

San Joaquin Valley
Air Pollution Control District

AUTHORITY TO CONSTRUCT

ISSUANCE DATE: DRAFT
DRAFT

PERMIT NO: S-1127-70-29

LEGAL OWNER OR OPERATOR: CHEVRON USA INC
MAILING ADDRESS: PO BOX 1392
BAKERSFIELD, CA 93302

LOCATION: HEAVY OIL CENTRAL

SECTION: NW 3 **TOWNSHIP:** 29S **RANGE:** 28E

EQUIPMENT DESCRIPTION:

MODIFICATION OF 62.5 MMBTU/HR STRUTHERS NATURAL GAS/VAPOR RECOVERY GAS-FIRED STEAM GENERATOR (CUSA ID #80-4, DIS #43010-82) WITH A FLUE GAS RECIRCULATION (FGR) SYSTEM AND A NORTH AMERICAN MODEL GLE LOW NOX BURNER: LIMIT NOX TO 9 PPM @ 3% O2 (0.011 LB-NOX/MMBTU) OR TO 12 PPMV @ 3% O2 (0.014 LB-NOX/MMBTU) FOR RULE 4320 COMPLIANCE

CONDITIONS

1. {1830} 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 NSR Rule] Federally Enforceable Through Title V Permit
2. {1831} 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. This Authority to Construct shall be implemented according to the date proposed in the District-approved Rule 4320 Emission Control Plan. [District Rule 4320]
4. All required source testing shall conform to the compliance testing procedures described in District Rule 1081. [District Rule 1081] Federally Enforceable Through Title V Permit
5. Particulate matter emissions shall not exceed 0.1 grain/dscf, 0.1 grain/dscf calculated to 12% CO2, nor 10 lb/hr. [District Rules 4201, 3.1 and 4301, 5.1 and 5.2.3] Federally Enforceable Through Title V Permit
6. If the steam generator is fired on PUC-regulated natural gas, then the permittee shall maintain on file copies of all natural gas bills or fuel throughput records for a period of five years. [District Rule 2520, 9.3.2] 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.

Seyed Sadredin, Executive Director APCO

DRAFT

DAVID WARNER, Director of Permit Services

S-1127-70-29 : May 28 2010 12:13PM - GOUGHD : Joint Inspection NOT Required

7. If the steam generator is not fired on PUC-regulated natural gas, then the sulfur content of the natural gas being fired in the engine shall be determined using ASTM D 1072, D 3031, D 4084, D 3246, D 6228, double GC for H₂S and mercaptans, or grab sample analysis by GC-FPD/TCD performed in the laboratory. [District Rule S 2520, 9.3.2 AND 4320] Federally Enforceable Through Title V Permit
8. If the steam generator is not fired on PUC-regulated natural gas, the sulfur content of each fuel source shall be tested weekly except that if compliance with the fuel sulfur content limit has been demonstrated for 8 consecutive weeks for a fuel source, then the testing frequency shall be quarterly. If a test shows noncompliance with the sulfur content requirement, the source must return to weekly testing until eight consecutive weeks show compliance. [District Rule 2520, 9.3.2] Federally Enforceable Through Title V Permit
9. Compliance with permit conditions in the Title V permit shall be deemed compliance with the following requirements: SJVUAPCD Rules 4201 (Last Amended December 17, 1992), 4301 (Last Amended December 17, 1992), 4305 sections 4.2, 5.1, 5.5.1, 5.5.2, 6.1.1, 6.2 (except 6.2.3), 6.3.1, 6.3.2, and 8.1 (Last Amended December 17, 1992), and 4351, sections 4.2, 5.2.2, 6.1.1, 6.2, and 8.1 (Last Amended October 19, 1995). A permit shield is granted from these requirements. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
10. The requirements of 40 CFR 72.6(b) and 40 CFR 60.40c do not apply to this source. A permit shield is granted from this requirement. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
11. Duration of start-up or shutdown shall not exceed two hours each per occurrence. During start-up or shutdown, the emissions control system shall be in operation, and emissions shall be minimized insofar as technologically possible. The operator shall maintain daily records of the duration of start-up and shutdown periods. [District Rules 4305, 5.5.6, 4306, 5.3, and 4320] Federally Enforceable Through Title V Permit
12. Start-up is defined as the period of time during which a unit is brought from a shutdown status to its operating temperature and pressure, including the time required by the unit's emission control system to reach full operation. Shutdown is defined as the period of time during which a unit is taken from an operational to a non-operational status by allowing it to cool down from its operating temperature to ambient temperature as the fuel supply to the unit is completely turned off. [District Rule 4306, 3.25 and 3.22] Federally Enforceable Through Title V Permit
13. Emissions from the natural gas/vapor recovery gas-fired steam generator shall not exceed any of the following limits: 0.014 lb-PM₁₀/MMBtu, or 0.003 lb-VOC/MMBtu. [District Rules 2201, 4301, 4320] Federally Enforceable Through Title V Permit
14. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when this unit is burning 50% or greater by volume PUC quality gas on a monthly average basis: 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 29 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]
15. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when the unit is burning less than 50% by volume PUC quality gas on a monthly average basis: 12 ppmvd NO_x @ 3% O₂ or 0.014 lb-NO_x/MMBtu and 29 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]
16. The applicable NO_x and CO emissions concentration for each month shall be determined based on the volume and type of fuel combusted in the unit (< 50% by volume PUC quality gas or greater than or equal to 50% by volume PUC quality gas). Permittee shall maintain supporting records that determine the type of fuel combusted. [District Rules 2201 and 4320]
17. PUC quality natural gas is any gaseous fuel where the sulfur content is no more than one-fourth (0.25) grain of hydrogen sulfide per one hundred (100) standard cubic feet, no more than five (5) grains of total sulfur per one hundred (100) standard cubic feet and at least 80% methane by volume. [District Rule 4320]
18. During a shakedown period not to exceed 60 calendar days from initial operation of the modifications authorized by this ATC, NO_x emission rate shall not exceed 15 ppmvd @ 3% O₂ or 0.0182 lb/MMBtu. The shakedown period shall be concluded prior to the applicable Rule 4320 compliance deadline selected for this unit. Permittee shall maintain a record of the date of initial operation and shall make such records readily available for District inspection upon request. [District Rule 4320]
19. During start-up and shutdown periods, emissions from the natural gas/vapor recovery gas-fired steam generator shall not exceed either of the following limits: 0.1 lb-NO_x/MMBtu or 0.084 lb-CO/MMBtu. [District Rule 2201] Federally Enforceable Through Title V Permit

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

20. Emissions from the natural gas/vapor recovery gas-fired steam generator shall not exceed either of the following limits: 54.0 lb-NO_x/day or 31.5 lb-CO/day. [District Rule 2201] Federally Enforceable Through Title V Permit
21. The combined sulfur content of all fuels supplied to this steam generator shall not exceed 5 grains S/100 scf. [District Rule 4320]
22. The following test methods shall be used: NO_x (ppmv) - EPA Method 7E or ARB Method 100, NO_x (lb/MMBtu) - EPA Method 19, CO (ppmv) - EPA Method 10 or ARB Method 100, stack gas oxygen - EPA Method 3 or 3A or ARB Method 100, stack gas moisture content - EPA Method 4, and stack gas velocities - EPA Method 2. [District Rules 1081, 4305, 4306, 6.2, 4320 and 4351] Federally Enforceable Through Title V Permit
23. A source test to demonstrate compliance with NO_x and CO emission limits shall be performed within 60 days of startup of this unit. The NO_x limit in effect at the time of the startup source testing will be determined based on the volume and type of fuel combusted (greater than or equal to 50% PUC quality or < 50% PUC quality gas) and shall be identified in the source test protocol. Whenever the fuel type is switched from the fuel type combusted during the initial startup of this unit, compliance source testing for NO_x and CO shall be conducted within 90 days of the date the fuel type is switched. [District Rules 2201 and 4320]
24. Source testing is required at least once every twelve (12) months from the initial source test date of each fuel type (greater than or equal to 50% PUC quality gas or < 50% PUC quality gas). After an initial compliance demonstration with the NO_x and CO emission limits for each fuel type on two (2) consecutive source tests, the unit shall be tested not less than once every thirty-six (36) months from the last test date for that fuel type. Testing shall not be required for any fuel type not in use during the 36 month period until such time the fuel type is switched, after which testing shall be performed within 90 days of switching fuel types. [District Rules 2201 and 4320]
25. Compliance source testing after switching fuel types is not required if the unit continues to demonstrate compliance with 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas. In which case, source testing shall only be required every thirty-six (36) months for the less than 50% by PUC quality gas. If the result of a source test demonstrates that the unit does not meet 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas, the source test frequency shall revert to at least one test every 36 months for each fuel type. [District Rules 2201 and 4320]
26. 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 4305, 5.5.2; 4306, 5.5.2 and 4320] Federally Enforceable Through Title V Permit
27. Source testing shall be conducted using the methods and procedures approved by the District. The District must be notified 30 days prior to any compliance source test, and a source test plan must be submitted for approval 15 days prior to testing. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
28. The results of each source test shall be submitted to the District within 60 days thereafter. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
29. 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; 2520, 9.3.2; 4305, 5.5.5; 4306, 5.5.5; and 4320] Federally Enforceable Through Title V Permit
30. All equipment, facilities, and systems installed or used to achieve compliance with the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003) shall at all times be maintained in good working order and be operated as efficiently as possible so as to minimize air pollutant emissions. [PSD SJ 80-14] Federally Enforceable Through Title V Permit

