

RV 9/4/25

PETITION FOR VARIANCE
BEFORE THE HEARING BOARD OF THE
SOUTH COAST AIR QUALITY MANAGEMENT DISTRICT

PETITIONER: CANYON POWER PLANT (CITY OF ANAHEIM) CASE NO: Case 6264-2

FACILITY ID: 153992

FACILITY ADDRESS: 3071 E. Miraloma Avenue

[location of equipment/site of violation; specify business/corporate address, if different, under Item 2, below]

City, State, Zip: Anaheim, CA 92806

1. TYPE OF VARIANCE REQUESTED (more than one box may be checked; see Attachment A, Item 1, before selecting)

☐ INTERIM ☐ SHORT ☒ REGULAR ☐ EMERGENCY ☐ EX PARTE EMERGENCY

2. CONTACT: Name, title, company (if different than Petitioner), address, and phone number of persons authorized to receive notices regarding this Petition (no more than two authorized persons).

Ron Hoffard – Generation Plant Manager

Cesar Santana – Project Engineer

Canyon Power Plant

Montrose Environmental Solutions, Inc.

3071 E. Miraloma Avenue

1631 E. St. Andrew Place

Anaheim Zip 92806

Santa Ana, CA Zip 92705

(714) 765-4536 Ext.

(949) 988-4279 Ext.

Fax ()

Fax ()

E-mail rhoffard@anaheim.net

E-mail cesarsantana@montrose-env.com

3. RECLAIM Permit ☒ Yes ☐ No Title V Permit ☒ Yes ☐ No

Persons with disabilities may request this document in an alternative format by contacting the Clerk of the Board at 909-396-2500 or by e-mail at clerkofboard@aqmd.gov.

If you require disability-related accommodations to facilitate participating in the hearing, contact the Clerk of the Board at least five (5) calendar days prior to the hearing.

[ALL DOCUMENTS FILED WITH CLERK'S OFFICE BECOME PUBLIC RECORD]

4. **GOOD CAUSE:** Explain why your petition was not filed in sufficient time to issue the required public notice. (Required only for Emergency and Interim Variances; see Attachment A, Item 4)

Not applicable.

5. Briefly describe the type of business and processes at your facility.

The Canyon Power Plant located at 3071 E. Miraloma Avenue supplies electric power to the California independent System Operator (CAISO) for The City of Anaheim to meet a portion of their electrical needs. The facility has four (4) LM6000 gas turbines that drive four (4) 50 Mega-Watt (MW) generators. The turbines are fueled by natural gas with CO and VOC emissions controlled by CO oxidation catalysts and NOx controlled by ammonia injected SCR catalysts.

Gas Turbine No. 1 is the subject of this petition.

6. List the equipment and/or activity(s) that are the subject of this petition (see Attachment A, Item 6, Example #1). **Attach copies of the Permit(s) to Construct and/or Permit(s) to Operate for the subject equipment. For RECLAIM or Title V facilities, attach *only* the relevant sections of the Facility Permit showing the equipment or process and conditions that are subject to this petition. You must bring the entire Facility Permit to the hearing.**

Equipment/Activity	Application/ Permit No.	RECLAIM Device No.	Date Application/Plan Denied (if relevant)*
Gas Turbine No. 1		D1	N/A
CO Oxidation Catalyst, No. 1		C3	N/A

*Attach copy of denial letter

7. Briefly describe the activity or equipment, and why it is necessary to the operation of your business. A schematic or diagram may be attached, in addition to the descriptive text.

Gas Turbine No. 1 is one of four (4) gas turbines located at the Canyon Power Plant. The turbines are used to generate electricity to the CAISO for the City of Anaheim. CO oxidation catalysts are used to reduce CO and VOC emissions from the turbines.

8. Is there a regular maintenance and/or inspection schedule for this equipment? Yes ☒ No ☐

If yes, how often: Semi-Annual; Date of last maintenance and/or inspection January 8, 2024

Describe the maintenance and/or inspection that was performed.

- The last inspection following a repair was performed at the General Electric (GE) Turbine repair facility in Houston, Texas.
- Routine Semi-Annual Inspections and Maintenance consist of a borescope inspections, oil and air filter changes, and instrumentation calibrations.
- Another maintenance requirement is a GE Service Bulletin requiring replacement of turbine compressor, blades rows (stages) 3 through 5. Replacements for blades in rows 3-5 are required when a turbine reaches 1,500 starts. By June 21, 2024, the date of the incident necessitating this petition, the turbine had 1,087 starts and 49.4 hours of operation since the turbine was returned to service, from a previous repair, on May 14, 2024.
- In addition to the regular maintenance and inspections, a borescope inspection was conducted following a triggered alarm and audible boom (compressor stall) caused by a broken stage 3 blade. The damage caused by the compressor stall far exceeded the replacement of only the compressor 3-5 blades.

