APPENDIX D - Permit to Operate

VENTURA COUNTY
AIR POLLUTION CONTROL DISTRICT

669 County Square Drive, 2nd Floor
Ventura, CA 93003
805/645-1400

PART 70 PERMIT

Number 00157

Permit Term: October 1, 2020 to March 31, 2024

Company Name / Address:
New-Indy Oxnard, LLC
P. O. Box 519
Port Hueneme, CA 93044

Facility Name / Address:
New-Indy Oxnard, LLC
5936 Perkins Road
Oxnard, CA 93033

Responsible Official:
Mr. Rudy Rehbein
Mill Manager
805/986-3881

Title V Contact:
Ms. Robyn Lebrilla
New-Indy Oxnard, LLC
805/271-7284

The Part 70 permit consists of this page and the tables, attachments and conditions listed in the attached table of contents. The Part 70 permit application is included for reference only and is not a part of the Part 70 permit.

Pursuant to Rule 33.1, the Part 70 permit shall also serve as a permit to operate issued to fulfill the requirements of Rule 10.B.

Ali Ghasemi

Ali R. Ghasemi, Manager
Engineering Division

For:

Dr. Laki Tisopulos
Air Pollution Control Officer

October 1, 2020

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PART 70 PERMIT NO. 00157
TABLE OF CONTENTS

1.a. PERMIT REVISIONS TABLE

Application No.	Issue Date	Description	Revised Permit Sections
00157-ADM1	05/03/00	Administrative Amendment to revise permitted emissions to reflect the use of standard calculation methods	•Signature Cover Page •Table of Contents •Permit Revisions Table •Table No. 4 (Permitted Emissions) •Attachment 74.15N3-0157
00157-171	06/29/00	Administrative Amendment to change the Title V Contact	•Signature Cover Page •Permit Revisions Table
00157-181	10/16/01	Replaced burner elements of 51 MMBTU/Hr Coen Duct Burner / Minor Part 70 Permit Modification	•Signature Cover Page •Table of Contents •Permit Revisions Table •Stationary Source Description •Table No. 2 •Table No. 3 •Table No. 4 •Attachment STRMLN157-NO_x,CO,NH_3 •Attachment PO0157PC2 •Shield-D,Da,Db,Dc (Replaces Shield-Db) •REMOVE Shield-Db •Shield-40CFR72-78
00157-191	06/10/02	Administrative Amendment to change company name from Willamette to Weyerhaeuser	•Cover Page •Signature Cover Page •Table of Contents •Permit Revisions Table •Attachment STRMLN157-NO_x,CO,NH_3 •Attachment STRMLN157-SOx •Attachment PO0157PC1 Attachment PO0157PC2
00157-201	06/09/04	Permit Reissuance for Period April 1, 2004 to March 31, 2009	See "Stationary Source Description"
00157-ADM2	02/15/05	Administrative Amendment to correct lb/hr permitted emissions for Nebraska Boiler	•Signature Cover Page •Permit Revisions Table •Table No. 4 (Permitted Emissions) •Attachment 74.15N3-0157
00157-211	03/30/06	Administrative Amendment to change the Responsible Official	•Signature Cover Page •Table of Contents •Permit Revisions Table •*Remove Attachment 52* •*Replace Attachment 57.B with* Attachment 57.1 •*Remove Attachment 68* •*Remove Attachment 74.6(2002)* •*Update* Attachment 74.6(2003)

Application No.	Issue Date	Description	Revised Permit Sections
00157-221	08/04/08	Administrative Amendment to change the ownership from Weyerhaeuser Company to International Paper and to change the Responsible Official	•Signature Cover Page •Permit Revisions Table
00157-231	06/17/09	Permit Reissuance for period terminating March 31, 2014	See "Permit Summary and Statement of Basis"
00157-241	09/28/09	Modify Permit Condition – Turbine Cold Starts / Minor Part 70 Permit Modification	•Signature Cover Page •Permit Revisions Table •Attachment STRMLN157-NOx,CO,NH_3
00157-251	01/26/11	Modify Permit Condition – CEM monitoring Conditions for Nebraska boiler. Minor Part 70 Permit Modification	•Signature Cover Page •Permit Revision Table •Condition 4 of Attachment PO00157PC2, Section 7
00157-261	07/26/12	Administrative Amendment to change the Ownership from International Paper to New – Indy Oxnard, LLC, Facility Name Change, and Title V Contact Person's Telephone number changed	• Signature Cover Page • Permit Revisions Table
00157-271	06/18/14	Permit Reissuance for period ending March 31, 2019	See "Permit Summary and Statement of Basis"
00157-281	03/07/17	Modified Nebraska Boiler to Comply With Rule 74.15.B.1	•Signature Cover Page •Table of Contents •Permit Revisions Table •Statement of Basis •Periodic Monitoring Summary •Table No. 2 •Table No. 3 •Table No. 4 •Attachment 74.15N1-00157 *replaces Attachment 74.15N3-0157* •Attachment PO0157PC2 •Attachment SHIELD-63JJJJJJ
00157-282 00157-291	05/21/18	App -282: Modify Boiler FGR Condition App -291: De-Rate Maxon Duct Burner to not be subject to Rule 74.34	•Signature Cover Page •Permit Revisions Table •Statement of Basis •Periodic Monitoring Summary •Table No. 2 •Table No. 3 •Table No. 4 •Attachment 40CFR63ZZZZN9 •Attachment PO0157PC2 •Attachment Shield-D,Da,Db,Dc
00157-301	10/01/20	Permit Reissuance for period ending March 31, 2024	See "Permit Summary and Statement of Basis"

1.b. PERMIT SUMMARY AND STATEMENT OF BASIS

Stationary Source Description

This stationary source is a manufacturing facility that produces corrugating medium, a paper component used in the manufacture of corrugated containers, such as cardboard boxes. This source has a Standard Industrial Classification (SIC) Code of 2631, Paperboard Mills. Major equipment at the source includes a natural gas-fired cogeneration turbine that provides the paper process with electricity, steam, and hot air; and a natural-gas fired boiler that is used in place of the turbine during planned turbine maintenance or when a breakdown occurs at the turbine. This stationary source is subject to the Part 70 permit program based upon the potential to emit nitrogen oxides (NO_x) and carbon monoxide (CO).

This stationary source uses recycled old corrugated containers (cardboard boxes) as a raw material and the corrugating medium is formed and dried in a paper machine. Both steam and hot air are used for drying. After drying, the corrugated medium is wound into rolls for shipment as a final product. The corrugating medium is the wavy, ripple-like shape of the medium in the middle that gives a cardboard box its strength. The facility does not produce the outer or inner layers of a cardboard box known as the linerboard. Currently the recycled cardboard boxes are brought to the facility by truck and most, if not all, of the finished rolls of corrugating medium leave the facility by train.

As discussed in more detail throughout this Permit Summary and Statement of Basis, this permit applies to emissions units that are required to have a permit to operate pursuant to District Rule 10, "Permits Required", and District Rule 23, "Exemptions from Permit". These emissions units are listed in Table No. 2 in Section No. 2 of this permit. However, as discussed below, some equipment that is exempt from permit pursuant to District Rule 23, "Exemptions from Permit", may be subject to District rules such as District Rules 50, "Opacity" and 55, "Fugitive Dust". This includes "Insignificant Activities" as listed in Section No. 5 of the permit. In addition, "Short Term Activities" as listed in Section No. 9 of the permit are subject to certain rules and regulations. This permit does not regulate or restrict the use of motor vehicles and mobile equipment such as cars, trucks, bulldozers, and forklifts, however, any smoke or dust emissions generated from the use of such equipment is subject to District Rules 50, "Opacity" and 55, "Fugitive Dust". This permit does not shield the permittee from complying with any Federal, State, or District rule or regulation that is not specifically addressed in the permit or any rule or regulation that may come into effect during the term of the permit.

Stationary Source Emissions

In Ventura County, the Part 70 permit thresholds are 50 tons per year for ROC and NOx and 100 tons per year for PM, SOx, and CO, pursuant to Rule 33.B.2 and Ventura County's "Serious" nonattainment classification with the federal ozone standard. Ventura County's nonattainment classification with the federal ozone standard has been in transition and is currently set at "Serious". This stationary source is subject to the Part 70 permit program based upon the potential to emit oxides of nitrogen (NOx) and carbon monoxide (CO) in excess of these thresholds as shown in Table No. 4 in Section No. 4 of this Permit to Operate. The purpose of

Table No. 4 is to document the permitted emissions of the criteria pollutants ROC, NOx, PM, SOx, and CO for this stationary source. Permitted Emissions of ammonia are also included in Table 4 for the turbine's selective catalytic reduction (SCR) NOx control system. Permitted emissions of halogenated Rule 2 exempt solvents are also included in the table. District Rule 29, "Conditions on Permits", requires permitted emissions to be included on each Permit to Operate. District Rule 29 requires that annual permitted emissions be based on a 12 calendar month rolling period and be expressed in units of tons per year. Hourly permitted emissions are required to be expressed in units of pounds per hour. Permitted emissions for a stationary source are required to be determined by aggregating the permitted emissions for each emissions unit at the stationary source.

Criteria pollutant emissions (ROC, NOx, PM, SOx, and CO) result from the combustion of natural gas in the turbine, duct burners, and boiler. ROC and halogenated solvents result from the periodic turbine gas path cleaning.

This stationary source is not a major source of federal Hazardous Air Pollutants (HAPs). The source is well below the HAP major source levels of 10 tons per year of a single HAP or 25 tons per year of combined HAPs. The Part 70 Permit re-issuance application includes a summary (in the units of pounds per year and pounds per hour) of pollutants that are subject to the State of California AB2588 Air Toxics "Hot Spot" Program. The goal of the Air Toxics "Hot Spots" Information and Assessment Act of 1987 (California Health and Safety Code Section 44300) is to collect air toxics emission data, to identify facilities having localized adverse health impacts, to ascertain health risks, to notify nearby workers and residents of significant risks, and to reduce significant risks if they exist. Under state law, motor vehicles (on-road and off-road) are not subject to the "Hot Spots" program. This facility has been subject to the "Hot Spots" program since the program's inception. Based on the quantity of toxic air contaminants released from the facility as determined by source testing, material balance calculations, and other engineering estimates, the potency and toxicity of materials released, and the proximity to sensitive receptors, this facility has been classified as "exempt". A health risk assessment report submitted on May 27, 2003 based on a 2002 emissions inventory demonstrated the facility's "exempt" status. As an exempt facility, the stationary source is not required to submit subsequent toxics reports unless significant changes are made.

The United States EPA has added greenhouse gases (GHGs) to the list of regulated air pollutants. As of January 2, 2011, EPA has required that GHGs be calculated for each Title V stationary source and included in the Part 70 Permit. However, in a Federal Register notice dated August 19, 2015, EPA ruled that GHG emissions alone cannot be used to determine Title V applicability. This ruling was based on the U.S. Supreme Court decision of June 23, 2015. Greenhouse gases are defined as the aggregate group of six greenhouse gases: carbon dioxide, nitrous oxide, methane, hydrofluorocarbons (by category), perfluorocarbons (by category), and sulfur hexafluoride. Carbon dioxide equivalent emissions (CO_{2e}) is the amount of greenhouse gases emitted relative to the global warming potential of each pollutant.

The CO_2 potential to emit for this stationary source has been calculated to be 229,150 tons per year. This potential to emit is based on the permitted annual combustion limits listed in Table No. 3 of the permit. The District has used an emission factor of 53.02 kg CO_2/MMBTU natural

gas (116.78 lb CO_2/MMBTU natural gas) from the *Regulation For The Mandatory Reporting of Greenhouse Gas Emissions*, California Code of Regulations, title 17, Subchapter 10, Article 2, sections 95100 to 95133; Appendix A, Table 4. This CO_2 potential to emit does not include insignificant activities or equipment exempt from permit pursuant to Rule 23, "Exemptions From Permit". Note that the emissions of greenhouse gases are not subject to Rule 42, "Permit Fees".

Starting in 2012, major GHG-emitting sources, such as electricity generation, and large stationary sources that emit more than 25,000 metric tons of carbon dioxide equivalent ($MTCO_2e$) per year were required to comply with the California Air Resources Board GHG Cap-and-Trade Program. This program is regulated and implemented by the California Air Resources Board (CARB), and not the District. A list of these GHG Cap-and-Trade sources can be found on CARB's website.

Compliance History

Upon reissuance of this Part 70 permit, the facility was determined to be in compliance with all applicable requirements. For the time period from January 1, 1996 to July 17, 2019, the facility received thirteen (13) Notices of Violation (NOV) from the VCAPCD Compliance Division as detailed in the "NOV by Facility" history for Facility No. 00157 located at the end of this section of the Part 70 permit.

Equipment Description and Applicable Requirements - General

Applicable requirements for this stationary source are listed throughout the permit. The Table of Contents in the front of the permit summarizes the applicable requirements including the equipment specific requirements, the general applicable requirements, and the applicable requirements for short-term activities. Table No. 2 in Section No. 2 of this Permit to Operate details the applicable requirements for specific emissions units at the facility. Permit conditions that enforce these requirements are listed in Section No. 6, "Specific Applicable Requirements" and Section No. 7, "Permit Specific Conditions" of this permit.

In addition to the emission unit specific requirements in Section No. 6 and Section No. 7, there are additional general requirements that may apply to the emissions units listed in this table, or to the stationary source as a whole. Furthermore, some general requirements may apply to emissions units or short-term activities not required to be specifically listed on the permit. These general requirements are contained in the following sections of the Permit: Section No. 8, "General Applicable Requirements"; Section No. 9, "General Requirements for Short-Term Activities"; Section No. 10, "General Permit Conditions"; and Section No. 11, "Miscellaneous Federal Program Conditions". A detailed applicability discussion and additional legal basis for the permit condition(s) is included with each attachment or set of permit conditions.

Equipment Description and Applicable Requirements - Specific

The source operates one cogeneration unit. This unit consists of a General Electric LM-2500-PK natural gas-fired turbine that drives a 29.0 MW electrical generator and a 51 MMBTU/Hr Coen duct burner. The turbine has a NO_x emissions limit based on Rule 26, "New Source Review". In

addition, the turbine is subject to Rule 74.23, "Stationary Gas Turbines", and 40 CFR Part 60 Subpart GG, "Standards of Performance for Stationary Gas Turbines". In order to comply with these requirements, the turbine is controlled by selective catalytic reduction (SCR) with ammonia injection and steam injection. In addition, the facility operates a continuous emissions monitoring system (CEMS) at the turbine that continuously monitors control system operating parameters, as well as emissions of NO_x and CO from the gas turbine.

The stationary source also operates a 108.0 MMBTU/Hr Nebraska Steam Boiler. This boiler is required to comply with the NO_x and CO emission concentration limits of Rule 74.15, "Boilers, Steam Generators, and Process Heaters." The boiler is equipped with a low NOx burner and flue gas recirculation. The 108.0 MMBTU/hr Nebraska boiler is not subject to 40 CFR Part 63, Subpart JJJJJJ, "National Emission Standards for Hazardous Air Pollutants for Industrial, Commercial, and Institutional Boilers Area Sources", because the unit is natural gas fired. The permit also includes a permit shield for the boiler and duct burners from 40 CFR Part 60, Subparts D, Da, Db, and Dc.

The turbine based cogeneration unit is not subject to 40 CFR, Part 60, Subpart KKKK, "Standards of Performance for Stationary Combustion Turbines", because construction of the turbine commenced prior to February 18, 2005 and no modification or reconstruction has taken place since that date. The turbine has been permitted with the District since May 24, 1989. No changes have been made to the turbine since it has been permitted with the Title V permit program (April 1, 1999). The permit includes a permit shield for 40 CFR Part 60, Subpart KKKK.

The turbine based cogeneration unit is not subject to 40 CFR, Part 63, Subpart YYYY, "National Emission Standards for Hazardous Air Pollutants for Stationary Combustion Turbines" (Turbine MACT) because the stationary source is not a major source of HAPs (Hazardous Air Pollutants). Also, the turbine is classified in the MACT as an "existing stationary combustion turbine"; and therefore, would not be required to meet the requirements of Subpart YYYY or Subpart A, including the initial notification requirements, even if the facility was a major source of HAPs.

The turbine based cogeneration unit is not subject to 40 CFR, Part 64, "Compliance Assurance Monitoring" (CAM). The turbine based cogeneration unit is not subject to CAM because it is already equipped with continuous emission monitors to comply with the NOx emission limits of Rule 26 and Rule 74.23. The 4.9 MMBTU/Hr Maxon Duct Burner is not subject to CAM because it is not subject to an emission limit and is not equipped with an emission control device. The Nebraska Boiler is not subject to CAM because it is because it is already equipped with continuous emission monitors to comply with the NOx emission limits of Rule 26 and Rule 74.15.

The stationary source includes an 88 BHP natural gas fired engine for powering an emergency generator. Spark ignited (natural gas fired) emergency engines are exempt from permitting pursuant to Rule 23.D.7.b. However, the engine is subject to maintenance and recordkeeping requirements of 40 CFR Part 63, Subpart ZZZZ, "National Emission Standards for Hazardous Air Pollutants for Stationary Reciprocating Internal Combustion Engines" (RICE MACT). The emergency engine is exempt from emissions limits of Rule 74.9, "Stationary Internal

Combustion Engines"; but is subject to hour meter and recordkeeping requirements of Rule 74.9. The engine is not subject to 40 CFR Part 60, Subpart JJJJ, "Standards of Performance for Stationary Spark Ignition Internal Combustion Engines", because the engine was in operation prior to June 12, 2006.

The use of solvents for turbine gas path cleaning are exempt from Subsections B.1 (solvent requirements) and B.2 (cleaning devices and methods requirements) of Rule 74.6, "Surface Cleaning and Degreasing", provided that the ROC content of the solvent is less than 200 grams per liter (1.67 pounds per gallon). The permit limits the gas path cleaning solvent to an ROC content of less than 200 grams per liter.

The stationary source is not subject to the requirements of 40 CFR Part 68, "List of Regulated Substances and Thresholds for Accidental Release Prevention". The stationary source does utilize a regulated substance, anhydrous ammonia (NH_3); however, the stored amount is less than the 10,000 pound threshold per 40 CFR Part 68.130.

The turbine at this stationary source is not by definition an "affected unit" under 40 CFR Part 72 Subpart A, and therefore is not subject to the acid rain program requirements of 40 CFR Parts 72 through 78. In addition, this facility has a permit shield from the individual applicable requirements that have been incorporated into a turbine streamline table. Demonstrating compliance with the streamlined requirements assures compliance with the subsumed individual turbine requirements.

Permit Revisions Summary

The Permit Revisions Table (located in Section No. 1 of the permit) is a list of all permit revisions since Part 70 Permit No. 00157 was initially issued on April 1, 1999. A portion of the permit revisions are described in further detail below. The District's Engineering Analysis for each application can also be consulted for further details.

