REQEUST FOR PROPOSALS

COV RFP # 2025-27

STACK EMISSIONS AND RATA TESTING SERVICES

DUE DATE: TUESDAY, SEPTEMBER 16, 2025 BY 1:00 P.M.

SEND RESPONSES TO:

MIGUEL A. MERCADO, QPA PURCHASING AGENT 640 E. WOOD STREET P.O. BOX 1508 VINELAND, NJ 08360

GENERAL REQUIREMENTS/INSTRUCTIONS

Proposal Submission Information

Submission Date and Time:

Tuesday, September 16, 2025, by 1:00 P.M.

Submission Office:

City of Vineland Purchasing Department 5th Floor City Hall 640 E. Wood Street Vineland, NJ 08360

Respondents shall clearly mark their submittal package with the title of this RFP and the name of the responding firm, addressed to the Purchasing Agent. The original proposal shall be marked to distinguish it from the copies.

Respondents are required to submit their expressions of interest, qualifications and experience. One (1) original and Three (3) copies of the Proposal, INCLUSIVE OF ALL information must be provided to the City's Purchasing Agent. Proposals are scheduled to be opened 1:00 PM on Tuesday, September 16, 2025. Any proposals received after said opening whether by mail or otherwise, will be returned unopened. The City assumes no responsibility for delays in any form of carrier, mail, or delivery service causing the proposal to be received after the above-referenced due date and time. Submission by fax, e-mail or telephone is NOT PERMITTED. Delivery of a proposal to any other City of Vineland Department or office is not acceptable and may result in your bid arriving late in the Purchasing Department. It is the bidder's responsibility to make sure the proposal is delivered to the proper office as listed above.

Only those RFP responses received prior to or on the submission date & time will be considered. Responses delivered before the submission date and time specified above may be withdrawn upon written application of the respondent who shall be required to produce evidence showing that the individual is or represents the principal or principals involved in the proposal. After the submission date and time specified above, responses must remain firm for a period of sixty (60) days.

City Representative for this Solicitation

Please direct all questions in writing to:

Miguel A. Mercado, QPA Purchasing Agent

Voice: (856) 794-4040 Fax: (856) 794-4327

Email: PurchasingOffice@vinelandcity.org

NOTE: Questions must be submitted in writing no later than noon on Friday, August 29, 2025. Questions received after this day and time will not be accepted.

Interpretations and Addenda

Respondents are expected to examine the RFP with care and observe all its requirements. All questions about the meaning or intent of this RFP, all interpretations and clarifications considered necessary by the owner's representative in response to such comments and questions will be issued by Addenda mailed or delivered to all parties recorded as having received the RFP package. Only comments and questions responded to by formal written Addenda will be binding. Oral interpretations, statements or clarifications are without legal effect.

Cost Liability and Additional Costs

The owner assumes no responsibility and liability for costs incurred by the respondents prior to the issuance of an agreement. The liability of the owner shall be limited to the terms and conditions of the contract.

Respondents will assume responsibility for all costs not stated in their proposals. All unit rates either stated in the proposal or used as a basis for its pricing are required to be all-inclusive. Additional charges, unless incurred for additional work performed by request of the owner, are not to be billed and will not be paid.

Statutory and Other Requirements

Compliance with Laws

Any contract entered into between the contractor and the owner must be in accordance with and subject to compliance by both parties with the New Jersey Local Public Contracts Law. The contractor must agree to comply with the non-discrimination provisions and all other laws and regulations applicable to the performance of services there under. The respondent shall sign and acknowledge such forms and certificates as may be required by this section.

Mandatory Affirmative Action Compliance

No firm may be issued a contract unless it complies with the Affirmative Action requirements of N.J.S.A. 10:5-31 et seq. and N.J.A.C. 17:27 as identified in the documents attached hereto. The form enclosed herein shall be properly executed.

Americans with Disabilities Act of 1990

Discrimination on the basis of disability in contracting for the delivery of services is prohibited. Respondents are required to read American with Disabilities language that is

part of the documents attached hereto and agree that the provisions of Title II of the Act are made part of the contract. The contractor is obligated to comply with the Act and hold the owner harmless.

Stockholder Disclosure

No corporation or partnership shall be awarded any contract for the performance of any work or the furnishing of any goods, unless, with receipt of the proposal of said corporation or partnership, there is submitted a statement setting forth the names and addresses of all stockholders in the corporation or partnership who own ten (10) percent or greater interest therein. Respondents shall complete and submit the form of statement included herein.

N.J. Business Registration Certificate

Pursuant to C57, PL2004, all New Jersey and out of state business organizations must obtain a Business Registration Certificate from the New Jersey Department of the Treasury, Division of Revenue, prior to conducting business in the State of New Jersey. Respondents shall be required to submit proof of their valid Business Registration prior to contract award. Questions regarding Business Registration may be directed to the Division of Revenue at (609) 292-1730. Online filing is available at www.state.nj.us/treasury/revenue/taxreg.htm.

Insurance and Indemnification

If it becomes necessary for the contractor, either as principal or by agent or employee, to enter upon the premises or property of the owner in order to construct, erect, inspect, make delivery or remove property hereunder, the contractor hereby covenants and agrees to take use, provide and make all proper, necessary and sufficient precautions, safeguards, and protection against the occurrence of happenings of any accident, injuries, damages, or hurt to person or property during the course of the work herein covered and his/her sole responsibility.

The contractor further covenants and agrees to indemnify and save harmless the owner from the payment of all sums of money or any other consideration(s) by reason of any, or all, such accidents, injuries, damages, or hurt that may happen or occur upon or about such work and all fines, penalties and loss incurred for or by reason of the violation of any owner regulation, ordinance or the laws of the State, or the United States while said work is in progress.

The contractor shall purchase and maintain during the entire period of this contract, professional liability insurance which shall protect the contractor and the City from any and all claims that may arise out of or result from the contractor's performance of this contract. A Certificate of Insurance in the amount of one million (\$1,000,000.00) dollars per occurrence/three million (\$3,000,000.00) annual aggregate shall be provided to the City prior to contract award.

Multiple Proposals Not Accepted

More than one proposal from an individual, a firm or partnership, a corporation or association under the same or different names, shall not be considered.

Failure to Enter Contract

Should the respondent, to whom the contract is awarded, fail to enter into a contract within ten (10) days, Sundays and holidays excepted, the owner may then, at its option, accept the proposal of another respondent.

Termination of Contract

If, through any cause, the contractor shall fail to fulfill in a timely and proper manner obligations under the contract or if the contractor violates any requirements of the contract, the owner shall thereupon have the right to terminate the contract by giving written notice to the contractor of such termination at least thirty (30) days prior to the proposed effective date of the termination. Such termination shall relieve the owner of any obligation for the balances to the contractor of any sum or sums set forth in the contract.

The contractor agrees to indemnify and hold the owner harmless from any liability to subcontractors/suppliers concerning payment for work performed or goods supplied arising out of the lawful termination of the contract by the owner under this provision. In case of default by the contractor, the owner may procure the articles or services from other sources and hold the contractor responsible for any excess cost occasioned thereby.

Challenge of Specifications

Any respondent who wishes to challenge a specification shall file such challenge in writing with the Director of Purchasing no less than three (3) business days prior to the opening of the RFP's. Challenges filed after that time shall be considered void and having no impact on the owner or the award of contract.

Payment

Invoices shall specify, in detail, the period for which payment is claimed, the services performed during the prescribed period, the amount claimed and correlation between the services claimed and the Proposal Document.

The City may withhold all or partial payments on account of subsequently discovered evidence including but not limited to the contractor not complying with the terms of the contract.

When the above grounds are removed, payment shall be made for amounts withheld because of them.

Contractors shall be required to sign a City voucher for payment.

Ownership of Material

The owner shall retain all of its rights and interest in any and all documents and property both hard copy and digital furnished by the owner to the contractor for the purpose of assisting the contractor in the performance of this contract. All such items shall be returned immediately to the owner at the expiration or termination of the contract or completion of any related services, pursuant thereto, whichever comes first. None of the documents and/or property shall, without the written consent of the owner, be disclosed to others or used by the contractor or permitted by the contractor to be used by their parties at any time except in the performance of the resulting contract.

Ownership of all data, materials and documentation originated and prepared for the owner pursuant to this contract shall belong exclusively to the owner. All data, reports, computerized information, programs and materials related to this project shall be delivered to and become the property of the owner upon completion of the project. The contractor shall not have the right to use, sell, or disclose the total of the interim or final work products, or make available to third parties, without the prior written consent of the owner. All information supplied to the owner may be required to be supplied on CD-ROM media compatible with the owner's computer operating system, MS Windows based, Lotus Suite.

Annual Disclosure Statement on Political Contributions

The contractor is hereby advised of the responsibility to file an annual disclosure statement on political contributions with the New Jersey Election Law Enforcement Commission pursuant to N.J.S.A. 19:44A-20.13 (P.L. 2005, c. 271, s.3) if the contractor receives contracts in excess of \$50,000.00 from public entities in a calendar year. It is the contractor's responsibility to determine if filing is necessary. Additional information on this requirement is available from ELEC at (888) 313-3532 or at www.elec.state.nj.us.

Proposal Forms

The following forms are contained in the attachments. All forms are required and shall be completed and made part of the proposal submitted.

Stockholder Disclosure
Affirmative Action Statement
Acknowledgment of Receipt of Addenda, if any.
Disclosure of Investment Activities in Iran
Prohibited Activities in Russia or Belarus

Proposals to Remain Subject to Acceptance

RFP responses shall remain open for a period of sixty (60) calendar days from the stated submittal date. The owner will either award the Contract within the applicable time period or reject all proposals. The owner may extend the decision to award or reject all proposals beyond the sixty (60) calendar days when the proposals of any respondents who consent thereto may, at the request of the owner, be held for consideration for such longer period as may be agreed.

Rejection of Proposals

The owner reserves the right to reject any or all proposals, or to reject any proposals if the evidence submitted by, or investigation of such respondent fails to satisfy the owner that such respondent is properly qualified to carry out the obligations of the RFP and to complete the work contemplated therein. The owner reserves the right to waive any minor informality in the RFP.

Evaluation Process

An evaluation team will review all proposals to determine if they satisfy the Proposal Requirements, determine if a proposal should be rejected and evaluate the proposals based upon the Evaluation Criteria. The highest-ranking respondent will then be recommended to the governing body for award of contract, based on price and other factors.

Evaluation Criteria

The criteria considered in the evaluation of this proposal shall be as follows. The arrangement of the criteria is not meant to imply order of importance in the selection process. All criteria will be used to select the successful respondent or respondents.

Understanding of the Requested Work

The proposals will be evaluated for general compliance with instructions and requests issued in the RFP. Non-compliance with significant instructions shall be grounds for disqualification of proposals.

Knowledge and Technical Competence

This includes the ability of the respondent to perform all of the tasks and adequately fulfill the requirements specified herein.

Management, Experience and Personnel Qualifications

Expertise of the firm shall be demonstrated by past contract successes providing government agencies with similar services.

The respondent will be evaluated on knowledge, experience, prior collaboration and successful completion of projects/services similar to that requested in this RFP. In addition to relevant experience, respondents shall provide personnel qualifications in the Proposal.

Ability to Complete the Services in a Timely Manner

This is based on the estimated duration of the tasks and the respondent's ability to accomplish these tasks as stated.

Cost to Provide Services

Provide your costs for the services requested on the Cost Proposal page provided in RFP.

Notice of Award

The successful respondent will be notified of the award of contract upon a favorable decision by the governing body at which time the respondent shall be required to execute a Vineland City contract.

Choice of Law

The agreement with the successful bidder shall be construed in accordance with the laws of the State of New Jersey. In the event of litigation or other legal proceedings commenced to enforce the terms of the agreement, the venue of such litigation shall be the Superior Court of New Jersey, Cumberland County.

Contract Records

As per N.J.A.C. 17:44-2.2 Vendor shall maintain all documentation related to products, transactions or services under this contract for a period of five years from the date of final payment. Such records shall be made available to the New Jersey Office of the State Comptroller upon request.

as established by the statutes and court decisions of the State of New Jersey and as established by applicable Federal law and applicable Federal court decisions.

In conforming with the targeted employment goals, the contractor or subcontractor agrees to review all procedures relating to transfer, upgrading, downgrading and layoff to ensure that all such actions are taken without regard to age, race, creed, color, national origin, ancestry, marital status, affectional or sexual orientation, gender identity or expression, disability, nationality or sex, consistent with the statutes and court decisions of the State of New Jersey, and applicable Federal law and applicable Federal court decisions.

The contractor shall submit to the public agency, after notification of award but prior to execution of a goods and services contract, one of the following three documents:

Letter of Federal Affirmative Action Plan Approval;

Certificate of Employee Information Report; or

Employee Information Report Form AA302 (electronically provided by the Division and distributed to the public agency through the Division's website at http://www.state.nj.us/treasury/contract_compliance).

The contractor and its subcontractors shall furnish such reports or other documents to the Division of Purchase an Property, CCAU, EEO Monitoring Program as may be requested by the office from time to time in order to carry out the purposes of these regulations, and public agencies shall furnish such information as may be requested by the Division of Purchase an Property, CCAU, EEO Monitoring Program for conducting a compliance investigation pursuant to N.J.A.C. 17:27-1 et seq.

EXECUTIVE ORDER NO. 151 REQUIREMENTS

It is the policy of the Division of Purchase and Property that its contracts should create a workforce that reflects the diversity of the State of New Jersey. Therefore, contractors engaged by the Division of Purchase and Property to perform under a construction contract shall put forth a good faith effort to engage in recruitment and employment practices that further the goal of fostering equal opportunities to minorities and women.

The contractor must demonstrate to the Division of Purchase and Property's satisfaction that a good faith effort was made to ensure that minorities and women have been afforded equal opportunity to gain employment under the Division of Purchase and Property's contract with the contractor. Payment may be withheld from a contractor's contract for failure to comply with these provisions.

Evidence of a "good faith effort" includes, but is not limited to:

- 1. The Contractor shall recruit prospective employees through the State Job bank website, managed by the Department of Labor and Workforce Development, available online at http://NJ.gov/JobCentralNJ;
- 2. The Contractor shall keep specific records of its efforts, including records of all individuals interviewed and hired, including the specific numbers of minorities and women;
- 3. The Contractor shall actively solicit and shall provide the Division of Purchase and Property with proof of solicitations for employment, including but not limited to advertisements in general circulation media, professional service publications and electronic media; and
- 4. The Contractor shall provide evidence of efforts described at 2 above to the Division of Purchase and Property no less frequently than once every 12 months.
- 5. The Contractor shall comply with the requirements set forth at N.J.A.C. 17:27.

This language is in addition to and does not replace good faith efforts requirements for construction contracts required by N.J.A.C. 17:27-3.6, 3.7 and 3.8, also known as Exhibit B.

AMERICANS WITH DISABILITIES ACT OF 1990

Equal Opportunity for Individuals with Disability

The contractor and the City of Vineland, (hereafter "City") do hereby agree that the provisions of Title 11 of the Americans with Disabilities Act of 1990 (the "Act") (42 U.S.C. SJ 21 01 et seq.), which prohibits discrimination on the basis of disability by public entities in all services, programs, and activities provided or made available by public entities, and the rules and regulations promulgated pursuant there unto, are made a part of this contract. In providing any aid, benefit, or service on behalf of the City pursuant to this contract, the contractor agrees that the performance shall be in strict compliance with the Act. In the event that the contractor, its agents, servants, employees, or subcontractors violate or are alleged to have violated the Act during the performance of this contract, the contractor shall defend the City in any action or administrative proceeding commenced pursuant to this Act. The contractor shall indemnify, protect, and save harmless the City, its agents, servants, and employees from and against any and all suits, claims, losses, demands, or damages, of whatever kind or nature arising out of or claimed to arise out of the alleged violation. The contractor shall, at its own expense, appear, defend, and pay any and all charges for legal services and any and all costs and other expenses arising from such action or administrative proceeding or incurred in connection therewith. In any and all complaints brought pursuant to the City's grievance procedure, the contractor agrees to abide by any decision of the City which is rendered pursuant to said grievance procedure. If any action or administrative proceeding results in an award of damages against the City, or if the City incurs any expense to cure a violation of the ADA which has been brought pursuant to its grievance procedure, the contractor shall satisfy and discharge the same at its own expense.

The City shall, as soon as practicable after a claim has been made against it, give written notice thereof to the contractor along with full and complete particulars of the claim, if any action or administrative proceeding is brought against the City or any of its agents, servants, and employees, the City shall expeditiously forward or have forwarded to the contractor every demand, complaint, notice, summons, pleading, or other process received by the City or its representatives.

It is expressly agreed and understood that any approval by the City of the services provided by the contractor pursuant to this contract will not relieve the contractor of the obligation to comply with the Act and to defend, indemnify, protect, and save harmless the City pursuant to this paragraph.

It is further agreed and understood that the City assumes no obligation to indemnify or save harmless the contractor, its agents, servants, employees and subcontractors for any claim which may arise out of their performance of this Agreement. Furthermore, the contractor expressly understands and agrees that the provisions of this indemnification clause shall in no way limit the contractor's obligations assumed in this Agreement, nor shall they be construed to relieve the contractor from any liability, nor preclude the City from taking any other actions available to it under any other provisions of the Agreement or otherwise at law.

NEW JERSEY ANTI-DISCRIMINATION PROVISIONS NJ.S.A.10:2-1 ET SEQ.

Pursuant to NJ.S.A. 10:2-1, if awarded a contract, the contractor agrees that:

- A. In the hiring of persons for the performance of work under this contract or any subcontract hereunder, or for the procurement, manufacture, assembling or furnishing of any such materials, equipment, supplies or services to be acquired under this contract, no contractor, nor any person acting on behalf of such contractor or subcontractor, shall, by reason of race, creed, color, national origin, ancestry, marital status, gender identity or expression, affectional or sexual orientation or sex, discriminate against any person who is qualified and available to perform the work to which the employment relates;
- B. No contractor, subcontractor, nor any person on his behalf shall, in any manner, discriminate against or intimidate any employee engaged in the performance of work under this contract or any subcontract hereunder, or engaged in the procurement, manufacture, assembling or furnishing of any such materials, equipment, supplies or services to be acquired under such contract, on account of race, creed, color, national origin, ancestry, marital status, gender identity or expression, affectional or sexual orientation or sex;
- C. There may be deducted from the amount payable to the contractor by the contracting public agency, under this contract, a penalty of \$50.00 for each person for each calendar day during which such person is discriminated against or intimidated in violation of the provisions of the contract; and
- D. This contract may be canceled or terminated by the contracting public agency, and all money due or to become due hereunder may be forfeited, for any violation of this section of the contract occurring after notice to the contractor from the contracting public agency of any prior violation of this section of the contract.

City of Vineland

Revised Contract Language for BRC Compliance

Goods and Services Contracts (including Purchase Orders)

*Construction Contracts (including Public Works related Purchase Orders)

N.J.S.A. 52:32-44 imposes the following requirements on contractors and all subcontractors that knowingly provide goods or perform services for a contractor fulfilling this contract:

- 1. The contractor shall provide written notice to its subcontractors and suppliers to submit proof of business registration to the contractor;
- Subcontractors through all tiers of a project must provide written notice to their subcontractors and suppliers to submit proof of business registration and subcontractors shall collect such proofs of business registration and maintain them on file;
- 3. Prior to receipt of final payment from a contracting agency, a contractor must submit to the contracting agency an accurate list of all subcontractors and suppliers or attest that none was used;
- 4. During the term of this contract, the contractor and its affiliates shall collect and remit and shall notify all subcontractors and their affiliates that they must collect and remit to the Director, New Jersey Division of Taxation, the use tax due pursuant to the Sales and Use Tax Act, (N.J.S.A. 54:32B-1 et seq.) on all sale of tangible personal property delivered into this State.

Pursuant to J.J.S.A. 54:49-4.1, a business organization that fails to provide a copy of a business registration as required, or that provides false business registration information, shall be liable for a penalty of \$25 for each day of violation, not to exceed \$50,000, for each proof of business registration not properly provided under a contract with a contracting agency. Information on the law and its requirements is available by calling (609) 292-9292.

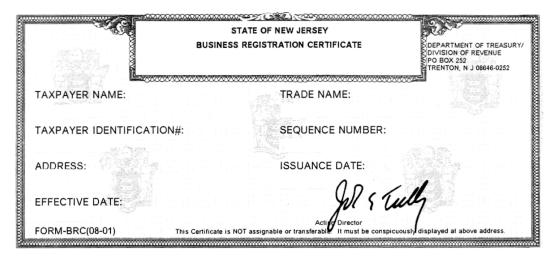
NEW JERSEY BUSINESS REGISTRATION

Pursuant to P.L. 2004, c.57, all consultants (both in-state and out-of-state) must obtain a Business Registration Certificate (BRC) from the New Jersey Department of the Treasury, Division of Revenue prior to conducting business with the NJTPA. A consultant or sub-consultant who fails to submit a copy of a valid BRC in accordance with the statue will be held liable for monetary penalties in accordance with N.J.S.A. 54:49-4.1. Questions regarding how to obtain a BRC can be directed to the New Jersey Division of Revenue at (609) 292-1730. The business registration form (Form NJ-REG) can be found online at:

http://www.state.nj.us/treasury/revenue/busregcert.shtml or

http://www.state.nj.us/treasury/revenue/gettingregistered.shtml

Sample New Jersey Registration Certificates:





Stack Emissions & RATA Testing Services Specification

Vineland Municipal Electric Utility

SECTION 014523 VMEU Project Code: 25-024

> Revision 2 July 14, 2025

Prepared by: Feff Davis	Date: <u>7/14/2025</u>
Project Lead: <u>Jeff Davis</u>	Date: <u>7/14/2025</u>

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SECTION 014523 - TESTING AND INSPECTION SERVICES

PART 1 - GENERAL CONDITIONS

1.1. Introduction

A. The objective of this specification is to invite proposals for Stack Emissions and RATA Testing Services for Vineland Municipal Electric Utility's combustion turbines.

1.2. Terms & Conditions

- A. City of Vineland General Instructions
 - i. It shall be each prospective Bidder's responsibility to read and understand the requirements as outlined and set forth in the document entitled "City of Vineland General Instructions" that precedes this specification. The general conditions outlined in this specification are not intended to duplicate or amend those instructions.
 - ii. See General Instructions Section III.C related to any request for interpretation or clarification of the meanings contained within this specification. Any questions or requests for interpretation or clarification of meanings SHALL go through the City of Vineland's Purchasing Department.