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

31. The Regional Administrator shall be notified in writing within (15) days following any failure of air pollution control equipment, process equipment, or of a process to operate in a normal manner which results in an increase in emissions above any allowable emissions limit stated in Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003). This notification shall include a description of the malfunctioning equipment or abnormal operation, the date of the initial failure, the period of time over which emissions were increased due to the failure, the cause of the failure, the estimated resultant emissions in excess of those allowed under Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003), and the methods utilized to restore normal operations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
32. The Regional Administrator, the head of the State Air Pollution Control Agency, the head of the responsible local air pollution control agency, and/or their authorized representatives, upon the presentation of credentials, shall be permitted: A) to enter upon the premises where the source is located or in which any records are required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and B) at reasonable times to have access to and copy any records required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and C) to inspect any equipment, operation, or method required in Federal Permit SJ 80-14 (as amended August 15, 2003); and D) to sample emissions from the source. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
33. In the event of any changes in control or ownership of facilities, Federal Permit SJ 80-14 (as amended August 15, 2003) shall be binding on all subsequent owners and operators. The applicant shall notify the succeeding owner and operator of the existence of Federal Permit SJ 80-14 (as amended August 15, 2003) and its conditions by letter, a copy of which shall be forwarded to the Regional Administrator and the State and local Air Pollution Control Agency. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
34. The provisions of Federal Permit SJ 80-14 (as amended August 15, 2003) are severable, and, if any provision of amended Federal Permit SJ 80-14 is held invalid, the remainder of amended Federal Permit SJ 80-14 shall not be affected thereby. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
35. The owner and operator of the proposed project shall construct and operate the proposed stationary source in compliance with all other applicable provisions of 40 CFR Parts 52, 60, and 61 and all other applicable Federal, State and local regulations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
36. 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 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
37. 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 in lieu of the performing the notification and testing required by this condition. [District Rules 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
38. 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 4305, 4306 and 4320] Federally Enforceable Through Title V Permit

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

39. 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 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
40. Source sampling to determine the compliance status of an emissions source shall be witnessed or authorized by District personnel. [District Rule 1081] Federally Enforceable Through Title V Permit
41. Copies of all gas purchase contracts, supplier certifications, and test results to determine compliance with the conditions of this permit shall be maintained. The operator shall record daily amount and type(s) of fuel(s) combusted, fuel source, and all dates on which unit is fired on any noncertified fuel and record specific type of noncertified fuel used. [District Rule 2520, 9.3.2] Federally Enforceable Through Title V Permit
42. Permittee shall maintain daily records of total combined volume of fuel gas and vapor recovery gas burned, the dates of any fuel type switching, the monthly NO_x and CO emissions limit determinations, the sulfur content and higher heat value as determined by periodic analytical testing or fuel supplier invoices/certifications, and permit number(s) of systems providing gas for incineration. [District Rules 2201, 2520 and 4320]
43. All records shall be maintained and retained on-site for a minimum of five (5) years, and shall be made available for District inspection upon request. [District Rules 1070, 4305, 6.1, 4306, 6.1 and 4320] Federally Enforceable Through Title V Permit
44. This ATC shall be implemented concurrently or after ATC S-1127-70-30. [District Rule 2201]

DRAFT

San Joaquin Valley
Air Pollution Control District

AUTHORITY TO CONSTRUCT

ISSUANCE DATE: DRAFT
DRAFT

PERMIT NO: S-1127-71-26

LEGAL OWNER OR OPERATOR: CHEVRON USA INC
MAILING ADDRESS: PO BOX 1392
BAKERSFIELD, CA 93302

LOCATION: HEAVY OIL CENTRAL

SECTION: 04 **TOWNSHIP:** 29S **RANGE:** 28E

EQUIPMENT DESCRIPTION:

MODIFICATION OF 62.5 MMBTU/HR NATURAL GAS/VAPOR RECOVERY GAS FIRED STEAM GENERATOR (CUSA ID# 79-4, DIS# 43009-82) WITH NORTH AMERICAN GLE MAGNA FLAME LOW NOX BURNER AND OPTIONAL FGR: INSTALL OPTIONAL USE FLUE GAS RECIRCULATION AND LIMIT NOX TO 9 PPM @ 3% O2 (0.011 LB-NOX/MMBTU) OR TO 12 PPMV @ 3% O2 (0.014 LB-NOX/MMBTU) FOR RULE 4320 COMPLIANCE

CONDITIONS

1. {1830} 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 NSR Rule] Federally Enforceable Through Title V Permit
2. {1831} 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. This Authority to Construct shall be implemented according to the date proposed in the District-approved Rule 4320 Emission Control Plan. [District Rule 4320]
4. All required source testing shall conform to the compliance testing procedures described in District Rule 1081 (Last Amended December 16, 1993). [District Rule 1081, and County Rules 108 (Kings), 108.1 (Fresno, Merced, San Joaquin, Tulare, Kern, and Stanislaus), and 110 (Madera)] Federally Enforceable Through Title V Permit
5. Copies of all gas purchase contracts, supplier certifications, and test results to determine compliance with the conditions of this permit shall be maintained. The operator shall record daily amount and type(s) of fuel(s) combusted, fuel source, and all dates on which unit is fired on any noncertified fuel and record specific type of noncertified fuel used. [District Rule 2520, 9.3.2] 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.

Seyed Sadredin, Executive Director / APCO

DAVID WARNER, Director of Permit Services

S-1127-71-26 : May 28 2010 12:13PM - GOUUGH : Joint Inspection NOT Required

6. The operator shall maintain all records of required monitoring data and support information for inspection at any time for a period of five years. [District Rule 2520, 9.4.2] Federally Enforceable Through Title V Permit
7. Particulate matter emissions shall not exceed 0.1 grain/dscf, 0.1 grain/dscf calculated to 12% CO₂, nor 10 lb/hr. [District Rules 4201, 3.1 and 4301, 5.1 and 5.2.3] Federally Enforceable Through Title V Permit
8. If the unit is fired on PUC-regulated natural gas, valid purchase contracts, supplier certifications, tariff sheets, or transportation contracts may be used to satisfy the fuel sulfur content analysis, provided they establish the fuel sulfur concentration and higher heating value. [District Rules 2520 and 4320]
9. If the steam generator is not fired on PUC-regulated natural gas, then the sulfur content of the natural gas being fired shall be determined using ASTM D 1072, D 3031, D 4084, D 3246, D 6228, double GC for H₂S and mercaptans, or grab sample analysis by GC-FPD/TCD performed in the laboratory. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
10. When complying with sulfur emission limits by fuel analysis or by a combination of source testing and fuel analysis, each fuel source shall be tested weekly for sulfur content and higher heating value. If compliance with the fuel sulfur content limit and sulfur emission limits has been demonstrated for 8 consecutive weeks for a fuel source, then the fuel testing frequency shall be semi-annually. If a semi-annual fuel content source test fails to show compliance, weekly testing shall resume until compliance is demonstrated for 8 consecutive weeks. [District Rule 2520 and 4320] Federally Enforceable Through Title V Permit
11. If the steam generator is not fired on PUC-regulated natural gas and compliance is achieved through fuel sulfur content limitations, then the sulfur content of the fuel shall be determined by testing sulfur content at a location after all fuel sources are combined prior to incineration, or by performing mass balance calculations based on monitoring the sulfur content and volume of each fuel source. The sulfur content of the fuel shall be determined using the test methods referenced in this permit. [District Rule 4320]
12. If fuel analysis is used to demonstrate compliance with conditions of this permit, the fuel higher heating value for each fuel shall be certified by a third party fuel supplier or determined by ASTM D 1826 or D 1945 in conjunction with ASTM D 3588 for gaseous fuels. [District Rule 2520, 9.3.2; 4305, 6.2.1; 4320 and 4351, 6.2.1] Federally Enforceable Through Title V Permit
13. Compliance with permit conditions in the Title V permit shall be deemed compliance with the requirements of County Rules 108 (Kings), 108.1 (Fresno, Merced, San Joaquin, Tulare, Kern, and Stanislaus), and 110 (Madera), 402 (Madera), 404 (Fresno, Kern, Tulare, Kings, Stanislaus, Merced, and San Joaquin), 405 (Madera), 408 (Fresno, Kern, Tulare, Kings, Stanislaus, Merced, and San Joaquin), 407.2 (Kern, Tulare, Kings, Stanislaus, and San Joaquin), and 408.2 (Merced). A permit shield is granted from these requirements. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
14. Compliance with permit conditions in the Title V permit shall be deemed compliance with the following requirements: SJVUAPCD Rules 4201 (Last Amended December 17, 1992), 4301 (Last Amended December 17, 1992), 4305 sections 4.2, 5.1, 5.5.1, 5.5.2, 6.1.1, 6.2 (except 6.2.3), 6.3.1, 6.3.2, and 8.1 (Last Amended December 17, 1992), and 4351, sections 4.2, 5.2.2, 6.1.1, 6.2, and 8.1 (Last Amended October 19, 1995). A permit shield is granted from these requirements. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
15. The requirements of 40 CFR 72.6(b) and 40 CFR 60.40c do not apply to this source. A permit shield is granted from this requirement. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
16. Emission rates shall not exceed PM₁₀: 0.014 lb/MMBtu or VOC: 0.003 lb/MMBtu. [District Rules 2201, 4305, 4306, 4320 and 4351] Federally Enforceable Through Title V Permit
17. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when this unit is burning 50% or greater by volume PUC quality gas on a monthly average basis: 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]
18. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when the unit is burning less than 50% by volume PUC quality gas on a monthly average basis: 12 ppmvd NO_x @ 3% O₂ or 0.014 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