Application No. 00157-201: Application No. 00157-201 is for the reissuance of Part 70 Permit No. 00157 for the period April 1, 2004 to March 31, 2009. The following items summarize the changes from the initial Part 70 Permit No. 00157 (April 1, 1999 to March 31, 2004):

- The permitted emissions as presented in Table No. 4 have been revised to reflect updated EPA AP-42 emission factors for natural gas combustion for boilers. Some of the permitted emissions have been revised for the Coen duct burner, the Maxon duct burner, and the Nebraska boiler.
- The reissuance application requested to revise Condition No. 2 of Attachment STRMLN157-NO_x,CO,NH_3 to increase the number of allowed cold startups at the turbine from two (2) to four (4) during any twelve month period. This request was granted. Rule 74.23 has no limits on the annual number of cold startups and this revision will not increase the permitted emissions of NOx and CO above the current annual limits. These annual limits, as measured in tons per rolling 12 month period, are directly enforceable as measured by the NOx and CO continuous emissions monitoring systems.

The permit already requires, and will continue to require, that emissions from start-ups, shut downs, and upsets be counted towards compliance with the emission limits.

- A permit attachment detailing the applicable requirements of Rule 74.11.1, "Large Water Heaters and Small Boilers", has been added to the permit.
- The Part 68 Permit Attachment has been updated to reflect that the facility stores less than the threshold quantity of ammonia and is not subject to Part 68 requirements.
- The 51 gallon unheated parts cleaner and the 17 gallon remote reservoir unheated parts cleaner have been replaced by 30 gallon unheated cold cleaners that use Clean Air Solvents certified by the South Coast AQMD. The solvent has a ROC content of zero. These units are exempt from permit pursuant to Rule 23.F.10.a and are exempt from Rule 74.6.1 (effective until July 1, 2004) and Rule 74.6 (effective after July 1, 2004).
- The following District rules have been revised and/or revisions of the rule have been adopted into the State Implementation Plan (SIP) since the initial issuance of Part 70 Permit No. 00157:
  a) Rule 54, "Sulfur Compounds"
  b) Rule 57, "Combustion Contaminants – Specific"
  c) Rule 64, "Sulfur Content of Fuels"
  d) Rule 68, "Carbon Monoxide"
  e) Rule 74.1, "Abrasive Blasting"
  f) Rule 74.2, "Architectural Coatings"
  g) Rule 74.6, "Surface Cleaning and Degreasing"
  h) Rule 74.6.1 "Cold Cleaners"
  i) Rule 74.23, "Stationary Gas Turbines"
  j) Rule 103, "Continuous Monitoring Systems"

Application No. 00157-231: Application No. 00157-231 is for the reissuance of Part 70 Permit No. 00157 for the period terminating on March 31, 2014. The following items summarize the changes due to this reissuance application:

- Attachment PO00157PC1, Condition No. 2 has been revised to reflect Rule 23 changes regarding solvent use.
- Revisions have been made to the Insignificant Activities Table
- The Wipe Cleaning Operations emissions unit has been clarified to be Stationary Gas Turbine Gas Path Cleaning, which has an ROC content limit of 200 grams per liter pursuant to Rule 74.6.E.3. The ROC permitted emissions have been reduced accordingly.
- Attachment PO00157PC2, Condition Nos. 5.d and 5.e have been revised to clarify the emissions recordkeeping for the Nebraska Boiler.
- Attachment STRMLN157-NO_x,CO,NH_3, Condition No. 6 has been revised to clarify the continuous monitoring performance specification for Carbon Monoxide.
- Part 70 Permit Shields for 40 CFR Part 60, Subpart KKKK; 40 CFR Part 63, Subpart YYYY; 40 CFR Part 60, Subpart JJJJ; and 40 CFR Part 63, Subpart ZZZZ have been added to the permit.

- An attachment for Rule 55, "Fugitive Dust" has been added to the permit.
- The following District rules have been adopted, revised and/or revisions of the rule have been adopted into the State Implementation Plan (SIP) since the April 1, 2004 to March 31, 2009 reissuance:
  a) Rule 23, "Exemptions From Permit"
  b) Rule 50, "Opacity"
  c) Rule 57.1, "Particulate Matter Emissions From Fuel Burning Equipment"
  d) Rule 74.6, "Surface Cleaning and Degreasing"

Application No. 00157-271: Application No. 00157-271 is for the reissuance of Part 70 Permit No. 00157 for the period terminating on March 31, 2019. The following items summarize the changes due to this reissuance application:

- Changes have been made to Table No. 2, "Permitted Equipment and Applicable Requirements Table", and Attachments 74.9N7 and 40CFR63ZZZZN9 have been added to the permit to show the applicable requirements for the existing emergency natural gas fired engine.
- Revisions have been made to the Insignificant Activities Table
- A Part 70 Permit Shield for 40 CFR Part 63, Subpart JJJJJJ, has been added to the permit.
- The following District rules have been adopted, revised and/or revisions of the rule have been adopted into the State Implementation Plan (SIP) since the last permit reissuance:
  a) Rule 54, "Sulfur Compounds"
  b) Rule 74.2, "Architectural Coatings"
  c) Rule 74.11.1, "Large Water Heaters and Small Boilers"

Application No. 00157-281: Application No. 00157-281 is for the permitting of modifications to the 108 MMBTU/hr Nebraska Boiler pursuant to Authority to Construct No. 00157-280. The Flue Gas Recirculation system was modified in order for the boiler to meet the 40 ppmvd NOx emission limit of Rule 74.15. Also the boiler will no longer operate with fuel oil as a standby fuel.

Application No. 00157-291: Application No. 00157-291 is for the permitting of Maxon Duct Burner with a de-rating of the maximum heat input from 10 to 4.9 MMBTU/hr. The unit will not be subject to Rule 74.34, "NOx Reductions From Miscellaneous Sources."

Application No. 00157-282: Application No. 00157-282 is for changes to the permit condition for the FGR monitoring for the Nebraska Boiler. Attachment PCPO00157PC2, Condition No. 3.

Application No. 00157-301: Application No. 00157-301 is for the reissuance of Part 70 Permit No. 00157 for the five-year term ending March 31, 2024. The following items summarize the most significant changes from the most recent Part 70 Permit modification above (June 18, 2014 to March 31, 2019):

- Attachment Rule 64.B.2 has been added to the permit for the diesel engines that are exempt from permit (less than 50 BHP – Rule 23.D.6) listed in Section No. 5 Exempt Equipment List
- The following District / federal rules attachments have been revised to clarify the applicability and / or monitoring requirements; and/or revisions of the District rule have been adopted into the State Implementation Plan (SIP) since the most recent modification of Part 70 Permit No. 00157:

  a) Rule 50, "Opacity" (Attachment 50)
  b) Rule 54, "Sulfur Compounds" (Attachments 54.B.1 and 54.B.2)
  c) Rule 74.1, "Abrasive Blasting" (Attachment 74.1)
  d) Rule 74.2, "Architectural Coatings" (Attachment 74.2)
  e) Rule 74.6, "Surface Cleaning and Degreasing" (Attachment 74.6)
  f) 40 CFR Part 82, "Protection of Stratospheric Ozone" (Attachment 40CFR82)

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NOV by Facility

Since January 1, 1996

Facility selected
00157

Facility No 00157 New-Indy Oxnard, LLC

NOV Date	NOV No	Rule Number	Comment	Settlement	Date Closed
07/31/1996	018257	29.C	Permit Condition Not Met - Records Viol. 29.C. Paid $1500.00	$1,500.00	08/21/1996
02/10/1997	018267	29.C	Permit Condition Not Met - NOx Emissions Viol. 29.C. Paid $750.00	$750.00	03/10/1997
03/04/1997	018268	103.C	Stack Monitoring - Improper Probe Installation Viol. 103.C.2. Paid $250.00	$250.00	04/11/1997
12/10/1997	018294	29.C	Permit Condition Not Met - Gas Turbine Viol. 29.C	$1,000.00	01/09/1998
07/02/1998	018908	29.C	Permit Condition Not Met - NOx Emissions	$500.00	07/24/1998
11/25/1998	018913	103	Failure To Calibrate CEMS - Nebraska Boiler	$1,000.00	12/29/1998
08/24/1999	018948	29.C	Permit Condition Not Met - Gas Turbine NOx Emissions	$500.00	10/13/1999
12/08/1999	018984	29.C	Permit Condition Not Met - Nebraska Boiler NOx Emissions	$0.00	01/12/2000
09/07/2000	019505	32.B.1	Failure To Notify District - CEMS Breakdown	$0.00	10/02/2000
09/03/2003	020447	74.23.B.2	Failure To Record NOx Emissions - Gas Turbine	$1,000.00	11/03/2003
01/12/2004	020704	103.A.3	Failure To Adequately Operate Equipment - CEMS	$3,000.00	03/23/2004
04/10/2008	021600	29.C	Permit Condition Not Met - NOx Emissions	$1,000.00	05/05/2008
05/07/2012	022644	74.23.B.4	Exceeding Turbine Emissions - Gas Turbine	$3,000.00	05/17/2012

Total for 13 NOVs	$13,500.00

1.c. PERIODIC MONITORING SUMMARY

This periodic monitoring summary is intended to aid the permittee in quickly identifying key monitoring, recordkeeping, and reporting requirements. It is not intended to be used as a "stand alone" monitoring guidance document that completely satisfies the requirements specifically applicable to this facility. The following tables are included in the periodic monitoring summary:

- Table 1.c.1 - Specific Applicable Requirements
- Table 1.c.2 - Permit-Specific Conditions
- Table 1.c.3 - General Applicable Requirements
- Table 1.c.4 - General Requirements for Short-Term Activities

1.c.1. Specific Applicable Requirements

The Specific Applicable Requirements Table includes a summary of the monitoring requirements, recordkeeping requirements, reporting requirements, and test methods associated with the attachments contained in Section No. 6 of this permit.

Attachment No./ Condition No.	Applicable Rule or Requirement	Monitoring	Recordkeeping	Semi-annual Reports	Test Methods	Comments
74.15N1-00157	Rules 74.15.B.1, 74.15.C.4, 74.15.E	•Source test every 24 months •Annual compliance certification	•Records of source test reports	None	None	
103N5-0157	Rules 103.A.2, A.4	•Monthly records of fuel consumption •Annual compliance certification with capacity factor calculation •CEM for NOx (Refer to Attachment PO0157PC2, Condition No. 4 for monitoring requirements to meet Rule 103.A.4)	•Monthly records of fuel consumption •Annual capacity factor calculation •Refer to Attachment PO0157PC2, Condition No. 4 for recordkeeping and reporting requirements to meet Rule 103.A.4	None	None	•The Nebraska boiler is exempt from Rule 103.A.2 only. Rule 103.A.4 still applies.

1.c.1. Specific Applicable Requirements (Continued)

Attachment No./ Condition No.	Applicable Rule or Requirement	Monitoring	Recordkeeping	Semi-annual Reports	Test Methods	Comments
STRMLN157-NO_x, CO, NH_3	Rules 26, 74.23.B.1, 74.23.B.2, 74.23.B.4, 103.A.4, 40 CFR Part 60 Subpart GG	•Annual Source Test (NOx, CO, O2, NH_3, fuel HHV) •Submit test results w/in 45 days of conducting tests •CEMs for fuel consumption, NOx, CO, O2, and control system operating parameters •Report each CEM emission violation w/in 96 hours •Monthly records of fuel consumption •Elapsed time of operation •Annual compliance certification	•Records of CEMs data •Records of maintenance operations, periodic inspections, and repairs to turbine, air pollution control system, and CEMs •Records of source test reports and any violations or limit exceedances •Monthly records of fuel consumption	•Actual annual operating hours or fuel consumption •Annual source test with control system operating parameters	•NO_x-EPA Method 20 •CO - ARB Method 100 •O2 - ARB Method 100 •NH_3 - BAAQMD Method ST-1B (1/20/82) •Gaseous fuel HHV - ASTM Method D1826-88 •Fuel oil HHV - ASTM Method 240-87	•Steamlined requirements
STRMLN157-SO_x	Rules 54 and 64, 40 CFR Part 60 Subpart GG,	•Annual compliance certification •None for PUC-quality gas, propane, or butane •Annual test if gas is other than PUC-quality gas, propane, or butane (submit with annual compliance certification) •Upon request, source test for sulfur compounds at point of discharge	•Annual fuel gas analysis for non PUC-quality gas	None	•Gaseous fuel: SCAQMD Method 307-94 or ASTM D1072-90(1994) •Exhaust Sulfur Compounds - EPA Test Method 6, 6A, 6C, 8, 15, 16A,16B, or SCAQMD Method 307-91, as appropriate	•Steamlined requirements •Natural Gas Only
74.9N7	Rule 74.9 Emergency Engine Exemption	•Monitor maintenance hours with elapsed hour meter	•As required by Rule 74.9.F.1	•Annual report of engine maintenance hours	None	
40CFR63ZZZZN9	RICE MACT for existing emergency spark ignited engines	•Maintenance Records •Annual compliance certification	•Maintenance records	None	None	

1.c.2. Permit-Specific Conditions

The Permit-Specific Conditions Table includes a summary of the monitoring requirements, recordkeeping requirements, reporting requirements, and test methods associated with the attachments contained in Section No. 7 of this permit.

Attachment No./ Condition No.	Applicable Rule or Requirement	Monitoring	Recordkeeping	Semi-annual Reports	Test Methods	Comments
PO0157PC1 Condition No. 1	Rule 26 General Recordkeeping	•Annual compliance certification •Monthly records of throughput and consumption	•Monthly records	None	None	
PO0157PC1 Condition No. 2,3	Rule 74.6 Stationary Gas Turbine Gas Path Cleaning	•Annual compliance certification •Maintain current solvent information •Upon request, solvent testing	•Records of current solvent information	None	•ROC content – EPA Method 24	
PO0157PC1 Condition No. 4	Rule 29 Exempt Solvents	•Maintain a list of solvents in use and their permit exemption status data	None	None	None	
PO0157PC2 Condition No. 1	Rule 26 Annual Emissions Limits for GE Turbine, Coen Duct Burner, and Nebraska Boiler	•Rolling twelve month calculations of emissions for combined units •Annual compliance certification	•Rolling twelve month records of emissions for combined units	None	None	
PO0157PC2 Condition No. 2	Rule 26 Natural Gas Only Requirement	•Annual compliance certification	None	None	None	
PO0157PC2 Condition No. 3	Rule 29 Flue Gas Recirculation at Nebraska Boiler	•Records of FGR VFD percentage and speed (Hz) during boiler tune-up and when boiler is operated •Annual compliance certification	•Records of FGR VFD percentage and speed (Hz) during boiler tune-up and when boiler is operated	None	None	

1.c.2. Permit-Specific Conditions (Cont.)

Attachment No./ Condition No.	Applicable Rule or Requirement	Monitoring	Recordkeeping	Semi-annual Reports	Test Methods	Comments
PO0157PC2 Condition No. 4	Rule 26 NO_x Emission Limits Nebraska Boiler	•CEMs for fuel consumption, NO_x and O_2 •Report each CEM emission violation w/in 96 hours •Daily zero and span drift checks when boiler is in operation •CEM records including the date, time, and duration of any startup, shutdown, or malfunction; emission measurements, testing, calibrations, and maintenance •Annual compliance certification	•CEM records	None	None	
PO0157PC2 Condition No. 5	Rule 26 Fuel Metering Requirements Maxon Duct Burner	•Annual compliance certification •Monitor time and duration of the Maxon Burner's use, and fuel consumption	•Records of time and duration of the Maxon Burner's use, and fuel consumption	None	None	
PO0157PC2 Condition No. 6	Rule 29 Rule 74.34 Rating of Maxon Duct Burner	•Annual compliance certification •Monitor hourly flowrate and heat input at duct burner	•Records of hourly flowrate and heat input at Maxon duct burner	None	None	

1.c.3. General Applicable Requirements

The General Applicable Requirements Table includes a summary of the monitoring requirements, recordkeeping requirements, reporting requirements, and test methods associated with the attachments contained in Section No. 8 of this permit.

Attachment No./ Condition No.	Applicable Rule or Requirement	Monitoring	Recordkeeping	Semi-annual Reports	Test Methods	Comments
50	Rule 50	•Visual inspections •Annual compliance certification, including a formal survey •Opacity readings upon request •Notification required for uncorrectable visible emissions	•All occurrences of visible emissions for periods>3min in any one hour •Annual formal survey of all emissions units	None	•Opacity - EPA Method 9	
54.B.1	Rule 54.B.1	•Annual compliance certification •Follow monitoring requirements under Rule 64 •Upon request, source test for sulfur compounds at point of discharge	None	None	•Sulfur Compounds - EPA Test Method 6, 6A, 6C, 8, 15, 16A,16B, or SCAQMD Method 307-91, as appropriate	•Compliance with Rule 64 ensures compliance with this rule based on District analysis
54.B.2	Rule 54.B.2	•Annual compliance certification •Determine ground or sea level concentrations of SO_2, upon request	•Representative fuel analysis or exhaust analysis and compliance demonstration	None	•SO_2 - BAAQMD Manual of Procedures, Vol.VI, Section 1, Ground Level Monitoring for H_2S and SO_2	
55	Rule 55	•Annual compliance certification	•Specific activity records as applicable	None	•EPA Method 9	
57.1	Rule 57.1	•Annual compliance certification	None	None	None	•Not required based on District analysis
64.B.1	Rule 64.B.1	•Annual compliance certification •None for PUC-quality gas, propane, or butane •Annual test if gas is other than PUC-quality gas, propane, or butane (submit with annual compliance certification)	•Annual fuel gas analysis if gas is other than PUC-quality gas, propane, or butane	None	•SCAQMD Method 307-94 or ASTM D1072-90(1994)	

1.c.3. General Applicable Requirements (Continued)

Attachment No./ Condition No.	Applicable Rule or Requirement	Monitoring	Recordkeeping	Semi-annual Reports	Test Methods	Comments
64.B.2	Rule 64.B.2	•Annual compliance certification •ARB certified diesel fuel or fuel supplier's certification, or fuel test per each delivery (submit with annual compliance certification)	Records of ARB certified diesel or Fuel supplier's certification, or fuel test per each delivery	None	ASTM Method D4294-98 or D2622-98	
68	Rule 68	•Annual compliance certification	None	None	None	•Not required based on District EPA emission factor analysis
74.6	Rule 74.6	•Annual compliance certification •Maintain current solvent information •Upon request, solvent testing •Measurement of freeboard height and drain hole area for cold cleaners (as applicable)	•Records of current solvent information	None	•ROC content-EPA Test Method 24 •Identity of solvent components-ASTM E168-67, ASTM E169-87, or ASTM E260-85 •True vapor pressure or composite partial pressure - ASTM D2879-86 or other methods per Rule 74.6.G.5 •Initial boiling point-ASTM 1078-78 or published source •Spray gun active/passive solvent losses-SCAQMD Method (10-3-89)	
74.11.1	Rule 74.11.1	•Annual compliance certification •Maintain identification records of large water heaters and small boilers	•Records of current information of large water heaters and small boilers	None	None	•Rule only applies to the installation of large water heaters and small boilers
74.22	Rule 74.22	•Annual compliance certification •Maintain furnace identification records	•Records of current furnace information	None	None	•Rule only applies to future installation of natural gas-fired, fan-type furnaces

1.c.4. General Requirements for Short-Term Activities

The General Requirements for Short-Term Activities Table includes a summary of the monitoring requirements, recordkeeping requirements, reporting requirements, and test methods associated with the attachments contained in Section No. 9 of this permit.