9. List all District rules, and/or permit conditions [indicating the specific section(s) and subsection(s)] from which you are seeking variance relief (if requesting variance from Rule 401 or permit condition, see Attachment A). Briefly explain how you are or will be in violation of each rule or condition (see Attachment A, Item 9, Example #2).

Rule	Explanation
Permit Condition D29.3	SOx, VOC, and PM testing must be conducted once every three years. This testing is used to demonstrate compliance with BACT requirements. The facility is unable to meet testing requirements while the turbine is out for repair, and therefore cannot meet Permit Condition D29.3.
Rule 203(b)	Equipment cannot be operated contrary to permit conditions. The facility is unable to meet testing requirements while the turbine is out for repair, and therefore cannot be fully in compliance with Rule 203.
Rule 2001(j)	Facilities in the RECLAIM program must comply with all provisions of District rules and regulations. The facility is unable to meet testing requirements while the turbine is out for repair, and therefore cannot be fully in compliance with Rule 2001.
Rule 3002(c)(1)	All equipment at a Title V facility must be in compliance with all terms, requirements, and conditions of the Title V permit. The facility is unable to meet testing requirements while the turbine is out for repair, and therefore cannot be fully in compliance with Rule 3002.

10. Are the equipment or activities subject to this request currently under variance coverage? Yes ☒ No ☐

Case No.	Date of Action	Final Compliance Date	Explanation
6264-1		August 31, 2025	The variance is to allow operations until the source testing can be conducted. Due to an extended period coordinating with the repair depot, the turbine will not be reinstalled until later this year, past the compliance date. A second variance is required to have coverage until the turbine is reinstalled and source testing is conducted.

11. Are any other equipment or activities at this location currently (or within the last six months) under variance coverage? Yes ☐ No ☒

Case No.	Date of Action	Final Compliance Date	Explanation

12. Were you issued any Notice(s) of Violation or Notice(s) to Comply concerning this equipment or activity within the past year? Yes ☐ No ☒

If yes, you must attach a copy of each notice.

13. Have you received any complaints from the public regarding the operation of the subject equipment or activity within the last six months? Yes ☐ No ☒

If yes, you should be prepared to present details at the hearing.

14. Explain why it is beyond your reasonable control to comply with the rule(s) and/or permit condition(s). Provide specific event(s) and date(s) of occurrence(s), if applicable.

The Gas Turbine No. 1 is physically absent from the facility and source testing cannot be done until the turbine is repaired, returned, and reinstalled. The turbine is currently in Canada and is not expected to be reinstalled until the end of the year. The relevant chronology is provided below.

- July 2020 – Triennial testing was last conducted July 2020. The next test would have been due July 2023.
- April 11, 2023 – Due to damage in the high-pressure turbine (the hot section), Gas Turbine No. 1 was removed from service.