B. Definition of Terms

- Words, phrases, or other expressions used in these contract documents shall be defined as follows.
 - a. "Contract" or "contract documents" shall include, but are not limited to, the General Instructions, specifications, drawings and addenda issued by the Owner; the proposal and other documents submitted by the Contractor; and the Contract Agreement.
 - b. "Owner" or "City" shall mean the City of Vineland, New Jersey, acting through its City Council and their duly authorized agents. All notices, letters, and other communication directed to the Owner shall be addressed and delivered to the City of Vineland Electric Utility, 57 West Park Avenue, Suite A, PO Box 1508, Vineland, New Jersey, 08362-1508, Attention: William Burns
 - c. "VMEU" shall mean the Vineland Municipal Electric Utility, or their duly authorized agent.
 - d. "Bidder" shall mean the corporation, company, partnership, firm, or individual who is submitting a bid proposal in response to this request, and its, his, or their duly authorized representatives.
 - e. "Contractor" shall mean the corporation, company, partnership, firm, or individual who has entered into a Contract for the performance of the work covered thereby, and its, his, or their duly authorized representatives.
 - f. "Date of Contract," or equivalent words, shall mean the date of Contract Agreement is signed by the Contractor.
 - g. "Day" or "days" unless herein otherwise expressly defined, shall mean a calendar day or days of 24 hours each.
 - h. "The work" shall mean the equipment, supplies, materials, labor, and services to

- be furnished under the contract and the carrying out of all obligations imposed by the contract documents.
- i. Whenever in these contract documents the words "as order," "as directed," "as required," "as permitted," "as allowed," or words or phrases of like import are used, it shall be understood that the order, direction, requirement, permission, or allowance of the Owner or VMEU is intended only to the extent of judging compliance with the terms of the contract; none of these terms shall imply that the Owner or the VMEU has any authority or responsibility for supervision of the Contractor's forces or operations, such supervision and the sole responsibility therefore being strictly reserved for the Contractor.
- j. Similarly the words "approved," "reasonable," "suitable," "acceptable," "proper," "satisfactory," or words of like effect and import, unless otherwise specified herein, shall mean approved, reasonable, suitable, acceptable, proper, or satisfactory in the judgment of the Owner or VMEU, to the extent provided in "i" above.
- k. Whenever in these contract documents the expression "it is understood and agreed" or an expression of like import is used, such expression means the mutual understanding and agreement of the parties executing the Contract.

C. Codes and Standards

i. Any references to test methods, standards or codes of federal, state or local authorities, shall be references to the latest approved versions as published at the date of taking bids, unless specifically stated otherwise.

PART 2 - SPECIFICATION

2.1. Introduction

This request for proposal specifies the work to be performed by the Contractor and outlines the format in which the Contractor's proposal shall be submitted. The Contractor may be asked to perform stack emission testing services for the following Vineland Municipal Electric Utility (VMEU) generating units located in Vineland, NJ:

- A. The Clayville Unit 1 combustion turbine located at 4087 S. Lincoln Ave.; and
- B. The H.M. Down Unit 11 combustion turbine located at 211 N. West Ave.

2.2. Scope of Work

The primary categories of tests will be:

- A. <u>Stack Emissions Testing</u> to measure stack pollutant emissions in accordance with permit requirements, and N.J. Department of Environmental Protection (NJDEP) and U.S. Environmental Protection Agency (USEPA) regulations;
- B. <u>CEMS RATA Testing</u> to verify the accuracy of the continuous emission monitoring systems (CEMS) in accordance with permit requirements, and NJDEP and USEPA regulations;
- C. <u>SCR Traverse Testing</u> to inform operation and tuning efforts, including tuning of the ammonia injection grid; and
- D. <u>Miscellaneous Testing</u> such as mobile CEMS monitoring, visual observations and fuel analyses.

The preparation of test protocols and reporting of all test results are also part of the Contract. Each of the activities listed above is discussed in greater detail in the sections to follow.

2.3. Stack Emissions Testing

Stack Emissions Testing may be scheduled by VMEU to verify compliance with permitted limits and/or for other regulatory or operational purposes. Stack Emissions Testing under the Contract may include any or all of the Test Groups outlined in the remainder of this section.

Emissions of volatile organic compounds (VOC's), carbon monoxide (CO), nitrogen oxides (NOx), and sulfur dioxide (SO2) shall be measured using a real time monitoring system (mobile CEMS). All continuous emissions monitoring systems (CEMS) which are used shall conform to the design and performance criteria as outlined in the latest USEPA and NJDEP regulations and guidance applicable to the tests being conducted. All calibration gases used for these systems must be certified under EPA protocol and provided by a vendor participating in the Protocol Gas Verification Program (PGVP). Particulate and other emissions shall be measured using appropriate isokinetic sampling methods.

Emission parameters shall be tested in accordance with the methods outlined in the following tables, unless otherwise arranged by VMEU and the Contractor, and approved by NJDEP and/or USEPA, as applicable. The test methods and durations in the tables are suggested for reference and for the purpose of providing quotes. The final authority regarding which procedures are acceptable resides with the NJDEP and/or USEPA, whichever entity requires a particular test. Other applicable test methods and procedures may be utilized if they are acceptable to VMEU and approved or specified by NJDEP or USEPA.

If requested, the Contractor shall prepare and submit test protocols for required tests in accordance with all applicable rules and regulations of the NJDEP or the USEPA, whichever agency has requested or required protocol review. It shall be assumed that preparation of an electronic reporting tool (ERT) submission will be required with each protocol. The Contractor may be asked to follow a previously approved protocol(s), if such protocol is within the scope of their proposal. Protocol modification may be otherwise required.

2.4. Testing Outlines

Parameters required to be measured during a given test may vary due to changes in permits or operations, a need for retesting, or new NJDEP and/or USEPA initiatives and directives. The most likely combinations are outlined in the tables below, but other test combinations may be required. The Contractor shall coordinate with VMEU in defining all test plans prior to each test.

Table 1: Basic Parameters - All Tests

Except as otherwise indicated, the following shall be measured concurrently with all test runs described in this section, with results included in the test report and summary.

PARAMETER	UNITS	TEST METHOD(s)	TEST DETAILS
Stack Gas Velocity	ft/sec	EPA Reference Method 2	- Concurrent with each stack test run described in this section
Volumetric Flow Rate	ACFM DSCFM		
Oxygen (O2)	% dry	EPA Reference Methods 3 / 3A	
Carbon Dioxide (CO2)	% dry		
Moisture	%	EPA Reference Method 4	

Table 2: Test Group A1 - Clayville Unit 1 Initial Stack Test (including formaldehyde)

PARAMETER	UNITS	TEST METHOD(s)	TEST DETAILS
Nitrogen Oxides (NOx)	ppmV ppmV @15% O2 lb/hr	EPA Reference Method 7E	
Carbon Monoxide (CO)	ppmV ppmV @15% O2 lb/hr	EPA Reference Method 10	3 runs 60 minutes per run
Ammonia (NH3)	ppmV ppmV @15% O2 lb/hr	EPA Reference Method CTM-027	NOx, CO and NH3 to be run concurrently
Volatile Organic Compounds (VOC)	ppmV ppmV @15% O2 lb/hr	EPA Reference Methods 18 / 25A	VOC and CH2O to be run concurrently
Formaldehyde (CH2O)	ppmV lb/hr	EPA Reference Methods 320 / 323	
Sulfur Dioxide (SO2)	ppmV lb/hr	EPA Reference Methods 6C / 8	3 runs
Total Suspended Particulates (TSP)	gr/DSCF lb/hr	NJ Air Test Method 1	120 minutes per run
PM-10	gr/DSCF lb/hr	EPA Reference Methods 201A / 202	3 runs
PM-2.5	gr/DSCF lb/hr	EPA Reference Methods 201A / 202	240 minutes per run

Table 3: Test Group A2 - Down Unit 11 Initial Stack Test (without formaldehyde)

PARAMETER	UNITS	TEST METHOD(s)	TEST DETAILS
Nitrogen Oxides (NOx)	ppmV ppmV @15% O2 lb/hr	EPA Reference Method 7E	
Carbon Monoxide (CO)	ppmV ppmV @15% O2 lb/hr	EPA Reference Method 10	3 runs 60 minutes per run
Ammonia (NH3)	ppmV ppmV @15% O2 lb/hr	EPA Reference Method CTM-027	NOx, CO and NH3 to be run concurrently
Volatile Organic Compounds (VOC)	ppmV ppmV @15% O2 lb/hr	EPA Reference Methods 18 / 25A	
Sulfur Dioxide (SO2)	ppmV lb/hr	EPA Reference Methods 6C / 8	3 runs
Total Suspended Particulates (TSP)	gr/DSCF lb/hr	NJ Air Test Method 1	120 minutes per run
PM-10	gr/DSCF lb/hr	EPA Reference Methods 201A / 202	3 runs
PM-2.5	gr/DSCF lb/hr	EPA Reference Methods 201A / 202	240 minutes per run

Table 4: Test Group A3 - Down Unit 11 Renewal Stack Test Firing ULSD

PARAMETER	UNITS	TEST METHOD(s)	TEST DETAILS
Nitrogen Oxides (NOx)	ppmV ppmV @15% O2 lb/hr	EPA Reference Method 7E	3 runs
Carbon Monoxide (CO)	ppmV ppmV @15% O2 lb/hr	EPA Reference Method 10	60 minutes per run NOx and CO to be run concurrently
Volatile Organic Compounds (VOC)	ppmV ppmV @15% O2 lb/hr	EPA Reference Methods 18 / 25A	
Total Suspended Particulates (TSP)	gr/DSCF lb/hr	NJ Air Test Method 1	3 runs 120 minutes per run
PM-10	gr/DSCF lb/hr	EPA Reference Methods 201A / 202	3 runs
PM-2.5	gr/DSCF lb/hr	EPA Reference Methods 201A / 202	240 minutes per run

Table 5: Test Group A4 - Clayville Unit 1 and Down Unit 11 Renewal Stack Test Firing Natural Gas

PARAMETER	UNITS	TEST METHOD(s)	TEST DETAILS
Nitrogen Oxides (NOx)	ppmV ppmV @15% O2 lb/hr	EPA Reference Method 7E	3 runs 60 minutes per run
Carbon Monoxide (CO)	ppmV ppmV @15% O2 lb/hr	EPA Reference Method 10	NOx and CO to be run concurrently
PM-10	gr/DSCF lb/hr	EPA Reference Methods 201A / 202	3 runs
PM-2.5	gr/DSCF lb/hr	EPA Reference Methods 201A / 202	240 minutes per run

Table 6: Test Group A5 - Clayville Unit 1 and Down Unit 11 Renewal Stack Test - NOx and CO

PARAMETER	UNITS	TEST METHOD(s)	TEST DETAILS
Nitrogen Oxides (NOx)	ppmV ppmV @15% O2 lb/hr	EPA Reference Method 7E	3 runs 60 minutes per run
Carbon Monoxide (CO)	ppmV ppmV @15% O2 lb/hr	EPA Reference Method 10	NOx and CO to be run concurrently

Table 7: Test Group A6 - Clayville Unit 1 and Down Unit 11 Renewal Stack Test - PM-10 and PM-2.5

PARAMETER	UNITS	TEST METHOD(s)	TEST DETAILS
PM-10	gr/DSCF lb/hr	EPA Reference Methods 201A / 202	3 runs
PM-2.5	gr/DSCF lb/hr	EPA Reference Methods 201A / 202	240 minutes per run

Table 8: Test Group A7 - Clayville Unit 1 and Down Unit 11 - Ammonia Slip

PARAMETER	UNITS	TEST METHOD(s)	TEST DETAILS
Ammonia (NH3)	ppmV ppmV @15% O2 lb/hr	EPA Reference Method CTM-027	3 runs 60 minutes per run

Table 9: Test Group A8 - HAPS Testing – Toxic Metals

PARAMETER	UNITS	TEST METHOD(s)	TEST DETAILS
Toxic Metals (to include As, Be, Cd, Cr, Co, Pb, Mn, Hg and Ni)	ppm lb/hr	EPA Reference Method 29	3 runs 240 minutes per run

Table 10: Test Group A9 - HAPS Testing – Non-metals

PARAMETER	UNITS	TEST METHOD(s)	TEST DETAILS
Volatile Organic Compounds (VOC)	ppmV ppmV @15% O2 lb/hr	EPA Reference Methods 18 / 25A	
Formaldehyde (CH2O)	ppmV lb/hr	EPA Reference Methods 320 / 323	3 runs 240 minutes per
Methane (CH4)	lb/hr	EPA Reference Method 18	run To be run
Dioxins / Furans	lb/hr	EPA Reference Method 23	concurrently to the extent possible
Polycyclic Organic Material (POM)	lb/hr	EPA Reference Method 23 / SW- 846 Method 8270	

2.5. Relative Accuracy Test Audits (RATAs)

The Contractor shall perform Relative Accuracy Test Audits (RATAs) for the CEMS systems installed at each unit. RATA tests shall be performed according to 40 CFR Parts 60 and 75, as required. The Contractor shall audit the monitors for Oxygen (O2), Carbon Monoxide (CO), and Nitrogen Oxides (NOx). Results for O2 shall be provided in %, and results for CO and NOx shall be provided as concentration (ppmvd), concentration corrected (ppmvd@15%O2) and emission rate (lb/MMBtu). For pricing purposes, Contractor shall assume 12 test runs per RATA.

If requested, the Contractor shall prepare and submit RATA test protocols for required tests in accordance with all applicable rules and regulations of the NJDEP or the USEPA, whichever agency has requested or required protocol review. It shall be assumed that preparation of an electronic reporting tool (ERT) submission will be required with each protocol. The Contractor may be asked to follow a previously approved protocol(s), if such protocol is within the scope of their proposal. Protocol modification may be otherwise required.

All CEMS which are used by the Contractor shall conform to the design and performance criteria as outlined in the latest EPA and NJ DEP regulations. All calibration gases used during testing for Part 75 purposes shall comply with EPA PGVP regulations, and all testing shall be performed by a Qualified Source Testing Individual. A NOx converter test of the VMEU CEMS shall be performed at the conclusion of each NOx RATA. Down Unit 11 and Clayville Unit 1 are low emission sources (<10 ppm). Contractor shall conduct all tests using monitoring systems appropriate for this low range of emissions.

Emission parameters shall be tested in accordance with the following table, unless otherwise arranged:

Table 11: RATA Test Parameters

PARAMETER	UNITS	TEST METHOD(s)	40 CFR Reference
Nitrogen Oxides (NOx)	ppmvd	EPA Reference Method 7E	Part 60
	lb/MMBtu	EPA Reference Method 19	Part 75
Carbon Monoxide (CO)	ppmvd	EPA Reference Method 10	Part 60
	lb/MMBtu	EPA Reference Method 19	Part 60
Oxygen (O2)	% dry	EPA Reference Method 3A	Part 60 Part 75

2.6. Miscellaneous Tests and Related Activities

A. <u>Mobile CEMS Monitoring</u>

Monitoring for various purposes using Contractor's mobile CEMS (NOx, CO, O2, VOC) may be required for equipment maintenance and testing. Pricing is requested for the following:

- 1. a base of six hours of monitoring (including mobilization and one day onsite);
- 2. each additional onsite day for the CEMS; and
- 3. each hour of attended monitoring (supervisor and technician).

B. Traverse Testing

Pricing is requested for traverse testing of one of the SCRs for NOx and ammonia slip. Assume the following for pricing:

- 1. 50 test points, 5 across at each of 10 ports
- 2. 2 days on site, 6 hours per day

C. <u>Visual Observations</u>

Pricing is requested for performing visual observations of stack emissions in accordance with EPA Method 9 and N.J.A.C. 7:27B, Subchapter 2.

D. Fuel Testing

Pricing is requested for the collection and testing of natural gas samples. Samples to be tested for the following:

- 1. Heat content (HHV) in BTU/scf and BTU/lb
- 2. Sulfur content

2.7. Applicable Standards

All emissions tests shall be conducted in accordance with the latest NJDEP and USEPA standards. This shall include but not be limited to EPA Test Methods (CFR Title 40, Part 60, Appendix A, as directly applicable and/or modified in 40 CFR 75), New Jersey Air Test Methods 1 and 3 (N.J.A.C. 7:27B), and any American Society for Testing and Materials or American National Standards Institute standards stipulated in approved test protocols. Testing procedures shall incorporate recommended best practices.

2.8. Background and Operating Data

The background and operating characteristics of each unit to be tested are outlined below. Drawings showing test port locations (Appendix A) and copies of the relevant portions of each Unit's air permit (Appendix B) are attached.

A. Clayville Unit 1 Combustion Turbine

Installation Date: 2014

Manufacturer/Model: Rolls Royce

Type: Simple Cycle

Max Flow Rate (ACFM): 825,000

Fuel: Natural Gas

Emission Control Equipment:

- Water Injection
- Selective Catalytic Reduction (SCR)
- CO Catalyst

B. <u>Down Unit 11 Combustion Turbine</u>

Installation Date: 2011

Manufacturer / Model: Rolls Royce

Type: Simple Cycle

Max Flow Rate (ACFM): 825,000 Fuel: Natural Gas and/or ULSD Emission Control Equipment:

- Water Injection
- Selective Catalytic Reduction (SCR)
- CO Catalyst

Table 12: Clayville Unit 1 Stack Testing Permit Limits – Natural Gas Firing (OS1)

Facility ID: 75808 Permit: BOP250001

Parameter	lb/hr	lb/MMBtu	ppmvd@ 15%O2
TSP	62.8 / 5		
PM-10	5		
PM-2.5	5		
NOx	5.79		25 / 2.5
со	7.04		250 / 5
voc	2.06		50 / 2.55
SO2	1.12		
NH3	4.28		5

Table 13: H.M. Down Unit 11 Stack Testing Permit Limits – Natural Gas Firing (OS1)

Facility ID: 75507 Permit: BOP250001

Parameter	lb/hr	lb/MMBtu	ppmvd@15%O2
TSP	62.8 / 5		
PM-10	5		
PM-2.5	5		
NOx	5.79	0.01	25 / 2.5
со	7.04	0.012	250 / 5
voc	2.1	0.0033	50 / 2.6
SO2	1.12		
NH3	4.28		5

Table 14: H.M. Down Unit 11 Stack Testing Permit Limits – ULSD Firing (OS3)

Facility ID: 75507 Permit: BOP250001

Permit limits while firing **ULSD under normal conditions**:

Parameter	lb/hr	lb/MMBtu	ppmvd@15%O2
TSP	60.8 / 17.8		
PM-10	17.8		
PM-2.5	17.8		
NOx	8.27	0.014	74 / 3.5
со	7.2	0.012	5
voc	2.34	0.0038	50 / 2.84
SO2	0.99		
NH3	4.37		5

Table 15: H.M. Down Unit 11 Stack Testing Permit Limits – ULSD Firing (OS2)

Facility ID: 75507 Permit: BOP250001

Permit limits while firing ULSD under special conditions per OS2 Ref. #31:

Parameter	lb/hr	lb/MMBtu	ppmvd@15%O2
TSP	60.8 / 17.8		
PM-10	17.8		
PM-2.5	17.8		
NOx	11.8	0.02	74 / 5
со	7.2	0.012	5
voc	2.34	0.0038	50 / 2.84
SO2	0.99		
NH3	4.37		5

PART 3 - EXECUTION

3.1. Scheduling of Tests

VMEU will determine the time and number of tests to be performed under the Contract. For the purposes of preparing a proposal, bidders should assume that the individual test groups defined in the preceding sections shall be conducted at separate times.

It is intended that most testing will be performed during normal work days, Monday through Friday, from approximately 8:00 am through 5:00 pm, however situations may arise which require longer test periods in a day and/or flexibility in scheduling. It shall be assumed that scheduled tests may sometimes be extended into evening hours, should test requirements warrant, or unexpected conditions arise. It is expected that the Contractor will work with VMEU in defining mutually agreeable test schedules which meet testing requirements.

VMEU will endeavor to schedule and arrange testing with the Contractor with as much advance notice as possible. However, should Contractor be unable to perform a particular test within a timeframe, or in such a way, as to meet VMEU's regulatory requirements, VMEU reserves the right to procure services from another vendor for that test.

3.2. Testing Responsibilities

VMEU will furnish operational data for each set of test runs, access to sampling locations, and scaffolding and/or lifts to the sampling port elevation(s) (if required). All test ports shall be opened, cleaned, and left hand tight by VMEU prior to the test team's arrival. VMEU will also provide lighting and electric service convenient to each test site (if required). All other equipment, rigging, etc. which are necessary to testing are to be supplied by the Contractor.

The Contractor shall be responsible for having thoroughly informed itself, prior to submitting its proposal, of all conditions and factors which would affect the prosecution and completion of the work, including, but not limited to: the arrangement and condition of existing structures affecting, or which will be affected by, the proposed work; the availability and cost of labor; facilities for transportation, handling and storage of materials and equipment; the climatic conditions in the locality of the site; the nature of the work and materials necessary for the execution of the contract; the means of access to the site. Contractor shall obtain all necessary information as to risks, contingencies, activities of VMEU and all other circumstances which could have an effect on its proposal. A site visit is highly recommended for this purpose.

It shall be understood and agreed that all such factors have been properly investigated and considered by the Contractor in the preparation of its submitted proposal. No claims for financial adjustment to the Contract will be permitted which are based on the lack of such prior information or its effect on the cost of the work.

3.3. Reports and Documentation

The Contractor shall prepare a complete Test Report for each set of tests performed, describing all procedures, test data, operational data, calculations, and test results, including non-conformances, if any. The Test Report shall include all data required to submit test results using the EPA Electronic Reporting Tool (ERT), and shall include preparation of an ERT submittal, if such submittal is required by a relevant permit or approved protocol.

<u>Test results shall be reviewed, and reports shall be certified, by a New Jersey Licensed Professional Engineer.</u>

Draft reports shall be submitted, either electronically or in hardcopy, no later than four (4) weeks after the completion of the on-site testing, for compliance stack tests, and no later than three (3) weeks after testing, for RATA tests.

Up to three hardcopies of the final report, with original certifications, shall be submitted no later than six weeks after completion of the on-site compliance stack testing, and no later than four weeks after RATA testing. An electronic copy of each final report shall also be provided, and raw data from each test run, as well as mobile CEMS monitoring, shall be provided in database format (e.g. Excel) upon request. If an ERT submittal is prepared, a copy of the submittal file shall also be provided.

The Contractor shall ensure that VMEU receives copies of all correspondence, and summaries of all communications, that it has with the NJDEP or any other regulating agency with regard to protocols, testing, or any other matter related to the Contract work.