Attachment No./ Condition No.	Applicable Rule or Requirement	Monitoring	Recordkeeping	Semi-annual Reports	Test Methods	Comments
74.1	Rule 74.1	•Annual compliance certification •Visual inspections of abrasive blasting operation •Abrasive blasting records	•Abrasive blasting records	None	•Visible emission evaluation-Section 92400 of CCR	
74.2	Rule 74.2	•Annual compliance certification •Maintain VOC records of coatings used	•Maintain VOC records of coatings used	None	•As required by Rule 74.2.G	
40CFR61.M	40 CFR Part 61, Subpart M	•Annual compliance certification •See 40 CFR Part 61.145 for inspection procedures	•See 40 CFR Part 61.145 for recordkeeping procedures	•See 40 CFR Part 61.145 for notification procedures	•See 40 CFR Part 61.145 for test methods	

2. PERMITTED EQUIPMENT AND APPLICABLE REQUIREMENTS TABLE

Purpose

The purpose of this table is to list the emissions units at this stationary source that are permitted to operate pursuant to Rule 10, "Permits Required" and Rule 23, "Exemptions From Permit". The table also provides a list of requirements that are specifically applicable to these emissions units. Permit conditions that enforce these requirements are listed in Section No. 6, "Specific Applicable Requirements" and Section No. 7, "Permit Specific Conditions" of this permit.

In addition to the emission unit specific requirements in Section No. 6 and Section No. 7, there are additional general requirements that may apply to the emissions units listed in this table, or to the stationary source as a whole. Furthermore, some general requirements may apply to emissions units or short-term activities not required to be specifically listed on the permit. These general requirements are contained in the following sections of the Permit: Section No. 8, "General Applicable Requirements"; Section No. 9, "General Requirements for Short-Term Activities"; Section No. 10, "General Permit Conditions"; and Section No. 11, "Miscellaneous Federal Program Conditions".

Equipment Description

This portion of the table provides a brief description of the permitted equipment at this stationary source. Attached to the table is a "Title V Equipment List Description Key" that contains definitions and explanations for some of the standard terminology used in the equipment description.

Applicable Requirements

The applicable requirements portion of the table is a matrix of applicability for the specific requirements that apply to the listed emissions units. The columns are labeled with APCD rule numbers or references to federal requirements. An "X" in the row corresponding to the emissions unit indicates the requirement is specifically applicable to that unit. For cases where a rule has multiple compliance options, a number appears instead of an "X". The number is a code key that corresponds to the "Title V Applicable Requirement Code Key" attached to the table. The code key table contains specific citations for the portions of the rule that are applicable. The code key is also used to identify the permit attachment in Section No. 6, "Specific Applicable Requirements", that contains the associated permit conditions. For example, code key "3" under Rule 74.15 indicates that the emission unit is required to comply with the requirements of Attachment 74.15N3 in Section No. 6.

Permit specific conditions are identified with a "PC" followed by a number in the column labeled "ADD REQ" (additional requirements). A "PC#" in the row corresponding to the emissions unit indicates that the permit specific condition is specifically applicable to that unit. The "PC#" also corresponds to the permit attachment in Section No. 7, "Permit Specific Conditions", that contains the permit specific requirements.

TABLE NO. 2

VENTURA COUNTY AIR POLLUTION CONTROL DISTRICT
Permit to Operate No. 00157
Permitted Equipment and Applicable Requirements

Equipment	54	64	74.6	74.15	74.23	103	40 CFR 60 GG	74.9	RICE MACT	Additional Requirements
1 - Gas Turbine-Based Cogeneration Unit consisting of: 1 - 290 MMBTU/Hr General Electric LM 2500-PK 29 MW Turbine[1]; Steam Injection for NO_x Control; Natural Gas-Fired Only 1 - 51 MMBTU/Hr Coen Duct Burner; Natural Gas-Fired Only 1 - Babcock-Hitachi Selective Catalytic Reduction Unit for NO_x Control (Note that the emissions of the turbine & duct burner are combined in a common stack and are controlled with SCR.)	X	X			4	4	X			PC1, PC2
1 - 4.9 MMBTU/Hr Maxon Duct Burner; Natural Gas-Fired Only										PC1,PC2
1 - 108.0 MMBTU/Hr Nebraska Boiler, Model NSE95SH Steam Boiler[2], Serial Number 2D-1983, with a Coen Low NO_x Burner and FGR; Natural Gas-Fired				1		5				PC1,PC2
Wipe Cleaning Operations - Stationary Gas Turbine Gas Path Cleaning			X							PC1
30 Gallon Cold Cleaners (Exempt from Permit per Rule 23.F.10.a)										
1 - 88 BHP Natural Gas Fired Engine, Emergency Generator, Winco PSS35000 (Exempt per Rule 23.D.7.b - spark-ignited, emergency use)								7	9	

[1] - Turbine exhaust is directed to a dual pressure heat recovery steam generator, through a non-contact heat exchanger, then to atmosphere. The turbine exhaust stack is equipped with a CEM that continuously monitors NO_x, CO, and O_2.

[2] - Nebraska Boiler is equipped with a CEM that continuously monitors NO_x and O_2.

Reissuance 00157-301

PART 70 PERMIT NO. 00157
TITLE V EQUIPMENT LIST DESCRIPTION KEY

The Permitted Equipment and Applicable Requirements Table and this Title V permit contain a number of terms, abbreviations, and acronyms that have been standardized. The following list describes and defines many of the terms in this permit:

APCD	Air Pollution Control District
APCO	Air Pollution Control Officer of the Ventura County APCD
ARB	The California Air Resources Board
ASTM	American Standards for Testing Materials
BACT	Best Available Control Technology
BHP	The rating of an internal combustion engine as measured in brake horsepower
CARB	California Air Resources Board
CFH	Cubic feet per hour
CFM	Cubic feet per minute
CFR	Code of Federal Regulations
CO	Carbon Monoxide
EPA	Environmental Protection Agency
FGR	Flue Gas Recirculation – NOx control technology primarily used for boilers
FO	Fuel Oil
GE	General Electric
Gal	Gallon
HAP	Hazardous Air Pollutant
HHV	Higher Heating Value of a fuel
Lo-NOx	Device (usually a burner) configured to limit NOx emissions
Lb ROC/Gal	Pound(s) of ROC per gallon
MMBTU	The heat input of a combustion device as measured in millions British Thermal Units
MW	MegaWatt

Section No. 2
Title V Equipment List Description Key (00157-301)

NESHAPS	National Emission Standards for Hazardous Air Pollutants
NH_3	Ammonia
NG	Natural Gas
NOx	Oxides of Nitrogen
NSPS	New Source Performance Standard
PM	Particulate Matter
ROC	Reactive Organic Compound
SCAQMD	South Coast Air Quality Management District
SCFM	Standard cubic feet per minute
SCR	Selective Catalytic Reduction for NOx control
SIP	State Implementation Plan
SOx	Sulfur Oxides
1,1,1-TCA	Trichloroethane
TV AF	Title V application form
VOC	Volatile Organic Compound

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PART 70 PERMIT NO. 00157
TITLE V APPLICABLE REQUIREMENT CODE KEY

Rule 74.15, "Boilers, Steam Generators and Process Heaters"

1. NOx and CO emission limits for units with an annual heat input rate greater than or equal to 9,000 MMBTU per calendar year. (74.15.B.1)
2. Tuning and fuel metering requirements for units with an annual heat input rate of less than 9,000 MMBTU per calendar year. (74.15.B.2 and 74.15.D.1)
3. Exemption from Rule 74.15.B.1 for emergency standby units when a breakdown occurs to the primary unit. (74.15.C.3)
4. Equipment is currently shut-down and not operating. Upon operation will install fuel meter (74.15.D.1). Based on annual heat input will perform tuning (74.15.B.2) or will comply with NOx and CO emission limits (74.15.B.1).

Rule 74.23, "Stationary Gas Turbines"

1. NO_x and NH_3 emission limit for turbines rated at 0.3 MW to less than 2.9 MW (74.23.B.1 and 74.23.B.4) Requirement to monitor operating parameters. (74.23.B.2.a and b)
2. NO_x and NH_3 emission limit for turbines rated at 2.9 MW to less than 10.0 MW. (74.23.B.1 and 74.23.B.4) Requirement to monitor operating parameters. (74.23.B.2.a and b)
3. NO_x and NH_3 emission limit for turbines rated at 10.0 MW and higher, with SCR, and operated less than 4,000 hr/yr (74.23.B.1 and 74.23.B.4) Requirement to monitor operating parameters. (74.23.B.2.a and b)
4. NO_x and NH_3 emission limit and CEMS requirement for turbines rated at 10.0 MW and higher, with SCR, and operated more than 4,000 hr/yr (74.23.B.1, 74.23.B.2, and 74.23.B.4)
5. NO_x emission limit for turbines rated at 10.0 MW and higher, without SCR, and operated less than 4,000 hr/yr (74.23.B.1) Requirement to monitor operating parameters. (74.23.B.2.a and b)
6. NO_x emission limit and CEMS requirement for turbines rated at 10.0 MW and higher, without SCR, and operated more than 4,000 hr/yr (74.23.B.1 and 74.23.B.2)
7. NO_x emission limit for turbines rated at 4.0 MW and higher, operated less than 877 hr/yr (74.23.B.1) Requirement to monitor operating parameters. (74.23.B.2.a and b)
8. Exemption from the requirements of 74.23.B, for turbines operated less than 200 hrs per calendar year (74.23.C.1.c)
9. Exemption from the requirements of 74.23.B, for emergency standby units operated during either an emergency or maintenance operation. (74.23.C.1.d)
10. Equipment is currently shut-down and not operating. Upon operation will install non-resettable totalizing hour meter (74.23.D.2). Exempt from the requirements of 74.23.B as long as turbine is operated less than 200 hrs per calendar year (74.23.C.1.c)
11. Pre-April 30, 2001 NO_x emission limit and CEMS requirement and post-April 30, 2001 NO_x emission limit and CEMS requirement for turbines rated at over 20 MW, equipped

with water injection only where exhaust gases are used to dry paper, and operated more than 4,000 hr/yr (74.23.B.1, 74.23.B.2, 74.23.B.5, and 74.23.I.3)

Rule 103, "Stack Monitoring"

1. CEM requirements for emission sources required by federal regulations to be equipped with a CEM system (103.A.1)
2. CEM requirements for boilers, steam generators, and process heaters with a heat input capacity of between 40 MMBTU/Hr and 250 MMBTU/Hr, and a capacity factor of at least 30% (103.A.2)
3. CEM requirements for boilers, steam generators, and process heaters with a heat input capacity of 250 MMBTU/Hr or more (103.A.3)
4. CEM requirements for any equipment which emits 2.3 kg/hr (5 lb/hr) or 22.7 kg/day (40 lb/day) or more of any single air contaminant (103.A.4)
5. Exemption from the requirements of Rule 103.A.2, for boilers, steam generators, and process heaters with a heat input capacity of between 40 MMBTU/Hr and 250 MMBTU/Hr, and a capacity factor of less than 30% (103.A.2)

Rule 74.9, "Stationary Internal Combustion Engines"

1. Pre-January 1, 2002 emissions limits for rich-burn engines (increments of progress have passed)
2. Pre-January 1, 2002 emissions limits for lean-burn engines (increments of progress have passed)
3. Natural gas-fired rich-burn engines (74.9.B.1 or 74.9.B.2)
4. Natural gas-fired lean-burn engines (74.9.B.1 or 74.9.B.2) with ammonia emission limit, if applicable. (74.9.B.5)
5. Diesel engines. (74.9.B.1 or 74.9.B.2) with ammonia emission limit, if applicable. (74.9.B.5)
6. Exemption from Rule 74.9 for engines operated less than 200 hours per calendar year (74.9.D.2)
7. Exemption from Rule 74.9 for emergency standby engines operated during either an emergency or maintenance operation. (74.9.D.3)
8. Exemption from Rule 74.9 for diesel engines with a permitted capacity factor of less than or equal to 15%. (74.9.D.8)
9. Exemption from Rule 74.9 for diesel engines used to power cranes and welding equipment. (74.9.D.9)
10. Exemption from Rule 74.9 for diesel engines operated on San Nicolas Island. (74.9.D.10)

40 CFR Part 63, Subpart ZZZZ, National Emission Standards for Hazardous Air Pollutants for Stationary Reciprocating Internal Combustion Engine (RICE MACT)

1. Existing compression ignition and spark ignition engine compliance dates
2. Existing landfill gas engines – area source
3. Existing emergency diesel engines – area source
4. Existing non-emergency diesel engines $\leq$ 300 HP – area source
5. Existing non-emergency diesel engines 300 HP $<$ X $\leq$ 500 HP – area source
6. Existing non-emergency diesel engines $<$ 500 HP – area source

Section No. 2
Title V Applicable Requirement Code Key (00157-271)

7. Existing non-emergency spark-ignited remote engine > 500 HP – area source
8. Existing non-emergency diesel engines greater than 300 HP at an area source of HAPs that qualify under the national security exemption
9. Existing emergency spark ignited engines

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3. PERMITTED THROUGHPUT AND CONSUMPTION LIMIT TABLE

Purpose

The purpose of this table is to list the emissions units at this stationary source that have limitations on throughput, fuel consumption, raw material usage, hours of operation, or other parameters that limit the potential to emit of the emissions unit. In some cases, the limit on the potential to emit is expressed directly as a set of pollutants and emission limits in tons per year.

These limitations are applied pursuant to Rule 26, "New Source Review" or Rule 29, "Conditions on Permits." Two sets of limits are listed in this table. The "Throughput Permit Limit" is the enforceable limit pursuant to this permit. Permit conditions that enforce these limits are listed in Section No. 7, "Permit Specific Conditions" of this permit.

The "Calculation Throughput" is used only to calculate permitted emissions pursuant to Rule 29, "Conditions on Permits."

Equipment Description

This portion of the table is the same as the equipment description in the "Permitted Equipment and Applicable Requirements Table."

Throughput Permit Limit

The throughput or consumption limit listed in this column of the table is an enforceable limit on the emissions unit's potential to emit. In the column labeled "District (D)/ Federal (F) Enforceable," a "D" or an "F" denotes whether the limit is only enforceable by the District or whether the limit is a federally-enforceable limit. District-enforceable limits are limits applied solely pursuant to Rule 29, "Conditions on Permits." Limits that have been applied pursuant to Rule 26, "New Source Review" are federally enforceable.

The throughput permit limit may apply to a single emissions unit or to a set of emission units. When the limit applies to set of emissions units, the set consists of the emissions unit with which the limit is listed and the emissions units which follow that have an asterisk in the throughput permit limit column.

Pursuant to Rule 26 and Rule 29, the throughput permit limit is an annual limit which is enforceable based on a period of any twelve (12) consecutive calendar months.

Note that when the calculation throughput (discussed below) corresponds to using the emissions unit full time (8760 hours per year) at maximum rated capacity, the throughput permit limit column contains the notation "No Limit." When District emission calculation procedures do not involve throughput or consumption data, both the throughput permit limit and the calculation throughput

column are left blank.

Calculation Throughput

The throughput or consumption limit listed in this column of the table is the throughput used in the District calculation procedures to calculate permitted emissions for the emissions unit. The calculation throughput may apply to a single emissions unit or to a set of emissions units denoted as discussed above. The calculation throughput is not an enforceable permit limit.

Abbreviations

The following abbreviations have been used in the "Permitted Throughput and Consumption Limit Table" for the "Throughput Permit Limit" column and for the "Calculation Throughput Limit" column:

BBL/Yr: barrels per year
Days/Yr: days per year
FO: fuel oil or diesel fuel
Gal/Yr: gallons per year
Hrs/Day: hours per day
Hrs/Yr: hours per year
Lbs/day: pounds per day
Lbs ROC/Yr: pounds of reactive organic compounds per year
MBBL/Yr: thousands of barrels per year
MGal/Yr: thousands of gallons per year
MMBTU/Yr: million British Thermal Units of heat input per year
MMCF/Yr: million standard cubic feet of natural gas per year
MMGal/Yr: million gallons per year
NG: natural gas
TPY: tons per year

TABLE NO. 3

VENTURA COUNTY AIR POLLUTION CONTROL DISTRICT
Permit to Operate No. 00157
Permitted Throughput/Consumption Limits

Equipment		Throughput Permit Limit	District (D)/ Federal(F) Enforceable	Calculation Throughput
1 - Gas Turbine-Based Cogeneration Unit consisting of:				
1 - 290 MMBTU/Hr General Electric LM 2500-PK 29 MW Turbine[1]; Steam Injection for NO_x Control: Natural Gas-Fired Only				
	ROC	3.29 TPY	F	See Attachment
	NO_x	50.00 TPY *	F	PO0157PC2
	PM	10.57 TPY	F	Condition No. 1
	SO_x	0.85 TPY	F	
	CO	97.66 TPY *	F	
1 - 51 MMBTU/Hr Coen Duct Burner; Natural Gas-Fired Only		**	F	**
1 - Babcock-Hitachi Selective Catalytic Reduction Unit for NO_x Control (Note that the emissions of the turbine & duct burner are combined in a common stack and are controlled with SCR.)				
1 - 4.9 MMBTU/Hr Maxon Duct Burner; Natural Gas-Fired Only		36.5 MMCF/Yr NG	F	36.5 MMCF/Yr NG
1 - 108.0 MMBTU/Hr Nebraska Boiler, Model NSE95SH Steam Boiler[2], Serial Number 2D-1983, with a Coen Low NO_x Burner and FGR; Natural Gas-Fired		**	F	**
Wipe Cleaning Operations - Stationary Gas Turbine Gas Path Cleaning		262 Gal / Yr solvent	F	***
30 Gallon Cold Cleaners (Exempt from Permit per Rule 23.F.10.a)				
1 - 88 BHP Natural Gas Fired Engine, Emergency Generator, Winco PSS35000, (Exempt per Rule 23.D.7.b - spark-ignited, emergency use)				

[1] - Turbine exhaust is directed to a dual pressure heat recovery steam generator, through a non-contact heat exchanger, then to atmosphere. The turbine exhaust stack is equipped with a CEM that continuously monitors NO_x, CO, and O_2.