- April 21, 2023 – Gas Turbine No. 1 was transported to the GE repair depot in Houston, Texas for repair.
- July 2023 – Triennial testing was not possible in the absence of Gas Turbine No. 1, which was sent to Texas for repair.
- February 14, 2024 – Gas Turbine No. 1 was transported back to Canyon Power Plant, reinstalled and, started for test. Gas Turbine No. 1 was unable to operate due to generator high vibrations and a failed automatic voltage regulator.
- May 14, 2024 – After the issues discovered on February 14, 2024 were resolved, Gas Turbine No. 1 was successfully started and placed in operation. Triennial testing was scheduled for August 2024.
- May 15, 2024 through and including May 20, 2024 – Gas Turbine No. 1 was not operated.
- May 21, 2024 – Linearity testing was completed.
- May 23, 2024 – RATA and ammonia slip testing were completed.
- May 27, May 28, May 31, June 3, June 4, June 6, June 12, and June 21, 2024 – Gas Turbine No. 1 operated for only 49.4 hours.
- June 21, 2024, at 10:25 PM – One of the blades from Gas Turbine No. 1 broke off from the rotor shaft and traveled through the compressor, combustor, and the hot section, damaging components along the way. The liberated blade caused air flow turbulence that resulted in extreme high-pressure air travelling in opposing directions, triggering a compressor fault alarm and a compressor stall event which caused an emergency turbine trip (shutdown). It was estimated that 50% of all compressor blades and vanes would have to be replaced, and that damage to the combustor, fuel nozzles, and hot section blades would need to be repaired.
- July 12, 2024 – A request for bids for the repair of these components was sent out. At the time of the submittal of the petition for Case 6264-1, it was not known when repairs would be completed. At the time, Canyon Power Plant estimated the turbine could be returned to service by May 2025.
- August 20, 2024 – Physical copies of the variance petition for Case 6264-1 were delivered to South Coast AQMD offices.
- October 3, 2024 – A Public Hearing was held by South Coast Air Quality Management District for Case 6264-1. A regular variance was granted, with a final Compliance Date of August 31, 2025.
- October 9, 2024 – The repair contract was awarded to a contractor with qualified depot facilities for the necessary repairs.
- October 2024 – April 2025 – Contract negotiations were unusually extensive due to the holidays, unpredictable tariffs and import/export regulations and costs applicable to a Canadian contractor, and supply chain issues that impacted the materials and services in the initially proposed scope of work/services.
- April 9, 2025 – Contract finalized for repair to Gas Turbine No. 1.
- April 21, 2025 – Gas Turbine No. 1 arrived at the contractor's repair depot in Alberta, Canada.
- May 16, 2025 – The contractor began turbine disassembly/induction.
- July 11, 2025 – The contractor issued a Depot Findings Report detailing the as-found conditions of the engine modules and engine parts needing to be replaced, repaired, or overhauled. The contractor provided an initial cost estimate of the repairs, totaling \$3,465,441.02. Costs include transportation and assembly costs, the high-pressure compressor, combustor repair and overhaul of fuel nozzles, the high pressure turbine, the low pressure turbine, low pressure compressor, compressor front

frame, and compressor rear frame. Canyon Power Plant estimated the turbine could be returned to service by March 2026.

15. When and how did you first become aware that you would not be in compliance with the rule(s) and/or permit condition(s)? Provide specific event(s) and date(s) of occurrence(s).

In mid-July, when Petition received the contractor's Depot Findings Report dated July 11, 2025, Petitioner became aware that Gas Turbine No. 1 would not be returned, reinstalled, and tested prior to the end of the existing variance, which was scheduled to end on August 31, 2025. The relevant chronology is below.

- July 2023 – Turbine No. 1 Triennial testing due. The Triennial test date was missed due to the duration of Gas Turbine No. 1 repairs while at GE, Houston Texas.
- April 12, 2023 – Turbine No. 1 transported to GE, Houston Texas to repair/replace fractured and damaged turbine blades, nozzles, and shrouds
- February 12, 2024 – Turbine No. 1 returned and reinstalled. Turbine No. 1 was out of service up to May 14, 2024, due to automatic voltage regulator and generator high vibration issues.
- May 14, 2024 – Turbine No. 1 was returned to service.
- May 2024 – Canyon Power Plant conducted various required testing in May, including the annual RATA and ammonia slip testing on May 23, 2024, and linearity testing on May 21, 2024.
- June 21, 2024 – The turbine incident occurred on the evening of June 21, 2024, before the August 2024 triennial compliance testing could be conducted. The turbine had operated for 49.4 hours since the annual RATA was conducted in early May 2024.
- August 2024 – A Triennial compliance test had been scheduled for August 2024, which was the earliest available testing date on the testing company's schedule.
- October 3, 2024 – Variance Petition, Case 6264-1, was granted, with a final compliance date of August 31, 2025.
- April 17, 2025 – Turbine No. 1 transported to the contractor in Alberta, Canada.
- July 11, 2025 – The contractor issued an initial cost estimate and findings report for the turbine repairs.
- July 2025 – In discussions with Canyon Power Plant staff, the contractor indicated that the turbine would not be returned until Fall of 2025. In more recent discussions with the contractor, the contractor indicated that repairs may require shipment of parts to and from other locations, and the most recent estimate as of the submittal of this Petition is that the turbine will be returned at the end of the year.

16. List date(s) and action(s) you have taken since that time to achieve compliance. That the Petition Form HB-V, and any related instructions, include requirement that the Petitioner include a timeline in suitable, chronological format to address the events, dates, and actions called for by Questions 15 and 16, including the dates of communication with the South Coast AQMD to notify them of the occurrence(s) giving rise to the requested variance.