3.4. Contractor Qualifications

- A. Proposals for the Contract work shall include evidence of testing firm qualifications. Such evidence shall include qualifications of the firm and all individuals who would be assigned to perform the work, including resumes, designation of project leaders, and the principal contact. Contractor shall meet all USEPA and NJDEP qualification and certification requirements that apply to tests conducted at the time of testing. This includes certification of the firm as an Air Emissions Testing Body under the requirements 40 CFR Parts 72 and 75, as well as certification of at least one individual available to lead Part 75 testing operations as a Qualified Source Testing Individual under those regulations. Current certifications shall be provided with proposals. The size of proposed sampling teams shall also be noted in the proposal.
- B. The name, Registration Number, discipline, and qualifications of the N.J. registered Professional Engineer proposed for review and certification of testing conducted under this project shall also be included in proposals.
- C. Proposers shall submit a list of clients for whom similar work has been performed, including contact names and a brief description of the work. Demonstration of similar work should include evidence of satisfactory testing at sources which have low levels of emissions similar to the VMEU sources to be tested.

3.5. Laboratory Capabilities

The location of a testing firm's laboratory facilities, and a brief description of its capabilities and qualifications, shall be given in its proposal. If sample analysis is to be performed by an outside laboratory, the name, location, and a list of references for that firm shall also be included. The Laboratory shall be State certified for the parameters requiring testing under this request for proposal.

3.6. Pricing (Must be submitted on the Proposal Forms provided.)

The prices shall be quoted on a fixed price basis for each emissions Test Group and operating unit. The fixed price shall include initial mobilization and report preparation. Contractor shall not be entitled to extra charges due to delays caused by the Contractor. All prices shall be held firm for the contract period.

A separate price shall be given for the preparation and submission of the Test Protocols for testing to be performed. Protocol pricing shall be provided for both Source Emission Compliance Testing and RATA Testing performed for certification and recertification purposes.

The proposal shall include a per-hour "rate schedule" for each classification of labor for both straight time and premium time. Rates for consulting work shall also be included. All rates shall be held firm for the contract period.

Lost time attributable to turbine stabilization, unit maintenance, unit load adjustment, or severe weather lasting more than one hour will constitute a change in project scope and extra charges shall be based on the aforementioned hourly rates.

3.7. Contract Award

The City of Vineland shall be the sole judge in determining the selection and awarding of the contract. The City reserves the right to award one contract for all services described in this RFP, or separate contracts for distinct portions of the work, whichever, in the awarding authority's opinion, is in the best interest of the City.

The proposals shall be evaluated on the basis of cost as well as testing firm's qualifications and related experience.

The City of Vineland reserves the right to reject any incomplete proposals.

Any agreement to perform work resulting from this solicitation shall be limited only to the work described herein. It will not obligate VMEU to award the Contractor any additional or follow-up work resulting from its performance nor does it obligate the Contractor to perform any additional work beyond the scope of this Request for Proposal.

3.8. Contract Terms / Payments

The terms of the contract shall be those stated in the attached City of Vineland General Conditions and those stated in this Request for Proposal. No terms or conditions other than these shall be included in the contract documents, nor will any other form of contract submitted in response to this request be accepted by the City of Vineland.

All payments will be made in accordance with the City's policy and procedures, and in compliance with New Jersey regulations governing municipal purchasing. Payment of bills is approved at City Council Meetings on the 2nd and 4th Tuesday of each month, and invoices, properly signed and tabulated, must be presented to Accounts Payable no later than 10 business days preceding a meeting in order for payment to be made. No payments will be made for testing services until test results are received by VMEU. It is suggested that invoices be supplied to both Accounts Payable and the VMEU representative who has arranged for testing for best coordination of payment.

3.9. Open Ended Contract

VMEU will award a selected Contractor an open ended contract for specified testing services, with a total estimated contract amount based on the Contractor's proposal. The total contract price is the maximum amount that will be spent under an awarded Contract unless changed through an approved change order. VMEU does not guarantee the use of any set amount of testing services, however, and may order as few as zero (0) tests and services.

3.10. Contact Period

A. Initial Contract Period.

The contract period shall be for a period of one (1) year commencing January 1, 2026 ending December 31, 2026, with option to renew for one (1) additional year.

- B. The "option year" shall NOT be considered an "automatic" contract renewal.
- C. Either party, the City Department or the Vendor may elect NOT to enter the "option year". This decision shall be made at least 90 days prior to the end of the "initial year".
- D. The maximum length of the contract from this specification is two (2) years, including the option year.
- E. VMEU may terminate the contract when monies appropriated for this contract have been exhausted.

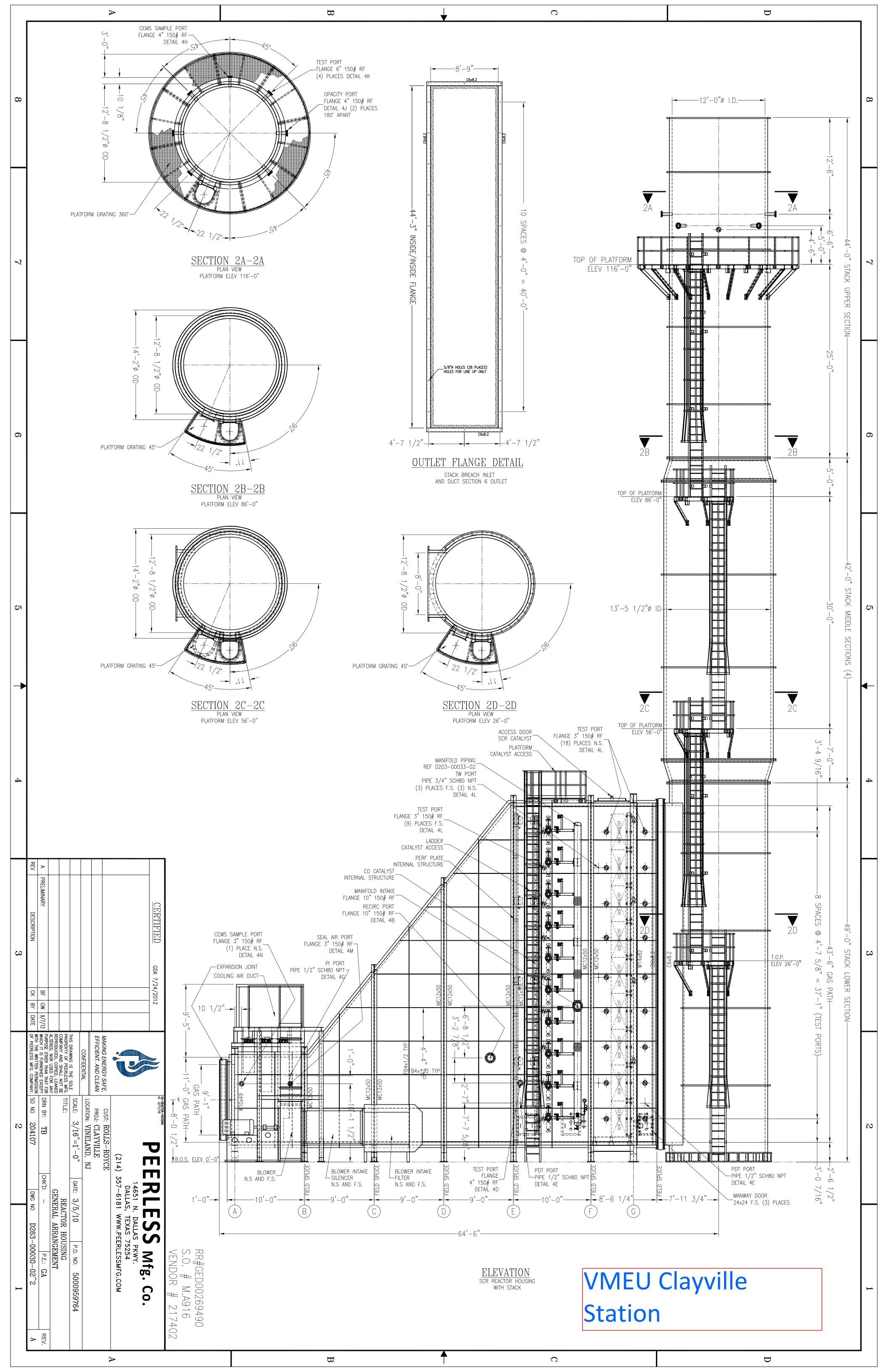
3.11. Site Visit

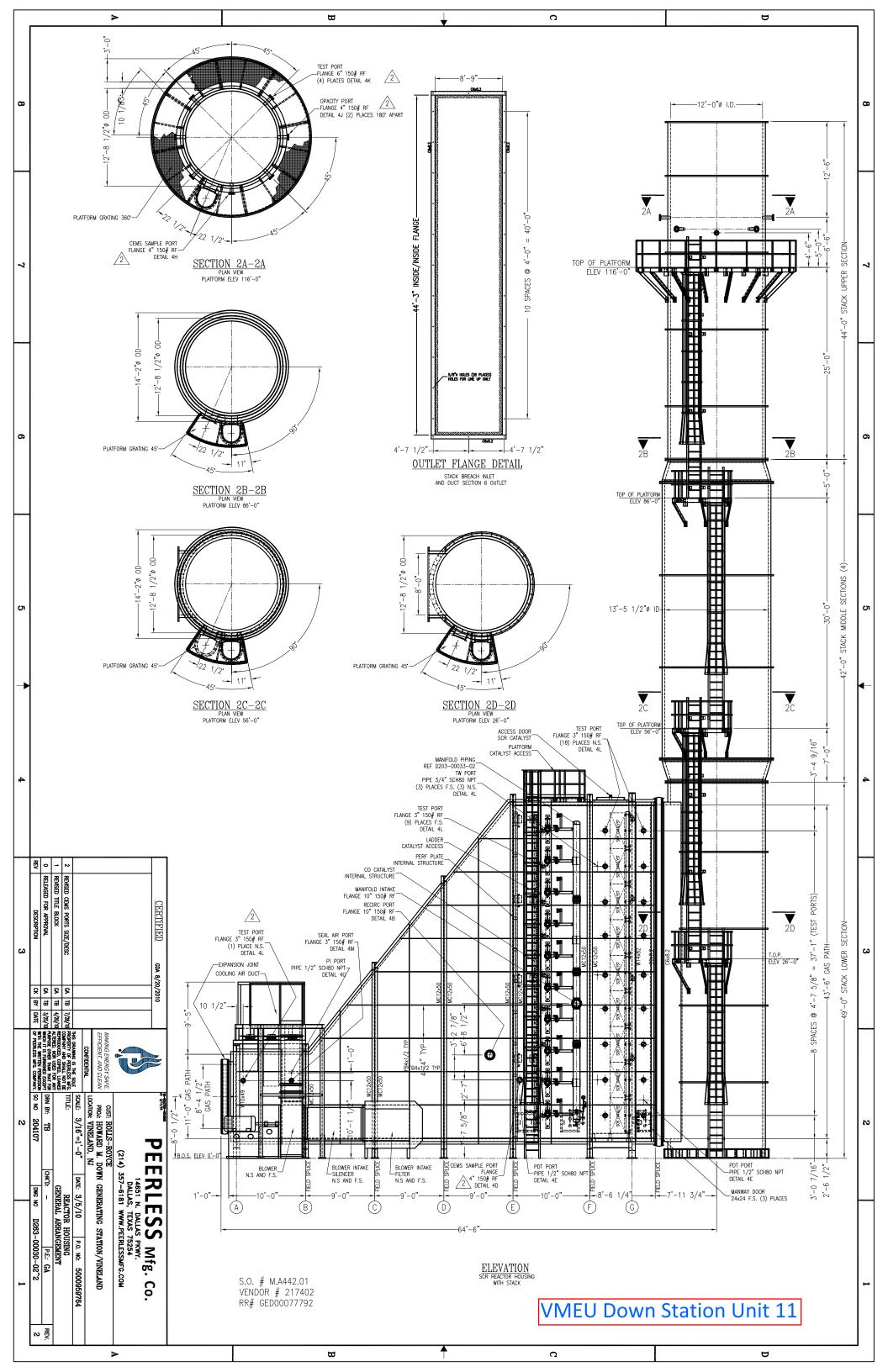
It is advisable that a testing firm visit the VMEU facilities listed in Section 2.8 to become familiarized with the sampling locations and to assess the requirements for conducting the testing services described in this request prior to submitting a proposal. Arrangements for plant visits can be made by contacting Jeff Davis, Supervising Engineer, (856)-794-4000 x4541.

PART 4 -ATTACHMENTS

4.1. List of Attachments

Sequence	Document Name
1	Attachment 1 – Drawings Showing Test Port Locations
2	Attachment 2 – Relevant Portions of Air Operating Permits
3	Proposal Form







PHILIP D. MURPHY Governor DEPARTMENT OF ENVIRONMENTAL PROTECTION

SHAWN M. LATOURETTE Commissioner

TAHESHA L. WAY Lt. Governor AIR, ENERGY AND MATERIALS SUSTAINABILITY
Division of Air Quality and Radiation Protection
Bureau of Stationary Sources
401 E. State Street, 2nd floor, P.O. Box 420, Mail Code 401-02
Trenton, NJ 08625-0420

Air Pollution Control Operating Permit Administrative Amendment

Permit Activity Number: BOP250001 Program Interest Number: 75507

Mailing Address	Plant Location	
DENNIS KOONS	VINELAND MUNICIPAL ELEC UTIL HOWARD	
DIRECTOR, VINELAND MUNICIPAL UTILITIES	M. DOWN	
CITY OF VINELAND MUNICIPAL ELECTRIC	211 N West Ave	
UTILITY	Vineland	
PO BOX 1508	Cumberland County	
Vineland, NJ 08362-1508		

Initial Operating Permit Approval Date: August 31, 2005
Operating Permit Approval Date: June 9, 2025
Operating Permit Expiration Date: July 8, 2029

AUTHORITY AND APPLICABILITY

The New Jersey Department of Environmental Protection (Department) approves and issues this Air Pollution Control Operating Permit under the authority of Chapter 106, P.L. 1967 (N.J.S.A. 26:2C-9.2). This permit is issued in accordance with the air pollution control permit provisions promulgated at Title V of the Federal Clean Air Act, 40 CFR 70, Air Pollution Control Act codified at N.J.S.A. 26:2C and New Jersey State regulations promulgated at N.J.A.C. 7:27-22.

The Department approves this operating permit based on the evaluation of the certified information provided in the permit application that all equipment and air pollution control devices regulated in this permit comply with all applicable State and Federal regulations. The facility shall be operated in accordance with the conditions of this permit. This operating permit supersedes any previous Air Pollution Control Operating Permits issued to this facility by the Department including any general operating permits, renewals, significant modifications, minor modifications, seven-day notice changes or administrative amendments to the permit.

Changes made through this permit activity are provided in the Reason for Application.

PERMIT SHIELD

Equipment at the facility referenced by this modification **is not covered by** the permit shield, pursuant to the provisions of N.J.A.C. 7:27-22.17.

COMPLIANCE SCHEDULES

This operating permit does not include compliance schedules as part of the approved compliance plan.

Revised: 12/19/2024

BOP250001

New Jersey Department of Environmental Protection Facility Specific Requirements

Date: 6/9/2025

Emission Unit: U11 Gas Turbine - Unit 11

Operating Scenario: OS Summary

Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement
1	Summary of Applicable Federal Regulations: 40 CFR 52.21: PSD 40 CFR 60 Subpart A 40 CFR 60 Subpart KKKK 40 CFR 97 Acid Rain. [40 CFR Federal Rules Summary]	None.	None.	None.
2	INITIAL STACK TEST: The permittee shall conduct a stack test while combusting natural gas using a protocol approved by the Department to demonstrate compliance with emission limits for VOC as specified in the compliance plan for OS Summary and NOx, CO, VOC, SO2, TSP, PM-10, PM-2.5 and Ammonia as specified in the compliance plan for OS1 while combusting natural gas. The permittee shall provide EMS with the turbine load performance curve with the protocol. Testing must be conducted at worst-case permitted operating conditions with regard to meeting the applicable emission standards, but without creating an unsafe condition. [N.J.A.C. 7:27-22.16(a)]	Monitored by stack emission testing once initially. The stack test must be conducted either within 180 days after initial startup of the reinstalled turbine or within 60 days of approval of a timely submitted protocol, whichever comes later. Pursuant to N.J.A.C. 7:27-16.23(c) and 19.15(c), the initial stack test to demonstrate compliance with VOC/NOx RACT standards shall be conducted within 180 days from the date on which the reinstalled turbine commences operation. In accordance with N.J.A.C. 7:27-19.15(a)2, any NOx testing conducted pursuant to this section shall be conducted concurrently with CO testing. The applicable NOx emission limits in N.J.A.C. 7:27-19 will not be considered to have been met unless the concurrent CO testing demonstrates compliance with the CO limit in N.J.A.C. 7:27-16.9 or the permit limit for CO, whichever is more stringent, is also met. [N.J.A.C. 7:27-22.18] and. [N.J.A.C. 7:27-22.16(o)]	Recordkeeping by stack test results once initially. [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. Submit a stack test protocol to the Emission Measurement Section (EMS) at Mail Code: 09-01, PO Box 420, Trenton, NJ 08625 within 60 days from the date of the approved initial (or modified) operating permit. The protocol and test report must be prepared and submitted on a CD using the Electronic Reporting Tool (ERT), unless another format is approved by EMS. The ERT program can be downloaded at: https://www.epa.gov/chief. Within 30 days of protocol approval or no less than 60 days prior to the testing deadline, whichever is later, the permittee must contact EMS at 609-984-3443 to schedule a mutually acceptable test date. A full stack test report must be submitted to EMS and a certified summary test report must be submitted to the Regional Enforcement Office within 45 days after performing the stack test pursuant to N.J.A.C. 7:27-22.19(d). The test results must be certified by a licensed professional engineer or certified industrial hygienist. [N.J.A.C. 7:27-22.18(h)]

Date: 6/9/2025

Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement
For the second s	RENEWAL STACK TEST FOR ULSD: Renewal stack testing shall be performed combusting ULSD once during each permit term during which the turbine does not qualify as a "peaking unit" for ULSD operations as defined by the Acid Rain program of USEPA, under 40 CFR 75. If the average capacity factor of the unit while combusting ULSD exceeds 10% over the previous 3 calendar years or the annual capacity factor in any of those calendar years exceeds 20%, the permittee shall: 1) Within 6 months of the capacity factor exceedance, submit a stack test protocol to the Department, and 2) Within 18 months of the capacity factor exceedance, conduct a stack test to demonstrate compliance with NOx, CO, VOC, TSP, PM-2.5 and PM-10 emission limits as specified in the complance plan for OS3 while combusting ULSD. Testing must be conducted at worst-case permitted operating conditions with regard to meeting the applicable emission standards, but without creating an unsafe condition. [N.J.A.C. 7:27-22.16(a)]	Monitored by stack emission testing at the approved frequency. In accordance with N.J.A.C. 7:27-19.15(a)2, any NOx testing conducted pursuant to this section shall be conducted concurrently with CO testing. The applicable NOx emission limits in N.J.A.C. 7:27-19 will not be considered to have been met unless the concurrent CO testing demonstrates compliance with the CO limit in N.J.A.C. 7:27-16.9 or the permit limit for CO, whichever is more stringent, is also met. [N.J.A.C. 7:27-22.16(o)]	Recordkeeping by stack test results upon occurrence of event. [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. Submit a stack test protocol to the Emission Measurement Section (EMS) at Mail Code: 09-01, PO Box 420, Trenton, NJ 08625 within 6 months of a capacity factor exceedence. The protocol and test report must be prepared and submitted on a CD using the Electronic Reporting Tool (ERT), unless another format is approved by EMS. The ERT program can be downloaded at: http://www.epa.gov/ttnchie1/ert. Within 30 days of protocol approval or no less than 60 days prior to the testing deadline, whichever is later, the permittee must contact EMS at 609-984-3443 to schedule a mutually acceptable test date. A full stack test report must be submitted to EMS and a certified summary test report must be submitted to the Regional Enforcement Office within 45 days after performing the stack test pursuant to N.J.A.C. 7:27-22.19(d). The test results must be certified by a licensed professional engineer or certified industrial hygienist. [N.J.A.C. 7:27-22.18(e)] and. [N.J.A.C. 7:27-22.18(h)]

Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement
4	RENEWAL STACK TEST FOR NATURAL GAS: The permittee shall conduct a stack test at least 18 months prior to the expiration of the initial or renewed operating permit using an approved protocol to demonstrate compliance with emission limits for NOx, CO, PM-10 and PM-2.5 as specified in the compliance plan for OS1 while combusting natural gas. The permittee shall provide EMS with the turbine load performance curve with the protocol. Testing must be conducted at worst-case permitted operating conditions with regard to meeting the applicable emission standards, but without creating an unsafe condition. [N.J.A.C. 7:27-22.16(a)]	Monitored by stack emission testing at the approved frequency. In accordance with N.J.A.C. 7:27-19.15(a)2, any NOx testing conducted pursuant to this section shall be conducted concurrently with CO testing. The applicable NOx emission limits in N.J.A.C. 7:27-19 will not be considered to have been met unless the concurrent CO testing demonstrates compliance with the CO limit in N.J.A.C. 7:27-16.9 or the permit limit for CO, whichever is more stringent, is also met. [N.J.A.C. 7:27-22.16(o)]	Recordkeeping by stack test results upon occurrence of event. [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. Submit a stack test protocol to the Emission Measurement Section (EMS) at Mail Code: 09-01, PO Box 420, Trenton, NJ 08625 at least 30 months prior to the expiration of the approved operating permit. The protocol and test report must be prepared and submitted on a CD using the Electronic Reporting Tool (ERT), unless another format is approved by EMS. The ERT program can be downloaded at: http://www.epa.gov/ttnchie1/ert. Within 30 days of protocol approval or no less than 60 days prior to the testing deadline, whichever is later, the permittee must contact EMS at 609-984-3443 to schedule a mutually acceptable test date. A full stack test report must be submitted to EMS and a certified summary test report must be submitted to the Regional Enforcement Office within 45 days after performing the stack test pursuant to N.J.A.C. 7:27-22.19(d). The test results must be certified by a licensed professional engineer or certified industrial hygienist. [N.J.A.C. 7:27-22.18(e)] and. [N.J.A.C. 7:27-22.18(h)]

Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement
5	Continuous Emission Monitoring System for NOx, CO and O2: Continuously monitor NOx, CO and O2 emitted from emission point PT11, using a Continuous Emission Monitoring (CEM) system that complies with USEPA performance and siting specifications (40 CFR Part 60, Appendix B. Continuous monitors and recorders shall be operated, calibrated, and maintained. Emissions shall be monitored during all operation of the turbine whether combusting natural gas or ultra low sulfur distillate. [N.J.A.C. 7:27-22.16(a)]	Monitored by continuous emission monitoring system continuously. [N.J.A.C. 7:27-22.16(o)]	Recordkeeping by data acquisition system (DAS) / electronic data storage continuously. [N.J.A.C. 7:27-22.16(o)]	CEMS/COMS - Submit equipment protocol, submit a PST protocol, conduct PST and submit results: As per the approved schedule. [N.J.A.C. 7:27-22.16(o)]
6	Continuous Process Monitoring System for Ammonia: Continuous process monitor and continuous process data recorder shall be installed and operated, calibrated and maintained to measure and record the concentration of Ammonia emitted from emission point PT11. Emissions shall be monitored during all operation of the turbine. The Permittee shall submit an equipment protocol to the Department in accordance with the NJDEP Technical Manual 1005 for review and approval. [N.J.A.C. 7:27-22.16(a)]	Other: Monitored by continuous process monitoring system continuously.[N.J.A.C. 7:27-22.16(o)].	Recordkeeping by data acquisition system (DAS) / electronic data storage continuously. [N.J.A.C. 7:27-22.16(o)]	Submit an equipment protocol: As per the approved schedule * to the Department for review and approval. * This requirement added by BOP120001, previous permits required this protocol to be submitted with CEMs protocol. Install the approved continuous process monitor equipment 30 days prior to the initial start up of the combustion turbine. The permittee shall not commence combustion in the turbine prior to installation of the process monitor. [N.J.A.C. 7:27-22.16(o)]
7	CO <= 250 ppmvd @ 15% O2. VOC RACT emission limit applies during all operation. [N.J.A.C. 7:27-16.9(b)]	CO: Monitored by continuous emission monitoring system continuously, based on one calendar day. (See U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	CO: Recordkeeping by data acquisition system (DAS) / electronic data storage continuously. (See U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Submit an Excess Emissions and Monitoring Systems Performance Report (EEMPR): On or before every April 30, July 30, October 30, and January 30 for the preceding quarter year (the quarter years begin on January 1, April 1, July 1, and October 1) electronically through the NJDEP online EEMPR web portal. [N.J.A.C. 7:27-22.16(o)]

Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement
8	VOC (Total) <= 50 ppmvd @ 15% O2. VOC RACT emission limit applies during all operations. [N.J.A.C. 7:27-16.9(b)]	VOC (Total): Monitored by stack emission testing at the approved frequency, based on the average of three Department validated stack test runs. Stack testing shall be performed initially and prior to permit renewal while combusting natural gas. Permit renewal testing not required for ULSD if the turbine is operated as a "peaking unit" with respect to ULSD as defined at 40 CFR 75. (See U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	VOC (Total): Recordkeeping by stack test results upon occurrence of event. Permit renewal testing not required for ULSD if the turbine is operated as a "peaking unit" with respect to ULSD as defined at 40 CFR 75. (See U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. Permit renewal testing not required for ULSD if the turbine is operated as a "peaking unit" with respect to ULSD as defined at 40 CFR 75. (See U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]
9	An exceedance of an emission limit that occurs during an adjustment of the combustion process under N.J.A.C. 7:27-19.16(g) is not a violation of this subchapter if it occurs as a result of the adjustment. After the combustion adjustment has been completed, the maximum emission rate of any contaminant shall not exceed the maximum allowable emission rate applicable under this subchapter or under an operating permit issued pursuant to N.J.A.C. 7:27-22 or an applicable certificate issued pursuant to N.J.A.C. 7:27-19.16(f)]	None.	None.	None.