[2] - Nebraska Boiler is equipped with a CEM that continuously monitors NO_x and O_2.

* - As measured by the CEMs in the common stack of the turbine & Coen duct burner, downstream of the SCR unit
** - Included in Tons Per Year Limit Above for Cogen Unit
*** - Permitted Emissions calculations based on 262 gallons per year solvent with an ROC content of 200 grams per liter (1.67 pounds per gallon) per Rule 74.6.E.3 and an average Rule 2 exempt halogenated solvent content of 5.34 pounds per gallon

Reissuance 00157-301

4. PERMITTED EMISSIONS TABLE

Purpose

The purpose of this table is to document the permitted emissions for this stationary source. Rule 29, "Conditions on Permits," requires permitted emissions to be included on each Permit to Operate. Rule 29 is not federally enforceable.

The permitted emissions table also characterizes the amount and type of criteria air pollutants emitted by this stationary source.

Rule 29 requires that annual permitted emissions be based on a 12 calendar month rolling period and be expressed in units of tons per year. Hourly permitted emissions are required to be expressed in units of pounds per hour. Permitted emissions for a stationary source are required to be determined by aggregating the permitted emissions for each emissions unit at the stationary source.

In general, permitted emissions are calculated based on throughput or consumption data for an emission unit, specific physical characteristics of the emission unit, and emission factors. The emission factors may be standard published emission factors, or they may be derived from source test data or specific emission limits that apply to the emissions unit. In some cases, permitted emissions are expressed directly as a set of pollutants and emission limits in tons per year without reference to any calculation method.

Section No. 3, "Permitted Throughput and Consumption Limit Table," contains information on the throughput and consumption limits that are enforceable at this stationary source. In addition, other sections of this permit contain conditions that act to enforce specific portions of the permitted emissions table.

Equipment Description

This portion of the table is the same as the equipment description in the "Permitted Equipment and Applicable Requirements Table."

Tons Per Year

This column of the table represents the permitted emissions in units of tons per year for ROC (reactive organic compounds), NOx (nitrogen oxides), PM (particulate matter), SOx (sulfur oxides), and CO (carbon monoxide). In some cases, emissions of non-criteria pollutants of interest may also be listed. Pursuant to Rule 29, annual permitted emissions shall be the annual emissions used to determine compliance for issuance of any new or revised permit issued after October 22, 1991. For emissions units for which no new or revised permit has been issued since

October 22, 1991, annual permitted emissions generally reflect actual historical emissions from the emissions unit.

The permitted emissions limit may apply to a single emissions unit or to a set of emission units. When the limit applies to set of emissions units, the set consists of the emissions unit with which the limit is listed and the emissions units which follow that have an asterisk in the pollutant columns.

Pounds Per Hour

This column of the table represents the permitted emissions in units of pounds per hour for ROC (reactive organic compounds), NOx (nitrogen oxides), PM (particulate matter), SOx (sulfur oxides), and CO (carbon monoxide). Pursuant to Rule 29, hourly permitted emissions shall be calculated based on the maximum quantity of each air pollutant which may be emitted from the emissions unit during a one-hour period, as limited by any applicable rules or permit conditions.

Hazardous Air Pollutants

This permit does not provide information that characterizes the emissions of hazardous air pollutants (HAPS) from this facility. This information can be obtained from the reissuance application or the facility's AB-2588, Air Toxics "Hot Spots," Report referenced at the bottom of the "Permitted Emissions Table." For Outer Continental Source (OCS) sources and other sources not subject to AB-2588, HAP emissions information is included in the permit reissuance application and is maintained by the stationary source.

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TABLE NO. 4

VENTURA COUNTY AIR POLLUTION CONTROL DISTRICT
Permit to Operate No. 00157
Permitted Emissions

Equipment	TONS PER YEAR							POUNDS PER HOUR						
	ROC	NOx	PM	SOx	CO	NH3	HS*	ROC	NOx	PM	SOx	CO	NH3	HS*
1 - Gas Turbine-Based Cogeneration Unit consisting of: 1 - 290 MMBTU/Hr General Electric LM 2500-PK 29 MW Turbine[1]; Steam Injection for NO_x Control; Natural Gas-Fired Only	3.29	50.00	10.57	0.85	97.66	40.36		0.72	85.45	2.41	0.20	59.65	9.23	
1 - 51 MMBTU/Hr Coen Duct Burner; Natural Gas-Fired Only	**	**	**	**	**	**		**	**	**	**	**	**	
1 - Babcock-Hitachi Selective Catalytic Reduction Unit for NO_x Control														
(Note that the emissions of the turbine and duct burner are combined in a common stack and are controlled with SCR.)														
1 - 4.9 MMBTU/Hr Maxon Duct Burner; Natural Gas-Fired Only	0.85	1.90	0.14	0.01	7.27			0.22	0.49	0.04	<0.01	1.87		
1 - 108.0 MMBTU/Hr Nebraska Boiler, Model NSE95SH Steam Boiler[2], Serial Number 2D-1983, with a Coen Low NO_x Burner and FGR; Natural Gas-Fired	**	**	**	**	**			0.57	5.25	0.78	0.06	31.93		
Wipe Cleaning Operations Stationary Gas Turbine Gas Path Cleaning	0.22						0.70	0.05						0.15
30 Gallon Cold Cleaners (Exempt from Permit per Rule 23.F.10.a)														
1 - 88 BHP Natural Gas Fired Engine, Emergency Generator, Winco PSS35000, (Exempt per Rule 23.D.7.b - spark-ignited, emergency use)														
[1] - Turbine exhaust is directed to a dual pressure heat recovery steam generator, through a non-contact heat exchanger, then to atmosphere. The turbine exhaust stack is equipped with a CEM that continuously monitors NO_x, CO, and O_2.														
[2] - Nebraska Boiler is equipped with a CEM that continuously monitors NO_x and O_2.														
* - Halogenated Rule 2 Exempt Solvents														
** - Included in Emissions Above for the Gas Turbine-Based Cogeneration Unit														
Reissuance 00157-301														
Total Permitted Emissions	4.36	51.90	10.71	0.86	104.93	40.36	0.70	1.56	91.19	3.23	0.26	93.45	9.23	0.15

HAP Emissions Ref.: AB 2588 Air Toxics Report AB-2588 Inventory Year: 2012

5. EXEMPT EQUIPMENT LIST

Rule 33.2.A.3 (Part 70 Permits - Application Contents) requires the applicant to provide a list of all emissions units located at the stationary source that are exempt pursuant to Rule 23 based on size or production rate. Pursuant to Rule 33.2.A.3, emissions from insignificant activities do not need to be included in the permit application.

This section of the permit contains a table entitled "Insignificant Activities (Exempt Equipment)." This table is a list of insignificant activities (exempt equipment) at the facility that are exempt from permit based on a size or production rate exemption in Rule 23, "Exemptions from Permit " Insignificant Activity is defined in Rule 33.1 (Part 70 Permits – Definitions). The permittee shall provide calculations, usage records, emission records, and/or operational data as necessary to substantiate an activity as insignificant.

This table is presented for informational purposes only. Any changes to this list are not considered to be permit modifications, nor is the list considered to be enforceable. As detailed in Rule 33.2.A.3, this list is required to be submitted with an application for permit reissuance. The general requirements listed in Section No. 8 of this permit may apply to these insignificant activities.

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Ventura County Air Pollution Control District

INSIGNIFICANT ACTIVITIES (EXEMPT EQUIPMENT)

Part 70 Permit No. 00157

INSIGNIFICANT ACTIVITIES (EXEMPT EMISSION UNITS)	BASIS FOR EXEMPTION (Size/Production Rate)	RULE 23 CITATION
1 - Abrasive Blast Unit	Total internal volume of blast section is ≤ 50 cubic feet	23.B.7
3 - Propane Space Heaters (0.15 MMBTU/Hr each)	Space heating and heat transfer equipment < 1 MMBTU/Hr	23.C.1
4 - Natural Gas Space Heaters (0.24 MMBTU/Hr each)	Space heating and heat transfer equipment < 1 MMBTU/Hr	23.C.1
2 - Steam Cleaners	Steam cleaning equipment < 1 MMBTU/Hr	23.C.2
Emergency natural gas generator at Administrative Office (Winco PSS35000 88 HP)	Emergency use, natural gas fired (spark ignited), 50 hrs/yr for testing	23.D.7
2 - Unheated Cold Cleaners (30 Gallons Capacity each)	Cold cleaners using cleaning agents certified by the SCAQMD as Clean Air Solvents	23.F.10.a
1 – Back-up Phone Generator, Propane Fired, < 50 HP Engine	< 50 BHP Rating	23.D.6
2 – Sump Pumps, Diesel Fired, < 50 BHP	< 50 BHP Rating	23.D.6
2 – Welding Units, Gasoline Fired, < 50 BHP	< 50 BHP Rating	23.D.6
1 – Jet Parts Washer, Electric, Using SCAQMD Clean Air Solvent	SCAQMD Clean Air Solvent	23.F.10.a

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6. SPECIFIC APPLICABLE REQUIREMENTS (ATTACHMENTS)

As discussed in Section No. 2, "Permitted Equipment and Applicable Requirements Table," the emissions units at this stationary source listed in the table have requirements that are specifically applicable to them. The applicable requirements are based on the District's prohibitory rules, State of California ATCM's, federal NSPS (40 CFR Part 60), federal NESHAPS (40 CFR Part 61), and federal NESHAPS/MACT (40 CFR Part 63).

In this section of the permit, the permit conditions that are associated with each specific applicable requirement are listed in an individual attachment. The attachment is identified with the label "Attachment (APCD Rule No. or CFR No.) #" in the lower left corner. Each attachment has an applicability section that describes how and why this attachment applies to the specific emissions unit. The attachment may apply to one or more of the emissions units listed in the Permitted Equipment and Applicable Requirements Table in Section No. 2.

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Ventura County Air Pollution Control District
Rule 74.15.B.1 Applicable Requirements
Nebraska Boiler
NOx and CO Emission Limits

Rule 74.15, "Boilers, Steam Generators, and Process Heaters"
Adopted 11/08/94, Federally-Enforceable

Applicability:

This attachment applies to the 108.0 MMBTU/hr Nebraska Boilers and details the Rule 74.15 requirements for the unit. This attachment is applicable to the unit because it has a maximum heat input rating of greater than or equal to 5 MMBTU/Hr and has operated with an annual heat input rate of greater than or equal to 9,000 MMBTU during any twelve (12) calendar month rolling period. This attachment also applies to the unit if the annual heat input rate is less than 9,000 MMBTU because it is equipped with low NOx burners and flue gas recirculation to comply with the NOx and CO requirements of Rule 74.15.B.1. A heat input of 9,000 MMBTU is equivalent to 90,000 therms and equivalent to 8.57 million cubic feet of natural gas at a higher heating value of 1,050 BTU/cf.

A boiler, steam generator or process heater is any external combustion equipment fired with liquid and/or gaseous fuel. A boiler or a steam generator is further defined as equipment used to produce steam or to heat water. Boiler or steam generator does not include any unfired waste heat recovery boiler that is used to recover sensible heat from the exhaust of any combustion equipment. A process heater is further defined as equipment that transfers heat from combustion gases to water or process streams. Process heater does not include any kiln or oven used for drying, baking, cooking, calcinating or vitrifying, or any fuel-fired degreasing or metal finishing equipment. Annual heat input is defined as the actual amount of heat released by fuels burned in a unit during a twelve (12) calendar month rolling period, based on the higher heating value of the fuel. The annual heat input shall be calculated as the sum of the previous 12 monthly fuel use rates multiplied by the higher heating value of the fuel.

Conditions:

1. Pursuant to Rule 74.15.B.1, emissions from the boiler shall not exceed the following limits:

   a. Oxides of Nitrogen (NOx expressed as NO_2): 40 ppmvd
   b. Carbon Monoxide (CO): 400 ppmvd

   These limits shall be referenced at three (3) percent volume stack gas oxygen on a dry basis averaged over 15 consecutive minutes. Compliance with this condition shall be verified every 24 months by source testing.

2. Pursuant to Rule 74.15.B.1, the boiler shall be source tested not less than once every 24 months (biennially) utilizing the following methods as detailed in Rule 74.15.E:

a.	NOx	ARB Method 100
b.	CO	ARB Method 100
c.	Stack Gas Oxygen	ARB Method 100

Pursuant to Rule 74.15.E.2, emission tests shall be conducted on units in "as-found" operating condition. However, no emission test for Rule 74.15 shall be conducted during start-up, shutdown or under breakdown conditions. Prior to conducting a biennial emissions test, permittee shall notify the District Compliance Division. Written notification, and a source test protocol subject to District approval, shall be received no less than 15 calendar days prior to the test. The emissions test report and results shall be submitted to the District Compliance Division within 45 days after the test.

3. Pursuant to Rule 74.15.C.4, the emission limits of Rule 74.15.B.1 shall not apply during the cold startup of an applicable unit. For units with a rated heat input capacity of equal to, or greater than, one hundred (100) million BTUs per hour, the duration of this exemption shall not exceed three (3) hours.

4. The permittee shall maintain records of the required biennial source test reports. This information shall be submitted to the District upon request.

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Ventura County Air Pollution Control District
Rule 103 Applicable Requirements
Stack Monitoring
Boilers, Steam Generators, and Process Heaters
Heat Input Capacity Between 40 MMBTU/Hr and 250 MMBTU/Hr
Capacity Factor of Less Than 30 Percent Per Year

Rule 103, "Stack Monitoring"
Adopted 02/09/99, Federally-Enforceable

Applicability:

This attachment applies to any boiler, steam generator, or process heater with a heat input capacity between 40 million BTUs per hour and 250 million BTUs per hour, and a capacity factor of less than 30 percent per year. A capacity factor is the ratio of a unit's reported fuel consumption compared to the amount of fuel that would have been used by an applicable unit if it had operated at its rated heat input capacity for the entire year.

Conditions:

1. Pursuant to Rule 103.A.2, the applicable emission unit shall be operated at a capacity factor of less than 30 percent per year to be exempt from the requirements of Rule 103.A.2.

2. In order to demonstrate compliance with the exemption from Rule 103.A.2, the permittee shall maintain monthly records of fuel consumption at the applicable unit and on an annual basis shall calculate the yearly capacity factor. The annual capacity factor calculation shall be submitted with the annual compliance certification to verify that the applicable emission unit is currently operating at a capacity factor of less than 30 percent per year.

3. Pursuant to Rule 103.A.4, the owner or operator of the applicable emission unit which emits at least 5 pounds per hour, or at least 40 pounds per day of any single air contaminant is required to install, maintain, and operate continuous monitoring systems if the Air Pollution Control District requests in writing that such monitoring systems be in operation, and that the air contaminant emissions to be monitored be specified along with a specified reason.

   The District requires the permittee to monitor NO_x emissions from the Nebraska boiler in accordance with Rule 103.A.4 requirements. Attachment PO0157PC2, Condition No. 4 contains the monitoring, recordkeeping, and reporting requirements necessary to meet Rule 103.A.4.

Ventura County Air Pollution Control District
Gas Turbine Based Cogeneration Unit
NO_x, CO, and NH_3 Applicable Requirements
Including Streamlined NO_x Requirements

Rule 26, "New Source Review"
Conditions applied pursuant to Rule 26 are Federally Enforceable

Rule 74.23, "Stationary Gas Turbines"
Adopted 01/08/02, Federally Enforceable

Rule 103, "Stack Monitoring"
Adopted 02/09/99, Federally Enforceable

40 CFR Part 60, "Standards of Performance for New Stationary Sources" (NSPS)
40 CFR Part 60, Subpart A, "General Provisions"
40 CFR Part 60, Subpart GG, "Standards of Performance for Stationary Gas Turbines"
Federally Enforceable

Applicability:

This attachment applies to the nitrogen oxides (NO_x measured as NO_2), carbon monoxide (CO), and ammonia (NH_3) emissions at the gas turbine based cogeneration unit, consisting of a General Electric LM 2500-PK gas turbine and a Coen duct burner. This attachment describes and streamlines the most stringent requirements of Rule 26, "New Source Review"; Rule 74.23, "Stationary Gas Turbines"; Rule 103, "Stack Monitoring"; and 40 CFR Part 60, Subpart GG, "Standards of Performance for Stationary Gas Turbines" (NSPS). The Ventura County APCD has been delegated authority for 40 CFR Part 60 Subpart GG and is considered to be the Administrator.

As shown on the attached table, the Rule 26 NO_x emission limit is the most stringent in comparison to the Rule 74.23 and NSPS NO_x emission limits; therefore the Rule 74.23 and NSPS emission limits are subsumed. The monitoring requirements of District Rule 74.23 and 103 are more stringent than the NSPS requirements; therefore the NSPS monitoring, recordkeeping, reporting, and test method requirements are subsumed by the requirements of Rules 74.23 and 103.

Compliance with the terms and conditions of the streamlined NO_x, CO, and NH_3 requirements for the cogeneration unit assures compliance with all individual NO_x, CO, and NH_3 applicable requirements pertaining to the cogeneration unit that have been addressed in the streamline analysis. The attached table details the determination of this permit shield for the cogeneration unit which consists of a General Electric LM 2500-PK natural gas-fired turbine that drives a 29

MW electrical generator, and which is also equipped with a 51 MMBTU/Hr natural gas-fired Coen duct burner.

Conditions:

1. The stack outlet concentration of Nitrogen Oxides (NO_x expressed as NO_2) shall not exceed 12.0 ppmvd, referenced at fifteen (15) percent volume stack gas oxygen on a dry basis, and averaged over any three consecutive hours. This is a Rule 26 requirement (Authority to Construct No. 0157-160, October 7, 1997) and is more stringent than Rule 74.23 and 40 CFR Part 60 Subpart GG. Compliance with this condition shall be verified by an annual source test, as specified in Condition No. 4 of this attachment, and by maintaining the continuous emission monitoring and control system operating parameter monitoring, as specified in Condition No. 5 of this attachment.

2. Pursuant to Rule 74.23.C.2, the NO_x emission limits listed above shall not apply to the cogeneration unit during the thermal stabilization period associated with a cold start-up, normal start-up, planned shutdown, or unplanned load change. A cold start-up exemption shall not exceed twelve (12) hours, a normal start-up exemption shall not exceed three (3) hours, a planned shutdown exemption shall not exceed one (1) hour, and an unplanned load change exemption shall not exceed two (2) hours. A start-up is considered cold if the gas turbine has experienced zero fuel flow for a period of 24 hours or more. A planned shutdown is a premeditated shutdown not caused by automatic sensors or other instrumentation. An unplanned load change is defined as the automatic release of power from the turbine and the subsequent restart. Loss of power during the release must exceed forty (40) percent of the turbine rating. For failed start-ups, each restart shall begin a new exemption period.