19. The applicable NO_x and CO emissions concentration for each month shall be determined based on the volume and type of fuel combusted in the unit (< 50% by volume PUC quality gas or greater than or equal to 50% by volume PUC quality gas). Permittee shall maintain supporting records that determine the type of fuel combusted. [District Rules 2201 and 4320]
20. PUC quality natural gas is any gaseous fuel where the sulfur content is no more than one-fourth (0.25) grain of hydrogen sulfide per one hundred (100) standard cubic feet, no more than five (5) grains of total sulfur per one hundred (100 standard cubic feet) and at least 80% methane by volume. [District Rule 4320]
21. During a shakedown period not to exceed 60 calendar days from initial operation of the modifications authorized by this ATC, NO_x emission rate shall not exceed 15 ppmvd @ 3% O₂ or 0.0182 lb/MMBtu. The shakedown period shall be concluded prior to the applicable Rule 4320 compliance deadline selected for this unit. Permittee shall maintain a record of the date of initial operation and shall make such records readily available for District inspection upon request. [District Rule 4320]
22. The combined sulfur content of all fuels supplied to this steam generator shall not exceed 5 grains S/100 scf. [District Rule 4320]
23. Duration of start-up or shutdown shall not exceed two hours each per occurrence. During start-up or shutdown, the emissions control system shall be in operation, and emissions shall be minimized insofar as technologically possible. The operator shall maintain daily records of the duration of start-up and shutdown periods. [District Rules 4305, 5.5.6, 4306, 5.3 and 4320] Federally Enforceable Through Title V Permit
24. Start-up is defined as the period of time during which a unit is brought from a shutdown status to its operating temperature and pressure, including the time required by the unit's emission control system to reach full operation. Shutdown is defined as the period of time during which a unit is taken from an operational to a non-operational status by allowing it to cool down from its operating temperature to ambient temperature as the fuel supply to the unit is completely turned off. [District Rules 4306, 3.25 and 3.22 and 4320] Federally Enforceable Through Title V Permit
25. During start-up and shutdown periods, emissions from the natural gas/vapor recovery gas-fired steam generator shall not exceed either of the following limits: 0.1 lb-NO_x/MMBtu or 0.084 lb-CO/MMBtu. [District Rule 4320]
26. Vapor recovery gas sulfur analysis and heating value determination shall be conducted by District-witnessed, or approved sample collection by an independent laboratory on an annual basis. [District Rules 1081, 7.2 and 2520, 9.5.1] Federally Enforceable Through Title V Permit
27. A source test to demonstrate compliance with NO_x and CO emission limits shall be performed within 60 days of startup of this unit. The NO_x limit in effect at the time of the startup source testing will be determined based on the volume and type of fuel combusted (greater than or equal to 50% PUC quality or < 50% PUC quality gas) and shall be identified in the source test protocol. Whenever the fuel type is switched from the fuel type combusted during the initial startup of this unit, compliance source testing for NO_x and CO shall be conducted within 90 days of the date the fuel type is switched. [District Rules 2201 and 4320]
28. Source testing is required at least once every twelve (12) months from the initial source test date of each fuel type (greater than or equal to 50% PUC quality gas or < 50% PUC quality gas). After an initial compliance demonstration with the NO_x and CO emission limits for each fuel type on two (2) consecutive source tests, the unit shall be tested not less than once every thirty-six (36) months from the last test date for that fuel type. Testing shall not be required for any fuel type not in use during the 36 month period until such time the fuel type is switched, after which testing shall be performed within 90 days of switching fuel types. [District Rules 2201 and 4320]
29. Compliance source testing after switching fuel types is not required if the unit continues to demonstrate compliance with 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas. In which case, source testing shall only be required every thirty-six(36) months for the less than 50% by PUC quality gas. If the result of a source test demonstrates that the unit does not meet 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas, the source test frequency shall revert to at least one test every 36 months for each fuel type. [District Rules 2201 and 4320]
30. Source testing shall be conducted using the methods and procedures approved by the District. The District must be notified 30 days prior to any compliance source test, and a source test plan must be submitted for approval 15 days prior to testing. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit

CONDITIONS CONTINUE ON NEXT PAGE

31. The results of each source test shall be submitted to the District within 60 days thereafter. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
32. The permittee shall keep records of the following: sulfur content of the vapor recovery gas on an annual basis; amount of natural gas and amount of vapor recovery gas combusted on a daily basis; and percentage O₂, NO_x concentration, and CO concentration on a monthly basis. [District Rules 1070, 4305, and 2520, 9.3.2] Federally Enforceable Through Title V Permit
33. Emissions for this unit shall be calculated using the arithmetic mean, pursuant to District Rule 1081 (Amended December 16, 1993), of 3 thirty-minute test runs for NO_x and CO. This mean shall be multiplied by the appropriate factor. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
34. All equipment, facilities, and systems installed or used to achieve compliance with the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003) shall at all times be maintained in good working order and be operated as efficiently as possible so as to minimize air pollutant emissions. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
35. The Regional Administrator shall be notified in writing within (15) days following any failure of air pollution control equipment, process equipment, or of a process to operate in a normal manner which results in an increase in emissions above any allowable emissions limit stated in Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003). This notification shall include a description of the malfunctioning equipment or abnormal operation, the date of the initial failure, the period of time over which emissions were increased due to the failure, the cause of the failure, the estimated resultant emissions in excess of those allowed under Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003), and the methods utilized to restore normal operations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
36. The Regional Administrator, the head of the State Air Pollution Control Agency, the head of the responsible local air pollution control agency, and/or their authorized representatives, upon the presentation of credentials, shall be permitted: A) to enter upon the premises where the source is located or in which any records are required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and B) at reasonable times to have access to and copy any records required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and C) to inspect any equipment, operation, or method required in Federal Permit SJ 80-14 (as amended August 15, 2003); and D) to sample emissions from the source. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
37. In the event of any changes in control or ownership of facilities, Federal Permit SJ 80-14 (as amended August 15, 2003) shall be binding on all subsequent owners and operators. The applicant shall notify the succeeding owner and operator of the existence of Federal Permit SJ 80-14 (as amended August 15, 2003) and its conditions by letter, a copy of which shall be forwarded to the Regional Administrator and the State and local Air Pollution Control Agency. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
38. The provisions of Federal Permit SJ 80-14 (as amended August 15, 2003) are severable, and, if any provision of amended Federal Permit SJ 80-14 is held invalid, the remainder of amended Federal Permit SJ 80-14 shall not be affected thereby. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
39. The owner and operator of the proposed project shall construct and operate the proposed stationary source in compliance with all other applicable provisions of 40 CFR Parts 52, 60, and 61 and all other applicable Federal, State and local regulations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
40. Compliance demonstration (source testing) shall be by District witnessed, or authorized, sample collection by ARB certified testing laboratory. [District Rule 1081] Federally Enforceable Through Title V Permit
41. The following test methods shall be used: NO_x (ppmv) - EPA Method 7E or ARB Method 100, NO_x (lb/MMBtu) - EPA Method 19, CO (ppmv) - EPA Method 10 or ARB Method 100, stack gas oxygen - EPA Method 3 or 3A or ARB Method 100, stack gas velocities - EPA Method 2, and stack gas moisture content - EPA Method 4. [District Rules 1081, 4305, 4320 and 4351] Federally Enforceable Through Title V Permit

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

42. 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 analyzer 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 4305, 4306, and 4320]
43. 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 in lieu of performing the notification and testing required by this condition. [District Rules 4305, 4306 and 4320]
44. 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 4305, 4306 and 4320]
45. {4066} The permittee shall maintain records of: (1) the date and time of NOX, CO, and O2 measurements, (2) the O2 concentration in percent by volume 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 4305 and 4306]
46. Permittee shall maintain daily records of total combined volume of fuel gas and vapor recovery gas burned, the dates of any fuel type switching, the monthly NOx and CO emissions limit determinations, the sulfur content and higher heat value as determined by periodic analytical testing or fuel supplier invoices/certifications, and permit number(s) of systems providing gas for incineration. [District Rules 2201, 2520 and 4320]
47. Permittee shall maintain records of fuel hhv and cumulative annual fuel use for a period of 5 years and shall make such records readily available for District inspection upon request. [District Rule 4351] Federally Enforceable Through Title V Permit
48. This ATC shall be implemented concurrently or after ATC S-1127-71-27. [District Rule 2201]

DRAFT

San Joaquin Valley
Air Pollution Control District

AUTHORITY TO CONSTRUCT

ISSUANCE DATE: DRAFT
DRAFT

PERMIT NO: S-1127-73-26

LEGAL OWNER OR OPERATOR: CHEVRON USA INC
MAILING ADDRESS: PO BOX 1392
BAKERSFIELD, CA 93302

LOCATION: HEAVY OIL CENTRAL

SECTION: 32 **TOWNSHIP:** 28S **RANGE:** 28E

EQUIPMENT DESCRIPTION:

MODIFICATION OF 62.5 MMBTU/HR NATURAL GAS/VAPOR RECOVERY GAS-FIRED STEAM GENERATOR (CUSA ID# 53-32, DIS# 43012-78) WITH NORTH AMERICAN GLE MAGNA FLAME LOW NOX BURNER AND LOW PRESSURE FUEL INDUCED RECIRCULATION: INSTALL OPTIONAL USE FLUE GAS RECIRCULATION AND LIMIT NOX TO 9 PPM @ 3% O2 (0.011 LB-NOX/MMBTU) OR TO 12 PPMV @ 3% O2 (0.014 LB-NOX/MMBTU) FOR RULE 4320 COMPLIANCE

CONDITIONS

1. {1830} 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 NSR Rule] Federally Enforceable Through Title V Permit
2. {1831} 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. This Authority to Construct shall be implemented according to the date proposed in the District-approved Rule 4320 Emission Control Plan. [District Rule 4320]
4. All required source testing shall conform to the compliance testing procedures described in District Rule 1081 (Last Amended December 16, 1993). [District Rule 1081, and County Rules 108 (Kings), 108.1 (Fresno, Merced, San Joaquin, Tulare, Kern, and Stanislaus), and 110 (Madera)] Federally Enforceable Through Title V Permit
5. Copies of all gas purchase contracts, supplier certifications, and test results to determine compliance with the conditions of this permit shall be maintained. The operator shall record daily amount and type(s) of fuel(s) combusted, fuel source, and all dates on which unit is fired on any noncertified fuel and record specific type of noncertified fuel used. [District Rule 2520, 9.3.2] 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.