- Triennial testing was originally scheduled to be completed by July 2023 but did not occur because the turbine was out of state for repairs.

- Once the turbine was in service in May 2024, testing was scheduled for August 2024.
- A borescope inspection was conducted on June 22nd-June 26th, 2024, to confirm the damage to the unit and determine the extent of repairs needed. The findings of the inspection were documented in an internal report completed on June 26, 2024.
- The South Coast AQMD inspector Thomas Lee was notified of the incident on June 26th, 2024.
- A request for Bids was sent out on July 12th, 2024, for Turbine No. 1 repairs. The South Coast AQMD attorney Karin Manwaring was notified of the incident by phone of July 19th, 2024.
- A variance petition, Case 6264-1 was submitted to the SCAQMD Hearing Board on August 20, 2024.
- The regular variance was granted on October 3, 2024, with a final compliance date of August 31, 2024.
- October 9, 2024 – The repair contract was awarded to a contractor with qualified depot facilities for the necessary repairs.
- October 2024 – April 2025 – Contract negotiations were unusually extensive due to the holidays, unpredictable tariffs and import/export regulations and costs, and supply chain issues that impacted the materials and services in the contractor's initially proposed scope of work/services.
- April 9, 2025 – Contract finalized for repair to Gas Turbine No. 1.
- The turbine was transported to the contractor's repair depot on April 17, 2025, in Alberta, Canada and arrived on April 21, 2025, with an induction date of May 16, 2025.

17. What would be the harm to your business during **and/or after** the period of the variance if the variance were not granted?

Economic losses: N/A

Number of employees laid off (if any): N/A

Provide detailed information regarding economic losses, if any, (anticipated business closure, breach of contracts, hardship on customers, layoffs, and/or similar impacts).

The turbine will not be operational during the variance period, so there will be no economic losses resulting from the variance not being granted other than the potential penalties that may arise from any Notice of Violation issued for the same reasons that required the last variance (triennial testing schedule being missed due to the non-operational turbine or physical absence of the turbine).

18. Can you curtail or terminate operations in lieu of, or in addition to, obtaining a variance? Please explain.

Yes. Gas Turbine No. 1 is not in operation and will not be in operation until it is returned, reinstalled, and source testing is completed.

19. Estimate excess emissions, if any, on a daily basis, including, if applicable, excess opacity (the percentage of total opacity above 20% during the variance period). If the variance will result in no excess emissions, insert "N/A" here and skip to No. 20.

Pollutant	(A)	(B)	(C)*
	Total Estimated Excess Emissions (lbs/day)	Reduction Due to Mitigation (lbs/day)	Net Emissions After Mitigation (lbs/day)
N/A	N/A	N/A	N/A

* Column A minus Column B = Column C

Excess Opacity: _____ N/A%

20. Show calculations used to estimate quantities in No. 19, or explain why there will be no excess emissions.

During the time the turbine is absent, there will be no excess emissions. When the turbine is returned and reinstalled, the turbine will be tested prior to placing it in service. The turbine will not operate until testing is done, so there will be no excess emissions.

21. Explain how you plan to reduce (mitigate) excess emissions during the variance period to the maximum extent feasible, or why reductions are not feasible.

There will be no need to mitigate excess emissions since there will be no excess emissions during the variance period. When the turbine is returned and reinstalled, the turbine will be tested prior to placing it in service. The turbine will not operate until testing is done, so there will be no excess emissions.

22. How do you plan to monitor or quantify emission levels from the equipment or activity(s) during the variance period, and to make such records available to the District? **Any proposed monitoring does not relieve RECLAIM facilities from applicable missing data requirements.**

There will be no need to quantify emission levels since there will be no emissions from Turbine No. 1 during the variance period.

23. How do you intend to achieve compliance with the rule(s) and/or permit condition(s)? Include a detailed description of any equipment to be installed, modifications or process changes to be made, permit conditions to be amended, etc., dates by which the actions will be completed, and an estimate of total costs.

A Request for Bids to repair Turbine No. 1 was sent on July 12th, 2024. The turbine is not expected to be back in operation until March 2026, due to supply constraints. The triennial compliance testing will be completed shortly after it is returned to service as directed by scheduling. The total repair costs are estimated to be about \$3,465,441.02 and total losses are estimated at \$1,700,000.