   In addition, the number of cold start-up exemptions that may be claimed shall not exceed four (4) in any 12-month period. A cold start-up (as defined above) is not required to be claimed as a cold start-up if the NOx concentrations meet the standard within three (3) hours of commencing cold start-up.

3. Pursuant to Rule 74.23.B.4, ammonia (NH_3) emissions from the cogeneration unit shall not exceed 20 ppmvd at 15% O_2. Compliance with this condition shall be verified by an annual source test, as specified in Condition No. 4 of this attachment.

4. Pursuant to Rule 74.23.B.1, the cogeneration unit shall be source tested not less than once every 12 months (annually) utilizing the following methods:

a.	NO_x	EPA Method 20
b.	CO	ARB Method 100
c.	Oxygen content	ARB Method 100
d.	Gaseous fuel heating value	ASTM Method D 1826-88

e. NH_3 BAAQMD Method ST-1B (Jan. 20, 1982)

The average of three source test runs shall be used to determine compliance. The tests shall be conducted at normal operating load.

Prior to conducting an annual emissions test, permittee shall notify the APCD Compliance Division. Written notification and a source test protocol, subject to District approval, shall be received no less than 15 calendar days prior to the test. The emissions test report shall indicate the following parameters at normal load: emissions of NO_x, CO, and NH_3 in parts per million by volume on a dry basis; parts per million by volume corrected to 15% oxygen on a dry basis; pounds per hour; the amount of excess oxygen in percent by volume; and the fuel and exhaust flow rates, in standard cubic feet per minute. In addition, pursuant to Rule 74.23.B.2, the permittee shall provide documentation, including a certified source test, correlating the control system operating parameters to the associated measured NO_x emissions. This information may be used by the District to determine compliance when the continuous emission monitoring system is not operating properly. These control system operating parameters include, but are not limited to, the steam injection rate, the steam to fuel ratio, the ammonia injection rate, and the ammonia to NO_x mole ratio entering the SCR unit. The test report shall also include data to show that the continuous emissions monitors and recorders accurately estimate emissions and concentration limits. The test report and results shall be submitted to the APCD Compliance Division within 45 days after the test.

5. Pursuant to Rule 74.23.B.2 and Rule 103.A.4, the permittee shall provide, properly install, maintain in good working order, operate, and calibrate, in accordance with manufacturers specifications, continuous monitoring systems at the gas turbine based cogeneration unit exhaust to continuously monitor, calculate where appropriate, and record the following data and control system operating parameters:

   a. For the Coen duct burner, the time and duration of its use and a continuous recording of its fuel consumption rate.
   b. For the SCR system, the ammonia flow rate and the ammonia to NO_x mole ratio.
   c. For the gas turbine, a continuous recording of the fuel flow rate, the ratio of water (steam) to fuel being fired in the gas turbine on a pounds per pound basis, and the steam injection rate.
   d. The concentration of NO_x, in parts per million by volume on a dry basis (ppmvd), of the exhaust gas entering the SCR system, and the exhaust gas vented to the atmosphere. The recorded concentration of NO_x emissions vented to the atmosphere shall be corrected to 15% oxygen.
   e. The concentration of CO, in ppmvd, in the exhaust vented to the atmosphere.
   f. The concentration of oxygen (in percent by weight) in the exhaust gas vented to the atmosphere.
   g. The emissions of NO_x in pounds per hour.

h. The emissions of CO in pounds per hour.
i. The NO_x emissions in tons summed over the previous 12 months.
j. The CO emissions in tons summed over the previous 12 months.
k. On a monthly basis, the quantity of fuel (in millions of cubic feet) consumed in the gas turbine and Coen duct burner (recorded separately).
l. The elapsed time of operation.

Pursuant to Rule 74.23.D.1, these records shall be available for inspection by the District upon request.

6. Pursuant to Rule 103.C.4, the continuous emission monitoring system shall be installed, calibrated, and maintained in accordance with the specifications in 40 CFR, Part 51, Appendix P, Sections 3.0 through 3.9.5. As stated in 40 CFR, Part 51, Appendix P, Section 3.1; the continuous monitoring systems shall comply with the following Performance Specifications:

a. Continuous monitoring systems for measuring nitrogen oxides shall comply with 40 CFR, Part 60, Appendix B, Performance Specification 2.
b. Continuous monitoring systems for measuring carbon monoxide shall comply with 40 CFR, Part 60, Appendix B, Performance Specification 4 or 4A.
c. Continuous monitoring systems for measuring oxygen shall comply with 40 CFR, Part 60, Appendix B, Performance Specification 3.

As an alternative, as detailed in Rule 103.C.4, the continuous emission monitoring system shall be installed, calibrated, and maintained in accordance with other specifications established by the District.

7. Pursuant to Rule 103.B.1, the permittee shall report any violation of any emission standard with which the cogeneration unit is required to comply, as indicated by the records of the monitoring device. The report shall be in writing to the District Compliance Division within 96 hours after such occurrence. The District shall, in turn, report the violation to the state within five working days after receiving the report of the violation from the permittee.

8. Pursuant to Rule 103.B.2, the permittee shall maintain permanent continuous emission monitoring records. The records shall be in a form suitable for inspection, shall be made available to the Air Resources Board or the District upon request, and shall include:

a. The date, time and duration of any startup, shutdown or malfunction in the operation of any affected facility.
b. The results of performance testing, evaluations, calibrations, checks, adjustments, and maintenance of any continuous emission monitors that have been installed pursuant to Rule 103.
c. Emission measurements.

9. Pursuant to Rule 103.B.4, the permittee shall, upon written notice from the District Compliance Division, provide a summary of the data obtained from the continuous monitoring systems. The format of the summary shall be approved in writing by the District Compliance Division.

10. Pursuant to Rule 103.B.5.c, continuous emission monitoring data shall be reduced according to the procedure established in 40 CFR, Part 51, Appendix P, paragraphs 5.0 through 5.3.3, or by other methods determined to be equivalent by the District, the Air Resources Board, and the Environmental Protection Agency.

11. Permittee shall maintain records of all maintenance operations, periodic inspections, and repairs performed on the gas turbine, SCR unit, and continuous emissions monitors. Permittee shall also maintain records and copies of all source test reports and any violations on exceedances of the limits shown in the conditions of this Permit to Operate. These records shall be made available for inspection by the District upon request.

12. Pursuant to Rule 74.23.E, the permittee shall submit a report to the District Compliance Division that contains the following information:

    a. Actual fuel consumption or operating hours during the previous twelve (12) months; and
    b. A copy of the required annual source test report and control system operating parameter information.

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NO_x Streamlining Comparison
Gas Turbine Based Cogeneration Unit , PO No. 00157

	RULE 74.23 AND RULE 103	NSPS SUBPART GG	RULE 26 NSR -
WORK PRACTICE STDS.	None	None	None
EMISSION LIMIT	Rule 74.23.B.1 and 74.23.I.4 9 x E/25 ppmvd @ 15% O_2 E = 36.3, reduces to: 13.1 ppmvd @ 15% O_2 equivalent emission factor: 44 lb NO_x/mmcf	60.332(a)(1) STD = 0.0075 x (14.4)/Y + F STD is allowable % NO_x by vol @ 15% O_2 with no allowances for unit efficiency (Y) or fuel bound nitrogen (F), the limit reduces to: 75 ppmvd @ 15% O_2 equivalent emission factor: 251.2 lb NO_x/mmcf	Rule 26-NSR 12.0 ppmvd @ 15% O_2 equivalent emission factor: 40 lb NO_x/mmcf
MONITORING	Rule 74.23 Source test annually for NO_x and O_2 content (74.23.B.1); Monitor NO_x directly w/CEM (103.A.4); Monitor control system operating parameters and elapsed time of operation (74.23.B.2) Rule 103 CEM, maintained per 40 CFR, Part 51, Appendix P, 3.0-3.9.5 & Part 60 Appendix B, Performance Spec 2 (103.C.4)	60.334 Continuously monitor fuel consumption and ratio of water (steam) to fuel (system accurate to ?5.0%) (60.334(a)); Monitor nitrogen content of fuel daily or as approved by Administrator (District is Administrator; and does not give a fuel bound nitrogen allowance in limit) (60.334(b))	Identical to Rule 74.23

NO_x Streamlining Comparison (Continued)
Gas Turbine Based Cogeneration Unit, PO No. 00157

	RULE 74.23 AND RULE 103	NSPS SUBPART GG	RULE 26 NSR - BACT
RECORDKEEPING	Rule 74.23.D.1 Continuous records of monitoring requirements specified above (103.B.2) Rule 103 NOx CEM records, etc., reduce per 40 CFR Part 51 Appendix P, 5.0-5.3.3 (103.B.5.e)	60.334(a) Continuous records of the water (or steam) to fuel ratio 60.7 Record startups, shutdowns, and malfunctions of unit and control device (60.7(b)) Maintain file of all measurements, etc. (60.7(f))	Identical to Rule 74.23
REPORTING	74.23.E Actual annual fuel consumption or operating hours Annual source test report Rule 103 Report NOx emission limit exceedances to the District within 96 hours (103.B.1) Provide a summary of the CEM data, upon written request from the District Compliance Division (103.B.4)	NOx (60.334(c)(1)) Report exceedances of the water (steam) to fuel ratio which has been determined to demonstrate compliance with the NO_x limit Report exceedances of the fuel bound nitrogen content allowed by the fuel-bound nitrogen allowance used during the performance test	None
TEST METHODS	74.23.F NO_x - EPA Method 20 O_2 content - ARB Method 100 Gaseous fuel HHV - ASTM Method D 1826-88 NH_3 - BAAQMD Method ST-1B, 1/20/82	60.335(c)(3) NO_x - EPA Method 20 O_2 Content - EPA Method 20 60.335(a) nitrogen content of fuel - a method approved by the Administrator (District) that is accurate to within 5 %	Identical to Rule 74.23

Ventura County Air Pollution Control District
Gas Turbine Based Cogeneration Unit
SO_x Applicable Requirements - Streamlined

Rule 54, "Sulfur Compounds"
Adopted 01/14/14, Federally Enforceable

Rule 64, "Sulfur Content of Fuels"
Adopted 04/13/99, Federally-Enforceable

40 CFR Part 60, "Standards of Performance for New Stationary Sources" (NSPS)
40 CFR Part 60, Subpart A, "General Provisions"
40 CFR Part 60, Subpart GG, "Standards of Performance for Stationary Gas Turbines"
Federally-Enforceable

Applicability:

This attachment applies to the sulfur oxides (SOx measured as SO2) emissions at the gas turbine based cogeneration unit, consisting of a General Electric LM 2500-PK gas turbine and a Coen duct burner. This attachment describes and streamlines the most stringent sulfur content of fuel and SOx emissions at the point of discharge requirements of Rule 54, "Sulfur Compounds", Rule 64, "Sulfur Content of Fuels", and 40 CFR Part 60, Subpart GG, "Standards of Performance for Stationary Gas Turbines" (NSPS). The Ventura County APCD has been delegated authority for 40 CFR Part 60 Subpart GG and is considered to be the Administrator.

As detailed in the attached table, the Rule 64.B.1 fuel sulfur content limits for gaseous fuel combustion are the most stringent in comparison to the Rule 54 and NSPS Subpart GG SO_x emission limits and sulfur content limits. The cogeneration unit has a Rule 26 BACT requirement to burn natural gas only. Therefore the Rule 54 and NSPS emission limits are subsumed. Both Rule 64 and the NSPS Subpart GG require monitoring of the fuel sulfur content at the discretion of the District. Therefore, the monitoring, recordkeeping, reporting, and test methods for Rule 54 and NSPS Subpart GG will be also subsumed.

Compliance with the terms and conditions of the streamlined SO_x requirements for the cogeneration unit assures compliance with all individual SO_x applicable requirements pertaining to the cogeneration unit that have been addressed in the streamline analysis. The attached table details the determination of this permit shield for the cogeneration unit that consists of a General Electric LM 2500-PK gas turbine and a Coen duct burner.

Conditions:

1. Pursuant to Rule 64.B.1, no person shall burn at any time gaseous fuel containing sulfur compounds in excess of 50 grains per 100 cubic feet of gaseous fuel (788 ppmv),

calculated as hydrogen sulfide at standard conditions, unless specifically exempted by Rule 64.

2. If only Public Utilities Commission-regulated natural gas, propane, or butane is combusted at this facility, it will be assumed that the permittee is complying with Rule 64 without additional periodic monitoring requirements.

3. If other than Public Utilities Commission-regulated natural gas, propane, or butane is being combusted, the permittee shall analyze the sulfur content of the fuel on an annual basis using South Coast AQMD Method 307-91 - Determination of Sulfur in a Gaseous Matrix or by ASTM D1072-90(1994), Standard Test Method for Total Sulfur in Fuel Gases. This annual fuel analysis shall be maintained at the facility and shall be provided to the District with the annual compliance certification.

4. Pursuant to Rule 54, no person shall discharge sulfur compounds, which would exist as a liquid or gas at standard conditions, in excess of 300 ppm by volume from any combustion operation, calculated as sulfur dioxide (SO_2) by volume, at 15% oxygen, at the point of discharge.

   In order to comply with Rule 54, permittee shall comply with the fuel sulfur content limits of Rule 64. No additional periodic monitoring requirements for Rule 54 are required beyond the periodic monitoring requirements of Rule 64.

5. Upon District request, sulfur compounds at the point of discharge shall be determined by source testing using EPA Test Method 6, 6A, 6C, 8, 15, 16A, 16B, or South Coast AQMD Test Method 307-91 (Determination of Sulfur in a Gaseous Matrix), as appropriate.

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SO_x Streamlining Comparison
Gas Turbine Based Cogeneration Unit, PO No. 0157

	RULES 54 and 64	NSPS SUBPART GG	RULE 26 BACT -
WORK PRACTICE STDS.	None	None	None
EMISSION LIMIT	Rule 54.B.1 ≤ 300 ppmv (EF = 1612.8 lb SO_x/mmcf @ 15% O2) Rule 64.B.1 Sulfur Compounds ≤ 50 grains per 100 ft^3 (788 ppmv) calculated as H_2S @ standard conditions (Equivalent EF = 134.5 lb SOx/mmcf)	60.333(a) ≤ 0.015% vol @ 15% O2 on a dry basis (0.015% vol = 150ppmv) (Equivalent EF = 806.4 lb SO_x/mmcf) OR Rule 60.333(b) Sulfur content of fuel ≤ 0.8 wt% (Equivalent EF = 661.5 lb SO_x/mmcf)	Permitted to burn natural gas only
MONITORING	Rules 54 and 64 PUC-quality natural gas - None Non-PUC quality natural gas - Annual analysis of fuel sulfur content	60.334(b) PUC-quality natural gas - None, as approved by the District (Administrator) Non-PUC quality natural gas - Monitor sulfur content of fuel annually, as approved by the District (Administrator)	None

SO_x Streamlining Comparison (Continued)
Gas Turbine Based Cogeneration Unit, PO No. 00157

	RULES 54 and 64	NSPS SUBPART GG	RULE 26 NSR - BACT
RECORDKEEPING	Rules 54 and 64 PUC-quality natural gas - None Non-PUC quality natural gas - Maintain records of annual fuel analyses	PUC-quality natural gas - None, as approved by the District (Administrator) Non-PUC quality natural gas - Maintain records of annual fuel analyses, as approved by the District (Administrator)	None
REPORTING	Provide fuel records to the District upon request	(60.334(c)(2) Provide fuel records to the District upon request, as approved by the District (Administrator)	None
TEST METHODS	Rule 54.D.1 SO_x - EPA Methods 6, 6A, 6C, 8, 15, 16A, 16B, or SCAQMD Method 307-91 Rule 64.D Sulfur content of gaseous fuels - SCAQMD Method 307-91	60.335(c)(3) SO_x - EPA Method 20 O_2 Content - EPA Method 20 60.335(d) Sulfur content of gaseous fuels - ASTM D 1072-80, D 3031-81, D 4084-82, or D 3246-81	None

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Ventura County Air Pollution Control District
Rule 74.9.D.3 Applicable Requirements
Emergency Standby Stationary Internal Combustion Engines
Operated During Either an Emergency or Maintenance Operation

Rule 74.9, "Stationary Internal Combustion Engines"

Adopted 11/08/05, Federally-Enforceable

Applicability:

This attachment applies to emergency standby stationary internal combustion engines rated at 50 or more horsepower, not subject to the provisions of APCD Rule 74.16, "Oilfield Drilling Operations," and operated during an emergency or maintenance operation. Maintenance operation is limited to 50 hours per calendar year. Pursuant to Rule 74.9.D.3, emergency standby stationary internal combustion engines operated during an emergency or during maintenance operation of no more than 50 hours per calendar year are exempt from all provisions of Rule 74.9.

As detailed in Rule 74.9.I.2 an emergency standby engine is defined as an internal combustion engine used only when normal power line or natural gas service fails, or for the emergency pumping of water for either fire protection or flood relief. An emergency standby engine may not be operated to supplement a primary power source when the load capacity or rating of the primary power source has been either reached or exceeded.

Conditions:

1. Pursuant to Section D.3 of Rule 74.9, an applicable emergency standby stationary internal combustion engine shall only be operated during an emergency or during maintenance operation of not more than 50 hours per calendar year.

   Pursuant to Section I.5 of Rule 74.9, a maintenance operation is defined as the use of an emergency standby engine and fuel system during testing, repair and routine maintenance to verify its readiness for emergency standby use.

2. Pursuant to Section D.3 of Rule 74.9, each emergency standby engine shall be equipped with an operating, non-resettable, elapsed hour meter.

3. Pursuant to Section F.1 of Rule 74.9, the Annual Compliance Certification shall include the following records for each emergency standby engine: Engine manufacturer, model number, operator identification number, and location.

4. Pursuant to Section F.2 of Rule 74.9, the annual engine hours of maintenance operation shall be reported annually. A report shall be provided to the District after every calendar year by February 15.

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Ventura County Air Pollution Control District
National Emission Standards for Hazardous Air Pollutants
For Stationary Reciprocating Internal Combustion Engines
Existing Emergency Spark Ignited Engines

40 CFR Part 63, Subpart ZZZZ, "National Emission Standards for Hazardous Air Pollutants for Stationary Reciprocating Internal Combustion Engines" (RICE MACT)

Applicability:

The NESHAP for Stationary Reciprocating Internal Combustion Engines is applicable to all stationary reciprocating internal combustion engines (RICE) at both major and area sources of hazardous air pollutants. The NESHAP is applicable to both compression ignition (CI – diesel) engines and spark ignition (SI – natural gas, landfill gas, gasoline, propane, etc.) engines. The specific conditions below are for existing emergency spark ignited engines at an area source. An engine is defined as "existing" if it was constructed before June 12, 2006. A stationary source is defined as an "area source" if it is not a major source of HAP (Hazardous Air Pollutants) emissions; meaning the stationary source does not emit or have the potential to emit any single HAP at a rate of 10 tons or more per year or any combination of HAP at a rate of 25 tons or more per year.