Seyed Sadredin, Executive Director APCO

DRAFT

DAVID WARNER, Director of Permit Services
S-1127-73-26 : May 28 2010 12:13PM - GOUHHD : Joint Inspection NOT Required

6. The operator shall maintain all records of required monitoring data and support information for inspection at any time for a period of five years. [District Rule 2520, 9.4.2] Federally Enforceable Through Title V Permit
7. Particulate matter emissions shall not exceed 0.1 grain/dscf, 0.1 grain/dscf calculated to 12% CO₂, nor 10 lb/hr. [District Rules 4201, 3.1 and 4301, 5.1 and 5.2.3] Federally Enforceable Through Title V Permit
8. If the unit is fired on PUC-regulated natural gas, valid purchase contracts, supplier certifications, tariff sheets, or transportation contracts may be used to satisfy the fuel sulfur content analysis, provided they establish the fuel sulfur concentration and higher heating value. [District Rules 2520 and 4320]
9. If the steam generator is not fired on PUC-regulated natural gas, then the sulfur content of the natural gas being fired shall be determined using ASTM D 1072, D 3031, D 4084, D 3246, D 6228, double GC for H₂S and mercaptans, or grab sample analysis by GC-FPD/TCD performed in the laboratory. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
10. When complying with sulfur emission limits by fuel analysis or by a combination of source testing and fuel analysis, each fuel source shall be tested weekly for sulfur content and higher heating value. If compliance with the fuel sulfur content limit and sulfur emission limits has been demonstrated for 8 consecutive weeks for a fuel source, then the fuel testing frequency shall be semi-annually. If a semi-annual fuel content source test fails to show compliance, weekly testing shall resume until compliance is demonstrated for 8 consecutive weeks. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
11. If the steam generator is not fired on PUC-regulated natural gas and compliance is achieved through fuel sulfur content limitations, then the sulfur content of the fuel shall be determined by testing sulfur content at a location after all fuel sources are combined prior to incineration, or by performing mass balance calculations based on monitoring the sulfur content and volume of each fuel source. The sulfur content of the fuel shall be determined using the test methods referenced in this permit. [District Rule 4320]
12. If fuel analysis is used to demonstrate compliance with conditions of this permit, the fuel higher heating value for each fuel shall be certified by a third party fuel supplier or determined by ASTM D 1826 or D 1945 in conjunction with ASTM D 3588 for gaseous fuels. [District Rule 2520, 9.3.2; 4305, 6.2.14320, and 4351, 6.2.1] Federally Enforceable Through Title V Permit
13. Compliance with permit conditions in the Title V permit shall be deemed compliance with the requirements of County Rules 108 (Kings), 108.1 (Fresno, Merced, San Joaquin, Tulare, Kern, and Stanislaus), and 110 (Madera), 402 (Madera), 404 (Fresno, Kern, Tulare, Kings, Stanislaus, Merced, and San Joaquin), 405 (Madera), 408 (Fresno, Kern, Tulare, Kings, Stanislaus, Merced, and San Joaquin), 407.2 (Kern, Tulare, Kings, Stanislaus, and San Joaquin), and 408.2 (Merced). A permit shield is granted from these requirements. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
14. Compliance with permit conditions in the Title V permit shall be deemed compliance with the following requirements: SJVUAPCD Rules 4201 (Last Amended December 17, 1992), 4301 (Last Amended December 17, 1992), 4305 sections 4.2, 5.1, 5.5.1, 5.5.2, 6.1.1, 6.2 (except 6.2.3), 6.3.1, 6.3.2, and 8.1 (Last Amended December 17, 1992), and 4351, sections 4.2, 5.2.2, 6.1.1, 6.2, and 8.1 (Last Amended October 19, 1995). A permit shield is granted from these requirements. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
15. The requirements of 40 CFR 72.6(b) and 40 CFR 60.40c do not apply to this source. A permit shield is granted from this requirement. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
16. Emission rates shall not exceed any of the following PM₁₀: 0.014 lb/MMBtu or VOC: 0.003 lb/MMBtu. [District Rules 2201, 4305, 4306, 4320 and 4351] Federally Enforceable Through Title V Permit
17. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when this unit is burning 50% or greater by volume PUC quality gas on a monthly average basis: 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]
18. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when the unit is burning less than 50% by volume PUC quality gas on a monthly average basis: 12 ppmvd NO_x @ 3% O₂ or 0.014 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

19. The applicable NO_x and CO emissions concentration for each month shall be determined based on the volume and type of fuel combusted in the unit (< 50% by volume PUC quality gas or greater than or equal to 50% by volume PUC quality gas). Permittee shall maintain supporting records that determine the type of fuel combusted. [District Rules 2201 and 4320]
20. PUC quality natural gas is any gaseous fuel where the sulfur content is no more than one-fourth (0.25) grain of hydrogen sulfide per one hundred (100) standard cubic feet, no more than five (5) grains of total sulfur per one hundred (100) standard cubic feet and at least 80% methane by volume. [District Rule 4320]
21. During a shakedown period not to exceed 60 calendar days from initial operation of the modifications authorized by this ATC, NO_x emission rate shall not exceed 15 ppmvd @ 3% O₂ or 0.0182 lb/MMBtu. The shakedown period shall be concluded prior to the applicable Rule 4320 compliance deadline selected for this unit. Permittee shall maintain a record of the date of initial operation and shall make such records readily available for District inspection upon request. [District Rule 4320]
22. Duration of start-up or shutdown shall not exceed two hours each per occurrence. During start-up or shutdown, the emissions control system shall be in operation, and emissions shall be minimized insofar as technologically possible. The operator shall maintain daily records of the duration of start-up and shutdown periods. [District Rules 4305, 5.5.6, 4306, 5.3 and 4320] Federally Enforceable Through Title V Permit
23. Start-up is defined as the period of time during which a unit is brought from a shutdown status to its operating temperature and pressure, including the time required by the unit's emission control system to reach full operation. Shutdown is defined as the period of time during which a unit is taken from an operational to a non-operational status by allowing it to cool down from its operating temperature to ambient temperature as the fuel supply to the unit is completely turned off. [District Rules 4306, 3.25 and 3.22 and 4320] Federally Enforceable Through Title V Permit
24. During start-up and shutdown periods, emissions from the natural gas/vapor recovery gas-fired steam generator shall not exceed either of the following limits: 0.1 lb-NO_x/MMBtu or 0.084 lb-CO/MMBtu. [District Rule 4320]
25. 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 analyzer 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 4305, 4306 and 4320]
26. 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 in lieu of performing the notification and testing required by this condition. [District Rules 4305, 4306 and 4320]
27. 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 4305, 4306 and 4320]
28. {4066} The permittee shall maintain records of: (1) the date and time of NO_x, CO, and O₂ measurements, (2) the O₂ concentration in percent by volume 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 4305 and 4306]

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

29. A source test to demonstrate compliance with NO_x and CO emission limits shall be performed within 60 days of startup of this unit. The NO_x limit in effect at the time of the startup source testing will be determined based on the volume and type of fuel combusted (greater than or equal to 50% PUC quality or < 50% PUC quality gas) and shall be identified in the source test protocol. Whenever the fuel type is switched from the fuel type combusted during the initial startup of this unit, compliance source testing for NO_x and CO shall be conducted within 90 days of the date the fuel type is switched. [District Rules 2201 and 4320]
30. Source testing is required at least once every twelve (12) months from the initial source test date of each fuel type (greater than or equal to 50% PUC quality gas or < 50% PUC quality gas). After an initial compliance demonstration with the NO_x and CO emission limits for each fuel type on two (2) consecutive source tests, the unit shall be tested not less than once every thirty-six (36) months from the last test date for that fuel type. Testing shall not be required for any fuel type not in use during the 36 month period until such time the fuel type is switched, after which testing shall be performed within 90 days of switching fuel types. [District Rules 2201 and 4320]
31. Compliance source testing after switching fuel types is not required if the unit continues to demonstrate compliance with 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas. In which case, source testing shall only be required every thirty-six(36) months for the less than 50% by PUC quality gas. If the result of a source test demonstrates that the unit does not meet 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas, the source test frequency shall revert to at least one test every 36 months for each fuel type. [District Rules 2201 and 4320]
32. Source testing shall be conducted using the methods and procedures approved by the District. The District must be notified 30 days prior to any compliance source test, and a source test plan must be submitted for approval 15 days prior to testing. [District Rule 1081] Federally Enforceable Through Title V Permit
33. The results of each source test shall be submitted to the District within 60 days thereafter. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
34. The permittee shall keep records of the following: sulfur content of the vapor recovery gas on an annual basis; amount of natural gas and amount of vapor recovery gas combusted on a daily basis. [District Rule 1070 and 2520, 9.5.1] Federally Enforceable Through Title V Permit
35. Emissions for this unit shall be calculated using the arithmetic mean, pursuant to District Rule 1081 (Amended December 16, 1993), of 3 thirty-minute test runs for NO_x and CO. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
36. All equipment, facilities, and systems installed or used to achieve compliance with the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003) shall at all times be maintained in good working order and be operated as efficiently as possible so as to minimize air pollutant emissions. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
37. The Regional Administrator shall be notified in writing within (15) days following any failure of air pollution control equipment, process equipment, or of a process to operate in a normal manner which results in an increase in emissions above any allowable emissions limit stated in Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003). This notification shall include a description of the malfunctioning equipment or abnormal operation, the date of the initial failure, the period of time over which emissions were increased due to the failure, the cause of the failure, the estimated resultant emissions in excess of those allowed under Section VIII of Federal Permit SJ 80-14 (as amended August 15, 2003), and the methods utilized to restore normal operations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
38. The Regional Administrator, the head of the State Air Pollution Control Agency, the head of the responsible local air pollution control agency, and/or their authorized representatives, upon the presentation of credentials, shall be permitted: A) to enter upon the premises where the source is located or in which any records are required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and B) at reasonable times to have access to and copy any records required to be kept under the terms and conditions of Federal Permit SJ 80-14 (as amended August 15, 2003); and C) to inspect any equipment, operation, or method required in Federal Permit SJ 80-14 (as amended August 15, 2003); and D) to sample emissions from the source. [PSD SJ 80-14] Federally Enforceable Through Title V Permit