24. State the date you are requesting the variance to begin: September 4, 2025
and the date by which you expect to achieve final compliance: March 31, 2026

If the regular variance is to extend beyond one year, you **must** include a **Schedule of Increments of Progress**, specifying dates or time increments for steps needed to achieve compliance. See District Rule 102 for definition of Increments of Progress (see Attachment A, Item 24, Example #3).

List Increments of Progress here: N/A

25. List the names of any District personnel with whom facility representatives have had contact concerning this variance petition or any related Notice of Violation or Notice to Comply.

<u>Karin Marwaring</u>	Ext. <u>2236</u>
<u>Thomas Lee</u>	Ext. <u>2412</u>

If the petition was completed by someone other than the petitioner, please provide their name and title below.

<u>Cesar Santana</u>	<u>Montrose Environmental Solutions, Inc.</u>	<u>Project Engineer</u>
Name	Company	Title

The undersigned, under penalty of perjury, states that the above petition, including attachments and the items therein set forth, is true and correct.

Executed on AUGUST 1, 2025, at CANYON POWER PLANT, California

<u>R Hoffard</u>	<u>Ron Hoffard</u>
Signature	Print Name

Title: Generation Plant Manager



FACILITY PERMIT TO OPERATE CANYON POWER PLANT

SECTION D: FACILITY DESCRIPTION AND EQUIPMENT SPECIFIC CONDITIONS

The operator shall comply with the terms and conditions set forth below:

Equipment	ID No.	Connected To	RECLAIM Source Type/ Monitoring Unit	Emissions* And Requirements	Conditions
Process 1: POWER GENERATION					
System 1: GAS TURBINE					
GAS TURBINE, NO. 1, NATURAL GAS, GENERAL ELECTRIC, MODEL LM6000PC SPRINT, SIMPLE CYCLE, 479 MMBTU/HR AT 46 DEG F, WITH INLET CHILLING, WITH WATER INJECTION WITH A/N: 555828	D1	C3	NOX: MAJOR SOURCE**	CO: 4 PPMV NATURAL GAS (4) [RULE 1303(a)(1)-BACT, 5-10-1996; RULE 1303(a)(1)-BACT, 12-6-2002]; CO: 2000 PPMV NATURAL GAS (5) [RULE 407, 4-2-1982]; NOX: 2.5 PPMV NATURAL GAS (4) [RULE 2005, 12-4-2015]; NOX: 25 PPMV NATURAL GAS (8) [40CFR 60 Subpart KKKK, 3-20-2009]; PM10: 0.01 GRAINS/SCF NATURAL GAS (5A) [RULE 475, 10-8-1976; RULE 475, 8-7-1978]; PM10: 0.1 GRAINS/SCF NATURAL GAS (5) [RULE 409, 8-7-1981]; PM10: 1.67 LBS/HR NATURAL GAS (5C) [RULE 1303(b)(2)-Offset, 5-10-1996; RULE 1303(b)(2)-Offset, 12-6-2002]; PM10: 11 LBS/HR NATURAL GAS (5B) [RULE 475, 10-8-1976; RULE 475, 8-7-1978]; SO2: (9) [40CFR 72 - Acid Rain Provisions, 11-24-1997]; SO2: 0.06 LBS/MMBTU NATURAL GAS (8) [40CFR 60 Subpart KKKK, 3-20-2009]; VOC: 2 PPMV NATURAL GAS (4) [RULE 1303(a)(1)-BACT, 5-10-1996; RULE 1303(a)(1)-BACT, 12-6-2002]	A63.1, A99.1, A99.2, A99.3, A195.1, A195.2, A195.3, A327.1, B61.1, D12.1, D29.2, D29.3, D82.1, D82.2, E193.1, H23.1, I298.1, K40.1
GENERATOR, 50.95 MW					

- * (1) (1A) (1B) Denotes RECLAIM emission factor
(3) Denotes RECLAIM concentration limit
(5) (5A) (5B) Denotes command and control emission limit
(7) Denotes NSR applicability limit
(9) See App B for Emission Limits
(2) (2A) (2B) Denotes RECLAIM emission rate
(4) Denotes BACT emission limit
(6) Denotes air toxic control rule limit
(8) (8A) (8B) Denotes 40 CFR limit (e.g. NSPS, NESHAPS, etc.)
(10) See section J for NESHAP/MACT requirements
- ** Refer to section F and G of this permit: to determine the monitoring, recordkeeping and reporting requirements for this device.