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Emission Unit: U11 Gas Turbine - Unit 11 Operating Scenario: OS1 Unit 11 Firing Natural Gas

Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement
1	Opacity <= 20 %. Smoke emissions from stationary combustion turbines no greater than 20% opacity, exclusive of visible condensed water vapor, for more than 10 consecutive seconds. [N.J.A.C. 7:27- 3.5]	None.	None.	None.
2	Particulate Emissions <= 62.8 lb/hr Particulate emission limit from the combustion of natural gas based on rated heat input of 628 MMBtu/hr. [N.J.A.C. 7:27- 4.2(a)]	None.	None.	None.
3	Opacity <= 10 %. Smoke emissions from stationary combustion turbines no greater than 10% opacity, exclusive of visible condensed water vapor, for more than 10 consecutive seconds. [N.J.A.C. 7:27-22.16(a)]	None.	None.	None.
4	VOC (Total) <= 0.0033 lb/MMBTU, which includes formaldehyde emission. Based on a heat input of 628 MMBtu/hr and VOC emission rate of 2.1 lb/hr. [N.J.A.C. 7:27-22.16(a)]	VOC (Total): Monitored by stack emission testing once initially, based on the average of three Department validated stack test runs (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	VOC (Total): Recordkeeping by stack test results once initially. [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. [N.J.A.C. 7:27-22.16(o)]
5	VOC (Total) <= 2.1 lb/hr, which includes formaldehyde emission. Based on vendor guarantee. [N.J.A.C. 7:27-22.16(a)]	VOC (Total): Monitored by stack emission testing once initially, based on the average of three Department validated stack test runs. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	VOC (Total): Recordkeeping by stack test results once initially. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]
6	VOC (Total) <= 2.6 ppmvd @ 15% O2 , which includes formaldehyde emission. Based on vendor guarantee. [N.J.A.C. 7:27-22.16(a)]	VOC (Total): Monitored by stack emission testing once initially, based on the average of three Department validated stack test runs. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	VOC (Total): Recordkeeping by stack test results once initially. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]

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	Facility Specific Requirements			
Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement
7	NOx (Total) <= 1 lb/MW-hr. NOx RACT emission limit applies during all periods of natural gas combustion. [N.J.A.C. 7:27-19.5(g)]	NOx (Total): Monitored by continuous emission monitoring system continuously, based on a calendar day (in ozone season) or 30 day rolling (at other times) average. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	NOx (Total): Recordkeeping by data acquisition system (DAS) / electronic data storage continuously. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Submit an Excess Emissions and Monitoring Systems Performance Report (EEMPR): On or before every April 30, July 30, October 30, and January 30 for the preceding quarter year (the quarter years begin on January 1, April 1, July 1, and October 1) electronically through the NJDEP online EEMPR web portal. [N.J.A.C. 7:27-21.16(o)]
8	NOx (Total) <= 2.5 ppmvd @ 15% O2. Based on vendor guarantee / SOTA. [N.J.A.C. 7:27-22.16(a)]	NOx (Total): Monitored by continuous emission monitoring system continuously, based on a 3 hour rolling average based on a 1 hour block average. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	NOx (Total): Recordkeeping by data acquisition system (DAS) / electronic data storage continuously. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Submit an Excess Emissions and Monitoring Systems Performance Report (EEMPR): On or before every April 30, July 30, October 30, and January 30 for the preceding quarter year (the quarter years begin on January 1, April 1, July 1, and October 1) electronically through the NJDEP online EEMPR web portal. [N.J.A.C. 7:27-22.16(o)]
9	NOx (Total) <= 0.01 lb/MMBTU. Based on method 19 calculations and a NOx concentration of 2.5 ppm. [N.J.A.C. 7:27-22.16(a)]	NOx (Total): Monitored by continuous emission monitoring system continuously, based on a 3 hour rolling average based on a 1 hour block average. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	NOx (Total): Recordkeeping by data acquisition system (DAS) / electronic data storage continuously. (see U11 / OS Summary). [N.J.A.C. 7:27-22.16(o)]	Submit an Excess Emissions and Monitoring Systems Performance Report (EEMPR): On or before every April 30, July 30, October 30, and January 30 for the preceding quarter year (the quarter years begin on January 1, April 1, July 1, and October 1) electronically through the NJDEP online EEMPR web portal. [N.J.A.C. 7:27-22.16(o)]
10	NOx (Total) <= 2.5 ppmvd @ 15% O2. Based on vendor guarantee / SOTA. [N.J.A.C. 7:27-22.16(a)]	NOx (Total): Monitored by stack emission testing once initially and every 5 years (based on completion date of the last stack test), based on the average of three Department validated stack test runs (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	NOx (Total): Recordkeeping by stack test results once initially and every 5 years (based on completion date of the last stack test) (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]

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Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement
11	NOx (Total) <= 5.79 lb/hr. Based on vendor guarantee. [N.J.A.C. 7:27-22.16(a)]	NOx (Total): Monitored by continuous emission monitoring system continuously, based on a 3 hour rolling average based on a 1 hour block average. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	NOx (Total): Recordkeeping by data acquisition system (DAS) / electronic data storage continuously. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Submit an Excess Emissions and Monitoring Systems Performance Report (EEMPR): On or before every April 30, July 30, October 30, and January 30 for the preceding quarter year (the quarter years begin on January 1, April 1, July 1, and October 1) electronically through the NJDEP online EEMPR web portal. [N.J.A.C. 7:27-22.16(o)]
12	NOx (Total) <= 5.79 lb/hr. Based on vendor guarantee. [N.J.A.C. 7:27-22.16(a)]	NOx (Total): Monitored by stack emission testing once initially and every 5 years (based on completion date of the last stack test), based on the average of three Department validated stack test runs (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	NOx (Total): Recordkeeping by stack test results once initially and every 5 years (based on completion date of the last stack test) (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]
13	NOx (Total) <= 0.01 lb/MMBTU. Based on method 19 calculations and a NOx concentration of 2.5 ppm. [N.J.A.C. 7:27-22.16(a)]	NOx (Total): Monitored by stack emission testing once initially and every 5 years (based on completion date of the last stack test), based on the average of three Department validated stack test runs (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	NOx (Total): Recordkeeping by stack test results once initially and every 5 years (based on completion date of the last stack test) (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]
14	CO <= 5 ppmvd @ 15% O2. Based on vendor guarantee. [N.J.A.C. 7:27-22.16(a)]	CO: Monitored by continuous emission monitoring system continuously, based on a 3 hour rolling average based on a 1 hour block average. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	CO: Recordkeeping by data acquisition system (DAS) / electronic data storage continuously. (see U11,OS Summary). [N.J.A.C. 7:27-22.16(o)]	Submit an Excess Emissions and Monitoring Systems Performance Report (EEMPR): On or before every April 30, July 30, October 30, and January 30 for the preceding quarter year (the quarter years begin on January 1, April 1, July 1, and October 1) electronically through the NJDEP online EEMPR web portal. [N.J.A.C. 7:27-22.16(o)]
15	CO <= 0.012 lb/MMBTU. Based on method 19 calculations and a CO concentration of 5.0 ppm. [N.J.A.C. 7:27-22.16(a)]	CO: Monitored by continuous emission monitoring system continuously, based on a 3 hour rolling average based on a 1 hour block average. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	CO: Recordkeeping by data acquisition system (DAS) / electronic data storage continuously. (see U11,OS Summary). [N.J.A.C. 7:27-22.16(o)]	Submit an Excess Emissions and Monitoring Systems Performance Report (EEMPR): On or before every April 30, July 30, October 30, and January 30 for the preceding quarter year (the quarter years begin on January 1, April 1, July 1, and October 1) electronically through the NJDEP online EEMPR web portal. [N.J.A.C. 7:27-22.16(o)]

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Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement
16	CO <= 5 ppmvd @ 15% O2. Based on vendor guarantee. [N.J.A.C. 7:27-22.16(a)]	CO: Monitored by stack emission testing once initially and every 5 years (based on completion date of the last stack test), based on the average of three Department validated stack test runs (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	CO: Recordkeeping by stack test results once initially and every 5 years (based on completion date of the last stack test) (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]
17	CO <= 0.012 lb/MMBTU. Based on method 19 calculations and a CO concentration of 5.0 ppm. [N.J.A.C. 7:27-22.16(a)]	CO: Monitored by stack emission testing once initially and every 5 years (based on completion date of the last stack test), based on the average of three Department validated stack test runs (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	CO: Recordkeeping by stack test results once initially and every 5 years (based on completion date of the last stack test) (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]
18	CO <= 7.04 lb/hr. Based on vendor guarantee. [N.J.A.C. 7:27-22.16(a)]	CO: Monitored by stack emission testing once initially and every 5 years (based on completion date of the last stack test), based on the average of three Department validated stack test runs (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	CO: Recordkeeping by stack test results once initially and every 5 years (based on completion date of the last stack test) (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]
19	CO <= 7.04 lb/hr. Based on vendor guarantee. [N.J.A.C. 7:27-22.16(a)]	CO: Monitored by continuous emission monitoring system continuously, based on a 3 hour rolling average based on a 1 hour block average. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	CO: Recordkeeping by data acquisition system (DAS) / electronic data storage continuously. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Submit an Excess Emissions and Monitoring Systems Performance Report (EEMPR): On or before every April 30, July 30, October 30, and January 30 for the preceding quarter year (the quarter years begin on January 1, April 1, July 1, and October 1) electronically through the NJDEP online EEMPR web portal. [N.J.A.C. 7:27-22.16(o)]
20	SO2 <= 1.12 lb/hr. Based on vendor guarantee. [N.J.A.C. 7:27-22.16(a)]	SO2: Monitored by stack emission testing once initially, based on each of three Department validated stack test runs. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	SO2: Recordkeeping by stack test results once initially. (see U11, OS Summary). [N.J.A.C. 7:27-21.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. (see U11,OS Summary). [N.J.A.C. 7:27-22.16(o)]
21	TSP <= 5 lb/hr. Based on vendor guarantee. [N.J.A.C. 7:27-22.16(a)]	TSP: Monitored by stack emission testing once initially, based on each of three Department validated stack test runs. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	TSP: Recordkeeping by stack test results once initially. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]

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Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement
22	PM-10 (Total) <= 5 lb/hr. Based on vendor guarantee. [40 CFR 52.21] and. [N.J.A.C. 7:27-22.16(a)]	PM-10 (Total): Monitored by stack emission testing once initially and every 5 years (based on completion date of the last stack test), based on the average of three Department validated stack test runs (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	PM-10 (Total): Recordkeeping by stack test results once initially and every 5 years (based on completion date of the last stack test) (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]
23	PM-2.5 (Total) <= 5 lb/hr. Based on PM-10 permitted emission rate. [40 CFR 52.21] and. [N.J.A.C. 7:27-22.16(a)]	PM-2.5 (Total): Monitored by stack emission testing once initially and every 5 years (based on completion date of the last stack test), based on the average of three Department validated stack test runs (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	PM-2.5 (Total): Recordkeeping by stack test results once initially and every 5 years (based on completion date of the last stack test) (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]
24	Ammonia <= 5 ppmvd @ 15% O2. Based on vendor specification / SOTA. [N.J.A.C. 7:27-22.16(a)]	Other: Monitored by continuous process monitoring system continuously, based on a 3 hour rolling average based on a 1 hour block average. (See U11, OSS).[N.J.A.C. 7:27-22.16(o)].	Ammonia: Recordkeeping by data acquisition system (DAS) / electronic data storage continuously. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	None.
25	Ammonia <= 5 ppmvd @ 15% O2. Based on vendor specification / SOTA. [N.J.A.C. 7:27-22.16(a)]	Ammonia: Monitored by stack emission testing once initially, based on the average of three Department validated stack test runs (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Ammonia: Recordkeeping by stack test results once initially. [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. [N.J.A.C. 7:27-22.16(o)]
26	Ammonia <= 4.28 lb/hr. Based on vendor specification. [N.J.A.C. 7:27-22.16(a)]	Ammonia: Monitored by stack emission testing once initially, based on the average of three Department validated stack test runs (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Ammonia: Recordkeeping by stack test results once initially. [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. [N.J.A.C. 7:27-22.16(o)]
27	HAPs (Total) <= 2.05 lb/hr. Hourly emission limit, based on the sum of all reported HAPS. [N.J.A.C. 7:27-22.16(a)]	None.	None.	None.
28	Acetaldehyde <= 0.31 lb/hr. Hourly emission limit based on a heat input of 628 MMBtu/hr and an emission factor of 4.93 E-4 lb/MMBtu. [N.J.A.C. 7:27-22.16(a)]	None.	None.	None.
29	Acetophenone <= 0.032 lb/hr. Hourly emission limit based on a heat input of 628 MMBtu/hr and an emission factor of 5.10 E-5 lb/MMBtu. [N.J.A.C. 7:27-22.16(a)]	None.	None.	None.

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Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement	
61	NOx (Total) <= 25 ppmvd @ 15% O2. This limit applies to a turbine that has heat input at peak load greater than 50 MMBtu/hr (HHV) but less or equal to 850 MMBtu/hr (HHV) firing natural gas and which commenced construction after February 18, 2005. **** Pursuant to 40 CFR 60.4320(a), this turbine is subject to either the input or the output NSPS limit (25 ppmdv @ 15% O2 or 1.2 lb/MWhr)***. [40 CFR 60.4320(a)]	NOx (Total): Monitored by stack emission testing at the approved frequency, based on the average of three Department validated stack test runs. The owner or operator shall conduct an initial performance test as required in 40 CFR 60.8. Annual testing shall be conducted thereafter (within 14 months following the previous performance test) unless the test results for the initial test are below 75% of the emission limit for NOx, when the test frequency may be reduced to every two years (within 26 months following the previous performance test). Test methods and procedures shall be consistent with the requirements of 40 CFR 60.4400 or, if a NOx diluent CEMS is installed, consistent with 40 CFR 60.4405. The performance test must be done at any load condition within plus or minus 25 percent of 100 percent of peak load. Alternatively, the testing might be performed at the highest achievable load point, if at least 75 percent of peak load cannot be achieved in practice. [40 CFR 60.4400]	NOx (Total): Recordkeeping by stack test results at the approved frequency. [40 CFR 60.4460]	Submit a report: As per the approved schedule. The owner or operator shall submit a written report of the results of each performance test before the close of business on the 60th day following the completion of the performance test. [40 CFR 60.4375(b)]	
62	SO2 <= 0.06 lb/MMBTU. No owner or operator shall burn any fuel which contains total potential sulfur emissions in excess of specified limit. If the turbine simultaneously fires multiple fuels, each fuel must meet this requirement. [40 CFR 60.4330(a)(2)]	SO2: Monitored by grab sampling at the approved frequency. Sampling shall be performed once initially and annually thereafter (no more than 14 calendar months between tests). Test methods and procedures shall be consistent with 40 CFR 60.4415(a)(1). The fuel analyses may be performed by the owner or operator, the fuel vendor, or any other qualified agency. [40 CFR 60.4360]	None.	Submit a report: Once initially. The permittee shall furnish the Administrator and NJDEP a written report of the results of fuel analyses. The permittee shall demonstrate that the potential sulfur emissions from each type of fuel do not exceed potential sulfur emissions of 0.060 lb SO2 per MMBtu heat input. [40 CFR 60.8(a)]	
63	Turbine fuel limited to natural gas. [N.J.A.C. 7:27-22.16(a)]	None.	Recordkeeping by invoices / bills of lading per delivery. [N.J.A.C. 7:27-22.16(o)]	None.	
64	Maximum Gross Heat Input <= 628 MMBTU/hr (HHV) while firing natural gas. [N.J.A.C. 7:27-22.16(a)]	Maximum Gross Heat Input: Monitored by fuel flow/firing rate instrument continuously. [N.J.A.C. 7:27-22.16(o)]	Maximum Gross Heat Input: Recordkeeping by data acquisition system (DAS) / electronic data storage continuously. [N.J.A.C. 7:27-22.16(o)]	None.	

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	racinty Specific Requirements										
Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement							
2	Opacity <= 10 %. Smoke emissions from stationary combustion turbines no greater than 10% opacity, exclusive of visible condensed water vapor, for more than 10 consecutive seconds. [N.J.A.C. 7:27-22.16(a)]	Opacity: Monitored by visual determination at the approved frequency, based on an instantaneous determination. A certified smoke reader shall conduct visual observations once every 100 hours of ultra low sulfur distillate fuel oil (ULSD) operation using NJ Test Method 2. Monitoring and recordkeeping may occur at a lesser frequency if circumstances prohibit conducting a visual determination (e.g., nighttime operation, weather conditions, unplanned dispatching, etc.) within the 100-hour timeframe. However, in no case shall the interval between visual determinations exceed 125 hours of ULSD fired operation. If the visual observation occurs at a lesser frequency than every 100 hours of ULSD operation, the reason for monitoring at the lesser frequency shall also be recorded. [N.J.A.C. 7:27-22.16(o)]	Opacity: Recordkeeping by manual logging of parameter or storing data in a computer data system upon occurrence of event. [N.J.A.C. 7:27-22.16(o)]	None.							
3	Particulate Emissions <= 60.8 lb/hr. Particulate emission limit from the combustion of Ultra Low Sulfur Distillate based on rated heat input of 608 MMBtu/hr. [N.J.A.C. 7:27- 4.2(a)]	Particulate Emissions: Monitored by stack emission testing once initially and prior to permit expiration date, based on each of three Department validated stack test runs. Annual periodic emission monitoring may be performed in lieu of permit renewal stack testing, if the unit is operated as a "peaking unit" as defined at 40 CFR 75. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Particulate Emissions: Recordkeeping by stack test results at the approved frequency and/or by periodic emission monitoring results annually, if the unit is operated as a "peaking unit". (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule and/or submit annual periodic emission monitoring report if the unit is operated as a "peaking unit". (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]							
4	NOx (Total) <= 1.6 lb/MW-hr. NOx RACT emission limit applies during all periods of ultra low sulfur distillate combustion. [N.J.A.C. 7:27-19.5(g)]	NOx (Total): Monitored by continuous emission monitoring system continuously, based on a calendar day (in ozone season) or 30 day rolling (at other times) average. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	NOx (Total): Recordkeeping by data acquisition system (DAS) / electronic data storage continuously. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Submit an Excess Emissions and Monitoring Systems Performance Report (EEMPR): On or before every April 30, July 30, October 30, and January 30 for the preceding quarter year (the quarter years begin on January 1, April 1, July 1, and October 1) electronically through the NJDEP online EEMPR web portal. [N.J.A.C. 7:27-21.16(o)]							

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New Jersey Department of Environmental Protection Facility Specific Requirements

Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement							
5	NOx (Total) <= 3.5 ppmvd @ 15% O2. Based on SOTA for CC turbines. [N.J.A.C. 7:27-22.16(a)]	NOx (Total): Monitored by continuous emission monitoring system continuously, based on a 3 hour rolling average based on a 1 hour block average. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	NOx (Total): Recordkeeping by data acquisition system (DAS) / electronic data storage continuously. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Submit an Excess Emissions and Monitoring Systems Performance Report (EEMPR): On or before every April 30, July 30, October 30, and January 30 for the preceding quarter year (the quarter years begin on January 1, April 1, July 1, and October 1) electronically through the NJDEP online EEMPR web portal. [N.J.A.C. 7:27-22.16(o)]							
6	NOx (Total) <= 3.5 ppmvd @ 15% O2. Based on SOTA for CC turbines. [N.J.A.C. 7:27-22.16(a)]	NOx (Total): Monitored by stack emission testing once initially and prior to permit expiration date, based on the average of three Department validated stack test runs. Annual periodic emission monitoring may be performed in lieu of permit renewal stack testing, if the unit is operated as a "peaking unit" as defined at 40 CFR 75. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	NOx (Total): Recordkeeping by stack test results at the approved frequency and/or by periodic emission monitoring results annually, if the unit is operated as a "peaking unit". (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule and/or submit annual periodic emission monitoring report if the unit is operated as a "peaking unit". (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]							
7	NOx (Total) <= 0.014 lb/MMBTU. Based on method 19 calculations and a NOx concentration of 3.5 ppmvd@15%O2. [N.J.A.C. 7:27-22.16(a)]	NOx (Total): Monitored by continuous emission monitoring system continuously, based on a 3 hour rolling average based on a 1 hour block average. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	NOx (Total): Recordkeeping by data acquisition system (DAS) / electronic data storage continuously. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Submit an Excess Emissions and Monitoring Systems Performance Report (EEMPR): On or before every April 30, July 30, October 30, and January 30 for the preceding quarter year (the quarter years begin on January 1, April 1, July 1, and October 1) electronically through the NJDEP online EEMPR web portal. [N.J.A.C. 7:27-22.16(o)]							
8	NOx (Total) <= 0.014 lb/MMBTU. Based on method 19 calculations and a NOx concentration of 3.5 ppmvd@15%O2. [N.J.A.C. 7:27-22.16(a)]	NOx (Total): Monitored by stack emission testing once initially and prior to permit expiration date, based on the average of three Department validated stack test runs. Annual periodic emission monitoring may be performed in lieu of permit renewal stack testing, if the unit is operated as a "peaking unit" as defined at 40 CFR 75. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	NOx (Total): Recordkeeping by stack test results at the approved frequency and/or by periodic emission monitoring results annually, if the unit is operated as a "peaking unit". (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule and/or submit annual periodic emission monitoring report if the unit is operated as a "peaking unit". (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]							

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	racincy Specific Requirements										
Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement							
9	CO <= 5 ppmvd @ 15% O2. Based on vendor guarantee and modification application BOP090003. [N.J.A.C. 7:27-22.16(a)]	CO: Monitored by continuous emission monitoring system continuously, based on a 3 hour rolling average based on a 1 hour block average. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	CO: Recordkeeping by data acquisition system (DAS) / electronic data storage continuously. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Submit an Excess Emissions and Monitoring Systems Performance Report (EEMPR): On or before every April 30, July 30, October 30, and January 30 for the preceding quarter year (the quarter years begin on January 1, April 1, July 1, and October 1) electronically through the NJDEP online EEMPR web portal. [N.J.A.C. 7:27-22.16(o)]							
10	CO <= 5 ppmvd @ 15% O2. Based on vendor guarantee. [N.J.A.C. 7:27-22.16(a)]	CO: Monitored by stack emission testing once initially and prior to permit expiration date, based on the average of three Department validated stack test runs. Annual periodic emission monitoring may be performed in lieu of permit renewal stack testing, if the unit is operated as a "peaking unit" as defined at 40 CFR 75. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	CO: Recordkeeping by stack test results at the approved frequency and/or by periodic emission monitoring results annually, if the unit is operated as a "peaking unit". (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule and/or submit annual periodic emission monitoring report if the unit is operated as a "peaking unit". (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]							
11	CO <= 0.012 lb/MMBTU. Based on method 19 calculations and a CO concentration of 5.0 ppm. [N.J.A.C. 7:27-22.16(a)]	CO: Monitored by continuous emission monitoring system continuously, based on a 3 hour rolling average based on a 1 hour block average. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	CO: Recordkeeping by data acquisition system (DAS) / electronic data storage continuously. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Submit an Excess Emissions and Monitoring Systems Performance Report (EEMPR): On or before every April 30, July 30, October 30, and January 30 for the preceding quarter year (the quarter years begin on January 1, April 1, July 1, and October 1) electronically through the NJDEP online EEMPR web portal. [N.J.A.C. 7:27-22.16(o)]							
12	CO <= 0.012 lb/MMBTU. Based on method 19 calculations and a CO concentration of 5.0 ppm. [N.J.A.C. 7:27-22.16(a)]	CO: Monitored by stack emission testing once initially and prior to permit expiration date, based on the average of three Department validated stack test runs. Annual periodic emission monitoring may be performed in lieu of permit renewal stack testing, if the unit is operated as a "peaking unit" as defined at 40 CFR 75. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	CO: Recordkeeping by stack test results at the approved frequency and/or by periodic emission monitoring results annually, if the unit is operated as a "peaking unit". (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule and/or submit annual periodic emission monitoring report if the unit is operated as a "peaking unit". (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]							

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New Jersey Department of Environmental Protection Facility Specific Requirements

Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement							
13	VOC (Total) <= 2.84 ppmvd @ 15% O2 , which includes formaldehyde emission. Based on vendor guarantee. [N.J.A.C. 7:27-22.16(a)]	VOC (Total): Monitored by stack emission testing once initially and prior to permit expiration date, based on the average of three Department validated stack test runs. Permit renewal testing not required if the turbine is operated as a "peaking unit" as defined at 40 CFR 75. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	VOC (Total): Recordkeeping by stack test results at the approved frequency. Permit renewal testing not required if the turbine is operated as a "peaking unit". (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. Permit renewal testing not required if the turbine is operated as a "peaking unit". (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]							
14	VOC (Total) <= 0.0038 lb/MMBTU, which includes formaldehyde emission. Based on a heat input of 608 MMBtu/hr and VOC emission rate of 2.34 lb/hr. [N.J.A.C. 7:27-22.16(a)]	VOC (Total): Monitored by stack emission testing once initially and prior to permit expiration date, based on the average of three Department validated stack test runs. Permit renewal testing not required if the turbine is operated as a "peaking unit" as defined at 40 CFR 75. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	VOC (Total): Recordkeeping by stack test results at the approved frequency. Permit renewal testing not required if the turbine is operated as a "peaking unit". (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. Permit renewal testing not required if the turbine is operated as a "peaking unit". (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]							
15	VOC (Total) <= 2.34 lb/hr, which includes formaldehyde emission. Based on vendor guarantee. [N.J.A.C. 7:27-22.16(a)]	VOC (Total): Monitored by stack emission testing once initially and prior to permit expiration date, based on the average of three Department validated stack test runs. Permit renewal testing not required if the turbine is operated as a "peaking unit" as defined at 40 CFR 75. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	VOC (Total): Recordkeeping by stack test results at the approved frequency. Permit renewal testing not required if the turbine is operated as a "peaking unit". (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. Permit renewal testing not required if the turbine is operated as a "peaking unit". (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]							
16	SO2 <= 0.99 lb/hr. Based on vendor guarantee. [N.J.A.C. 7:27-22.16(a)]	SO2: Monitored by stack emission testing once initially, based on each of three Department validated stack test runs. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	SO2: Recordkeeping by stack test results once initially. (see U11, OS Summary). [N.J.A.C. 7:27-21.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]							
17	TSP <= 17.8 lb/hr. Based on vendor guarantee. [N.J.A.C. 7:27-22.16(a)]	TSP: Monitored by stack emission testing once initially and prior to permit expiration date, based on each of three Department validated stack test runs. Permit renewal testing not required if the turbine is operated as a "peaking unit" as defined at 40 CFR 75. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	TSP: Recordkeeping by stack test results at the approved frequency. Permit renewal testing not required if the turbine is operated as a "peaking unit". (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. Permit renewal testing not required if the turbine is operated as a "peaking unit". (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]							

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	racinty specific requirements											
Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement								
18	PM-2.5 (Total) <= 17.8 lb/hr. Based on vendor guarantee. [40 CFR 52.21] and. [N.J.A.C. 7:27-22.16(a)]	PM-2.5 (Total): Monitored by stack emission testing once initially and prior to permit expiration date, based on the average of three Department validated stack test runs. Permit renewal testing not required if the turbine is operated as a "peaking unit" as defined at 40 CFR 75. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	PM-2.5 (Total): Recordkeeping by stack test results at the approved frequency. Permit renewal testing not required if the turbine is operated as a "peaking unit". (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. Permit renewal testing not required if the turbine is operated as a "peaking unit". (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]								
19	PM-10 (Total) <= 17.8 lb/hr. Based on vendor guarantee. [40 CFR 52.21] and. [N.J.A.C. 7:27-22.16(a)]	PM-10 (Total): Monitored by stack emission testing once initially and prior to permit expiration date, based on the average of three Department validated stack test runs. Permit renewal testing not required if the turbine is operated as a "peaking unit" as defined at 40 CFR 75. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	PM-10 (Total): Recordkeeping by stack test results at the approved frequency. Permit renewal testing not required if the turbine is operated as a "peaking unit". (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. Permit renewal testing not required if the turbine is operated as a "peaking unit". (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]								
20	Ammonia <= 5 ppmvd @ 15% O2. Based on vendor specification / SOTA. [N.J.A.C. 7:27-22.16(a)]	Other: Monitored by continuous process monitoring system continuously, based on a 3 hour rolling average based on a 1 hour block average. (See U11, OSS). [N.J.A.C. 7:27-22.16(o)].	Ammonia: Recordkeeping by data acquisition system (DAS) / electronic data storage continuously. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	None.								
21	Ammonia <= 5 ppmvd @ 15% O2. Based on vendor specification / SOTA. [N.J.A.C. 7:27-22.16(a)]	Ammonia: Monitored by stack emission testing once initially, based on each of three Department validated stack test runs. Permit renewal testing not required if the turbine is operated as a "peaking unit" as defined at 40 CFR 75. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Ammonia: Recordkeeping by stack test results at the approved frequency. Permit renewal testing not required if the turbine is operated as a "peaking unit". (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. Permit renewal testing not required if the turbine is operated as a "peaking unit". (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]								
22	Ammonia <= 4.37 lb/hr. Based on vendor specification. [N.J.A.C. 7:27-22.16(a)]	Ammonia: Monitored by stack emission testing once initially, based on each of three Department validated stack test runs. Permit renewal testing not required if the turbine is operated as a "peaking unit" as defined at 40 CFR 75. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Ammonia: Recordkeeping by stack test results at the approved frequency. Permit renewal testing not required if the turbine is operated as a "peaking unit". (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. Permit renewal testing not required if the turbine is operated as a "peaking unit". (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]								

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Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement						
23	NOx (Total) <= 74 ppmvd @ 15% O2. This limit applies to a turbine that has heat input at peak load greater than 50 MMBtu/hr (HHV) but less or equal to 850 MMBtu/hr (HHV) firing fuels other than natural gas and which commenced construction after February 18, 2005. *** Pursuant to 40 CFR 60.4320(a), this turbine is subject to either the input or the output NSPS limit (74 ppmdv @ 15% O2 or 3.6 lb/MWhr)***. [40 CFR 60.4320(a)]	NOx (Total): Monitored by stack emission testing at the approved frequency, based on the average of three Department validated stack test runs The owner or operator shall conduct an initial performance test as required in 40 CFR 60.8. Annual testing shall be conducted thereafter (within 14 months following the previous performance test) unless the test results for the initial test are below 75% of the emission limit for NOx, when the test frequency may be reduced to every two years (within 26 months following the previous performance test). Test methods and procedures shall be consistent with the requirements of 40 CFR 60.4400 or, if a NOx diluent CEMS is installed, consistent with 40 CFR 60.4405. The performance test must be done at any load condition within plus or minus 25 percent of 100 percent of peak load. Alternatively, the testing might be performed at the highest achievable load point, if at least 75 percent of peak load cannot be achieved in practice. [40 CFR 60.4400]	NOx (Total): Recordkeeping by stack test results at the approved frequency. [40 CFR 60.4460]	Submit a report: As per the approved schedule. The owner or operator shall submit a written report of the results of each performance test before the close of business on the 60th day following the completion of the performance test. [40 CFR 60.4375(b)]						
24	SO2 <= 0.06 lb/MMBTU. No owner or operator shall burn any fuel which contains total potential sulfur emissions in excess of specified limit. If the turbine simultaneously fires multiple fuels, each fuel must meet this requirement. [40 CFR 60.4330(a)(2)]	SO2: Monitored by grab sampling once initially. Test methods and procedures shall be consistent with 40 CFR 60.4415(a)(1). The fuel analyses may be performed by the owner or operator, the fuel vendor, or any other qualified agency. [40 CFR 60.4360]	None.	Submit a report: Once initially. The permittee shall furnish the Administrator and NJDEP a written report of the results of fuel analyses. The permittee shall demonstrate that the potential sulfur emissions from each type of fuel do not exceed potential sulfur emissions of 0.060 lb SO2 per MMBtu heat input. [40 CFR 60.8(a)]						
25	Sulfur Content in Fuel <= 0.0015 % by weight. [N.J.A.C. 7:27- 9.2(b)]	Sulfur Content in Fuel: Monitored by review of fuel delivery records per delivery. [N.J.A.C. 7:27-22.16(o)]	Sulfur Content in Fuel: Recordkeeping by fuel certification receipts per delivery. [N.J.A.C. 7:27-22.16(o)]	None.						
26	Turbine fuel limited to ultra low sulfur distillate fuel oil (ULSD) [sulfur content <= 15 ppm]. [N.J.A.C. 7:27-22.16(a)]	Monitored by review of fuel delivery records per delivery . [N.J.A.C. 7:27-22.16(o)]	Recordkeeping by fuel certification receipts per delivery. [N.J.A.C. 7:27-22.16(o)]	None.						

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New Jersey Department of Environmental Protection Facility Specific Requirements

Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement							
27	Hours of Operation While Firing Fuel Oil <= 500 hr/yr. Unit 11 may be operated using this scenario, in lieu of OS2, when NOx emission concentrations are <= 3.5 ppmvd@15%O2. [N.J.A.C. 7:27-22.16(a)]	Hours of Operation While Firing Fuel Oil: Monitored by hour/time monitor daily, based on a consecutive 365 day period (rolling 1 day basis). The permittee shall install, calibrate and maintain the monitor(s) in accordance with the manufacturer's specifications. [N.J.A.C. 7:27-22.16(o)]	Hours of Operation While Firing Fuel Oil: Recordkeeping by manual logging of parameter or storing data in a computer data system annually. A record shall be made for each period that light distillate fuel oil is burned. Each record shall show the date, start time, end time, and the amount of fuel consumed. [N.J.A.C. 7:27-22.16(o)]	None.							
28	NOx (Total) <= 8.27 lb/hr. Based on method 19 calculations, a NOx concentration of 3.5 ppm, and a maximum hourly heat input of 608 MMBtu/hr. [N.J.A.C. 7:27-22.16(a)]	NOx (Total): Monitored by continuous emission monitoring system continuously, based on a 3 hour rolling average based on a 1 hour block average. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	NOx (Total): Recordkeeping by data acquisition system (DAS) / electronic data storage continuously. (see U11 / OS Summary). [N.J.A.C. 7:27-22.16(o)]	Submit an Excess Emissions and Monitoring Systems Performance Report (EEMPR): On or before every April 30, July 30, October 30, and January 30 for the preceding quarter year (the quarter years begin on January 1, April 1, July 1, and October 1) electronically through the NJDEP online EEMPR web portal. [N.J.A.C. 7:27-22.16(o)]							
29	NOx (Total) <= 8.27 lb/hr. Based on method 19 calculations, a NOx concentration of 3.5 ppm, and a maximum hourly heat input of 608 MMBtu/hr. [N.J.A.C. 7:27-22.16(a)]	NOx (Total): Monitored by stack emission testing once initially and prior to permit expiration date, based on the average of three Department validated stack test runs. Annual periodic emission monitoring may be performed in lieu of permit renewal stack testing, if the unit is operated as a "peaking unit" as defined at 40 CFR 75. (see U11, OS Summary .). [N.J.A.C. 7:27-22.16(o)]	NOx (Total): Recordkeeping by stack test results at the approved frequency and/or by periodic emission monitoring results annually, if the unit is operated as a "peaking unit". (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule and/or submit annual periodic emission monitoring report if the unit is operated as a "peaking unit". (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]							
30	CO <= 7.2 lb/hr. Based on method 19 calculations, a CO concentration of 5 ppm, and a maximum hourly heat input of 608 MMBtu/hr. [N.J.A.C. 7:27-22.16(a)]	CO: Monitored by by continuous emission monitoring system continuously, based on a 3 hour rolling average based on a 1 hour block average. (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	CO: Recordkeeping by by data acquisition system (DAS) / electronic data storage continuously. (see U11 / OS Summary). [N.J.A.C. 7:27-22.16(o)]	Submit an Excess Emissions and Monitoring Systems Performance Report (EEMPR): On or before every April 30, July 30, October 30, and January 30 for the preceding quarter year (the quarter years begin on January 1, April 1, July 1, and October 1) electronically through the NJDEP online EEMPR web portal. [N.J.A.C. 7:27-22.16(o)]							

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New Jersey Department of Environmental Protection Facility Specific Requirements

	T	racinty Specific	T	ı	
Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement	
31	CO <= 7.2 lb/hr. Based on method 19 calculations, a CO concentration of 5 ppm, and a maximum hourly heat input of 608 MMBtu/hr. [N.J.A.C. 7:27-22.16(a)]	CO: Monitored by stack emission testing once initially and prior to permit expiration date, based on the average of three Department validated stack test runs. Annual periodic emission monitoring may be performed in lieu of permit renewal stack testing, if the unit is operated as a "peaking unit" as defined at 40 CFR 75. (see U11, OS Summary .). [N.J.A.C. 7:27-22.16(o)]	CO: Recordkeeping by stack test results at the approved frequency, and/or by periodic emission monitoring results annually, if the unit is operated as a "peaking unit". (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule and/or submit annual periodic emission monitoring report if the unit is operated as a "peaking unit". (see U11, OS Summary). [N.J.A.C. 7:27-22.16(o)]	
32	HAPs (Total) <= 3.6 lb/hr. Hourly emission limit, based on the sum of all reported HAPS. [N.J.A.C. 7:27-22.16(a)]	None.	None.	None.	
33	Acetaldehyde <= 0.3 lb/hr. Hourly emission limit based on a heat input of 608 MMBtu/hr and an emission factor of 4.93 E-4 lb/MMBtu. [N.J.A.C. 7:27-22.16(a)]	None.	None.	None.	
34	Acetophenone <= 0.031 lb/hr. Hourly emission limit based on a heat input of 608 MMBtu/hr and an emission factor of 5.10 E-5 lb/MMBtu. [N.J.A.C. 7:27-22.16(a)]	None.	None.	None.	
35	Acrolein <= 0.0407 lb/hr. Hourly emission limit based on a heat input of 608 MMBtu/hr and an emission factor of 6.69 E-5 lb/MMBtu. [N.J.A.C. 7:27-22.16(a)]	None.	None.	None.	
36	Benzene <= 0.231 lb/hr. Hourly emission limit based on a heat input of 608 MMBtu/hr and an emission factor of 3.80 E-4 lb/MMBtu. [N.J.A.C. 7:27-22.16(a)]	None.	None.	None.	
37	Biphenyl <= 0.00591 lb/hr. Hourly emission limit based on a heat input of 608 MMBtu/hr and an emission factor of 9.72 E-6 lb/MMBtu. [N.J.A.C. 7:27-22.16(a)]		None.	None.	
38	Butadiene (1,3-) <= 0.0000302 lb/hr. Hourly emission limit based on a heat input of 608 MMBtu/hr and an emission factor of 4.97 E-8 lb/MMBtu. [N.J.A.C. 7:27-22.16(a)]	None.	None.	None.	

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New Jersey Department of Environmental Protection Equipment Inventory

Equip. NJID	Facility's Designation	Equipment Description	Equipment Type	Certificate Number	Install Date	Grand- Fathered	Last Mod. (Since 1968)	Equip. Set ID
E11	Unit 11	Turbine Unit No. 11	Combustion Turbine		1/1/2012	No		
E14	BA Silo	Unit 10 bottom ash silo	Storage Vessel	087631	1/1/1952	No	9/14/1988	
E15	FA Silo	Unit 10 fly ash silo	Storage Vessel	087632	1/1/1969	No	9/14/1988	
E18	Tank No.2	ULSD Fuel Oil Tank (675K)	Storage Vessel		1/1/1972	Yes		
E19	Tank No.4	10 day tank (20K No.6 Fuel Oil)	Storage Vessel	003649	1/1/1970	No		
E20	Tank No.5	8 day tank (20K No.6 Fuel Oil)	Storage Vessel		1/1/1955	Yes		
E21	Tank No.6	10 day tank (20K No.2 Fuel Oil)	Storage Vessel		1/1/1970			
E22	EmerGen	Emergency Generator	Fuel Combustion Equipment (Other)		1/1/1969	No		

New Jersey Department of Environmental Protection Control Device Inventory

Date: 6/9/2025

CD NJID	Facility's Designation	Description	CD Type	Install Date	Grand- Fathered	Last Mod. (Since 1968)	CD Set ID
CD17	BA-BVF	Bottom ash bin vent filter	Other	9/14/1988	No		
CD18	FA-BVF	Fly ash bin vent filter	Other	9/14/1988	No		
CD19	SCR-11	Selective Catalytic Reduction for Unit No. 11	Selective Catalytic Reduction	2/1/2012	No		
CD20	Ox Cat-11	Oxidation Catalyst for Unit No.	Oxidizer (Catalytic)	2/1/2012	No		
CD21	H2O-11	Water Injection system for Unit 11	Other	1/1/2012	No		

VINELAND MUNICIPAL ELEC UTIL HOWARD M. DOWN (75507) BOP250001

New Jersey Department of Environmental Protection Emission Points Inventory

PT NJID	Facility's Designation	Description	Config.	Equiv. Diam.	Height (ft.)	Dist. to Prop.	Exhaus	st Temp. (deg. F) Exhaust Vol. (acfm)		cfm)	Discharge PT Direction Set ID			
Nam	Designation			(in.)	(11.)	Line (ft)	Avg.	Min.	Max.	Avg.	Min.	Max.	Direction	Set ID
PT2	TNK2VENT	TANK2VENT	Round	8	38	120	125.0	110.0	130.0	10.0	0.0	33.0	Down	
PT4	10DAYVNT	10DAYVNT	Round	6	20	10	125.0	110.0	130.0	10.0	0.0	33.0	Down	
PT5	8DAYVNT	8DAYVNT	Round	6	7	80	125.0	110.0	130.0	10.0	0.0	33.0	Up	
PT6	10IGVNT	10IGVNT	Round	6	25	22	60.0	0.0	120.0	10.0	0.0	15.0	Down	
PT11	Unit No. 11	Unit No. 11 Stack	Round	143	135	120	750.0	690.0	850.0	795,000.0	627,000.0	850,000.0	Up	
PT14	BA-SILO	bottom ash silo vent	Round	6	55	107	200.0			80.0	60.0	84.0	Horizontal	
PT15	FA-SILO	fly ash silo vent	Round	6	66	62	200.0			700.0	300.0	800.0	Horizontal	
PT22	genstck	emergency generator stack	Round	8	56	80	350.0			950.0	450.0	1,000.0	Up	