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

39. In the event of any changes in control or ownership of facilities, Federal Permit SJ 80-14 (as amended August 15, 2003) shall be binding on all subsequent owners and operators. The applicant shall notify the succeeding owner and operator of the existence of Federal Permit SJ 80-14 (as amended August 15, 2003) and its conditions by letter, a copy of which shall be forwarded to the Regional Administrator and the State and local Air Pollution Control Agency. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
40. The provisions of Federal Permit SJ 80-14 (as amended August 15, 2003) are severable, and, if any provision of amended Federal Permit SJ 80-14 is held invalid, the remainder of amended Federal Permit SJ 80-14 shall not be affected thereby. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
41. The owner and operator of the proposed project shall construct and operate the proposed stationary source in compliance with all other applicable provisions of 40 CFR Parts 52, 60, and 61 and all other applicable Federal, State and local regulations. [PSD SJ 80-14] Federally Enforceable Through Title V Permit
42. Compliance demonstration (source testing) shall be by District witnessed, or authorized, sample collection by ARB certified testing laboratory. [District Rule 1081] Federally Enforceable Through Title V Permit
43. The following test methods shall be used: NO_x (ppmv) - EPA Method 7E or ARB Method 100, NO_x (lb/MMBtu) - EPA Method 19, CO (ppmv) - EPA Method 10 or ARB Method 100, stack gas oxygen - EPA Method 3 or 3A or ARB Method 100, stack gas velocities - EPA Method 2, and stack gas moisture content - EPA Method 4. [District Rules 1081, 4305, 4320, and 4351] Federally Enforceable Through Title V Permit
44. Permittee shall maintain daily records of total combined volume of fuel gas and vapor recovery gas burned, the dates of any fuel type switching, the monthly NO_x and CO emissions limit determinations, the sulfur content and higher heat value as determined by periodic analytical testing or fuel supplier invoices/certifications, and permit number(s) of systems providing gas for incineration. [District Rules 2201, 2520 and 4320]
45. Permittee shall maintain records of fuel hhv and cumulative annual fuel use for a period of 5 years and shall make such records readily available for District inspection upon request. [District Rule 4351] Federally Enforceable Through Title V Permit
46. This ATC shall be implemented concurrently or after ATC S-1127-73-27. [District Rule 2201]

DRAFT

San Joaquin Valley
Air Pollution Control District

AUTHORITY TO CONSTRUCT

ISSUANCE DATE: DRAFT
DRAFT

PERMIT NO: S-1127-112-23

LEGAL OWNER OR OPERATOR: CHEVRON USA INC
MAILING ADDRESS: PO BOX 1392
BAKERSFIELD, CA 93302

LOCATION: HEAVY OIL CENTRAL

SECTION: 32 **TOWNSHIP:** 28S **RANGE:** 28E

EQUIPMENT DESCRIPTION:

MODIFICATION OF 62.5 MMBTU/HR NATURAL GAS/VAPOR RECOVERY GAS-FIRED STEAM GENERATOR (CUSA ID# 77-32, DIS# 43011-82) WITH NORTH AMERICAN GLE MAGNA FLAME LOW NOX BURNER AND LOW PRESSURE FUEL INDUCED RECIRCULATION: INSTALL OPTIONAL USE FLUE GAS RECIRCULATION AND LIMIT NOX TO 9 PPM @ 3% O2 (0.011 LB-NOX/MMBTU) OR TO 12 PPMV @ 3% O2 (0.014 LB-NOX/MMBTU) FOR RULE 4320 COMPLIANCE

CONDITIONS

1. {1830} 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 NSR Rule] Federally Enforceable Through Title V Permit
2. {1831} 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. This Authority to Construct shall be implemented according to the date proposed in the District-approved Rule 4320 Emission Control Plan. [District Rule]
4. All required source testing shall conform to the compliance testing procedures described in District Rule 1081(Last Amended December 16,1993). [District Rule 1081, and County Rules 108 (Kings), 108.1 (Fresno, Merced, San Joaquin, Tulare, Kern, and Stanislaus), and 110 (Madera)] Federally Enforceable Through Title V Permit
5. Copies of all gas purchase contracts, supplier certifications, and test results to determine compliance with the conditions of this permit shall be maintained. The operator shall record daily amount and type(s) of fuel(s) combusted, fuel source, and all dates on which unit is fired on any noncertified fuel and record specific type of noncertified fuel used. [District Rule 2520, 9.3.2 and 40 CFR 60.48c(g)] 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.

Seyed Sadredin, Executive Director APCO

DAVID WARNER, Director of Permit Services

S-1127-112-23 : May 28 2010 12:13PM - GOUGHHD : Joint Inspection NOT Required

6. The operator shall maintain all records of required monitoring data and support information for inspection at any time for a period of five years. [District Rule 2520, 9.4.2] Federally Enforceable Through Title V Permit
7. Particulate matter emissions shall not exceed 0.1 grain/dscf, 0.1 grain/dscf calculated to 12% CO₂, nor 10 lb/hr. [District Rules 4201, 3.1 and 4301, 5.1 and 5.2.3] Federally Enforceable Through Title V Permit
8. If the unit is fired on PUC-regulated natural gas, valid purchase contracts, supplier certifications, tariff sheets, or transportation contracts may be used to satisfy the fuel sulfur content analysis, provided they establish the fuel sulfur concentration and higher heating value. [District Rules 2520 and 4320]
9. If the steam generator is not fired on PUC-regulated natural gas, then the sulfur content of the natural gas being fired shall be determined using ASTM D 1072, D 3031, D 4084, D 3246, D 6228, double GC for H₂S and mercaptans, or grab sample analysis by GC-FPD/TCD performed in the laboratory. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
10. When complying with sulfur emission limits by fuel analysis or by a combination of source testing and fuel analysis, each fuel source shall be tested weekly for sulfur content and higher heating value. If compliance with the fuel sulfur content limit and sulfur emission limits has been demonstrated for 8 consecutive weeks for a fuel source, then the fuel testing frequency shall be semi-annually. If a semi-annual fuel content source test fails to show compliance, weekly testing shall resume until compliance is demonstrated for 8 consecutive weeks. [District Rules 2520, 9.3.2 and 4320] Federally Enforceable Through Title V Permit
11. If the steam generator is not fired on PUC-regulated natural gas and compliance is achieved through fuel sulfur content limitations, then the sulfur content of the fuel shall be determined by testing sulfur content at a location after all fuel sources are combined prior to incineration, or by performing mass balance calculations based on monitoring the sulfur content and volume of each fuel source. The sulfur content of the fuel shall be determined using the test methods referenced in this permit. [District Rule 4320]
12. If fuel analysis is used to demonstrate compliance with conditions of this permit, the fuel higher heating value for each fuel shall be certified by a third party fuel supplier or determined by ASTM D 1826 or D 1945 in conjunction with ASTM D 3588 for gaseous fuels. [District Rule 2520, 9.3.2; 4305, 6.2.1; 4320 and 4351, 6.2.1] Federally Enforceable Through Title V Permit
13. Compliance with permit conditions in the Title V permit shall be deemed compliance with the following requirements of SJVUAPCD Rules 4201 (Last Amended December 17, 1992), 4301 (Last Amended December 17, 1992), 4305 sections 4.2, 5.1, 5.5.1, 5.5.2, 6.1.1, 6.2 (except 6.2.3), 6.3.1, 6.3.2, and 8.1 (Last Amended December 17, 1992), and 4351, sections 4.2, 5.2.2, 6.1.1, 6.2, and 8.1 (Last Amended October 19, 1995). A permit shield is granted from these requirements. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
14. Compliance with permit conditions in the Title V permit shall be deemed compliance with the requirements of County Rules 108 (Kings), 108.1 (Fresno, Merced, San Joaquin, Tulare, Kern, and Stanislaus), and 110 (Madera), 402 (Madera), 404 (Fresno, Kern, Tulare, Kings, Stanislaus, Merced, and San Joaquin), 405 (Madera), 408 (Fresno, Kern, Tulare, Kings, Stanislaus, Merced, and San Joaquin), 407.2 (Kern, Tulare, Kings, Stanislaus, and San Joaquin), and 408.2 (Merced). A permit shield is granted from these requirements. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
15. The requirements of 40 CFR 72.6(b) and 40 CFR 60.40c do not apply to this source. A permit shield is granted from this requirement. [District Rule 2520, 13.2] Federally Enforceable Through Title V Permit
16. Emission rates shall not exceed any of the following PM₁₀: 0.014 lb/MMBtu or VOC: 0.003 lb/MMBtu. [District Rules 2201, 4305, 4306, 4320 and 4351] Federally Enforceable Through Title V Permit
17. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when this unit is burning 50% or greater by volume PUC quality gas on a monthly average basis: 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]
18. Except during startup, shutdown and the shakedown period, emissions shall not exceed any of the following limits when the unit is burning less than 50% by volume PUC quality gas on a monthly average basis: 12 ppmvd NO_x @ 3% O₂ or 0.014 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu. [District Rules 2201 and 4320]