FACILITY PERMIT TO OPERATE CANYON POWER PLANT

SECTION D: FACILITY DESCRIPTION AND EQUIPMENT SPECIFIC CONDITIONS

The operator shall comply with the terms and conditions set forth below:

Equipment	ID No.	Connected To	RECLAIM Source Type/ Monitoring Unit	Emissions* And Requirements	Conditions
Process 1: POWER GENERATION					
CO OXIDATION CATALYST, NO. 1, BASF, 110 CUBIC FEET OF TOTAL CATALYST VOLUME A/N: 476654	C3	D1 C4			
SELECTIVE CATALYTIC REDUCTION, NO. 1, CORMETECH CMHT-21, 1012 CU.FT.; WIDTH: 2 FT 6 IN; HEIGHT: 25 FT 9 IN; LENGTH: 18 FT WITH A/N: 476654 AMMONIA INJECTION	C4	C3 S6		NH3: 5 PPMV NATURAL GAS (4) [RULE 1303(a)(1)-BACT, 5-10-1996; RULE 1303(a)(1) -BACT, 12-6-2002]	A195.4, D12.2, D12.3, D12.4, E179.1, E179.2, E193.1
STACK, TURBINE NO. 1, HEIGHT: 86 FT ; DIAMETER: 11 FT 8 IN A/N: 555828	S6	C4			

- * (1) (1A) (1B) Denotes RECLAIM emission factor (2) (2A) (2B) Denotes RECLAIM emission rate
(3) Denotes RECLAIM concentration limit (4) Denotes BACT emission limit
(5) (5A) (5B) Denotes command and control emission limit (6) Denotes air toxic control rule limit
(7) Denotes NSR applicability limit (8) (8A) (8B) Denotes 40 CFR limit (e.g. NSPS, NESHAPS, etc.)
(9) See App B for Emission Limits (10) See section J for NESHAP/MACT requirements
- ** Refer to section F and G of this permit to determine the monitoring, recordkeeping and reporting requirements for this device.



FACILITY PERMIT TO OPERATE CANYON POWER PLANT

SECTION D: FACILITY DESCRIPTION AND EQUIPMENT SPECIFIC CONDITIONS

The operator shall comply with the terms and conditions set forth below:

The test(s) shall be conducted quarterly during the first twelve months of operation of the catalytic control device and annually thereafter when four consecutive quarterly source tests demonstrate compliance with the ammonia emission limit. If an annual test is failed, four consecutive quarterly source tests must demonstrate compliance with the ammonia emissions limits prior to resuming annual source tests.

The South Coast AQMD shall be notified of the date and time of the test at least 10 days prior to the test.

If the turbine is not in operation during one calendar year, then no testing is required during that calendar year.

The NO_x concentration, as determined by the CEMS, shall be simultaneously recorded during the ammonia slip test. If the CEMS is inoperable, a test shall be conducted to determine the NO_x emissions using South Coast AQMD Method 100.1 measured over a 60 minute averaging time period.

The test shall be conducted and the results submitted to the South Coast AQMD within 60 days after the test date.

The test shall be conducted to demonstrate compliance with the Rule 1303 concentration limit.

[RULE 1135, 11-2-2018; RULE 1303(a)(1)-BACT, 5-10-1996; RULE 1303(a)(1)-BACT, 12-6-2002]

[Devices subject to this condition : D1, D7, D13, D19]

D29.3 The operator shall conduct source test(s) for the pollutant(s) identified below.

Pollutant(s) to be tested	Required Test Method(s)	Sampling Time	Test Location
SOX emissions	AQMD Laboratory Method 307-91	District-approved averaging time	Fuel sample



FACILITY PERMIT TO OPERATE CANYON POWER PLANT

SECTION D: FACILITY DESCRIPTION AND EQUIPMENT SPECIFIC CONDITIONS

The operator shall comply with the terms and conditions set forth below:

VOC emissions	District Method 25.3 Modified	1 hour	Outlet of the SCR serving this equipment
PM emissions	District method 5.1	4 hours	Outlet of the SCR serving this equipment



FACILITY PERMIT TO OPERATE CANYON POWER PLANT

SECTION D: FACILITY DESCRIPTION AND EQUIPMENT SPECIFIC CONDITIONS

The operator shall comply with the terms and conditions set forth below:

The PM emissions testing shall be conducted using South Coast AQMD Method 5.1 as described in Section 3.3 of the Delta Air Quality Services, Inc. protocol, dated September 27, 2013 and approved by the South Coast AQMD on October 10, 2013. The testing shall consist of one run with a sampling time of four hours minimum for the run. The PM emissions results will be considered to be a surrogate for the PM10 emissions.