Pursuant to Section 63.6640(f) and Section 63.6675, an "emergency engine" is any engine whose operation is limited to emergency situations and required testing and maintenance. An emergency can be the loss of grid power or the stationary source's own power production. An emergency engine may also participate in an emergency demand response program under limited circumstances. Stationary RICE used for peak shaving or as part of a financial arrangement to supply power into the grid, or as a part of a non-emergency demand response program are not considered emergency stationary RICE.

Pursuant to Section 63.6595(a)(1), the permittee must comply with the applicable operating requirements on and after May 3, 2013.

Conditions:

1. Pursuant to Section 63.6603(a), Table 2d, the permittee shall comply with the following operating requirements:

    a. Change oil and filter every 500 hours of operation or annually, whichever comes first. An oil analysis program as described in Section 63.6625(i) can be utilized in order to extend the specified oil change requirement.

    b. Inspect spark plugs every 1,000 hours of operation or annually, whichever comes first, and replace as necessary.

c. Inspect all hoses and belts every 500 hours of operation or annually, whichever comes first, and replace as necessary.

Pursuant to Table 2d, if an emergency RICE is operating during an emergency and it is not possible to perform the above maintenance or if performing the maintenance would otherwise pose an unacceptable risk under federal, state, or local law, the maintenance can be delayed and should be performed as soon as practicable after the emergency has ended or the unacceptable risk has abated. All such maintenance delays shall be reported to the APCD Compliance Division.

2. Pursuant to Section 63.6625(e) and 63.6640(a), Table 6, the permittee shall operate and maintain the stationary RICE according to the manufacturer's emission-related written instructions or develop your own plan which must provide to the extent practicable for the maintenance and operation of the engine in a manner consistent with good air pollution control practice for minimizing emissions.

3. Pursuant to Section 63.6625(f), the RICE shall be equipped with a non-resettable hour meter.

4. Pursuant to Section 63.6625(h), the permittee shall minimize the engine's time spent at idle during startup and minimize the engine's startup time to a period needed for appropriate and safe loading of the engine, not to exceed 30 minutes.

5. Pursuant to Sections 63.6640(f) and 63.6675, the permittee shall operate the emergency RICE in compliance with the following requirements:

   a. There is no time limit on the use of emergency stationary RICE in emergency situations. An emergency can be the loss of grid power or the stationary source's own power production.

   b. The use of the engine is limited to 100 hours per calendar year for maintenance checks and readiness testing, emergency demand response, 5% or greater voltage or frequency deviation situations, and up to 50 hours per year for non-emergency situations as detailed in Section 63.6640(f)(4). The 50 hours are to be counted in the 100 hours limit.

   c. The emergency stationary RICE may be operated up to 50 hours per calendar year for peak shaving as part of a financial agreement to supply power into the grid, or as part of a non-emergency demand response program, until May 3, 2014. After May 3, 2014, the 50 hours per year for non-emergency situations can be used to supply power as part of a financial agreement if all of the requirements of Section

63.6640(f)(4)(ii) are met. The 50 hours per year limit is to be counted towards the 100 hours per year limit.

6. Pursuant to Sections 63.6655(e) and 63.6655(f), the permittee shall maintain the following records:

   a. Records of maintenance conducted on the stationary emergency RICE.

   b. Records of the hours of operation of the engine that is recorded through the non-resettable hour meter. The permittee must document how many hours are spent for emergency operation, including what classified the operation as emergency, and how many hours are spent for non-emergency operation.

7. If the engine site rating exceeds 100 brake HP and operates or is contractually obligated to be available for more than 15 hours per year for purposes specified in Section 63.6640(f)(2)(ii) and (iii) or that operates for the purposes specified in Section 63.6640(f)(4)(ii) the permittee is required to compile and submit a report as required by Section 63.6650(h). The annual report must be submitted no later than March 31 of each year. (Section 63.6650(h))

8. On an annual basis, the permittee shall certify that all engines at this stationary source are operating in compliance with 40 CFR Part 63, Subpart ZZZZ, "National Emission Standards for Hazardous Air Pollutants for Stationary Reciprocating Engines" (RICE MACT).

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7. PERMIT SPECIFIC CONDITIONS (ATTACHMENTS)

As discussed in Section No. 2, "Permitted Equipment and Applicable Requirements Table," the emissions units at this stationary source listed in the table have requirements that are specifically applicable to them. The applicable requirements are primarily based on Rule 26, "New Source Review" requirements (e.g., BACT and offset requirements), or Rule 29, "Conditions on Permits" requirements (e.g., throughput recordkeeping requirements, specific requirements that limit emissions, etc.). These requirements are in addition to the specific applicable requirements listed in Section No. 6.

In this section of the permit, the permit conditions that are associated with each specific applicable requirement are listed in an individual attachment. The attachment is identified with the label "Attachment PO (Title V Permit No.) PC#" in the lower left corner. Each attachment has an applicability section that describes how and why this attachment applies to the specific emissions unit. The attachment may apply to one or more of the emissions units listed in the Permitted Equipment and Applicable Requirements Table in Section No. 2.

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Ventura County Air Pollution Control District
Additional Permit Requirements

Rule 26, "New Source Review"

Rule 29, "Conditions on Permits"

Conditions applied pursuant to Rule 26 are federally enforceable and conditions applied pursuant to Rule 29 are District enforceable only.

Rule 74.6, "Surface Cleaning and Degreasing"
Adopted 11/11/03, Federally Enforceable

Applicability:

This attachment applies to the entire stationary source. These requirements are in addition to any other specific or general requirements referenced in this permit.

Conditions:

1. In order to comply with the throughput and consumption limits of this permit, the permittee shall maintain monthly records of throughput and consumption as detailed in Section No. 3, "Permitted Throughput and Consumption Limit Table", of this permit. The monthly records shall be summed for the previous 12 months. Throughput or consumption totals for any of these 12 calendar month rolling periods in excess of the specified limit shall be considered a violation of this permit. This is a general throughput and consumption recordkeeping condition and applies unless another throughput and consumption recordkeeping condition appears in this section of the permit. (Rule 26)

2. Pursuant to section E.3 of Rule 74.6, "Surface Cleaning and Degreasing", solvents used for stationary gas turbine gas path cleaning shall not exceed an ROC content of 200 grams per liter (1.67 pounds per gallon), as applied. Sections E.3 also states that solvents used for stationary gas turbine gas path cleaning are exempt from Sections B.1 (solvent requirements) and B.2 (cleaning devices and methods requirements) of Rule 74.6. Pursuant to Rule 74.6.G.1, the ROC content of materials shall be determined by EPA Test Method 24 (40 CFR Part 60, Appendix A). All recordkeeping requirements listed in section F.1 do apply to gas turbine gas path cleaning. (Rule 74.6)

3. For stationary gas turbine gas path cleaning, the permittee shall maintain monthly records of solvent purchase and usage along with records of solvent that is recycled or disposed of properly. The monthly records shall be summed for the previous 12 months. Net solvent usage totals for any of these 12 calendar month rolling periods in excess of the

usage limit of 262 gallons per year (see Table No. 3) shall be considered a violation of this permit. (Rule 26)

4. Pursuant to Rule 23.F.7, the use of solvents, in addition to the use of coatings, adhesives, lubricants, and sealants, for facility and building maintenance and repair is exempt from permit. However, the use of such materials by contractors for the maintenance and repair of process and industrial equipment is not exempt from permit pursuant to Rule 23.F.7, unless the material is exempted under another specific section of Rule 23. Pursuant to Rule 23.F.6, the use of non-refillable aerosol cans is exempt from permit. Pursuant to Rule 23.F.10, the use of cleaning agents certified by the SCAQMD as Clean Air Solvents (Rule 23.F.10.a) and the use of cleaning agents that contain no more than 25 grams per liter of ROC as used or applied, and no more than 5 percent by weight combined of methylene chloride, perchloroethylene, trichloroethylene, 1,1,1-trichloroethane, carbon tetrachloride, and chloroform (Rule 23.F.10.b), is also exempt from permit. This permit does not limit the usage of acetone. Acetone is exempt from permit and record keeping requirements, as it is not defined as a reactive organic compound.

   In order to substantiate the solvent use exemptions listed above, the permittee shall maintain a list of all exempt solvents used at the stationary source and a reference to the specific permit exemption status. (Rule 29)

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Ventura County Air Pollution Control District
Additional Permit Requirements
Combustion Emissions Units

Rule 26, "New Source Review"

Conditions applied pursuant to Rule 26 are federally enforceable.

Rule 29, "Conditions On Permits"

Conditions applied pursuant to Rule 29 are not federally enforceable.

Rule 103, "Stack Monitoring"
Adopted 02/09/99, Federally-Enforceable

Applicability:

This attachment applies to the combustion units at this stationary source. The combustion units are the 290 MMBTU/Hr GE LM 2500-PK Gas Turbine including a 51 MMBTU/Hr Coen Duct Burner, the 4.9 MMBTU/Hr Maxon Duct Burner, and the 108.0 MMBTU/Hr Nebraska Boiler. These requirements are in addition to any other specific or general requirements referenced in this permit.

Conditions:

1. The combined emissions from the Cogeneration Unit (290 MMBTU/hr GE Gas Turbine and 51 MMBTU/hr Coen Duct Burner) and the 108 MMBTU/hr Nebraska Standby Boiler shall not exceed the following:

Annual (Rolling 12 Month) Emission Limits

	ROC	NOx	PM	SOx	CO
Tons per Year:	3.29	50.00	10.57	0.85	97.66

Note that this limit does not include emissions from the 4.9 MMBTU/hr Maxon Duct Burner; this unit has its own annual natural gas combustion limit.

In order to comply with this condition, the permittee shall maintain a rolling twelve month total of ROC, NOx, PM, SOx, and CO emissions for the above units. The permittee shall record the monthly natural gas consumption at each of the above units and shall maintain a rolling twelve month record of NOx emissions from the cogeneration unit and the Nebraska boiler as recorded by the continuous emissions monitoring systems (CEMs); and shall maintain a rolling twelve month record of CO emissions from the

cogeneration unit as recorded by the CEMs. The monthly natural gas consumption records shall be used with the following emission factors to calculate monthly emissions (where no emission factor is given the CEMs data is used):

Emission Factors (Not Limits)

	ROC	NOx	PM	SOx	CO	Units
GE LM 2500-PK Turbine	2.1	CEM	7.35	0.60	CEM	Lb/MMcf
51 MMBTU/hr Duct Burner	2.8	CEM	7.6	0.60	CEM	Lb/MMcf
Nebraska Boiler	5.5	CEM	7.6	0.60	310.64	Lb/MMcf

The emission factors may be changed at the discretion of the VCAPCD. If the factors are revised, the emission limits listed above will be changed accordingly. Monthly emissions for all the combustion units listed above shall be summed for the previous twelve months. Emission totals for any of these 12 calendar month periods in excess of the specified limits shall be considered a violation of this condition.

The emission limits are based on the emission factors listed above and the annual fuel throughputs listed below.

Annual Fuel Throughputs (Not Limits)

GE LM 2500-PK Turbine:	2,847.0 MMcf natural gas for SOx 1,992.9 MMcf natural gas for ROC & PM
51 MMBTU/hr Duct Burner:	854.1MMcf natural gas for ROC & PM

2. The GE LM2500-PK Turbine, Coen Duct Burner, Maxon Duct Burner, and Nebraska Boiler shall be fired on natural gas only. (Rule 26)

3. The flue gas recirculation (FGR) system at the Nebraska Boiler shall be operated properly at all times that the boiler is in operation. The FGR rate shall remain within the parameters defined by the most recent Nebraska Boiler tune-up. The boiler tune-up shall include a NOx and CO emissions screening to confirm that the emissions are within the required limits. The FGR rate parameters are the FGR Variable Frequency Drive (VFD) percentage and the FGR VFD Speed (Hz).

   In order to comply with this condition, the permittee shall keep a record of the FGR VFD percentage and speed (Hz) during the most recent boiler tune-up; and shall make a daily record the FGR VFD percentage and speed (Hz) on calendar days when the Nebraska Boiler is operated. (Rule 29)

4. The permittee shall operate and maintain a continuous emissions monitor system (CEMS) for NO_x and oxygen emissions from the Nebraska Boiler, pursuant to Rule 103.A.4. The CEMS is required to demonstrate compliance with the 40 ppmvd at 3% oxygen limit of Rule 74.15.B.1 (see Attachment 74.15N1, Condition No. 1). The continuous emissions monitor shall be operated, maintained, and calibrated in the following manner:

   a. While the Nebraska Boiler is in operation, zero and span drift checks of the continuous monitor shall be made at least once daily. (Rule 103.C.4)

   b. While the Nebraska Boiler is in operation, adjustments to the zero and span shall be made whenever the 24-hour zero drift or 24-hour calibration drift exceed 10% of the emission standard. (Rule 103.C.4)

   c. While the Nebraska Boiler is in operation, any breakdown or shutdown of the monitoring equipment shall be reported to the District pursuant to the requirements of APCD Rule 32. (Rule 32, Rule 103.B.2.a)

   d. The permittee shall maintain continuous emission monitoring records, in a form suitable for inspection. The records shall include the date, time, and duration of any startup, shutdown, or malfunction in the operation of the Nebraska Boiler, emission measurements, and any performance testing, calibrations, checks, adjustments and maintenance of the continuous monitor. Such records shall be made available to the District upon request. (Rule 103.B.2)

   e. Upon written notice from the District, the permittee shall provide a summary of the data obtained from the continuous monitoring systems in a format approved in writing by the District. (Rule 103.B.4)

   f. The permittee shall report any violation of the NO_x limit as indicated by the monitoring device, in writing to the District Compliance Division within 96 hours after such occurrence. The District shall, in turn, report the violation to the state within five working days after receiving the report of the violation from the permittee. (Rule 103.B.1)

   g. Continuous monitoring data shall be reduced according to the procedure established in 40 CFR Part 51, Appendix P, paragraphs 5.0 through 5.3.3, or by other methods determined to be equivalent by the District, the Air Resources Board, and the Environmental Protection Agency. (Rule 103.B.5.c)

5. The Maxon Duct Burner shall be equipped with a dedicated fuel meter. The permittee shall continuously record the time and duration of the Maxon Duct Burner's use, and its fuel consumption rate. (Rule 26)

6. The Maxon duct burner has been de-rated to less than 5 MMBTU/hr and is not subject to Rule 74.34, "NOx Reductions From Miscellaneous Sources." A gas regulator was installed prior to the burner to reduce the maximum heat input. The Maxon Duct Burner shall not be operated at rate greater than or equal to 5 MMBTU/hr. The Maxon Duct Burner shall be equipped with a dedicated fuel meter. The permittee shall maintain continuous monitoring records of the natural gas flow rate to the duct burner (SCFH and MMBTU/hr), in a form suitable for inspection. The flow meter's calibration certificate shall also be available for inspection. (Rule 29)

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8. GENERAL APPLICABLE REQUIREMENTS (ATTACHMENTS)

The general applicable requirements are broadly applicable requirements that apply and are enforced in the same manner for all subject emissions units or activities. These requirements can normally be adequately addressed in the permit application with minimal or no reference to any specific emissions unit or activity, provided that the scope of the requirement and the manner of its enforcement are clear. Examples of such requirements include those that apply identically to all emissions units at a facility (e.g., source-wide opacity limits), general housekeeping requirements, and requirements that apply identical emissions limits to small units (e.g., process weight requirements).

As detailed in the Title V Permit Reissuance Application, general applicable requirements that apply to this facility were determined. The permit conditions associated with each generally applicable requirement are listed in an individual attachment. The attachment is identified with the label "Attachment (APCD Rule No.) ____" in the lower left corner of each attachment. Each attachment has an applicability section that describes the emissions units to which the attachment applies. Each attachment may apply to one or more of the emissions units listed in the Applicable Requirements Table of Section No. 2. Note that these general applicable requirements may also apply to emissions units not required to be listed in the permit, such as those that are short-term.

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Ventura County Air Pollution Control District
Rule 50 Applicable Requirements
Opacity

Rule 50, "Opacity"
Adopted 04/13/04, Federally-Enforceable

Applicability:

This attachment applies to all emissions units at this stationary source.

Conditions:

1. Pursuant to Rule 50.A, permittee shall not discharge into the atmosphere from any single source whatsoever any air contaminants for a period or periods aggregating more than three (3) minutes in any one (1) hour which are as dark or darker in shade as that designated as No. 1 on the Ringelmann Chart, or equivalent to 20% opacity and greater, unless specifically exempted by Rule 50.

2. Permittee shall perform daily visual inspections to ensure that compliance with Rule 50 is being maintained. A record shall be kept of any occurrence of visible emissions other than uncombined water greater than zero percent for a period or periods aggregating more than three (3) minutes in any one (1) hour. These records shall include the date, time, and identity of emissions unit. If the visible emissions problem cannot be corrected within 24 hours, permittee shall provide verbal notification to the District within the subsequent 24 hours. These visible emissions records shall be maintained at the facility and submitted to the District upon request.

3. On an annual basis, permittee shall certify that all emissions units at the facility are complying with Rule 50. This annual compliance certification shall include a formal survey identifying the date, time, emissions unit, and verification that there are no visible emissions other than uncombined water greater than zero percent for a period or periods aggregating more than three (3) minutes in any one (1) hour. As an alternative, the annual compliance certification shall include a formal survey identifying the date, time, emissions unit, and verification that there are no visible emissions for a period or periods aggregating more than three (3) minutes in any one (1) hour which are as dark or darker in shade as that designated as No. 1 on the Ringelmann Chart, or equivalent to 20% opacity and greater, as determined by a person certified in reading smoke using EPA Method 9, or any other appropriate test method as approved in writing by the District, the California Air Resources Board, and the U.S. Environmental Protection Agency.

4. Upon District request, opacity shall be determined by a person certified in reading smoke using EPA Method 9 or a certified, calibrated monitoring system.

Ventura County Air Pollution Control District
Rule 54 Applicable Requirements
Sulfur Compounds - Sulfur Emissions from
Combustion Operations at Point of Discharge

Rule 54, "Sulfur Compounds"
Adopted 01/14/14, Federally Enforceable

Rule 64, "Sulfur Content of Fuels"
Adopted 04/13/99, Federally-Enforceable

Applicability:

This attachment applies to all combustion emissions units at this stationary source that combust gaseous or liquid fuels. This attachment addresses the requirements of Rule 54 for sulfur emissions at the point of discharge. It can be demonstrated that compliance with the fuel sulfur content limits of Rule 64 ensures compliance with the sulfur emission limits of Rule 54.