VINELAND MUNICIPAL ELEC UTIL HOWARD M. DOWN (75507) BOP250001

New Jersey Department of Environmental Protection Emission Unit/Batch Process Inventory

U 11 Unit 11 Gas Turbine - Unit 11

UOS	Facility's	UOS Description	Operation	Signif.	Control Emission	on SCC(s)	Annual Oper. Hours		Flow (acfm)		Temp. (deg F)		
NJID	Designation		Type	Equip.	Device(s)	Point(s)	SCC(s)	Min.	Max.	Range Min.	Max.	Min.	Max.
OS1	Turbine-NG	Unit 11 Firing Natural Gas	Normal - Steady State	E11	CD19 (S) CD20 (P) CD21 (P)	PT11	2-01-001-02 2-01-002-01	0.0	8,760.0	644,000.0	850,000.0	690.0	850.0
OS2	Turbine-FO	Firing ULSD, <=5ppm NOx emissions	Normal - Steady State	E11	CD19 (S) CD20 (P) CD21 (P)	PT11	2-01-001-01	0.0	500.0	627,000.0	850,000.0	690.0	850.0
OS3	Turbine-FO	Firing ULSD, <=3.5ppm NOx emissions	Normal - Steady State	E11	CD19 (S) CD20 (P) CD21 (P)	PT11	2-01-001-01	0.0	500.0	627,000.0	850,000.0	690.0	850.0

U 14 BA Silo Bottom Ash Silo

UOS	Facility's	UOS	Operation	Signif.	Control	Emission	SCC(s)	Annual Oper. Hours	VOC	Flow (acfm			mp.
NJID	Designation	Description	Type	Equip.	Device(s)	Point(s)	SCC(S)	Min. Max.	Range	Min.	Max.	Min.	Max.
OS1	BA-store	storage of bottom ash in silo	Normal - Steady State	E14	CD17 (P)	PT14	4-03-011-97	0.0 8,760.0		60.0	84.0	100.0	250.0



PHILIP D. MURPHY Governor

TAHESHA L. WAY Lt. Governor DEPARTMENT OF ENVIRONMENTAL PROTECTION

SHAWN M. LATOURETTE Commissioner

AIR, ENERGY AND MATERIALS SUSTAINABILITY
Division of Air Quality and Radiation Protection
Bureau of Stationary Sources
401 E. State Street, 2nd floor, P.O. Box 420, Mail Code 401-02
Trenton, NJ 08625-0420

Air Pollution Control Operating Permit Administrative Amendment

Permit Activity Number: BOP250001 Program Interest Number: 75808

Mailing Address	Plant Location	
DENNIS KOONS	VINELAND CITY MEU CLAYVILLE	
DIRECTOR MUNICIPAL UTILITIES	4087 S Lincoln Ave	
VINELAND CITY MUNICIPAL ELECTRIC	Vineland	
UTILITY	Cumberland County	
PO BOX 1508 - 640 E WOOD ST	•	
Vineland, NJ 08362-1508		

Initial Operating Permit Approval Date: December 5, 2018
Operating Permit Approval Date: June 3, 2025
Operating Permit Expiration Date: January 8, 2029

AUTHORITY AND APPLICABILITY

The New Jersey Department of Environmental Protection (Department) approves and issues this Air Pollution Control Operating Permit under the authority of Chapter 106, P.L. 1967 (N.J.S.A. 26:2C-9.2). This permit is issued in accordance with the air pollution control permit provisions promulgated at Title V of the Federal Clean Air Act, 40 CFR 70, Air Pollution Control Act codified at N.J.S.A. 26:2C and New Jersey State regulations promulgated at N.J.A.C. 7:27-22.

The Department approves this operating permit based on the evaluation of the certified information provided in the permit application that all equipment and air pollution control devices regulated in this permit comply with all applicable State and Federal regulations. The facility shall be operated in accordance with the conditions of this permit. This operating permit supersedes any previous Air Pollution Control Operating Permits issued to this facility by the Department including any general operating permits, renewals, significant modifications, minor modifications, seven-day notice changes or administrative amendments to the permit.

Changes made through this permit activity are provided in the Reason for Application.

PERMIT SHIELD

Equipment at the facility referenced by this modification **is not covered by** the permit shield, pursuant to the provisions of N.J.A.C. 7:27-22.17.

COMPLIANCE SCHEDULES

This operating permit does not include compliance schedules as part of the approved compliance plan.

Revised: 12/19/2024 1

Date: 6/3/2025

Emission Unit: U1 Gas Turbine - Unit No. 1

Operating Scenario: OS Summary

Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement
1	Summary of Applicable Federal Regulations: 40 CFR 60 Subpart A 40 CFR 60 Subpart KKKK 40 CFR 60 Subpart TTTT 40 CFR 72 - Phase II Acid Rain 40 CFR 97 - CSAPR [None]	None.	None.	None.
2	INITIAL STACK TEST The permittee shall conduct a stack test using a protocol approved by the Department to demonstrate compliance with emission limits for VOC as specified in the compliance plan for OS Summary and NOx, CO, VOC, SO2, TSP, PM-10, PM-2.5, Ammonia and Formaldehyde as specified in the compliance plan for OS1. The permittee shall provide EMS with the turbine load performance curve with the protocol. Testing must be conducted at worst-case permitted operating conditions with regard to meeting the applicable emission standards, but without creating an unsafe condition. [N.J.A.C. 7:27-22.16(a)]	Other: The stack test must be conducted either within 180 days after initial startup of the reinstalled turbine or within 60 days of approval of a timely submitted protocol, whichever comes later. Pursuant to N.J.A.C. 7:27-16.23(c) and 19.15(c), the initial stack test to demonstrate compliance with VOC/NOx RACT standards shall be conducted within 180 days from the date on which the reinstalled turbine commences operation. In accordance with N.J.A.C. 7:27-19.15(a)2, any NOx testing conducted pursuant to this section shall be conducted concurrently with CO testing. The applicable NOx emission limits in N.J.A.C. 7:27-19 will not be considered to have been met unless the concurrent CO testing demonstrates compliance with the CO limit in N.J.A.C. 7:27-16.9 or the permit limit for CO, whichever is more stringent, is also met. [N.J.A.C. 7:27-22.18] and [N.J.A.C. 7:27-22.16(o)].	Other: Recordkeeping as required under the applicable operating scenario(s). [N.J.A.C. 7:27-22.16(o)].	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. Submit a stack test protocol to the Emission Measurement Section (EMS) at Mail Code: 09-01, PO Box 420, Trenton, NJ 08625 within 60 days from the date of the approved initial (or modified) operating permit. The protocol and test report must be prepared and submitted on a CD using the Electronic Reporting Tool (ERT), unless another format is approved by EMS. The ERT program can be downloaded at: https://www.epa.gov/chief. Within 30 days of protocol approval or no less than 60 days prior to the testing deadline, whichever is later, the permittee must contact EMS at 609-984-3443 to schedule a mutually acceptable test date. A full stack test report must be submitted to EMS and a certified summary test report must be submitted to the Regional Enforcement Office within 45 days after performing the stack test pursuant to N.J.A.C. 7:27-22.19(d). The test results must be certified by a licensed professional engineer or certified industrial hygienist. [N.J.A.C. 7:27-22.18(e)] and. [N.J.A.C. 7:27-22.18(h)]

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Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement
3	The permittee shall conduct a stack test at least 18 months prior to the expiration of the initial or renewed operating permit using an approved protocol to demonstrate compliance with emission limits for NOx and CO as specified in the compliance plan for OS1 unless the turbine is eligible for and complying with one of the alternative monitoring requirements listed below. The permittee shall provide EMS with the turbine load performance curve with the protocol. If complying with the "Periodic Emission Monitoring Alternative for Peaking Units" and the average capacity factor of the unit exceeds 10% over the previous 3 calendar years or the annual capacity factor in any of those calendar years exceeds 20%, the permittee shall: 1) Within 60 days of the exceedance, submit a stack test protocol to EMS; and 2) Within 180 days of the exceedance, conduct a stack test pursuant to the above requirements. Testing must be conducted at worst-case permitted operating conditions with regard to meeting the applicable emission standards, but without creating an unsafe condition. Alternative Monitoring Requirements in OS Summary: 1) "Periodic Emission Monitoring Alternative for Peaking Units" 2) "CEMS Alternative to Stack Test for NOx and CO" [N.J.A.C. 7:27-22.16(a)]	Other: Monitoring as required under the applicable operating scenario(s). In accordance with N.J.A.C. 7:27-19.15(a)2, any NOx testing conducted pursuant to this section shall be conducted concurrently with CO testing. The applicable NOx emission limits in N.J.A.C. 7:27-19 will not be considered to have been met unless the concurrent CO testing demonstrates compliance with the CO limit in N.J.A.C. 7:27-16.9 or the permit limit for CO, whichever is more stringent, is also met. PERMITTEES OPERATING AFTER EXPIRATION DATE OF THE OPERATING PERMIT SHALL FOLLOW THE STACK TESTING SCHEDULE SPECIFIED IN THE REF #4 LINE ITEM BELOW.[N.J.A.C. 7:27-22.16(o)].	Other: Recordkeeping as required under the applicable operating scenario(s). [N.J.A.C. 7:27-22.16(o)].	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. Submit a stack test protocol to the Emission Measurement Section (EMS) at Mail Code: 09-01, PO Box 420, Trenton, NJ 08625 at least 30 months prior to the expiration of the approved operating permit (or within 60 days of a capacity factor exceedance, as applicable). The protocol and test report must be prepared and submitted on a CD using the Electronic Reporting Tool (ERT), unless another format is approved by EMS. The ERT program can be downloaded at: http://www.epa.gov/ttnchie1/ert. Within 30 days of protocol approval or no less than 60 days prior to the testing deadline, whichever is later, the permittee must contact EMS at 609-984-3443 to schedule a mutually acceptable test date. A full stack test report must be submitted to EMS and a certified summary test report must be submitted to the Regional Enforcement Office within 45 days after performing the stack test pursuant to N.J.A.C. 7:27-22.19(d). The test results must be certified by a licensed professional engineer or certified industrial hygienist. [N.J.A.C. 7:27-22.18(e)] and. [N.J.A.C. 7:27-22.18(h)]

U1 Gas Turbine - Unit No. 1 OS Summary

New Jersey Department of Environmental Protection Facility Specific Requirements

Ref.# Applicable	Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement
4 STACK TESTING SEXPIRED PERMITION If an operating permittee shall condition than 42 months after of the operating permittee is eligible for one of the alternative requirements listed is shall provide EMS operformance curve of the interest of	SCHEDULE FOR (NOx and CO): it has expired, the uct a stack test no later the date of expiration mit using an approved rate compliance with stox and CO as specified an for OS1 unless the r, and complying with, e monitoring below. The permittee with the turbine load with the protocol. e "Periodic Emission ive for Peaking Units" acity factor of the unit the previous 3 calendar rapacity factor in any of exceeds 20%, the f the exceedance, submit to EMS; and of the exceedance, pursuant to the above ducted at worst-case conditions with regard cable emission ut creating an unsafe and Requirements in OS on Monitoring ing Units"	Monitoring Requirement Other: Monitoring as required under the applicable operating scenario(s). In accordance with N.J.A.C. 7:27-19.15(a)2, any NOx testing conducted pursuant to this section shall be conducted concurrently with CO testing. The applicable NOx emission limits in N.J.A.C. 7:27-19 will not be considered to have been met unless the concurrent CO testing demonstrates compliance with the CO limit in N.J.A.C. 7:27-16.9 or the permit limit for CO, whichever is more stringent, is also met.[N.J.A.C. 7:27-22.16(o)].	Recordkeeping Requirement Other: Recordkeeping as required under the applicable operating scenario(s). [N.J.A.C. 7:27-22.16(o)].	Submittal/Action Requirement Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. If an operating permit has expired, the permittee shall submit a stack test protocol to the Emission Measurement Section (EMS) at Mail Code: 09-01, PO Box 420, Trenton, NJ 08625 no later than 30 months after the date of expiration of the operating permit (or within 60 days of a capacity factor excedence, as applicable). The protocol and test report must be prepared and submitted on a CD using the Electronic Reporting Tool (ERT), unless another format is approved by EMS. The ERT program can be downloaded at: https://www.epa.gov/chief. Within 30 days of protocol approval or no less than 60 days prior to the testing deadline, whichever is later, the permittee must contact EMS at 609-984-3443 to schedule a mutually acceptable test date. A full stack test report must be submitted to EMS and a certified summary test report must be submitted to the Regional Enforcement Office within 45 days after performing the stack test pursuant to N.J.A.C. 7:27-22.19(d). The test results must be certified by a licensed professional engineer or certified industrial hygienist. [N.J.A.C. 7:27-22.18(e) and . [N.J.A.C. 7:27-22.18(e)]

U1 Gas Turbine - Unit No. 1

OS Summary Page 26 of 105

Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement
5	The permittee shall conduct a stack test at least 18 months prior to the expiration of the initial or renewed operating permit using an approved protocol to demonstrate compliance with emission limits for PM-10 and PM-2.5 as specified in the compliance plan for OS1. The permittee shall provide EMS with the turbine load performance curve with the protocol. Testing must be conducted at worst-case permitted operating conditions with regard to meeting the applicable emission standards, but without creating an unsafe condition. [N.J.A.C. 7:27-22.16(a)] NON-COMPLIANT AT TIME OF PERMIT ISSUANCE. SEE COMPLIANCE SCHEDULE IN PART G.	Other: Monitoring as required under the applicable operating scenario(s). PERMITTEES OPERATING AFTER EXPIRATION DATE OF THE OPERATING PERMIT SHALL FOLLOW THE STACK TESTING SCHEDULE SPECIFIED IN THE REF.#6 LINE ITEM BELOW.[N.J.A.C. 7:27-22.16(o)]. NON-COMPLIANT AT TIME OF PERMIT ISSUANCE. SEE COMPLIANCE SCHEDULE IN PART G.	Other: Recordkeeping as required under the applicable operating scenario(s). [N.J.A.C. 7:27-22.16(o)]. NON-COMPLIANT AT TIME OF PERMIT ISSUANCE. SEE COMPLIANCE SCHEDULE IN PART G.	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. Submit a stack test protocol to the Emission Measurement Section (EMS) at Mail Code: 09-01, PO Box 420, Trenton, NJ 08625 at least 30 months prior to the expiration of the approved operating permit. The protocol and test report must be prepared and submitted on a CD using the Electronic Reporting Tool (ERT), unless another format is approved by EMS. The ERT program can be downloaded at: http://www.epa.gov/ttnchie1/ert. Within 30 days of protocol approval or no less than 60 days prior to the testing deadline, whichever is later, the permittee must contact EMS at 609-984-3443 to schedule a mutually acceptable test date. A full stack test report must be submitted to EMS and a certified summary test report must be submitted to the Regional Enforcement Office within 45 days after performing the stack test pursuant to N.J.A.C. 7:27-22.19(d). The test results must be certified by a licensed professional engineer or certified industrial hygienist. [N.J.A.C. 7:27-22.18(e)] and . [N.J.A.C. 7:27-22.18(e)] NON-COMPLIANT AT TIME OF PERMIT ISSUANCE. SEE COMPLIANCE SCHEDULE IN PART G.

Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement
6	STACK TESTING SCHEDULE FOR EXPIRED PERMIT (PM-10 and PM-2.5): If an operating permit has expired, the permittee shall conduct a stack test no later than 42 months after the date of expiration of the operating permit using an approved protocol to demonstrate compliance with emission limits for PM-10 and PM-2.5 as specified in the compliance plan for OS1. The permittee shall provide EMS with the turbine load performance curve with the protocol. Testing must be conducted at worst-case permitted operating conditions with regard to meeting the applicable emission standards, but without creating an unsafe condition. [N.J.A.C. 7:27-22.16(a)]	Other: Monitoring as required under the applicable operating scenario(s).[N.J.A.C. 7:27-22.16(o)].	Other: Recordkeeping as required under the applicable operating scenario(s). [N.J.A.C. 7:27-22.16(o)].	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. If an operating permit has expired, the permittee shall submit a stack test protocol to the Emission Measurement Section (EMS) at Mail Code: 09-01, PO Box 420, Trenton, NJ 08625 no later than 30 months after the date of expiration of the operating permit. The protocol and test report must be prepared and submitted on a CD using the Electronic Reporting Tool (ERT), unless another format is approved by EMS. The ERT program can be downloaded at: https://www.epa.gov/chief. Within 30 days of protocol approval or no less than 60 days prior to the testing deadline, whichever is later, the permittee must contact EMS at 609-984-3443 to schedule a mutually acceptable test date. A full stack test report must be submitted to EMS and a certified summary test report must be submitted to the Regional Enforcement Office within 45 days after performing the stack test pursuant to N.J.A.C. 7:27-22.19(d). The test results must be certified by a licensed professional engineer or certified industrial hygienist. [N.J.A.C. 7:27-22.18(e) and [N.J.A.C. 7:27-22.18(b)]

Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement
13	VOC (Total) <= 50 ppmvd @ 15% O2. VOC RACT rule emission limit applies during all operation of the combustion turbine. [N.J.A.C. 7:27-16.9(c)]	VOC (Total): Monitored by stack emission testing once initially, based on the average of three Department validated stack test runs. See "INITIAL STACK TEST" in OS Summary. [N.J.A.C. 7:27-16.23(a)2]	VOC (Total): Recordkeeping by stack test results once initially. See "INITIAL STACK TEST" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. See "INITIAL STACK TEST" in OS Summary. [N.J.A.C. 7:27-22.16(o)]
14	The owner or operator of a stationary combustion turbine that has a maximum gross heat input rate of 25 million BTU per hour or more and associated duct burner (if a duct burner is installed) shall adjust the combustion process in accordance with the procedure set forth at N.J.A.C. 7:27-19.16(g) and in accordance with the manufacturer's recommended procedures and maintenance schedules for those sources. [N.J.A.C 7:27-22.16(a)], [N.J.A.C. 7:27-16.9(f)] and [N.J.A.C. 7:27-19.5(e)]	Other: Monitored by continuous emission monitoring (CEMS) or by periodic emission monitoring upon performing combustion adjustment. If not using a certified CEMS, monitoring shall be performed in accordance with the specific procedures for combustion adjustment monitoring specified in NJDEP Technical Manual 1005. [N.J.A.C. 7:27-19.16(g)].	Recordkeeping by data acquisition system (DAS) / electronic data storage upon performing combustion adjustment or by manual logging of parameter or storing data in a computer data system. The permittee shall record the following information for each adjustment in a log book or computer data system: 1. The date and times the adjustment began and ended; 2. The name, title, and affiliation of the person who performed the procedure and adjustment; 3. The type of procedure and maintenance performed; 4. The concentration of NOx, CO, and O2 measured before and after the adjustment was made; and 5. The type and amount of fuel use since the last combustion adjustment was performed. The records shall be kept for a minimum of 5 years and be readily accessible to the Department upon request. [N.J.A.C. 7:27-19.16(h)]	None.

Date: 6/3/2025

Emission Unit: U1 Gas Turbine - Unit No. 1

Operating Scenario: OS1 Unit No, 1 Firing Natural Gas

Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement
1	Opacity <= 20 %. Smoke emissions from stationary combustion turbines no greater than 20% opacity, exclusive of visible condensed water vapor, for more than 10 consecutive seconds. [N.J.A.C. 7:27- 3.5]	None.	None.	None.
2	Opacity <= 10 %. Smoke emissions from stationary combustion turbines no greater than 10% opacity, exclusive of visible condensed water vapor, for more than 10 consecutive seconds. [N.J.A.C. 7:27-22.16(a)]	None.	None.	None.
3	Particulate Emissions <= 62.8 lb/hr Particulate emission limit from the combustion of natural gas based on rated heat input of 628 MMBtu/hr. [N.J.A.C. 7:27- 4.2(a)]	Particulate Emissions: Monitored by stack emission testing once initially, based on each of three Department validated stack test runs. See "INITIAL STACK TEST" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	Particulate Emissions: Recordkeeping by stack test results once initially. See "INITIAL STACK TEST" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. See "INITIAL STACK TEST" in OS Summary. [N.J.A.C. 7:27-22.16(o)]
4	NOx (Total) <= 1 lb/MW-hr (net). NOx RACT emission limit applies during all periods of natural gas combustion during which useful energy is being produced by the turbine. [N.J.A.C. 7:27-19.5(g)]	NOx (Total): Monitored by continuous emission monitoring system continuously, based on a calendar day (in ozone season) or 30 day rolling (at other times) average. See "CONTINUOUS EMISSION MONITORING (CEMS)" in OS Summary. [N.J.A.C. 7:27-19.15(a)1]	NOx (Total): Recordkeeping by data acquisition system (DAS) / electronic data storage continuously. See "CONTINUOUS EMISSION MONITORING (CEMS)" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	Submit an Excess Emissions and Monitoring Systems Performance Report (EEMPR): On or before every April 30, July 30, October 30, and January 30 for the preceding calendar quarter (the calendar quarters begin on January 1, April 1, July 1, and October 1) electronically through the NJDEP online EEMPR web portal starting with the quarter in which the Performance Specification Test was conducted, for review and approval. Quarterly EEMPR reports shall include all quarterly and annual QA data. This report shall be submitted whether or not an emission exceedance has occurred. See CEMS and QA/QC requirements in OS Summary. [N.J.A.C. 7:27-22.19(d)]

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New Jersey Department of Environmental Protection Facility Specific Requirements

Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement
5	Turbine fuel limited to natural gas. [N.J.A.C. 7:27-22.16(a)]	None.	Recordkeeping by invoices / bills of lading / certificate of analysis upon request of the Department. [N.J.A.C. 7:27-22.16(o)]	None.
6	Maximum Gross Heat Input <= 628 MMBTU/hr (HHV) while firing natural gas. [N.J.A.C. 7:27-22.16(a)]	Maximum Gross Heat Input: Monitored by fuel flow/firing rate instrument continuously. [N.J.A.C. 7:27-22.16(o)]	Maximum Gross Heat Input: Recordkeeping by data acquisition system (DAS) / electronic data storage continuously. [N.J.A.C. 7:27-22.16(o)]	None.
7	NOx (Total) <= 2.5 ppmvd @ 15% O2. Based on vendor guarantee / SOTA. [N.J.A.C. 7:27-22.16(a)]	NOx (Total): Monitored by continuous emission monitoring system continuously, based on a 3 hour rolling average based on a 1 hour block average. See "CONTINUOUS EMISSION MONITORING (CEMS)" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	NOx (Total): Recordkeeping by data acquisition system (DAS) / electronic data storage continuously. See "CONTINUOUS EMISSION MONITORING (CEMS)" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	Submit an Excess Emissions and Monitoring Systems Performance Report (EEMPR): On or before every April 30, July 30, October 30, and January 30 for the preceding calendar quarter (the calendar quarters begin on January 1, April 1, July 1, and October 1) electronically through the NJDEP online EEMPR web portal starting with the quarter in which the Performance Specification Test was conducted, for review and approval. Quarterly EEMPR reports shall include all quarterly and annual QA data. This report shall be submitted whether or not an emission exceedance has occurred. See CEMS and QA/QC requirements in OS Summary. [N.J.A.C. 7:27-22.19(d)]
8	NOx (Total) <= 2.5 ppmvd @ 15% O2. Based on vendor guarantee / SOTA. [N.J.A.C. 7:27-22.16(a)]	NOx (Total): Monitored by stack emission testing once initially and prior to permit expiration date, based on the average of three Department validated stack test runs. See "INITIAL STACK TEST" and "STACK TEST FOR NOx and CO" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	NOx (Total): Recordkeeping by stack test results once initially and prior to permit expiration date. See "INITIAL STACK TEST" and "STACK TEST FOR NOx and CO" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. See "INITIAL STACK TEST" and "STACK TEST FOR NOx and CO" in OS Summary. [N.J.A.C. 7:27-22.16(o)]