DRAFT
CONDITIONS CONTINUE ON NEXT PAGE

19. The applicable NO_x and CO emissions concentration for each month shall be determined based on the volume and type of fuel combusted in the unit (< 50% by volume PUC quality gas or greater than or equal to 50% by volume PUC quality gas). Permittee shall maintain supporting records that determine the type of fuel combusted. [District Rules 2201 and 4320]
20. PUC quality natural gas is any gaseous fuel where the sulfur content is no more than one-fourth (0.25) grain of hydrogen sulfide per one hundred (100) standard cubic feet, no more than five (5) grains of total sulfur per one hundred (100 standard cubic feet) and at least 80% methane by volume. [District Rule 4320]
21. During a shakedown period not to exceed 60 calendar days from initial operation of the modifications authorized by this ATC, NO_x emission rate shall not exceed 15 ppmvd @ 3% O₂ or 0.0182 lb/MMBtu. The shakedown period shall be concluded prior to the applicable Rule 4320 compliance deadline selected for this unit. Permittee shall maintain a record of the date of initial operation and shall make such records readily available for District inspection upon request. [District Rule 4320]
22. The combined sulfur content of all fuels supplied to this steam generator shall not exceed 5 grains S/100 scf. [District Rule 4320]
23. Duration of start-up or shutdown shall not exceed two hours each per occurrence. During start-up or shutdown, the emissions control system shall be in operation, and emissions shall be minimized insofar as technologically possible. The operator shall maintain daily records of the duration of start-up and shutdown periods. [District Rules 4305, 5.5.6, 4306, 5.3 and 4320] Federally Enforceable Through Title V Permit
24. Start-up is defined as the period of time during which a unit is brought from a shutdown status to its operating temperature and pressure, including the time required by the unit's emission control system to reach full operation. Shutdown is defined as the period of time during which a unit is taken from an operational to a non-operational status by allowing it to cool down from its operating temperature to ambient temperature as the fuel supply to the unit is completely turned off. [District Rules 4306, 3.25 and 3.22 and 4320] Federally Enforceable Through Title V Permit
25. During start-up and shutdown periods, emissions from the natural gas/vapor recovery gas-fired steam generator shall not exceed either of the following limits: 0.1 lb-NO_x/MMBtu or 0.084 lb-CO/MMBtu. [District Rule 4320]
26. 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 analyzer 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 4305, 4306 and 4320]
27. 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 in lieu of performing the notification and testing required by this condition. [District Rules 2520, 4305, 4306 and 4320] Federally Enforceable Through Title V Permit
28. 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 4305, 4306 and 4320]
29. {4066} The permittee shall maintain records of: (1) the date and time of NO_x, CO, and O₂ measurements, (2) the O₂ concentration in percent by volume 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 4305 and 4306]

CONDITIONS CONTINUE ON NEXT PAGE

30. Source testing shall be conducted using the methods and procedures approved by the District. The District must be notified 30 days prior to any compliance source test, and a source test plan must be submitted for approval 15 days prior to testing. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
31. The results of each source test shall be submitted to the District within 60 days thereafter. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
32. The permittee shall keep records of the following: sulfur content of the vapor recovery gas on an annual basis; amount of natural gas and amount of vapor recovery gas combusted on a daily basis. [District Rules 1070 and 2520, 9.4.2] Federally Enforceable Through Title V Permit
33. Emissions for this unit shall be calculated using the arithmetic mean, pursuant to District Rule 1081 (Amended December 16, 1993), of 3 thirty-minute test runs for NO_x and CO. This mean shall be multiplied by the appropriate factor. [District Rules 1081 and 2520, 9.3.2] Federally Enforceable Through Title V Permit
34. A source test to demonstrate compliance with NO_x and CO emission limits shall be performed within 60 days of startup of this unit. The NO_x limit in effect at the time of the startup source testing will be determined based on the volume and type of fuel combusted (greater than or equal to 50% PUC quality or < 50% PUC quality gas) and shall be identified in the source test protocol. Whenever the fuel type is switched from the fuel type combusted during the initial startup of this unit, compliance source testing for NO_x and CO shall be conducted within 90 days of the date the fuel type is switched. [District Rules 2201 and 4320]
35. Source testing is required at least once every twelve (12) months from the initial source test date of each fuel type (greater than or equal to 50% PUC quality gas or < 50% PUC quality gas). After an initial compliance demonstration with the NO_x and CO emission limits for each fuel type on two (2) consecutive source tests, the unit shall be tested not less than once every thirty-six (36) months from the last test date for that fuel type. Testing shall not be required for any fuel type not in use during the 36 month period until such time the fuel type is switched, after which testing shall be performed within 90 days of switching fuel types. [District Rules 2201 and 4320]
36. Compliance source testing after switching fuel types is not required if the unit continues to demonstrate compliance with 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas. In which case, source testing shall only be required every thirty-six(36) months for the less than 50% by PUC quality gas. If the result of a source test demonstrates that the unit does not meet 9 ppmvd NO_x @ 3% O₂ or 0.011 lb-NO_x/MMBtu and 28 ppmvd CO @ 3% O₂ or 0.021 lb-CO/MMBtu while firing on less than 50% by volume PUC quality gas, the source test frequency shall revert to at least one test every 36 months for each fuel type. [District Rules 2201 and 4320]
37. Compliance demonstration (source testing) shall be by District witnessed, or authorized, sample collection by ARB certified testing laboratory. [District Rule 1081] Federally Enforceable Through Title V Permit
38. The following test methods shall be used: NO_x (ppmv) - EPA Method 7E or ARB Method 100, NO_x (lb/MMBtu) - EPA Method 19, CO (ppmv) - EPA Method 10 or ARB Method 100, stack gas oxygen - EPA Method 3 or 3A or ARB Method 100, stack gas velocities - EPA Method 2, and stack gas moisture content - EPA Method 4. [District Rules 1081, 4305, 4320 and 4351] Federally Enforceable Through Title V Permit
39. Permittee shall maintain daily records of total combined volume of fuel gas and vapor recovery gas burned, the dates of any fuel type switching, the monthly NO_x and CO emissions limit determinations, the sulfur content and higher heat value as determined by periodic analytical testing or fuel supplier invoices/certifications, and permit number(s) of systems providing gas for incineration. [District Rules 2201, 2520 and 4320]
40. Permittee shall maintain records of fuel hhv and cumulative annual fuel use for a period of 5 years and shall make such records readily available for District inspection upon request. [District Rules 4320 and 4351] Federally Enforceable Through Title V Permit
41. Steam generator may be operated with ring or perforated type burner diffuser plate. Changes between ring or perforated type burner diffuser plates shall be recorded in a contemporaneous log. [District Rule 2520 section 6.4.2] Federally Enforceable Through Title V Permit
42. This ATC shall be implemented concurrently or after ATC S-1127-112-24. [District Rule 2201]

DRAFT

Appendix C
Emission Profile(s)

Permit #: S-1127-22-28	Last Updated
Facility: CHEVRON USA INC	05/19/2010 GOUGHD

Equipment Pre-Baselined: NO

	<u>NOX</u>	<u>SOX</u>	<u>PM10</u>	<u>CO</u>	<u>VOC</u>
Potential to Emit (lb/Yr):	7665.0	7830.0	7665.0	11498.0	1643.0
Daily Emis. Limit (lb/Day)	54.0	21.5	21.0	31.5	4.5
Quarterly Net Emissions Change (lb/Qtr)					
Q1:	-548.0	0.0	0.0	0.0	0.0
Q2:	-548.0	0.0	0.0	0.0	0.0
Q3:	-548.0	0.0	0.0	0.0	0.0
Q4:	-548.0	0.0	0.0	0.0	0.0
Check if offsets are triggered but exemption applies	N	N	N	N	N
Offset Ratio					
Quarterly Offset Amounts (lb/Qtr)					
Q1:					
Q2:					
Q3:					
Q4:					

Permit #: S-1127-25-28 Last Updated
Facility: CHEVRON USA INC 05/19/2010 GOUGHD

Equipment Pre-Baselined: NO

	<u>NOX</u>	<u>SOX</u>	<u>PM10</u>	<u>CO</u>	<u>VOC</u>
Potential to Emit (lb/yr):	7665.0	7830.0	7665.0	11498.0	1643.0
Daily Emis. Limit (lb/Day)	54.0	21.5	21.0	31.5	4.5
Quarterly Net Emissions Change (lb/Qtr)					
Q1:	-548.0	0.0	0.0	0.0	0.0
Q2:	-548.0	0.0	0.0	0.0	0.0
Q3:	-548.0	0.0	0.0	0.0	0.0
Q4:	-548.0	0.0	0.0	0.0	0.0
Check if offsets are triggered but exemption applies	N	N	N	N	N
Offset Ratio					
Quarterly Offset Amounts (lb/Qtr)					
Q1:					
Q2:					
Q3:					
Q4:					