As source testing methods and techniques evolve, a new protocol may be submitted and evaluated by the South Coast AQMD for approval in accordance with the procedure described below.

For PM (surrogate for PM10), the tests shall be conducted at least once every 18 months in order to verify compliance with the emission rate of 1.67 lb/hr PM10 at maximum load during normal operations. If all tests conducted over a three-year period comply with the 1.67 lb/hr limit for PM10, the facility shall have the option of reducing the source test frequency to once every three years.

For SOx and VOC, the test shall be conducted at least once every three years. The South Coast AQMD shall be notified of the date and time of the test at least 10 days prior to the test.

The test shall be conducted to determine the oxygen levels in the exhaust. In addition, the tests shall measure the fuel flow rate (CFH), the flue gas flow rate, and the turbine generating output in MW.

The test shall be conducted in accordance with South Coast AQMD approved test protocol. The protocol shall be submitted to the South Coast AQMD engineer no later than 45 days before the proposed test date and shall be approved by the South Coast AQMD before the test commences..

The test protocol shall include the proposed operating conditions of the turbine during the tests, the identity of the testing lab, a statement from the testing lab certifying that it meets the criteria of Rule 304, and a description of all sampling and analytical procedures.



FACILITY PERMIT TO OPERATE CANYON POWER PLANT

SECTION D: FACILITY DESCRIPTION AND EQUIPMENT SPECIFIC CONDITIONS

The operator shall comply with the terms and conditions set forth below:

The test shall be conducted when this equipment is operating at loads of 100, 75, and 50 percent, with the exception of PM testing (surrogate for PM₁₀). For PM, the test shall be conducted when this equipment is operating at a load of 100 percent.

For natural gas fired turbines only, for the purpose of demonstrating compliance with VOC BACT limits as determined by South Coast AQMD, the operator shall use South Coast AQMD Method 25.3 modified as follows:

- a) Triplicate stack gas samples extracted directly into Summa canisters, maintaining a final canister pressure between 400-500 mm Hg absolute,
- b) Pressurization of the Summa canisters with zero gas analyzed/certified to less than 0.05 ppmv total hydrocarbons as carbon, and
- c) Analysis of Summa canisters per the canister analysis portion of South Coast AQMD Method 25.3 with a minimum detection limit of 0.3 ppmv or less and reported to two significant figures. The temperature of the Summa canisters when extracting the samples for analysis shall not be below 70 F.

The use of this modified method for VOC compliance determination does not mean that it is more accurate than unmodified South Coast AQMD Method 25.3, nor does it mean that it may be used in lieu of South Coast AQMD Method 25.3 without prior approval, except for the determination of compliance with the BACT level of 2.0 ppmv VOC calculated as carbon for natural gas fired turbines.

For purposes of this condition, an alternative test method may be allowed for any of the above pollutants upon concurrence by South Coast AQMD, EPA, and CARB.

[RULE 1303(a)(1)-BACT, 5-10-1996; RULE 1303(a)(1)-BACT, 12-6-2002; RULE 1303(b)(2)-Offset, 5-10-1996; RULE 1303(b)(2)-Offset, 12-6-2002]

[Devices subject to this condition : D1, D7, D13, D19]

D82.1 The operator shall install and maintain a CEMS to measure the following parameters:

**BEFORE THE HEARING BOARD OF THE
SOUTH COAST AIR QUALITY MANAGEMENT DISTRICT
MINUTE ORDER**

CANYON POWER PLANT (CITY OF ANAHEIM)
3071 E. Miraloma Avenue
Anaheim, CA 92806

Case No: 6264-1
Facility ID: 153992

Hearing Date: 10/3/24

Hearing Type: Regular

Consent Calendar: No

HEARING BOARD ACTION

Action: Granted

Starting Date: 10/3/2024

Ending Date: 08/31/2025

RULES

203(b) {from Section D, Condition No. D29.3 of Title V/RECLAIM P/O Facility ID 153992}
2004(f)(1) {from Section D, Condition No. D29.3 of Title V/RECLAIM P/O Facility ID 153992}
3002(c)(1) {from Section D, Condition No. D29.3 of Title V/RECLAIM P/O Facility ID 153992}