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Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement
9	NOx (Total) <= 5.79 lb/hr. Based on permitted maximum heat input (628 MMBtu/hr) and a lb/MMBtu value equivalent to the 2.5 ppm SOTA limit (0.00921 lb/MMBtu). [N.J.A.C. 7:27-22.16(a)]	NOx (Total): Monitored by continuous emission monitoring system continuously, based on a 3 hour rolling average based on a 1 hour block average. See "CONTINUOUS EMISSION MONITORING (CEMS)" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	NOx (Total): Recordkeeping by data acquisition system (DAS) / electronic data storage continuously. See "CONTINUOUS EMISSION MONITORING (CEMS)" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	Submit an Excess Emissions and Monitoring Systems Performance Report (EEMPR): On or before every April 30, July 30, October 30, and January 30 for the preceding calendar quarter (the calendar quarters begin on January 1, April 1, July 1, and October 1) electronically through the NJDEP online EEMPR web portal starting with the quarter in which the Performance Specification Test was conducted, for review and approval. Quarterly EEMPR reports shall include all quarterly and annual QA data. This report shall be submitted whether or not an emission exceedance has occurred. See CEMS and QA/QC requirements in OS Summary. [N.J.A.C. 7:27-22.19(d)]
10	NOx (Total) <= 5.79 lb/hr. Based on permitted maximum heat input (628 MMBtu/hr) and a lb/MMBtu value equivalent to the 2.5 ppm SOTA limit (0.00921 lb/MMBtu). [N.J.A.C. 7:27-22.16(a)]	NOx (Total): Monitored by stack emission testing once initially and prior to permit expiration date, based on the average of three Department validated stack test runs. See "INITIAL STACK TEST" and "STACK TEST FOR NOx and CO" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	NOx (Total): Recordkeeping by stack test results once initially and prior to permit expiration date. See "INITIAL STACK TEST" and "STACK TEST FOR NOx and CO" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. See "INITIAL STACK TEST" and "STACK TEST FOR NOx and CO" in OS Summary. [N.J.A.C. 7:27-22.16(o)]
11	CO <= 5 ppmvd @ 15% O2. Based on vendor guarantee / SOTA. [N.J.A.C. 7:27-22.16(a)]	CO: Monitored by continuous emission monitoring system continuously, based on a 3 hour rolling average based on a 1 hour block average. See "CONTINUOUS EMISSION MONITORING (CEMS)" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	CO: Recordkeeping by data acquisition system (DAS) / electronic data storage continuously. See "CONTINUOUS EMISSION MONITORING (CEMS)" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	Submit an Excess Emissions and Monitoring Systems Performance Report (EEMPR): On or before every April 30, July 30, October 30, and January 30 for the preceding calendar quarter (the calendar quarters begin on January 1, April 1, July 1, and October 1) electronically through the NJDEP online EEMPR web portal starting with the quarter in which the Performance Specification Test was conducted, for review and approval. Quarterly EEMPR reports shall include all quarterly and annual QA data. This report shall be submitted whether or not an emission exceedance has occurred. See CEMS and QA/QC requirements in OS Summary. [N.J.A.C. 7:27-22.19(d)]

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Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement
12	CO <= 5 ppmvd @ 15% O2. Based on vendor guarantee / SOTA. [N.J.A.C. 7:27-22.16(a)]	CO: Monitored by stack emission testing once initially and prior to permit expiration date, based on the average of three Department validated stack test runs. See "INITIAL STACK TEST" and "STACK TEST FOR NOx and CO" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	CO: Recordkeeping by stack test results once initially and prior to permit expiration date. See "INITIAL STACK TEST" and "STACK TEST FOR NOx and CO" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. See "INITIAL STACK TEST" and "STACK TEST FOR NOx and CO" in OS Summary. [N.J.A.C. 7:27-22.16(o)]
13	CO <= 7.04 lb/hr. Based on permitted maximum heat input (628 MMBtu/hr) and a lb/MMBtu value equivalent to the 5.0 ppm SOTA limit (0.0112 lb/MMBtu). [N.J.A.C. 7:27-22.16(a)]	CO: Monitored by continuous emission monitoring system continuously, based on a 3 hour rolling average based on a 1 hour block average. See "CONTINUOUS EMISSION MONITORING (CEMS)" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	CO: Recordkeeping by data acquisition system (DAS) / electronic data storage continuously. See "CONTINUOUS EMISSION MONITORING (CEMS)" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	Submit an Excess Emissions and Monitoring Systems Performance Report (EEMPR): On or before every April 30, July 30, October 30, and January 30 for the preceding calendar quarter (the calendar quarters begin on January 1, April 1, July 1, and October 1) electronically through the NJDEP online EEMPR web portal starting with the quarter in which the Performance Specification Test was conducted, for review and approval. Quarterly EEMPR reports shall include all quarterly and annual QA data. This report shall be submitted whether or not an emission exceedance has occurred. See CEMS and QA/QC requirements in OS Summary. [N.J.A.C. 7:27-22.19(d)]
14	CO <= 7.04 lb/hr. Based on permitted maximum heat input (628 MMBtu/hr) and a lb/MMBtu value equivalent to the 5.0 ppm SOTA limit (0.0112 lb/MMBtu). [N.J.A.C. 7:27-22.16(a)]	CO: Monitored by stack emission testing once initially and prior to permit expiration date, based on the average of three Department validated stack test runs. See "INITIAL STACK TEST" and "STACK TEST FOR NOx and CO" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	CO: Recordkeeping by stack test results once initially and prior to permit expiration date. See "INITIAL STACK TEST" and "STACK TEST FOR NOx and CO" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. See "INITIAL STACK TEST" and "STACK TEST FOR NOx and CO" in OS Summary. [N.J.A.C. 7:27-22.16(o)]
15	VOC (Total) <= 2.55 ppmvd @ 15% O2. This limit includes formaldehyde emissions. Based on vendor guaranteed VOC emissions plus permitted Formaldehyde emissions. [N.J.A.C. 7:27-22.16(a)]	VOC (Total): Monitored by stack emission testing once initially, based on the average of three Department validated stack test runs. See "INITIAL STACK TEST" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	VOC (Total): Recordkeeping by stack test results once initially. See "INITIAL STACK TEST" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. See "INITIAL STACK TEST" in OS Summary. [N.J.A.C. 7:27-22.16(o)]

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Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement
16	VOC (Total) <= 2.06 lb/hr. This limit includes formaldehyde emissions. Based on permitted maximum heat input (628 MMBtu/hr) and a lb/MMBtu value equivalent to the 2.55 ppm permit limit (0.00327 lb/MMBtu). [N.J.A.C. 7:27-22.16(a)]	VOC (Total): Monitored by stack emission testing once initially, based on the average of three Department validated stack test runs. See "INITIAL STACK TEST" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	VOC (Total): Recordkeeping by stack test results once initially. See "INITIAL STACK TEST" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. See "INITIAL STACK TEST" in OS Summary. [N.J.A.C. 7:27-22.16(o)]
17	SO2 <= 1.12 lb/hr. Based on permitted maximum heat input (628 MMBtu/hr), a natural gas heating value of 1020 MMBtu/MMScf and the maximum value of sulfur content in Transco's natural gas, measured during 2009 - 2011 monthly samples (0.634 grains/100dscf). [N.J.A.C. 7:27-22.16(a)]	SO2: Monitored by stack emission testing once initially, based on the average of three Department validated stack test runs. See "INITIAL STACK TEST" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	SO2: Recordkeeping by stack test results once initially. See "INITIAL STACK TEST" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. See "INITIAL STACK TEST" in OS Summary. [N.J.A.C. 7:27-22.16(o)]
18	TSP <= 5 lb/hr. Based on vendor guarantee. [N.J.A.C. 7:27-22.16(a)]	TSP: Monitored by stack emission testing once initially, based on the average of three Department validated stack test runs. See "INITIAL STACK TEST" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	TSP: Recordkeeping by stack test results once initially. See "INITIAL STACK TEST" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. See "INITIAL STACK TEST" in OS Summary. [N.J.A.C. 7:27-22.16(o)]
19	PM-10 (Total) <= 5 lb/hr. Based on vendor guarantee. [N.J.A.C. 7:27-22.16(a)]	PM-10 (Total): Monitored by stack emission testing once initially and prior to permit expiration date, based on the average of three Department validated stack test runs. See "INITIAL STACK TEST" and "STACK TEST FOR PM-10 and PM-2.5" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	PM-10 (Total): Recordkeeping by stack test results once initially and prior to permit expiration date. See "INITIAL STACK TEST" and "STACK TEST FOR PM-10 and PM-2.5" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. See "INITIAL STACK TEST" and "STACK TEST FOR PM-10 and PM-2.5" in OS Summary. [N.J.A.C. 7:27-22.16(o)]
20	PM-2.5 (Total) <= 5 lb/hr. Based on PM-10 permitted emission rate. [N.J.A.C. 7:27-22.16(a)]	PM-2.5 (Total): Monitored by stack emission testing once initially and prior to permit expiration date, based on the average of three Department validated stack test runs. See "INITIAL STACK TEST" and "STACK TEST FOR PM-10 and PM-2.5" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	PM-2.5 (Total): Recordkeeping by stack test results once initially and prior to permit expiration date. See "INITIAL STACK TEST" and "STACK TEST FOR PM-10 and PM-2.5" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. See "INITIAL STACK TEST" and "STACK TEST FOR PM-10 and PM-2.5" in OS Summary. [N.J.A.C. 7:27-22.16(o)]
21	Ammonia <= 5 ppmvd @ 15% O2. Based on vendor specification / SOTA. [N.J.A.C. 7:27-22.16(a)]	Other: Monitored by continuous process monitoring system continuously, based on a 3 hour rolling average based on a 1 hour block average. See "CONTINUOUS PROCESS MONITORING" in OS Summary.[N.J.A.C. 7:27-22.16(o)].	Ammonia: Recordkeeping by data acquisition system (DAS) / electronic data storage continuously See "CONTINUOUS PROCESS MONITORING" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	None.

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Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement
22	Ammonia <= 5 ppmvd @ 15% O2. Based on vendor specification / SOTA. [N.J.A.C. 7:27-22.16(a)]	Ammonia: Monitored by stack emission testing once initially, based on the average of three Department validated stack test runs. See "INITIAL STACK TEST" in OS Summary. [N.J.A.C. 7:27-22.16(0)]	Ammonia: Recordkeeping by stack test results once initially. See "INITIAL STACK TEST" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. See "INITIAL STACK TEST" in OS Summary. [N.J.A.C. 7:27-22.16(o)]
23	Ammonia <= 4.28 lb/hr. Based on permitted maximum heat input (628 MMBtu/hr) and a lb/MMBtu value equivalent to the 5.0 ppm SOTA limit (0.00681 lb/MMBtu). [N.J.A.C. 7:27-22.16(a)]	Ammonia: Monitored by stack emission testing once initially, based on the average of three Department validated stack test runs. See "INITIAL STACK TEST" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	Ammonia: Recordkeeping by stack test results once initially. See "INITIAL STACK TEST" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. See "INITIAL STACK TEST" in OS Summary. [N.J.A.C. 7:27-22.16(o)]
24	Methane <= 1.52 lb/hr. Based on permitted hourly heat input and 40 CFR Part 98, Subpart C, Table C-2 emission factor. [N.J.A.C. 7:27-22.16(a)]	Methane: Monitored by calculations once initially. [N.J.A.C. 7:27-22.16(o)]	Methane: Recordkeeping by manual logging of parameter or storing data in a computer data system once initially. Maintain initial calculations and make available to the Department upon request. [N.J.A.C. 7:27-22.16(o)]	None.
25	Nitrous oxide <= 0.152 lb/hr. Based on permitted hourly heat input and 40 CFR Part 98, Subpart C, Table C-2 emission factor. [N.J.A.C. 7:27-22.16(a)]	Nitrous oxide: Monitored by calculations once initially. [N.J.A.C. 7:27-22.16(o)]	Nitrous oxide: Recordkeeping by manual logging of parameter or storing data in a computer data system once initially. Maintain initial calculations and make available to the Department upon request. [N.J.A.C. 7:27-22.16(o)]	None.
26	Acetaldehyde <= 0.341 lb/hr. Based on permitted hourly heat input and California Air Toxics emission factor. [N.J.A.C. 7:27-22.16(a)]	Acetaldehyde: Monitored by calculations once initially. [N.J.A.C. 7:27-22.16(o)]	Acetaldehyde: Recordkeeping by manual logging of parameter or storing data in a computer data system once initially. Maintain initial calculations and make available to the Department upon request. [N.J.A.C. 7:27-22.16(o)]	None.
27	Acetophenone <= 0.0352 lb/hr. Based on permitted hourly heat input and emission factor from GE Energy and Environmental Research Corp. Progress Report No. 2 (2/14/02). [N.J.A.C. 7:27-22.16(a)]	Acetophenone: Monitored by calculations once initially. [N.J.A.C. 7:27-22.16(o)]	Acetophenone: Recordkeeping by manual logging of parameter or storing data in a computer data system once initially. Maintain initial calculations and make available to the Department upon request. [N.J.A.C. 7:27-22.16(0)]	None.

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Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement
28	Acrolein <= 0.0462 lb/hr. Based on permitted hourly heat input and emission factor from GE Energy and Environmental Research Corp. Progress Report No. 2 (2/14/02). [N.J.A.C. 7:27-22.16(a)]	Acrolein: Monitored by calculations once initially. [N.J.A.C. 7:27-22.16(o)]	Acrolein: Recordkeeping by manual logging of parameter or storing data in a computer data system once initially. Maintain initial calculations and make available to the Department upon request. [N.J.A.C. 7:27-22.16(o)]	None.
29	Arsenic Emissions <= 0.000133 lb/hr. Based on permitted hourly heat input and AP-42 emission factor. [N.J.A.C. 7:27-22.16(a)]	Arsenic Emissions: Monitored by calculations once initially. [N.J.A.C. 7:27-22.16(o)]	Arsenic Emissions: Recordkeeping by manual logging of parameter or storing data in a computer data system once initially. Maintain initial calculations and make available to the Department upon request. [N.J.A.C. 7:27-22.16(o)]	None.
30	Benzene <= 0.263 lb/hr. Based on permitted hourly heat input and emission factor from Electric Power Research Institute Technical Update (February 2006). [N.J.A.C. 7:27-22.16(a)]	Benzene: Monitored by calculations once initially. [N.J.A.C. 7:27-22.16(o)]	Benzene: Recordkeeping by manual logging of parameter or storing data in a computer data system once initially. Maintain initial calculations and make available to the Department upon request. [N.J.A.C. 7:27-22.16(o)]	None.
31	Benzo (A) Pyrene Emissions <= 0.000062 lb/hr. Based on permitted hourly heat input and California Air Toxics emission factor. [N.J.A.C. 7:27-22.16(a)]	Benzo (A) Pyrene Emissions: Monitored by calculations once initially. [N.J.A.C. 7:27-22.16(o)]	Benzo (A) Pyrene Emissions: Recordkeeping by manual logging of parameter or storing data in a computer data system once initially. Maintain initial calculations and make available to the Department upon request. [N.J.A.C. 7:27-22.16(o)]	None.
32	Beryllium Emissions <= 0.000008 lb/hr. Based on permitted hourly heat input and AP-42 emission factor. [N.J.A.C. 7:27-22.16(a)]	Beryllium Emissions: Monitored by calculations once initially. [N.J.A.C. 7:27-22.16(o)]	Beryllium Emissions: Recordkeeping by manual logging of parameter or storing data in a computer data system once initially. Maintain initial calculations and make available to the Department upon request. [N.J.A.C. 7:27-22.16(o)]	None.
33	Biphenyl <= 0.00656 lb/hr. Based on permitted hourly heat input and emission factor from GE Energy and Environmental Research Corp. Progress Report No. 2 (2/14/02). [N.J.A.C. 7:27-22.16(a)]	Biphenyl: Monitored by calculations once initially. [N.J.A.C. 7:27-22.16(o)]	Biphenyl: Recordkeeping by manual logging of parameter or storing data in a computer data system once initially. Maintain initial calculations and make available to the Department upon request. [N.J.A.C. 7:27-22.16(o)]	None.

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Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement
34	Cadmium Emissions <= 0.000733 lb/hr. Based on permitted hourly heat input and AP-42 emission factor. [N.J.A.C. 7:27-22.16(a)]	Cadmium Emissions: Monitored by calculations once initially. [N.J.A.C. 7:27-22.16(o)]	Cadmium Emissions: Recordkeeping by manual logging of parameter or storing data in a computer data system once initially. Maintain initial calculations and make available to the Department upon request. [N.J.A.C. 7:27-22.16(o)]	None.
35	Chromium (Hexavalent) Emissions <= 0.00114 lb/hr. Based on permitted hourly heat input and California Air Toxics emission factor. [N.J.A.C. 7:27-22.16(a)]	Chromium (Hexavalent) Emissions: Monitored by calculations once initially. [N.J.A.C. 7:27-22.16(o)]	Chromium (Hexavalent) Emissions: Recordkeeping by manual logging of parameter or storing data in a computer data system once initially. Maintain initial calculations and make available to the Department upon request. [N.J.A.C. 7:27-22.16(o)]	None.
36	Cobalt Emissions <= 0.0000691 lb/hr. Based on permitted hourly heat input and emission factor from GE Energy and Environmental Research Corp. Progress Report No. 2 (2/14/02). [N.J.A.C. 7:27-22.16(a)]	Cobalt Emissions: Monitored by calculations once initially. [N.J.A.C. 7:27-22.16(o)]	Cobalt Emissions: Recordkeeping by manual logging of parameter or storing data in a computer data system once initially. Maintain initial calculations and make available to the Department upon request. [N.J.A.C. 7:27-22.16(o)]	None.
37	Ethylbenzene <= 0.038 lb/hr. Based on permitted hourly heat input and California Air Toxics emission factor. [N.J.A.C. 7:27-22.16(a)]	Ethylbenzene: Monitored by calculations once initially . [N.J.A.C. 7:27-22.16(o)]	Ethylbenzene: Recordkeeping by manual logging of parameter or storing data in a computer data system once initially. Maintain initial calculations and make available to the Department upon request. [N.J.A.C. 7:27-22.16(o)]	None.
38	Formaldehyde <= 0.49 lb/hr. Based on permitted hourly heat input and AP-42 emission factor. [N.J.A.C. 7:27-22.16(a)]	Formaldehyde: Monitored by stack emission testing once initially, based on the average of three Department validated stack test runs. See "INITIAL STACK TEST" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	Formaldehyde: Recordkeeping by stack test results once initially. See "INITIAL STACK TEST" in OS Summary. [N.J.A.C. 7:27-22.16(o)]	Stack Test - Submit protocol, conduct test and submit results: As per the approved schedule. See "INITIAL STACK TEST" in OS Summary. [N.J.A.C. 7:27-22.16(o)]
39	Manganese Emissions <= 0.00038 lb/hr. Based on permitted hourly heat input and emission factor from GE Energy and Environmental Research Corp. Progress Report No. 2 (2/14/02). [N.J.A.C. 7:27-22.16(a)]	Manganese Emissions: Monitored by calculations once initially. [N.J.A.C. 7:27-22.16(o)]	Manganese Emissions: Recordkeeping by manual logging of parameter or storing data in a computer data system once initially. Maintain initial calculations and make available to the Department upon request. [N.J.A.C. 7:27-22.16(o)]	None.

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New Jersey Department of Environmental Protection Facility Specific Requirements

D . C #	APalla Danishani	M '	D 11 1 D 1	
Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittal/Action Requirement
40	Naphthalene <= 0.00525 lb/hr. Based on permitted hourly heat input and California Air Toxics emission factor. [N.J.A.C. 7:27-22.16(a)]	Naphthalene: Monitored by calculations once initially. [N.J.A.C. 7:27-22.16(o)]	Naphthalene: Recordkeeping by manual logging of parameter or storing data in a computer data system once initially. Maintain initial calculations and make available to the Department upon request. [N.J.A.C. 7:27-22.16(o)]	None.
41	Nickel Emissions <= 0.0014 lb/hr. Based on permitted hourly heat input and AP-42 emission factor. [N.J.A.C. 7:27-22.16(a)]	Nickel Emissions: Monitored by calculations once initially. [N.J.A.C. 7:27-22.16(o)]	Nickel Emissions: Recordkeeping by manual logging of parameter or storing data in a computer data system once initially. Maintain initial calculations and make available to the Department upon request. [N.J.A.C. 7:27-22.16(o)]	None.
42	Polynuclear aromatic hydrocarbons (PAHs) <= 0.00536 lb/hr. Based on permitted hourly heat input and emission factor from GE Energy and Environmental Research Corp. Progress Report No. 2 (2/14/02). [N.J.A.C. 7:27-22.16(a)]	Polynuclear aromatic hydrocarbons (PAHs): Monitored by calculations once initially. [N.J.A.C. 7:27-22.16(o)]	Polynuclear aromatic hydrocarbons (PAHs): Recordkeeping by manual logging of parameter or storing data in a computer data system once initially. Maintain initial calculations and make available to the Department upon request. [N.J.A.C. 7:27-22.16(o)]	None.
43	Propylene oxide <= 0.0391 lb/hr. Based on permitted hourly heat input and California Air Toxics emission factor. [N.J.A.C. 7:27-22.16(a)]	Propylene oxide: Monitored by calculations once initially. [N.J.A.C. 7:27-22.16(o)]	Propylene oxide: Recordkeeping by manual logging of parameter or storing data in a computer data system once initially. Maintain initial calculations and make available to the Department upon request. [N.J.A.C. 7:27-22.16(o)]	None.
44	Styrene <= 0.0408 lb/hr. Based on permitted hourly heat input and emission factor from GE Energy and Environmental Research Corp. Progress Report No. 2 (2/14/02). [N.J.A.C. 7:27-22.16(a)]	Styrene: Monitored by calculations once initially. [N.J.A.C. 7:27-22.16(o)]	Styrene: Recordkeeping by manual logging of parameter or storing data in a computer data system once initially. Maintain initial calculations and make available to the Department upon request. [N.J.A.C. 7:27-22.16(o)]	None.
45	Any individual hazardous air pollutant emissions, not specifically listed in this permit, are below the reporting thresholds listed in N.J.A.C. 7:27-17. [N.J.A.C. 7:27-22.16(a)]	None.	None.	None.