Permit #: S-1127-28-29 Last Updated
Facility: CHEVRON USA INC 05/19/2010 GOUGHD

Equipment Pre-Baselined: NO

	<u>NOX</u>	<u>SOX</u>	<u>PM10</u>	<u>CO</u>	<u>VOC</u>
Potential to Emit (lb/Yr):	7665.0	7830.0	7665.0	11498.0	1643.0
Daily Emis. Limit (lb/Day)	54.0	21.5	21.0	31.5	4.5
Quarterly Net Emissions Change (lb/Qtr)					
Q1:	-548.0	0.0	0.0	0.0	0.0
Q2:	-548.0	0.0	0.0	0.0	0.0
Q3:	-548.0	0.0	0.0	0.0	0.0
Q4:	-548.0	0.0	0.0	0.0	0.0
Check if offsets are triggered but exemption applies	N	N	N	N	N
Offset Ratio					
Quarterly Offset Amounts (lb/Qtr)					
Q1:					
Q2:					
Q3:					
Q4:					

Permit #: S-1127-29-25	Last Updated
Facility: CHEVRON USA INC	05/19/2010 GOUGHD

Equipment Pre-Baselined: NO

	<u>NOX</u>	<u>SOX</u>	<u>PM10</u>	<u>CO</u>	<u>VOC</u>
Potential to Emit (lb/Yr):	7665.0	7830.0	7665.0	11498.0	1643.0
Daily Emis. Limit (lb/Day)	54.0	21.5	21.0	31.5	4.5
Quarterly Net Emissions Change (lb/Qtr)					
Q1:	-548.0	0.0	0.0	0.0	0.0
Q2:	-548.0	0.0	0.0	0.0	0.0
Q3:	-548.0	0.0	0.0	0.0	0.0
Q4:	-548.0	0.0	0.0	0.0	0.0
Check if offsets are triggered but exemption applies	N	N	N	N	N
Offset Ratio					
Quarterly Offset Amounts (lb/Qtr)					
Q1:					
Q2:					
Q3:					
Q4:					

Permit #: S-1127-30-26	Last Updated
Facility: CHEVRON USA INC	05/19/2010 GOUGHD

Equipment Pre-Baselined: NO

	<u>NOX</u>	<u>SOX</u>	<u>PM10</u>	<u>CO</u>	<u>VOC</u>
Potential to Emit (lb/Yr):	7665.0	7830.0	7665.0	11498.0	1643.0
Daily Emis. Limit (lb/Day)	54.0	21.5	21.0	31.5	4.5
Quarterly Net Emissions Change (lb/Qtr)					
Q1:	-548.0	0.0	0.0	0.0	0.0
Q2:	-548.0	0.0	0.0	0.0	0.0
Q3:	-548.0	0.0	0.0	0.0	0.0
Q4:	-548.0	0.0	0.0	0.0	0.0
Check if offsets are triggered but exemption applies	N	N	N	N	N
Offset Ratio					
Quarterly Offset Amounts (lb/Qtr)					
Q1:					
Q2:					
Q3:					
Q4:					

Permit #: S-1127-31-26	Last Updated
Facility: CHEVRON USA INC	05/19/2010 GOUGHD

Equipment Pre-Baselined: NO

	<u>NOX</u>	<u>SOX</u>	<u>PM10</u>	<u>CO</u>	<u>VOC</u>
Potential to Emit (lb/Yr):	7665.0	51465.0	7665.0	11498.0	1643.0
Daily Emis. Limit (lb/Day)	54.0	21.5	21.0	31.5	4.5
Quarterly Net Emissions Change (lb/Qtr)					
Q1:	-548.0	0.0	0.0	0.0	0.0
Q2:	-548.0	0.0	0.0	0.0	0.0
Q3:	-548.0	0.0	0.0	0.0	0.0
Q4:	-548.0	0.0	0.0	0.0	0.0
Check if offsets are triggered but exemption applies	N	N	N	N	N
Offset Ratio					
Quarterly Offset Amounts (lb/Qtr)					
Q1:					
Q2:					
Q3:					
Q4:					

Permit #: S-1127-34-24	Last Updated
Facility: CHEVRON USA INC	05/19/2010 GOUGHD

Equipment Pre-Baselined: NO

	<u>NOX</u>	<u>SOX</u>	<u>PM10</u>	<u>CO</u>	<u>VOC</u>
Potential to Emit (lb/Yr):	7665.0	7830.0	7665.0	11498.0	1643.0
Daily Emis. Limit (lb/Day)	54.0	21.5	21.0	31.5	4.5
Quarterly Net Emissions Change (lb/Qtr)					
Q1:	-548.0	0.0	0.0	0.0	0.0
Q2:	-548.0	0.0	0.0	0.0	0.0
Q3:	-548.0	0.0	0.0	0.0	0.0
Q4:	-548.0	0.0	0.0	0.0	0.0
Check if offsets are triggered but exemption applies	N	N	N	N	N
Offset Ratio					
Quarterly Offset Amounts (lb/Qtr)					
Q1:					
Q2:					
Q3:					
Q4:					

Permit #: S-1127-35-25	Last Updated
Facility: CHEVRON USA INC	05/19/2010 GOUGHD

Equipment Pre-Baselined: NO

	<u>NOX</u>	<u>SOX</u>	<u>PM10</u>	<u>CO</u>	<u>VOC</u>
Potential to Emit (lb/Yr):	7665.0	7830.0	7665.0	11498.0	1643.0
Daily Emis. Limit (lb/Day)	54.0	21.5	21.0	31.5	4.5
Quarterly Net Emissions Change (lb/Qtr)					
Q1:	-548.0	0.0	0.0	0.0	0.0
Q2:	-548.0	0.0	0.0	0.0	0.0
Q3:	-548.0	0.0	0.0	0.0	0.0
Q4:	-548.0	0.0	0.0	0.0	0.0
Check if offsets are triggered but exemption applies	N	N	N	N	N
Offset Ratio					
Quarterly Offset Amounts (lb/Qtr)					
Q1:					
Q2:					
Q3:					
Q4:					

Permit #: S-1127-36-25 Last Updated
Facility: CHEVRON USA INC 05/19/2010 GOUGHD

Equipment Pre-Baselined: NO

	<u>NOX</u>	<u>SOX</u>	<u>PM10</u>	<u>CO</u>	<u>VOC</u>
Potential to Emit (lb/Yr):	7665.0	7830.0	7665.0	11498.0	1643.0
Daily Emis. Limit (lb/Day)	54.0	21.5	21.0	31.5	4.5
Quarterly Net Emissions Change (lb/Qtr)					
Q1:	-548.0	0.0	0.0	0.0	0.0
Q2:	-548.0	0.0	0.0	0.0	0.0
Q3:	-548.0	0.0	0.0	0.0	0.0
Q4:	-548.0	0.0	0.0	0.0	0.0
Check if offsets are triggered but exemption applies	N	N	N	N	N
Offset Ratio					
Quarterly Offset Amounts (lb/Qtr)					
Q1:					
Q2:					
Q3:					
Q4:					

Permit #: S-1127-38-27	Last Updated
Facility: CHEVRON USA INC	05/19/2010 GOUGHD

Equipment Pre-Baselined: NO

	<u>NOX</u>	<u>SOX</u>	<u>PM10</u>	<u>CO</u>	<u>VOC</u>
Potential to Emit (lb/Yr):	7665.0	7830.0	7665.0	11498.0	1643.0
Daily Emis. Limit (lb/Day)	54.0	21.5	21.0	31.5	4.5
Quarterly Net Emissions Change (lb/Qtr)					
Q1:	-548.0	0.0	0.0	0.0	0.0
Q2:	-548.0	0.0	0.0	0.0	0.0
Q3:	-548.0	0.0	0.0	0.0	0.0
Q4:	-548.0	0.0	0.0	0.0	0.0
Check if offsets are triggered but exemption applies	N	N	N	N	N
Offset Ratio					
Quarterly Offset Amounts (lb/Qtr)					
Q1:					
Q2:					
Q3:					
Q4:					

Permit #: S-1127-39-27	Last Updated
Facility: CHEVRON USA INC	05/19/2010 GOUGH

Equipment Pre-Baselined: NO

	<u>NOX</u>	<u>SOX</u>	<u>PM10</u>	<u>CO</u>	<u>VOC</u>
Potential to Emit (lb/Yr):	7665.0	7830.0	7665.0	11498.0	1643.0
Daily Emis. Limit (lb/Day)	54.0	21.5	21.0	31.5	4.5
Quarterly Net Emissions Change (lb/Qtr)					
Q1:	-548.0	0.0	0.0	0.0	0.0
Q2:	-548.0	0.0	0.0	0.0	0.0
Q3:	-548.0	0.0	0.0	0.0	0.0
Q4:	-548.0	0.0	0.0	0.0	0.0
Check if offsets are triggered but exemption applies	N	N	N	N	N
Offset Ratio					
Quarterly Offset Amounts (lb/Qtr)					
Q1:					
Q2:					
Q3:					
Q4:					

Permit #: S-1127-42-26	Last Updated
Facility: CHEVRON USA INC	05/19/2010 GOUGHD

Equipment Pre-Baselined: NO

	<u>NOX</u>	<u>SOX</u>	<u>PM10</u>	<u>CO</u>	<u>VOC</u>
Potential to Emit (lb/Yr):	7665.0	7830.0	7665.0	11498.0	1643.0
Daily Emis. Limit (lb/Day)	54.0	21.5	21.0	31.5	4.5
Quarterly Net Emissions Change (lb/Qtr)					
Q1:	-548.0	0.0	0.0	0.0	0.0
Q2:	-548.0	0.0	0.0	0.0	0.0
Q3:	-548.0	0.0	0.0	0.0	0.0
Q4:	-548.0	0.0	0.0	0.0	0.0
Check if offsets are triggered but exemption applies	N	N	N	N	N
Offset Ratio					
Quarterly Offset Amounts (lb/Qtr)					
Q1:					
Q2:					
Q3:					
Q4:					