EQUIPMENT DESCRIPTION

DEVICE/APPLICATION/PERMIT

Gas Turbine No. 1

D1

CONDITIONS

1. The variance applies only to the portion of permit condition D29.3 stating the "test shall be conducted at least one every three years." All other requirements in this condition shall remain in effect.
2. Petitioner shall notify the South Coast AQMD via email to AQ Engineer Chris Perri (cperri@aqmd.gov), AQ Inspector II Avelino Revilla (arevilla@aqmd.gov), and Supervising AQ Inspector Thomas Lee (tlee2@aqmd.gov) of the following:
 - a. Completion of repairs to Turbine No. 1, within seven (7) days of completion;
 - b. The return of repaired Turbine No. 1 to Canyon Power, within (7) seven calendar days
 - c. Date and time if initial start-up of the repaired Turbine No. 1, within twenty-four (24) hours of start-up;
 - d. At least ten (10) calendar days prior to the source test, provide notification of the date and time of the source test.
3. Petitioner shall conduct the triennial testing in accordance with permit condition D29.3 within 90 days after first successful fire. Successful fire shall mean operation that demonstrates compliance with all permit conditions, including the NOx emission limit.

4. Petitioner shall notify South Coast AQMD by calling 1-800-CUT-SMOG and by sending an email to AQ Inspector II Avelino Revilla (arevilla@aqmd.gov), Supervising AQ Inspector Thomas Lee (tlee2@aqmd.gov), and AQ Engineer Chris Perri (cperri@aqmd.gov) at least 24 hours prior to starting the Triennial Source Test.
5. Petitioner shall submit a complete source test report showing preliminary compliance with the Triennial Source Test conditions to South Coast AQMD Source Testing (sourcetesting@aqmd.gov) and to AQ Inspector II Avelino Revilla (arevilla@aqmd.gov), Supervising AQ Inspector Thomas Lee (tlee2@aqmd.gov), and AQ Engineer Chris Perri (cperri@aqmd.gov) within 45 calendar days after the test date.
6. Petitioner shall operate the Continuous Emissions Monitoring System (CEMS) to continuously monitor the exhaust from the Turbine No. 1 (Device No. D1) and record all required parameters (i.e. NOx concentration, oxygen content, and fuel flow) pursuant to Rule 2012, Appendix A, Chapter 2 for the duration of the variance period including showing valid zeros for all parameters when the turbine is not operating. In lieu of the of the abovementioned requirement, the Petitioner may choose to comply with the requirements in Rule 2012(c)(2)(D) and 2012(c)(2)(E), as amended on November 3, 2022
7. Petitioner shall pay all applicable fees to the Clerk of the Hearing Board, or the variance shall be invalidated pursuant to Rule 303(k), except for excess emissions fees, which shall be paid within fifteen (15) days of notification in writing that the fees are due, unless otherwise ordered by the Hearing Board.
8. Petitioner shall notify the Clerk of the Hearing Board at clerkofboard@aqmd.gov in writing when final compliance has been achieved.

EXCESS EMISSIONS

None

Failure to comply in full with any and all conditions and increments of progress may result in modification or revocation of this order by the Hearing Board, and/or enforcement actions by the South Coast AQMD.

REMINDER

In the event Petitioner will be unable to comply with the final compliance date, a petition requesting a modification and extension of the variance may be filed. To meet notice requirements, the petition must be filed no later than **July 15, 2025**. In the event the hearing is not needed and taken off calendar, petitioner may request a refund of 50% of the filing fee, however, petitioner will be responsible for the publication fee.

Present:

Micah Ali, Chair
Robert Pearman, Esq., Vice Chair
Jerry P. Abraham, MD, MPH, CMQ
Mohan Balagopalan
Cynthia Verdugo-Peralta

Representing the Petitioner:

Teresa Chen, Deputy City Attorney

Representing the Respondent: Kathryn Roberts, Senior Deputy District Counsel


Witnesses for the Petitioner: Ron Hoffard, Power Plant Operations Manager
Elden Krause, City of Anaheim Public Utilities Integrated
Resource Manager
Karl Lany, Principal Engineer – Montrose Environmental
Solutions

Witness for the Reespondent: Avelino Revilla, Air Quality Inspector II

Respondent's Exhibit: A – Proposed Regular Variance Conditions

Motion: Balagopalan/Abraham 5-0

Board
Review/Approval


Mohan Balagopalan

Dated

11/6/24

Prepared by: Faye Thomas