Conditions:

1. Pursuant to Rule 54.B.1.a, no person shall discharge sulfur compounds from any combustion operation, which would exist as a liquid or gas at standard conditions, in excess of the following limit at the point of discharge:

300 ppm by vol, on a dry basis, as sulfur dioxide (SO_2), at 3% oxygen	For sources subject to: Rule 74.11, "Natural Gas-Fired Water Heaters" Rule 74.11.1, "Large Water Heaters and Small Boilers" Rule 74.15, "Boilers, Steam Generators, and Process Heaters" Rule 74.15.1, "Boilers, Steam Generators, and Process Heaters" (1 to 5 MMBTUs)
300 ppm by vol, on a dry basis, as sulfur dioxide (SO_2), at 15% O_2	For sources subject to: Rule 74.9, "Stationary Internal Combustion Engines" Rule 74.23, "Stationary Gas Turbines" Flares and all other combustion operations

2. In order to comply with Rule 54, permittee shall comply with the fuel sulfur content limits of Rule 64. No additional periodic monitoring requirements for Rule 54 are required beyond the periodic monitoring requirements of Rule 64.

3. Upon District request, sulfur compounds at the point of discharge shall be determined by source testing using EPA Test Method 6, 6A, 6C, 8, 15, 16A, 16B, or South Coast AQMD Test Method 307-91 (Determination of Sulfur in a Gaseous Matrix), as appropriate.

Ventura County Air Pollution Control District
Rule 54 Applicable Requirements
Sulfur Compounds - Sulfur Dioxide Concentration at Ground Level

Rule 54, "Sulfur Compounds"
Adopted 01/14/14, Federally Enforceable

Applicability:

This attachment applies to all emissions units at this stationary source that emit sulfur compounds. This attachment addresses the requirements of Rule 54 for sulfur emissions at ground or sea level at or beyond the property line of the stationary source.

Conditions:

1. Pursuant to Rule 54, no person shall discharge sulfur compounds, which would exist as a liquid or gas at standard conditions, as sulfur dioxide which results in average ground or sea level concentrations at any point at or beyond the property line in excess of 0.25 ppmv averaged over any one hour period, or 0.04 ppmv averaged over any 24 hour period.

2. Pursuant to Rule 54.B.2.a, no person shall discharge sulfur compounds, which would exist as a liquid or gas at standard conditions, as sulfur dioxide which results in ground or sea level concentrations at any point at or beyond the property line such that the 1-hour average design value exceeds 0.075 ppm (Vol).

    a) For purposes of Subsection B.2.a, the design value is derived from the 3-year average of annual 99th percentile daily maximum 1-hour values. At the District's discretion, compliance with the ground or sea level concentration limit in Subsection B.2.a of this rule may be demonstrated using EPA-approved dispersion models or ambient air monitoring. If the District requires ambient air monitoring, the test method(s) listed in Subsection D.2 of this rule must be employed.

    b) To demonstrate compliance using dispersion modeling, the annual 99^{th} percentile daily maximum at each receptor is determined from model results as follows: for each year of meteorological data modeled, select from each day the maximum hourly modeled SO_2 concentration value and sort all these daily maximum hourly values by descending value. The 99^{th} percentile is the 4^{th} highest value for each modeled year. Calculate the average of the 99^{th} percentile values for three consecutive years of modeling data for each receptor. Compliance is demonstrated if this average value is less than or equal to the design value concentration limit in Subsection B.2.a of this Rule at each receptor.

    c) Compliance with the limit in subsection B.2.a may also be demonstrated using EPA-approved screen models. Compliance is demonstrated if the 1-hour SO_2

ground or sea level concentration does not exceed 0.075 ppm (Vol) at or beyond the property line.

d) If ambient air monitoring data is used to demonstrate compliance, the design value must be calculated in accordance with 40 CFR Part 50 Appendix T – Interpretation of the Primary National Ambient Air Quality Standards for Oxides of Sulfur (Sulfur Dioxide).

3. Permittee shall maintain a representative fuel analysis or exhaust analysis, along with modeling data or other demonstration to ensure that compliance with Rule 54 is being maintained. This analysis and compliance demonstration shall be provided to the District upon request.

4. Upon District request, ground or sea level concentrations of SO_2 shall be determined by Bay Area Air Quality Management District Manual of Procedures, Volume VI, Section 1, Ground Level Monitoring for Hydrogen Sulfide and Sulfur Dioxide (July 20, 1994) with the following amendments:

a. The wind direction shall be continuously measured and recorded to within 5 degrees of arc, and wind speed shall be continuously measured and recorded to within 0.25 miles per hour (mph) at wind speeds less than 25 mph and with a threshold no greater than 0.2 mph.

b. The meteorological instruments and siting requirements shall comply with the guidelines in "Quality Assurance Handbook for Air Pollution Measurements Systems, Volume IV, Meteorological Measurements Version 2.0," EPA-454/B-08-002, March 2008.

c. The gas standards shall be restandardized against the reference wet chemical method at a minimum of once every 12 months, or be standardized using National Institute of Standards and Technology (NIST) standard gases.

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Ventura County Air Pollution Control District
Rule 55 Applicable Requirements
Fugitive Dust

Rule 55, "Fugitive Dust"
Adopted 06/10/08, District-Enforceable

This permit attachment will become federally enforceable when Rule 55 is approved by EPA as part of the SIP.

Applicability:

This attachment applies to any operation, disturbed surface area, or man-made condition at this stationary source that is capable of generating dust. These operations may include bulk material handling, earth-moving, construction, demolition, storage piles, unpaved roads, track-out, or off-field agricultural operations.

All definitions listed in Section H of Rule 55 are applicable to this attachment. The Rule 55 definition section includes the following definitions: "disturbed surface area", "bulk material", "earth moving activities", "construction/demolition activities", "storage piles", "paved road", "track-out", and "off-field agricultural operations". All exemptions listed in Section D of Rule 55 are applicable to this attachment.

Conditions:

1. Pursuant to Rule 55.B.1, the permittee shall not cause or allow the emissions of fugitive dust from any applicable source such that the dust remains visible beyond the midpoint (width) of a public street or road adjacent to the property line of the emission source or beyond 50 feet from the property line if there is not an adjacent public street or road.

2. Pursuant to Rule 55.B.2, the Permittee shall not cause or allow the emissions of fugitive dust from any applicable source such that the dust causes 20 percent opacity or greater during each observation and the total duration of such observations (not necessarily consecutive) is a cumulative 3 minutes or more in any one (1) hour. Only opacity readings from a single source shall be included in the cumulative total used to determine compliance. Compliance with the opacity limit shall be determined by using EPA Method 9 with the modifications listed in Section F of Rule 55.

3. Pursuant to Rule 55.B.3, the permittee shall not allow track-out to extend 25 feet or more in length unless at least one of the following three control measures is utilized: track-out area improvement, track-out prevention, or track-out removal. These control measures are detailed in Rule 55.B.3.a.

4. Pursuant to Rule 55.B.3.b, notwithstanding other track-out requirements, all track-out shall be removed at the conclusion of each workday or evening shift subject to the conditions listed in Section 55.B.3.b.

5. Pursuant to Rule 55.C, the permittee shall comply with the specific activity requirements detailed in Section C of Rule 55, for earth-moving, bulk material handling, and truck hauling activities, as applicable.

6. The permittee shall comply with the specific recordkeeping requirements listed in Section E of Rule 55, as applicable.

7. On an annual basis, the permittee shall certify that all applicable sources of dust at this stationary source are operating in compliance with Rule 55. The permittee may also certify annually that there are no operations, disturbed surface areas, or man-made conditions at this stationary source that are subject to Rule 55.

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Ventura County Air Pollution Control District
Rule 57.1 Applicable Requirements
Particulate Matter Emissions from Fuel Burning Equipment

Rule 57.1, "Particulate Matter Emissions from Fuel Burning Equipment"
Adopted 01/11/05, Federally Enforceable

Applicability:

This attachment applies to fuel burning equipment such as boilers, steam generators, process heaters, water heaters, space heaters, flares, and gas turbines. This attachment does not apply to internal combustion engines, jet engine test stands and rocket engine test stands, and rocket propellant testing devices and rocket fuel testing devices. This attachment also does not apply to exhaust gas streams containing particulate matter that was not generated by the combustion of fuel; such exhaust gas streams are subject to Rule 52 and Rule 53.

Conditions:

1. Pursuant to Section B of Rule 57.1, emissions of particulate matter shall not exceed 0.12 pounds per million BTU of fuel input.

   Particulate matter is defined as any material, except uncombined water, that exists in a finely divided form as a liquid or solid at standard conditions. Standard conditions are: a gas temperature of 68 degrees Fahrenheit (20 degrees Celsius) and a gas pressure of 14.7 pounds per square inch (760 mm. Hg) absolute.

2. Upon request of the District Compliance Division, compliance shall be determined by independent source test using CARB Method 5. The total particulate catch shall include the filter catch, probe catch, impinger catch, and the solvent extract, as specified in CARB Method 5. Any other appropriate test method may be used with prior written approval by the District, the California Air Resources Board, and the U.S. Environmental Protection Agency.

3. Periodic monitoring is not necessary to certify compliance with Rule 57.1. To certify compliance, a reference to the Rule 57.B District analysis dated December 3, 1997 is sufficient.

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Ventura County Air Pollution Control District
Rule 64 Applicable Requirements
Sulfur Content of Fuels - Gaseous Fuel Requirements

Rule 64, "Sulfur Content of Fuels"
Adopted 04/13/99, Federally Enforceable

Applicability:

This attachment applies to all combustion emissions units at this stationary source while the emissions units are combusting gaseous fuels. Rule 64 shall not apply to any flare gas combustion, where no useful energy is produced, and which is subject to Rule 54, "Sulfur Compounds."

Conditions:

1. Pursuant to Rule 64, no person shall burn at any time gaseous fuel containing sulfur compounds in excess of 50 grains per 100 cubic feet of gaseous fuel (788 ppmv), calculated as hydrogen sulfide at standard conditions, unless specifically exempted by Rule 64.

2. If only Public Utilities Commission-regulated natural gas, propane, or butane is combusted at this facility, it will be assumed that the permittee is complying with Rule 64 without additional periodic monitoring requirements. Any person claiming this exemption shall maintain records sufficient to substantiate the use of these fuels.

3. If other than Public Utilities Commission-regulated natural gas, propane, or butane is being combusted, the permittee shall analyze the sulfur content of the fuel on an annual basis using South Coast AQMD Method 307-94 - Determination of Sulfur in a Gaseous Matrix or by ASTM D1072-90 (1994), Standard Test Method for Total Sulfur in Fuel Gases.

   Alternatively, when measuring the sulfur content of landfill or oilfield gaseous fuel, permittee may use the colorimetric method ASTM D 4810-88 (Reapproved 1994) or the ASTM D4084-94 (Lead Acetate Reaction Rate Method) and may assume that the hydrogen sulfide content of the fuel gas adequately represents the total sulfur content. However, if the sulfur content as measured by ASTM D4810-88 or ASTM D4084-94 equals or exceeds 200 ppmv, then only South Coast AQMD Method 307-94 or ASTM D1072-90 (1994) shall be used to determine compliance.

   The applicable ranges of some ASTM methods mentioned above are not adequate to measure the levels of sulfur in some fuel gases. Dilution of samples before analysis may be used subject to the verification of the dilution ratio.

Permittee may use the colorimetric method ASTM D 4810-88 (Reapproved 1994) for the measurement of the sulfur content of gaseous fuels other than landfill or oilfield gas only if written approval has been granted by the District and by US EPA.

4. Monitoring of the sulfur content of landfill or oilfield gaseous fuel by the permittee shall be at least quarterly if any of the following conditions apply:

   a. Any sulfur measurement exceeds 394 ppmv, calculated as hydrogen sulfide at standard conditions.

   b. A stationary source is new.

   c. The permittee has not reported historical measurements of hydrogen sulfide of the landfill or oilfield gaseous fuel performed within the previous three years in writing to the District for a stationary source.

   An operator may have the sulfur content of landfill or oilfield gaseous fuel monitored annually only, instead of quarterly, by satisfying the following provisions:

   a. During four consecutive calendar quarters, each sulfur content measurement shall not exceed 394 ppmv, calculated as hydrogen sulfide at standard conditions, and

   b. Submit a written request to the District for a reduction in monitoring frequency. This request shall contain backup documentation including monitoring reports that document the above provision. Requests for a reduction in monitoring frequency are not effective until written approval by the District is received by the operator.

   This annual fuel analysis, and the quarterly analyses if applicable, shall be maintained at the facility and a copy of the annual analysis shall be provided to the District with the annual compliance certification.

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Ventura County Air Pollution Control District
Rule 64 Applicable Requirements
Sulfur Content of Fuels - Liquid Fuel Requirements

Rule 64, "Sulfur Content of Fuels"
Adopted 04/13/99, Federally Enforceable

Applicability:

This attachment applies to all combustion emissions units at this stationary source while the emissions units are combusting liquid fuels. This attachment does not apply to any combustion emission unit with sulfur emission controls.

Conditions:

1. Pursuant to Rule 64, no person shall burn any liquid fuels with a sulfur content in excess of 0.5 percent, by weight, unless specifically exempted by Rule 64.

2. If only ARB-quality reformulated gasoline or ARB-certified diesel fuel is combusted at this facility, it will be assumed that the permittee is complying with Rule 64 without additional periodic monitoring requirements. Any person claiming this exemption shall maintain records sufficient to substantiate the use of these fuels.

3. If other than ARB-quality reformulated gasoline or ARB-certified diesel fuel is being combusted, for each liquid fuel delivery permittee shall either obtain the fuel supplier's certification, or shall test the sulfur content of the fuel using ASTM Method D4294-98 or D2622-98, to ensure that compliance with Rule 64 is being maintained. For liquid fuels, operators of electric power generation units may use the sampling and analysis methods prescribed in Code of Federal Regulations 40CFR Part 75 Appendix D.2.2. The fuel supplier's certification may be provided once for each purchase lot, if records are kept of the purchase lot number of each delivery.

   The fuel sulfur content by weight data shall be maintained at the facility and shall be provided with the annual compliance certification.

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Ventura County Air Pollution Control District
Rule 74.6 Applicable Requirements
Surface Cleaning and Degreasing

Rule 74.6, "Surface Cleaning and Degreasing"
Adopted 11/11/03, Federally Enforceable

Applicability:

This attachment applies to all solvent cleaning activities at this stationary source, except those activities listed in Condition No. 11 that are exempt pursuant to Section E of Rule 74.6. This attachment does not apply to substrate surface preparation regulated by other APCD surface coating, adhesive, ink, resin, and solvent rules. "Solvent" is defined as any ROC-containing liquid used to perform solvent cleaning. "Solvent cleaning" is defined as the use of organic solvent to remove loosely held uncured adhesives, uncured inks, uncured coatings, uncured resins, and other contaminants which include, but are not limited to, dirt, soil, lubricants, coolant, moisture, grease, and fingerprints, from parts, tools, machinery, equipment, and general work areas.

This attachment also contains requirements, pursuant to Rule 74.6, for cold cleaners. A cold cleaner is defined in Rule 74.6 as any batch operated equipment designed to contain liquid solvent that is operated below the solvent's boiling point to carry out solvent cleaning operations. A specific type of cold cleaner is a "remote reservoir cold cleaner" which is a device in which solvent is moved through a sink-like work area for cleaning parts and drains immediately, without forming a pool, through a single drain hole less than 100 square centimeters (15.5 square inches) in area into an enclosed container that is not accessible for soaking parts. The freeboard height for remote reservoir cold cleaners is the distance from the top of the solvent drain to the top of the tank.

This attachment does not apply to solvent cleaning where an emission control system is used pursuant to Rule 74.6.B.5 or where an alternative cleaning system is used pursuant to Rule 74.6.B.6. Pursuant to APCD Rule 23.F.7, solvents used by the permittee for facility, ground, and building maintenance and repair are exempt from the requirement to have a permit. However, unless exempted by Rule 74.6.E, such solvents are required to comply with Rule 74.6.

Conditions:

1. Pursuant to Rule 74.6.B.1, no person shall perform solvent cleaning using solvent that exceeds the following limits:

    a. Solvents used for application equipment cleanup, and all other cleanup of uncured coatings, adhesives, inks, or resins, shall not exceed an ROC content of 900 grams per liter and an ROC composite partial pressure of 33 mmHg at 20°C, as applied.

b. Solvents used for cleaning of electronic components, electrical apparatus components, medical devices, or aerospace components shall not exceed an ROC content of 900 grams per liter and an ROC composite partial pressure of 33 mmHg at 20°C, as applied.

c. Solvents used for cleaning for purposes other than those listed in (a) and (b) above shall not exceed an ROC content of 25 grams per liter, as applied.

2. Pursuant to Rule 74.6.B.2, no person shall perform solvent cleaning using a solvent with an ROC content greater than 25 grams per liter unless one of the following cleaning devices or methods is used:

a. Wipe cleaning where solvent is dispensed to wipe cleaning materials from containers that are kept closed to prevent evaporation, except while dispensing solvent or replenishing the solvent supply;

b. Non-atomized solvent flow, dip, or flush method where pooling on surfaces being cleaned is prevented or drained, and all solvent runoff is collected in a manner that enables solvent recovery or disposal. The collection system shall be kept closed to prevent evaporation except while collecting solvent runoff or emptying the collection system;

If the cleaning method has a solvent capacity more than one gallon, a cold cleaner or remote reservoir cold cleaner meeting the equipment and operating requirements of Condition Nos. 8, 9, and 10 of this attachment (Sections C and D of Rule 74.6) shall be used to comply with this requirement.

c. Application of solvent from a hand held spray bottle, squirt bottle or other closed container with a capacity of one liter or less;

d. A properly used enclosed gun washer or low emission spray gun cleaner.

3. Pursuant to Rule 74.6.B.3.a, no person shall allow liquid cleaning solvent to leak from any equipment or container.

4. Pursuant to Rule 74.6.B.3.b, no person shall specify, solicit, supply, or require any cleaning solvent or solvent cleaning equipment intended for uses governed by Rule 74.6 if such use would violate Rule 74.6. This prohibition applies to all written and oral contracts under which solvent cleaning operations subject to Rule 74.6 are to be conducted at any location in Ventura County.

5. Pursuant to Rule 74.6.B.3.c, no person shall use more than one gallon per week of

solvents containing methylene chloride, perchloroethylene, trichloroethylene, 1,1,1-trichloroethane, carbon tetrachloride, or chloroform, or any combination of these solvents, in a total concentration greater than 5 percent by weight, for cold cleaning except in a cold cleaner operated in accordance with National Emission Standards for Halogenated Solvent Cleaning, 40 CFR Parts 9 and 63, Subpart T, Sections 63.460 through 63.469 (Degreasing MACT Standards). Any person that uses the above solvent in quantities less than one gallon per week shall maintain records of the volume and formulation of such solvent on an as-used basis (recording use each day such material is used). Records shall be saved for at least five (5) years from the date of each record and shall be made available to District personnel upon request.