Permit #: S-1127-55-26	Last Updated
Facility: CHEVRON USA INC	05/19/2010 GOUGH

Equipment Pre-Baselined: NO

	<u>NOX</u>	<u>SOX</u>	<u>PM10</u>	<u>CO</u>	<u>VOC</u>
Potential to Emit (lb/Yr):	7665.0	7830.0	7665.0	11498.0	1643.0
Daily Emis. Limit (lb/Day)	54.0	21.5	21.0	31.5	4.5
Quarterly Net Emissions Change (lb/Qtr)					
Q1:	-548.0	0.0	0.0	0.0	0.0
Q2:	-548.0	0.0	0.0	0.0	0.0
Q3:	-548.0	0.0	0.0	0.0	0.0
Q4:	-548.0	0.0	0.0	0.0	0.0
Check if offsets are triggered but exemption applies	N	N	N	N	N
Offset Ratio					
Quarterly Offset Amounts (lb/Qtr)					
Q1:					
Q2:					
Q3:					
Q4:					

Permit #: S-1127-57-26	Last Updated
Facility: CHEVRON USA INC	05/19/2010 GOUGHD

Equipment Pre-Baselined: NO

	<u>NOX</u>	<u>SOX</u>	<u>PM10</u>	<u>CO</u>	<u>VOC</u>
Potential to Emit (lb/Yr):	7665.0	7830.0	7665.0	11498.0	1643.0
Daily Emis. Limit (lb/Day)	54.0	21.5	21.0	31.5	4.5
Quarterly Net Emissions Change (lb/Qtr)					
Q1:	-548.0	0.0	0.0	0.0	0.0
Q2:	-548.0	0.0	0.0	0.0	0.0
Q3:	-548.0	0.0	0.0	0.0	0.0
Q4:	-548.0	0.0	0.0	0.0	0.0
Check if offsets are triggered but exemption applies	N	N	N	N	N
Offset Ratio					
Quarterly Offset Amounts (lb/Qtr)					
Q1:					
Q2:					
Q3:					
Q4:					

Permit #: S-1127-66-30	Last Updated
Facility: CHEVRON USA INC	05/19/2010 GOUGHD

Equipment Pre-Baselined: NO

	<u>NOX</u>	<u>SOX</u>	<u>PM10</u>	<u>CO</u>	<u>VOC</u>
Potential to Emit (lb/Yr):	7665.0	7830.0	7665.0	11498.0	1643.0
Daily Emis. Limit (lb/Day)	54.0	21.5	21.0	31.5	4.5
Quarterly Net Emissions Change (lb/Qtr)					
Q1:	-548.0	0.0	0.0	0.0	0.0
Q2:	-548.0	0.0	0.0	0.0	0.0
Q3:	-548.0	0.0	0.0	0.0	0.0
Q4:	-548.0	0.0	0.0	0.0	0.0
Check if offsets are triggered but exemption applies	N	N	N	N	N
Offset Ratio					
Quarterly Offset Amounts (lb/Qtr)					
Q1:					
Q2:					
Q3:					
Q4:					

Permit #: S-1127-69-28	Last Updated
Facility: CHEVRON USA INC	05/19/2010 GOUGH

Equipment Pre-Baselined: NO

	<u>NOX</u>	<u>SOX</u>	<u>PM10</u>	<u>CO</u>	<u>VOC</u>
Potential to Emit (lb/Yr):	7665.0	7830.0	7665.0	11498.0	1643.0
Daily Emis. Limit (lb/Day)	54.0	21.5	21.0	31.5	4.5
Quarterly Net Emissions Change (lb/Qtr)					
Q1:	-548.0	0.0	0.0	0.0	0.0
Q2:	-548.0	0.0	0.0	0.0	0.0
Q3:	-548.0	0.0	0.0	0.0	0.0
Q4:	-548.0	0.0	0.0	0.0	0.0
Check if offsets are triggered but exemption applies	N	N	N	N	N
Offset Ratio					
Quarterly Offset Amounts (lb/Qtr)					
Q1:					
Q2:					
Q3:					
Q4:					

Permit #: S-1127-70-29	Last Updated
Facility: CHEVRON USA INC	05/19/2010 GOUGHD

Equipment Pre-Baselined: NO

	<u>NOX</u>	<u>SOX</u>	<u>PM10</u>	<u>CO</u>	<u>VOC</u>
Potential to Emit (lb/Yr):	7665.0	7830.0	7665.0	11498.0	1643.0
Daily Emis. Limit (lb/Day)	54.0	21.5	21.0	31.5	4.5
Quarterly Net Emissions Change (lb/Qtr)					
Q1:	-548.0	0.0	0.0	0.0	0.0
Q2:	-548.0	0.0	0.0	0.0	0.0
Q3:	-548.0	0.0	0.0	0.0	0.0
Q4:	-548.0	0.0	0.0	0.0	0.0
Check if offsets are triggered but exemption applies	N	N	N	N	N
Offset Ratio					
Quarterly Offset Amounts (lb/Qtr)					
Q1:					
Q2:					
Q3:					
Q4:					

Permit #: S-1127-71-26	Last Updated
Facility: CHEVRON USA INC	05/19/2010 GOUGHD

Equipment Pre-Baselined: NO

	<u>NOX</u>	<u>SOX</u>	<u>PM10</u>	<u>CO</u>	<u>VOC</u>
Potential to Emit (lb/Yr):	7665.0	7830.0	7519.0	11607.0	1533.0
Daily Emis. Limit (lb/Day)	54.0	21.5	20.6	31.8	4.2
Quarterly Net Emissions Change (lb/Qtr)					
Q1:	-548.0	0.0	0.0	0.0	0.0
Q2:	-548.0	0.0	0.0	0.0	0.0
Q3:	-548.0	0.0	0.0	0.0	0.0
Q4:	-548.0	0.0	0.0	0.0	0.0
Check if offsets are triggered but exemption applies	N	N	N	N	N
Offset Ratio					
Quarterly Offset Amounts (lb/Qtr)					
Q1:					
Q2:					
Q3:					
Q4:					

Permit #: S-1127-73-26 Last Updated
Facility: CHEVRON USA INC 05/19/2010 GOUGHD

Equipment Pre-Baselined: NO

	<u>NOX</u>	<u>SOX</u>	<u>PM10</u>	<u>CO</u>	<u>VOC</u>
Potential to Emit (lb/Yr):	7665.0	7830.0	7665.0	11498.0	1643.0
Daily Emis. Limit (lb/Day)	54.0	21.5	21.0	31.5	4.5
Quarterly Net Emissions Change (lb/Qtr)					
Q1:	-548.0	0.0	0.0	0.0	0.0
Q2:	-548.0	0.0	0.0	0.0	0.0
Q3:	-548.0	0.0	0.0	0.0	0.0
Q4:	-548.0	0.0	0.0	0.0	0.0
Check if offsets are triggered but exemption applies	N	N	N	N	N
Offset Ratio					
Quarterly Offset Amounts (lb/Qtr)					
Q1:					
Q2:					
Q3:					
Q4:					

Permit #: S-1127-112-23	Last Updated
Facility: CHEVRON USA INC	05/19/2010 GOUGHD

Equipment Pre-Baselined: NO

	<u>NOX</u>	<u>SOX</u>	<u>PM10</u>	<u>CO</u>	<u>VOC</u>
Potential to Emit (lb/Yr):	7665.0	7830.0	7665.0	11498.0	1643.0
Daily Emis. Limit (lb/Day)	54.0	21.5	21.0	31.5	4.5
Quarterly Net Emissions Change (lb/Qtr)					
Q1:	-548.0	0.0	0.0	0.0	0.0
Q2:	-548.0	0.0	0.0	0.0	0.0
Q3:	-548.0	0.0	0.0	0.0	0.0
Q4:	-548.0	0.0	0.0	0.0	0.0
Check if offsets are triggered but exemption applies	N	N	N	N	N
Offset Ratio					
Quarterly Offset Amounts (lb/Qtr)					
Q1:					
Q2:					
Q3:					
Q4:					

Appendix D

Title V Compliance Certification

RECEIVED

JUN 30 2009

SJVAPCD
Southern Region

San Joaquin Valley Unified Air Pollution Control District

TITLE V MODIFICATION - COMPLIANCE CERTIFICATION FORM

I. TYPE OF PERMIT ACTION (Check appropriate box)

- SIGNIFICANT PERMIT MODIFICATION ADMINISTRATIVE
 MINOR PERMIT MODIFICATION AMENDMENT

COMPANY NAME: Chevron U.S.A. Inc.	FACILITY ID: S - 1127
1. Type of Organization: <input checked="" type="checkbox"/> Corporation <input type="checkbox"/> Sole Ownership <input type="checkbox"/> Government <input type="checkbox"/> Partnership <input type="checkbox"/> Utility	
2. Owner's Name:	
3. Agent to the Owner:	

II. COMPLIANCE CERTIFICATION (Read each statement carefully and initial all circles for confirmation):

- Based on information and belief formed after reasonable inquiry, the equipment identified in this application will continue to comply with the applicable federal requirement(s).
- Based on information and belief formed after reasonable inquiry, the equipment identified in this application will comply with applicable federal requirement(s) that will become effective during the permit term, on a timely basis.
- Corrected information will be provided to the District when I become aware that incorrect or incomplete information has been submitted.
- Based on information and belief formed after reasonable inquiry, information and statements in the submitted application package, including all accompanying reports, and required certifications are true accurate and complete.

I declare, under penalty of perjury under the laws of the state of California, that the forgoing is correct and true:

William Fall
Signature of Responsible Official

6/30/09
Date

William R. Fall

Name of Responsible Official (please print)

Manager - Health, Safety & Environment

Title of Responsible Official (please print)