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New Jersey Department of Environmental Protection Facility Specific Requirements

Ref.#	Applicable Requirement	Monitoring Requirement	Recordkeeping Requirement	Submittel/Action Dequipment
				Submittal/Action Requirement
46	Ox (Total) <= 25 ppmvd @ 15% O2 OR (Ox (total) <= 1.2 lb/MW-hr of useful atput. his limit applies to a turbine that has heat apput at peak load greater than 50 (MBtu/hr (HHV) but less or equal to 850 (MBtu/hr (HHV) firing natural gas and thich commenced construction after ebruary 18, 2005. [40 CFR 60.4320(a)] his his limit applies to a turbine that has heat apput at peak load greater than 50 (MBtu/hr (HHV) firing natural gas and thich commenced construction after ebruary 18, 2005. [40 CFR 60.4320(a)] his limit applies to a turbine that has heat apput at peak load greater than 50 (must testing at the approved frequency, based on the average of three Department validated stack test runs. The owner or operator shall conduct an initial performance test as required in 40 CFR 60.4340(a). Test methods and procedures shall be consistent with the requirements of 40 CFR 60.4400 or, if a NOx diluent CEMS is installed, consistent with 40 CFR 60.4405. The performance test must be done at any load condition within plus or minus 25 percent of 100 percent of peak load. Alternatively, the testing might be performed at the happroved frequency, based on the average of three Department validated stack test runs. The owner or operator shall conduct an initial performance test as required in 40 CFR 60.4340(a). Test methods and procedures shall be consistent with the requirements of 40 CFR 60.4400 or, if a NOx diluent CEMS is installed, consistent with 40 CFR 60.4405. The performance test must be done at any load condition within plus or minus 25 percent of 100 percent of peak load cannot be achieved in practice. [40 CFR 60.4400]		NOx (Total): Recordkeeping by stack test results at the approved frequency. [40 CFR 60.4460]	Submit a report: As per the approved schedule. The owner or operator shall submit a written report of the results of each performance test before the close of business on the 60th day following the completion of the performance test. [40 CFR 60.4375(b)]
47	NOx (Total) <= 96 ppmvd @ 15% O2 OR NOx (total) <= 4.7 lb/MW-hr of useful output. This limit applies to a turbine that has output greater than 30 MW which is operating at less than 75 percent of peak load or at a temperature less than 0 degrees F. [40 CFR 60.4320(a)]	NOx (Total): Monitored by stack emission testing at the approved frequency, based on the average of three Department validated stack test runs. The owner or operator shall conduct an initial performance test as required in 40 CFR 60.8. The subsequent testing shall only be conducted if choosing to comply with 40 CFR 60.4340(a). Test methods and procedures shall be consistent with the requirements of 40 CFR 60.4400 or, if a NOx diluent CEMS is installed, consistent with 40 CFR 60.4405. The performance test must be done at any load condition within plus or minus 25 percent of 100 percent of peak load. Alternatively, the testing might be performed at the highest achievable load point, if at least 75 percent of peak load cannot be achieved in practice. For turbines with supplemental duct burner NOx measurements shall be taken after the duct burner, which has to be in operation during the performance test. [40 CFR 60.4400]	NOx (Total): Recordkeeping by stack test results at the approved frequency. [40 CFR 60.4460]	Submit a report: As per the approved schedule. The owner or operator shall submit a written report of the results of each performance test before the close of business on the 60th day following the completion of the performance test. [40 CFR 60.4375(b)]

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New Jersey Department of Environmental Protection Equipment Inventory

Equip.	Facility's	Equipment	Equipment Type	Certificate	Install	Grand-	Last Mod.	Equip.
NJID	Designation	Description		Number	Date	Fathered	(Since 1968)	Set ID
E1	Unit 1	Turbine Unit No. 1	Combustion Turbine	PCP160001	6/1/2015	No	10/5/2017	

New Jersey Department of Environmental Protection Control Device Inventory

CD NJID	Facility's Designation	Description	CD Type	Install Date	Grand- Fathered	Last Mod. (Since 1968)	CD Set ID
CD1	SCR-1	Selective Catalytic Reduction for Unit No. 1	Selective Catalytic Reduction	6/1/2015	No		
CD2	Ox-Cat-2	Oxidation Catalyst for Unit No. 1	Oxidizer (Catalytic)	6/1/2015	No		
CD3	H2O Inject	Water Injection for Unit No. 1	Other	6/1/2015	No		

VINELAND CITY MEU CLAYVILLE (75808) BOP250001

Date: 6/3/2025

New Jersey Department of Environmental Protection Emission Points Inventory

	PT NJID	Facility's Designation	Description	Config.	Equiv. Diam.	Height (ft.)	Dist. to Prop.	Exhaust Temp. (deg. F)		F) Exhaust Vol. (acfm)			Discharge Direction	PT Set ID	
	МЛД	Designation			(in.)	(11.)	Line (ft)	Avg.	Min.	Max.	Avg.	Min.	Max.	Direction	Set ID
PT1		Unit No. 1	Unit No. 1 Stack	Round	140	135	120	750.0	400.0	825.0	770,000.0	627,000.0	825,000.0	Up	

VINELAND CITY MEU CLAYVILLE (75808) BOP250001

Date: 6/3/2025

New Jersey Department of Environmental Protection Emission Unit/Batch Process Inventory

U 1 Unit No. 1 Gas Turbine - Unit No. 1

UOS	Facility's	UOS	Operation	Signif.	Control	Emission	SCC(a)	Annual Oper. Hours V	Flow (acfm)	Temp. (deg F)
NJID	Designation	Description	Type	Equip.	Device (s)	Point(s)	SCC(s)	Min. Max. Ra	ange Min. Max	Min. Max.
OS1	Turbine - NG	Unit No, 1 Firing Natural Gas	Normal - Steady State	E1	CD1 (S) CD2 (P) CD3 (P)	PT1	2-01-002-01	0.0 3,579.0	627,000.0 825,000	0 400.0 825.0
OS2	Turbine - SU	Unit No. 1 - Start-up	Startup	E1		PT1	2-01-002-01	0.0		
OS3	Turbine - SD	Unit No. 1 - Shut Down	Shutdown	E1		PT1	2-01-002-01	0.0		
OS4	Turbine-SUSD	Unit No. 1 - Start-up and Shut Down During the Same Hour	Startup	E1		PT1	2-01-002-01	0.0		

THE FOLLOWING DOCUMENTS TO BE SUBMITTED WITH YOUR PROPOSAL

PROPOSAL CHECKLIST

The following checklist is provided as assistance in the development of the RFP response. It in no way supersedes or replaces the requirements of the RFP. Please initial on the lines below for each document/section attesting to the fact that you have read and/or included the documents with your RFP.

General Requirements/Instructions	
Scope of Work	
Proposal requirements	
Evaluation Criteria	
Acknowledgment of Receipt of Addenda	
Statement of Ownership Disclosure	
Statement of Authority	
EEO/Affirmative Action Compliance Notice	
Affirmative Action Mandatory Language	
Americans with Disabilities Act Mandatory Language	
Disclosure of Investment Activities in Iran	
Prohibited Activities in Russia or Belarus	



Proposal Form Stack Emissions and RATA Testing Services 2026 - 2027

A.	Source Stack Emission Testing - See Technical Specification for Test Group details.
	Quoted price shall include initial mobilization and test report.

1.	Test Group A1:	Clayville Unit 1 Initial Stack Test (including form	naldehyde)
		\$/ test X 1 test =	\$
2.	Test Group A2:	Down Unit 11 Initial Stack Test (without formal)	lehyde)
		\$/ test X 1 test =	\$
3.	Test Group A3:	Down Unit 11 Renewal Stack Test Firing ULSD	
		$\int \frac{1 \text{test}}{2 \text{test}} = $	\$
4.	Test Group A4:	Clayville Unit 1 & Down Unit 11 Renewal Stack	Test Firing Natural Gas
		\$/ test X 2 tests =	\$
5.	Test Group A5:	Clayville Unit 1 & Down Unit 11 Renewal Stack	Test – NOx & CO
		\$/ test X 1 test =	\$
6.	Test Group A6:	Clayville Unit 1 & Down Unit 11 Renewal Stack	Test – PM-10 & PM-2.5
		\$/ test X 1 test =	\$
7.	Test Group A7:	Clayville Unit 1 and Down Unit 11 – Ammonia S	Slip
		$\int \frac{1 \text{test}}{2 \text{test}} = $	\$

8. Test Group A8: HAPS Testing – Toxic Metals

\$_____/ test X 1 test = \$_____

9. Test Group A9: HAPS Testing – Non-metals

\$_____/ test X 1 test = \$_____

10. Cost for Compliance Test Protocol (preparation and submission)

\$_____/ protocol X **2** =

11. Cost for Additional Mobilization

\$_____/ mobilization X 2 = \$_____

- A. SUBTOTAL (1 through 11) \$_____
- **B. CEMS RATA Testing** See Technical Specification for RATA test details. Quoted price shall include mobilization and test report.
 - 1. CEMS RATA NOx, CO, and O2

\$_____/ test X **3 tests** = \$_____

2. **Cost for RATA Test Protocol** (preparation and submission)

\$_____/ protocol X **2** = \$_____

B. SUBTOTAL (1 through 2)

Company _____

C. Miscellaneous Tests and Related Activities

1. Mobile CEMS Monitoring

Mobilization Plus 6 Monitoring Hours

\$_____

Each Additional Day for CEMS

\$_____/ day X **4 days** = \$_____

Additional Attended Hours

\$_____/ hour X **32 hours** = \$_____

2. SCR Traverse Testing – *see Technical Specification for test details*

Mobilization

\$_____/ mobilization X **1** =

\$ _____

SCR Traverse Testing

\$ _____

3. Visual Observations – *test performed according to N.J.A.C.* 7:27*B*-2

\$_____/ test X **2 tests** =

\$ _____

4. Natural Gas Sampling and Analysis – Heat content and sulfur

\$_____/ sample X **4** =

\$ _____

C. SUBTOTAL (1 through 4) \$_____

D. TOTAL COST - BASE BID

 \mathbf{A} (subtotal) + \mathbf{B} (subtotal) + \mathbf{C} (subtotal) = $\mathbf{\$}$

E. <u>Labor Rates</u> (for use in determining the cost of services not otherwise specified)

Classification	\$/hour straight <u>time</u>	\$/hour premium <u>time</u>
1	\$	\$
2	\$	\$
3	\$	\$
4	\$	\$
5	\$	\$

STATEMENT OF AUTHORITY

RFP SUBMITTED FOR:		
COMPANY:		
RFP SUBMITTED BY:		
	(Print Name of Company Officer)	
SIGNATURE:		
(Si	gnature of Company Officer)***	
TITLE:	DATE:	
TELEPHONE:	EXT:	
FACSIMILE:		
EMAIL ADDRESS:		
TAXPAYER IDENTIFICATION I	NUMBER:	

*** The RFP must be signed by a Company Officer in order to be accepted by the City as a valid RFP. Failure to sign the RFP shall cause the RFP submission to be rejected as non-responsive.

STATEMENT OF OWNERSHIP DISCLOSURE

N.J.S.A. 52:25-24.2 (P.L. 1977, c.33, as amended by P.L. 2016, c.43)

This statement shall be completed, certified to, and included with all bid and proposal submissions. Failure to submit the required information is cause for automatic rejection of the bid or proposal.

Name of Organization:				
Organization Address:				
<u>Part </u> I Check the box that represents the type of bus	siness organization:			
□Sole Proprietorship (skip Parts II and III, execut □Non-Profit Corporation (skip Parts II and III, execut □For-Profit Corporation (any type) □Limited Liability Company (LLC) □Partnership □Limited Partnership □Limited Liability Partnership (LLP) □Other (be specific):	ecute certification in Part IV)			
Part II				
more of its stock, of any class, or of all in interest therein, or of all members in the	The list below contains the names and addresses of all stockholders in the corporation who own 10 percent or more of its stock, of any class, or of all individual partners in the partnership who own a 10 percent or greater interest therein, or of all members in the limited liability company who own a 10 percent or greater interest therein as the case may be. (COMPLETE THE LIST BELOW IN THIS SECTION)			
in the partnership owns a 10 percent or g	OR No one stockholder in the corporation owns 10 percent or more of its stock, of any class, or no individual partner in the partnership owns a 10 percent or greater interest therein, or no member in the limited liability company owns a 10 percent or greater interest therein, as the case may be. (SKIP TO PART IV)			
(Please attach additional sheets if more space is	needed):			
Name of Individual or Business Entity	Address			

Part III

Signature:

DISCLOSURE OF 10% OR GREATER OWNERSHIP IN THE STOCKHOLDERS, PARTNERS OR LLC MEMBERS LISTED IN PART II

If a bidder has a direct or indirect parent entity which is publicly traded, and any person holds a 10 percent or greater beneficial interest in the publicly traded parent entity as of the last annual federal Security and Exchange Commission (SEC) or foreign equivalent filing, ownership disclosure can be met by providing links to the website(s) containing the last annual filing(s) with the federal Securities and Exchange Commission (or foreign equivalent) that contain the name and address of each person holding a 10% or greater beneficial interest in the publicly traded parent entity, along with the relevant page numbers of the filing(s) that contain the information on each such person. Attach additional sheets if more space is needed.

	additional sheets if more space is needed.				
Websit	e (URL) containing the las	st annual SEC (or foreign	equivale	ent) filing	Page #'s
any corresponding corp publicly traded paren every noncorporate sto	poration, partnership and/or t entities referenced abov ockholder, and individual pa	ckholder, partner or membe limited liability company (L e. The disclosure shall be rtner, and member exceeding een listed. Attach addition	LC) liste continue ng the 10	d in Part II other tha d until names and ad) percent ownership	in for any ddresses of criteria
Stockholder/Partner/Member and Corresponding Entity Listed in Part II		dress			
Corresponding E	chury Listeu iii Part ii				
my knowledge are true bidder/proposer; that th continuing obligation fro to notify the criminal offense to mak	and complete. I acknowledge ei om the date of this certification in writing of any of e a false statement or misre aw and that it will constitute	t that the foregoing informatige: that I am authorized to exist relying on the information of through the completion of the completion of the presentation in this certificate a material breach of my agreesulting from this certification.	xecute th contained f any con ontained tion, and eement(s	is certification on behind herein and that I are stracts with herein; that I am awaif I do so, I am subjects) with the, permitting	nalf of the m under a are that it is a ct to criminal
Full Name (Print):			Title:		

Date:

AFFIRMATIVE ACTION COMPLIANCE NOTICE N.J.S.A. 10:5-31 and N.J.A.C. 17:27

GOODS AND SERVICES CONTRACTS (INCLUDING PROFESSIONAL SERVICES)

This form is a summary of the successful bidder's requirement to comply with the requirements of N.J.S.A. 10:5-31 and N.J.A.C. 17:27-1 et seq.

The successful bidder shall submit to the public agency, after notification of award but prior to execution of this contract, one of the following three documents as forms of evidence:

(a) A photocopy of a valid letter that the contractor is operating under an existing Federally approved or sanctioned affirmative action program (good for one year from the date of the letter);

OR

(b) A photocopy of a Certificate of Employee Information Report approval, issued in accordance with N.J.A.C. 17:27-4:

OR

(c) A photocopy of an Employee Information Report (Form AA302) provided by the Division and distributed to the public agency to be completed by the contractor in accordance with N.J.A.C. 17:27-4.

The successful vendor may obtain the Affirmative Action Employee Information Report (AA302) from the contracting unit during normal business hours.

The successful vendor(s) must submit the copies of the AA302 Report to the Division of Contract Compliance and Equal Employment Opportunity in Public Contracts (Division). The Public Agency copy is submitted to the public agency, and the vendor copy is retained by the vendor.

The undersigned vendor certifies that he/she is aware of the commitment to comply with the requirements of N.J.S.A. 10:5-31 and N.J.A.C. 17:27.1 et seq. and agrees to furnish the required forms of evidence.

The undersigned vendor further understands that his/her bid shall be rejected as non-responsive if said contractor fails to comply with the requirements of N.J.S.A. 10:5-31 and N.J.A.C. 17:27-1 et seq.

COMPANY:	SIGNATURE:
PRINT NAME:	_ TITLE:
DATE:	

FAILURE BY BIDDER TO COMPLETE AND RETURN THIS NOTICE WITH THEIR BID SUBMISSION SHALL BE CAUSE FOR THEIR BID TO BE REJECTED AS NON-RESPONSIVE

CITY OF VINELAND ACKNOWLEDGMENT OF RECEIPT OF ADDENDA

Pursuant to N.J.S.A. 40A:11-23.1a, the undersigned bidder hereby acknowledges receipt of the following notices, revisions, or addenda to the bid advertisement, specifications or bid documents. By indicating date of receipt, bidder acknowledges the submitted bid takes into account the provisions of notice, revision or addendum. Note that the local unit's record of notice to bidders shall take precedence and that failure to include provisions of changes in a bid proposal may be subject for rejection of the bid.

The undersigned Bidder hereby acknowledges receipt of the following Addenda:

Addendum Number	Dated	Acknowledge Receipt (initial)
		
		
		
□No addenda were received:		
Acknowledged for:		
	(Name of Bidder)	
Ву:		
,	(Signature of Authorized Represer	tative)
Name:		
	(Print or Type)	
Title:		
Date:		

DISCLOSURE OF INVESTMENT ACTIVITIES IN IRAN FORM



Print Name and Title

STATE OF NEW JERSEY
DEPARTMENT OF THE TREASURY - DIVISION OF PURCHASE AND PROPERTY
33 WEST STATE STREET, P.O. BOX 230 TRENTON, NEW JERSEY 08625-0230

BID SOLICITATION # AND TITLE:	
VENDOR NAME:	
a contract must certify that neither the person nor entity, nor any of its paren 25 List as a person or entity engaged in investment acti https://www.state.nj.us/treasury/purchase/pdf/Chapter25List.pdf . Vendors Division of Purchase and Property finds a person or entity to be in violation	e) any person or entity that submits a bid or proposal or otherwise proposes to enter into or renew onts, subsidiaries, or affiliates, is identified on the New Jersey Department of the Treasury's Chapter tivities in Iran. The Chapter 25 list is found on the Division's website at s/Bidders must review this list prior to completing the below certification. If the Director of the port of the law, s/he shall take action as may be appropriate and provided by law, rule or contract, vering damages, declaring the party in default and seeking debarment or suspension of the party.
CHECH	K THE APPROPRIATE BOX
	nd P.L. 2021, c.4), that neither the Vendor/Bidder listed above nor any of its parents, subsidiaries, y's Chapter 25 List of entities determined to be engaged in prohibited activities in Iran.
OR	
the Treasury's Chapter 25 List. I will provide a detailed, accurate	r one or more of its parents, subsidiaries, or affiliates is listed on the New Jersey Department of e and precise description of the activities of the Vendor/Bidder, or one of its parents, t activities in Iran by completing the information requested below.
Entity Engaged in Investment Activities Relationship to Vendor/ Bidder Description of Activities	
Duration of Engagement Anticipated Cessation Date	
*Attach Additional Sheets If Necessary.	
knowledge are true and complete. I acknowledge that the State of New Jerse from the date of this certification through the completion of any contract(s) wit aware that it is a criminal offense to make a false statement or misrepresent.	CERTIFICATION In behalf of the Vendor, that the foregoing information and any attachments hereto, to the best of my ey is relying on the information contained herein, and that the Vendor is under a continuing obligation that the State to notify the State in writing of any changes to the information contained herein; that I am tation in this certification. If I do so, I may be subject to criminal prosecution under the law, and it will state to declare any contract(s) resulting from this certification void and unenforceable.
Signature	Date



CERTIFICATION OF NON-INVOLVEMENT IN PROHIBITED ACTIVITIES IN RUSSIA OR BELARUS

Pursuant to N.J.S.A. 52:32-60.1, et seq. (<u>L. 2022, c. 3</u>) any person or entity (hereinafter "Vendori") that seeks to enter into or renew a contract with a State agency for the provision of goods or services, or the purchase of bonds or other obligations, must complete the certification below indicating whether or not the Vendor is identified on the Office of Foreign Assets Control (OFAC) Specially Designated Nationals and Blocked Persons list, available here: https://sanctionssearch.ofac.treas.gov/. If the Department of the Treasury finds that a Vendor has made a certification in violation of the law, it shall take any action as may be appropriate and provided by law, rule or contract, including but not limited to, imposing sanctions, seeking compliance, recovering damages, declaring the party in default and seeking debarment or suspension of the party.

I, the undersigned, certify that I have read the definition of "Vendor" below, and have reviewed the Office of Foreign Assets Control (OFAC) Specially Designated Nationals and Blocked Persons list, and having done so certify:

(Check the Appropriate Box)

A.	That the Vendor is not identified on the OFAC Specially Designated Nationals and Blocked Persons list or account of activity related to Russia and/or Belarus.
	OR
В.	That I am unable to certify as to "A" above, because the Vendor is identified on the OFAC Specially Designated Nationals and Blocked Persons list on account of activity related to Russia and/or Belarus.
	OR
C.	That I am unable to certify as to "A" above, because the Vendor is identified on the OFAC Specially Designated Nationals and Blocked Persons list. However, the Vendor is engaged in activity related to Russia and/or Belarus consistent with federal law, regulation, license or exemption. A detailed description of how the Vendor's activity related to Russia and/or Belarus is consistent with federal law is set forth below.

Signature of Vendor's Authorized Representative	Date	
Print Name and Title of Vendor's Authorized Representative	Vendor's FEIN	
Vendor's Name	Vendor's Phone Number	
Vendor's Address (Street Address)	Vendor's Fax Number	
Vendor's Address (City/State/Zip Code)	Vendor's Email Address	

(Attach Additional Sheets If Necessary.)

¹ Vendor means: (1) A natural person, corporation, company, limited partnership, limited liability partnership, limited liability company, business association, sole proprietorship, joint venture, partnership, society, trust, or any other nongovernmental entity, organization, or group; (2) Any governmental entity or instrumentality of a government, including a multilateral development institution, as defined in Section 1701(c)(3) of the International Financial Institutions Act, 22 U.S.C. 262r(c)(3); or (3) Any parent, successor, subunit, direct or indirect subsidiary, or any entity under common ownership or control with, any entity described in paragraph (1) or (2).