6. Pursuant to Rule 74.6.B.4.a, all ROC-containing solvents shall be stored in non-absorbent, non-leaking containers that shall be kept closed at all times except when filling or emptying.

7. Pursuant to Rule 74.6.B.4.b, waste solvent and waste solvent residues shall be disposed of in a manner conforming with Division 20, Chapter 6.5 of the California Health and Safety Code.

8. Pursuant to Rule 74.6.C.1, all cold cleaners, except remote reservoir cold cleaners, shall be equipped with the following devices:

   a. A drying rack suspended above the solvent, or other facility for draining cleaned parts such that the drained solvent is returned to the cleaner.

   b. A cover that prevents the solvent from evaporating when not processing work in the cleaner. If high volatility solvent is used, the cover must be a sliding, rolling, or guillotine (bi-parting) type that is designed to easily open and close, or it must be designed to be easily operated with one hand. A high volatility solvent is an unheated solvent with an ROC composite partial pressure of greater than 2 mmHg @ 20°C.

   c. A freeboard height of at least 6 inches (15.2 centimeters), if low volatility solvent is used. A low volatility solvent is an unheated solvent with an ROC composite partial pressure of 2 mmHg or less @ 20°C.

   d. At least one of the following control devices, if high volatility solvent is used:

      1. A freeboard height such that the freeboard ratio is at least 0.75.
      2. A water cover if the solvent is insoluble in and heavier than water.

   e. A permanent conspicuous mark locating the maximum allowable solvent level that conforms with the applicable freeboard height requirement in Condition No. 8.c or 8.d.1.

f. A permanent conspicuous label or sign summarizing the applicable operating requirements appropriate for cold cleaning operations.

9. Pursuant to Rule 74.6.C.2, remote reservoir cold cleaners shall be equipped with the following devices:

a. A permanent conspicuous label or sign summarizing the applicable operating requirements appropriate for cold cleaning operations.

b. A sink-like work area that is sloped sufficiently towards the drain to preclude pooling of solvent.

c. A single drain hole, less than 100 square centimeters (15.5 square inches) in area, for the solvent to flow from the sink into the enclosed reservoir.

d. A freeboard height of at least 6 inches (15.2 centimeters).

e. A cover for the drain when no work is being processed in the cleaner and high volatility solvent is used. If low volatility solvent is used, a cover is not required.

10. Pursuant to Rule 74.6.D, any person who operates a cold cleaner shall conform to the following operating requirements:

a. The operator shall drain cleaned parts of all solvent until dripping ceases to ensure that the drained solvent is returned to the cleaner.

b. Solvent agitation, where necessary, shall be achieved using pump recirculation, a mixer, or ultrasonics. Air agitation shall not be used.

c. If a solvent flow is utilized, only a solid fluid stream (not a fine, atomized, or shower type spray) shall be used.

d. The pressure of the solvent flow system shall be such that liquid solvent does not splash outside the container.

e. No person shall remove or open any required device designed to cover the solvent unless work is being processed in the cleaner or maintenance is being performed on the cleaner.

f. The cleaning equipment and emission control equipment shall be operated and maintained in proper working order.

g. The cleaning of porous or absorbent materials such as cloth, leather, wood, or rope is prohibited. This provision shall not apply to paper gaskets or paper filters.

11. Pursuant to Rule 74.6.E.1, Rule 74.6 (all requirements of this permit attachment) shall not

apply to:

a. Cleaning activities using Clean Air Solvent, or a solvent with an ROC-content no more than 25 grams per liter as applied. A "Clean Air Solvent" is a solvent certified by the South Coast Air Quality Management District as a Clean Air Solvent.

b. The use of up to 160 fluid ounces of non-refillable aerosol cleaning products per day, per facility.

c. Janitorial cleaning including graffiti removal.

d. Cleaning carried out in vapor degreasers or motion picture film cleaning equipment.

e. Any cleaning device or mechanism regulated by National Emission Standards for Halogenated Solvent Cleaning, 40 CFR Parts 9 and 63, Subpart T, Sections 63.460 through 63.469 (Degreasing MACT Standards).

f. Cleaning operations subject to any of the following rules:

Rule 74.3, Paper, Fabric and Film Coating Operations
Rule 74.5.1, Petroleum Solvent Dry Cleaning
Rule 74.5.2, Synthetic Solvent Dry Cleaning
Rule 74.19, Graphic Arts Operations
Rule 74.19.1, Screen Printing Operations
Rule 74.21, Semiconductor Manufacturing

g. Stripping of cured coating (e.g.; stripping), cured adhesive (e.g.; debonding, ungluing), cured ink, or cured resin.

h. The use of solvent for purposes other than solvent cleaning activities.

12. Pursuant to Rule 74.6.E.2, Rule 74.6.B.1 (Condition No. 1 of this attachment) shall not apply to:

a. Cleaning operations required to comply with any ROC content and/or composite vapor pressure limit in any of the following rules:

Rule 74.12, Surface Coating of Metal Parts and Products
Rule 74.13, Aerospace Assembly and Component Manufacturing Operations
Rule 74.14, Polyester Resin Material Operations
Rule 74.18, Motor Vehicle and Mobile Equipment Coating Operations
Rule 74.20, Adhesives and Sealants
Rule 74.24, Marine Coating Operations

b. Cleaning of ultraviolet lamps used to cure ultraviolet inks coatings, adhesives or resins.

c. Cleaning of solar cells, laser hardware, scientific instruments, or high-precision optics.

d. Cleaning conducted in laboratory tests and analyses including quality assurance/quality control applications, or bench scale or short-term (less than 2 years) research and development programs.

e. Removal of elemental sodium from the inside of pipes and lines.

f. Cleaning of mold release compounds from molds.

g. Cleaning of tools used to cut or abrade cured magnetic oxide coatings.

h. Cleaning of aerospace assembly and subassembly surfaces that are exposed to strong oxidizers or reducers such as nitrogen tetroxide, liquid oxygen or hydrazine.

i. Cleaning of paper gaskets.

j. Cleaning of clutch assemblies where rubber is bonded to metal by means of an adhesive.

k. Cleaning of hydraulic actuating fluid from filters and filter housings.

l. Removal of explosive materials and constituents from equipment associated with manufacturing, testing or developing explosives.

m. Manufacturing cleaning of nuts and bolts designed for automotive racing applications, in a cold cleaner complying with Sections C and D of Rule 74.6 using solvent with an ROC content no more than 900 grams per liter and a ROC composite partial pressure no more than 5 mm Hg @ 20C.

n. Cleaning of precision–lapped mechanical seals in pumps that handle liquefied gasses, in a cold cleaner complying with Sections C and D of Rule 74.6 using solvent with an ROC content no more than 900 grams per liter and a ROC composite partial pressure no more than 5 mm Hg @ 20C.

o. Facility wide use of less than 1 gallon per week of non-compliant solvent where compliant solvents are not available. Any person claiming this exemption shall

maintain records of the volume and formulation of non-compliant solvent used on an as-used basis (recording use each day such material is used). Records shall be saved for at least five (5) years from the date of each record and shall be made available to District personnel upon request.

13. Pursuant to Rule 74.6.E.3, Rule 74.6 Sections B.1 and B.2 (Condition Nos. 1 and 2 of this attachment) shall not apply to aircraft engine gas path cleaning or stationary gas turbine gas path cleaning using solvent with an ROC content of 200 g/l or less, as applied.

14. Pursuant to Rule 74.6.F, the permittee shall maintain a current material list showing each ROC containing material used in solvent cleaning activities. The list shall summarize the following information:

    a. Solvent name and manufacturer's description.

    b. All intended uses of the solvent at the facility, classified as follows:

        1. Cleanup, including application equipment cleaning, or
        2. Cleaning of electronic components, electrical apparatus components, medical devices, or aerospace components, or
        3. Solvent used pursuant to an exemption in Rule 74.6.E (specify the exemption claimed).

    c. The ROC content in units of grams per liter of material (and ROC composite partial pressure in units of mm Hg @ 20C, if applicable) of the solvent.

    d. If the solvent is a mix of materials blended by the operator, a record of the mix ratio.

    This information shall be made available to District personnel upon request.

15. Permittee shall maintain the above records and conduct periodic facility inspections, and an annual compliance certification to ensure that compliance with Rule 74.6 is being maintained. Upon request of the District, compliance with Rule 74.6 shall be determined using the following methods:

    a. Pursuant to Rule 74.6.G.1, the ROC content of materials shall be determined by EPA Test Method 24 (40 CFR Part 60, Appendix A).

    b. Pursuant to Rule 74.6.G.4, the identity of components in solvents shall be determined using manufacturer's formulation data or by using ASTM E168-67, ASTM E169-87, or ASTM E260-85.

c. Pursuant to Rule 74.6.G.5, ROC composite partial pressure of a solvent shall be calculated using a widely accepted published source such as: Boublik, T., V. Fried and E. Hala, "The Vapor Pressure of Pure Substances," Elsevier Scientific Publishing Co., New York (1973), Perry's Chemical Engineers Handbook, McGraw-Hill Book Company, CRC Handbook of Chemistry and Physics, Chemical Rubber Publishing Company (1986-1987), and Lange's Handbook of Chemistry, John A. Dean, editor, McGraw-Hill Book Company (1985). The true vapor pressure of a component in a solvent mix may be determined by ASTM Method D2879-86. The ROC composite partial pressure of a solvent mix consisting entirely of ROC may be determined by ASTM Method D2879-86.

d. Pursuant to Rule 74.6.G.6, the active and passive solvent losses from spray gun cleaning systems shall be determined using South Coast Air Quality Management District's "General Test Method for Determining Solvent Losses from Spray Gun Cleaning Systems" dated October 3, 1989. The test solvent for this determination shall be any lacquer thinner with a minimum vapor pressure of 105 mm Hg at 20°C. The minimum test temperature shall be 15°C.

e. Pursuant to Rule 74.6.G.7, initial boiling point of solvent shall be determined by ASTM 1078-78 or by using a published source such as listed in Rule 74.6.G.5.

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Ventura County Air Pollution Control District
Rule 74.11.1 Applicable Requirements
Rule 74.11.1, Large Water Heaters and Small Boilers

Rule 74.11.1, "Large Water Heaters and Small Boilers"
Adopted 09/11/12, Federally Enforceable

Applicability:

This attachment applies to all natural gas-fired water heaters, boilers, steam generators or process heaters (units) with a rated heat input capacity greater than or equal to 75,000 BTU/hr and less than 1,000,000 BTU/hr at this stationary source installed after January 1, 2013 and to the future installation of any such unit at this stationary source. Note that units rated less than 1,000,000 BTU/hr are exempt from District permit requirements pursuant to Rule 23.C.1.

Conditions:

1. Pursuant to Rule 74.11.1.B.2, no person shall sell, offer for sale, or install in Ventura County any new unit with a rated heat input capacity of greater than or equal to 75,000 BTU/hr and less than or equal to 400,000 BTU/hr that does not meet the following criteria:

   a. Oxides of nitrogen emissions shall not exceed 14 nanograms per joule of heat output (32.5 pounds per billion BTU), or 20 parts per million, and

   b. The unit is certified in accordance with Rule 74.11.1.C.

   The oxides of nitrogen emission standard required above (Condition No. 1.a) does not apply to units specifically designed to heat swimming pools, hot tubs, or spas. For such units, oxides of nitrogen emissions shall not exceed 40 nanograms per joule of heat output (93 pounds per billion BTU), or 55 parts per million.

2. Pursuant to Rule 74.11.1.B.4, no person shall sell, offer for sale, or install in Ventura County any new unit with a rated heat input capacity of greater than 400,000 BTU/hr and less than 1,000,000 BTU/hr that does not meet the following criteria:

   a. Oxides of nitrogen emissions shall not exceed 20 parts per million and carbon monoxide emissions shall not exceed 400 parts per million, and

   b. The unit is certified in accordance with Rule 74.11.1.C.

3. The permittee shall maintain a listing of manufacturer, brand name, model number, heat input rating, and installation date for each water heater, boiler, steam generator and

process heater, with a rated heat input capacity greater than or equal to 75,000 BTU/hr and less than 1,000,000 BTU/hr, at this stationary source. Permittee shall submit these identification records for all of these units to the District upon request.

4. On an annual basis, the permittee shall certify that all water heaters, boilers, steam generators and process heaters, with a rated heat input capacity greater than or equal to 75,000 BTU/hr and less than 1,000,000 BTU/hr, at this stationary source are complying with Rule 74.11.1. This annual certification shall include a formal survey identifying each unit and documentation of certification status (pursuant to Rule 74.11.1.C), as required.

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Ventura County Air Pollution Control District
Rule 74.22 Applicable Requirements
Rule 74.22, Natural Gas-Fired Fan-Type Central Furnaces

Rule 74.22, "Natural Gas-Fired Fan-Type Central Furnaces"
Adopted 11/09/93, Federally Enforceable

Applicability:

This attachment applies to all natural gas-fired, fan-type central furnaces at this stationary source installed after May 31, 1994 and to the future installation of any natural gas-fired, fan-type central furnaces at this stationary source. A fan-type central furnace is a self contained space heater providing for circulation of heated air at pressures other than atmospheric through ducts of more than 10 inches in length that has a rated heat input capacity of less than 175,000 BTU per hour and, for combination heating and cooling units, a rated cooling capacity of less than 65,000 BTU per hour. Natural gas-fired, fan-type central furnaces installed in manufactured housing (mobile homes) are exempt from Rule 74.22.

Conditions:

1. Pursuant to Rule 74.22.B, no person shall install, after May 31, 1994, any natural gas-fired fan-type central furnace:

   a. with NOx (oxides of nitrogen) emissions in excess of 40 nanograms per joule of heat output. (74.22.B.1)

   b. unless it is certified and identified in accordance with Section C of Rule 74.22. (74.22.B.2)

2. Permittee shall maintain a listing of manufacturer, brand name, model number, and heat input rating for each natural gas-fired fan-type central furnace at this stationary source. Permittee shall submit these identification records for all of these furnaces to the District upon request.

3. On an annual basis, permittee shall certify that all natural gas-fired fan-type central furnaces at this stationary source are complying with Rule 74.22. This annual certification shall include a formal survey identifying each natural gas-fired fan-type central furnace; whether it was installed before or after May 31, 1994; and for those furnaces installed after May 31, 1994, information indicating that the certification is contained on the furnace nameplate, or that the furnace is included on a District-provided list of certified furnaces.

9. GENERAL APPLICABLE REQUIREMENTS (ATTACHMENTS)

The general applicable requirements are broadly applicable requirements that apply and are enforced in the same manner for all subject emissions units or activities. These requirements can normally be adequately addressed in the permit application with minimal or no reference to any specific emissions unit or activity, provided that the scope of the requirement and the manner of its enforcement are clear. Examples of such requirements include those that apply identically to all emissions units at a facility (e.g., source-wide opacity limits), general housekeeping requirements, and requirements that apply identical emissions limits to small units (e.g., process weight requirements).

As detailed in the Title V Permit Reissuance Application, general applicable requirements that apply to this facility were determined. The permit conditions associated with each generally applicable requirement are listed in an individual attachment. The attachment is identified with the label "Attachment (APCD Rule No.) ____" in the lower left corner of each attachment. Each attachment has an applicability section that describes the emissions units to which the attachment applies. Each attachment may apply to one or more of the emissions units listed in the Applicable Requirements Table of Section No. 2. Note that these general applicable requirements may also apply to emissions units not required to be listed in the permit, such as those that are short-term.

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Ventura County Air Pollution Control District
Rule 74.1 Applicable Requirements
Abrasive Blasting

Rule 74.1, "Abrasive Blasting"
Adopted 11/12/91, Federally Enforceable

Applicability:

This attachment applies to short term activities involving any abrasive blasting operation conducted at this facility. Abrasive blasting is the operation of cleaning or preparing a surface by forcibly propelling a stream of abrasive material against that surface. Abrasive materials subject to Rule 74.1 include, but are not limited to, sand, slag, steel shot, garnet or walnut shells.

Conditions:

1. Pursuant to Rule 74.1.B.1.a, all abrasive blasting operations shall be conducted within a permanent building, except for abrasive blasting operations conducted under one or more of the following conditions as detailed in Rule 74.1.B.1.b:

    a. Steel or iron shot/grit is used exclusively

    b. The item to be blasted exceeds eight feet in any dimension

    c. The surface being blasted is situated at its permanent location or no further away from its permanent location than is necessary to allow the surface to be blasted

2. Pursuant to Rule 74.1.B.1.c, any abrasive blasting that is allowed to be conducted outside of a permanent building, and is not exclusively using steel or iron shot/grit, must use one of the following:

    a. Wet abrasive blasting

    b. Hydroblasting

    c. Vacuum blasting

    d. Dry blasting with California ARB certified abrasives

3. Abrasive blasting for pavement marking shall comply with the requirements of Rule 74.1.B.2.

4. Abrasive blasting of stucco and concrete shall comply with the requirements of Rule 74.1.B.3.

5. Packages or containers for abrasives certified in accordance with Section 92530 of the California Code of Regulations used for permissible outdoor blasting shall comply with the labeling requirements of Rule 74.1.B.4.

6. Abrasive blasting operations shall comply with the visible emission standards of Rule 74.1.C.1 and the nuisance prohibition of Rule 74.1.C.2. The visible emission evaluation of abrasive blasting operations shall be conducted in accordance with Section 92400 of the California Code of Regulations.

7. Permittee shall monitor each abrasive blasting operation to ensure that compliance with Rule 74.1 is being maintained. For each abrasive blasting operation conducted at the facility, permittee shall maintain records of the following information:

   a. Date of operation

   b. Type of abrasive blasting media used

   c. Identity, size, and location of item blasted

   d. Whether operation was conducted inside or outside a permanent building

   e. California ARB certifications for abrasives used

   These records shall be maintained at the facility and submitted to the District upon request.

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Ventura County Air Pollution Control District
Rule 74.2 Applicable Requirements
Architectural Coatings

Rule 74.2, "Architectural Coatings"
Adopted 01/12/10, Federally Enforceable

Applicability:

This attachment applies to short term activities involving any person who supplies, sells, offers for sale, applies or solicits the application of any architectural coating at this stationary source. An architectural coating is a coating to be applied to stationary structures or their appurtenances at the site of installation, to portable buildings at the site of installation, to pavements, or to curbs. Coatings applied in shop applications or to nonstationary structures, such as airplanes, ships, boats, railcars and automobiles, are not considered to be architectural coatings for the purposes of this rule, nor are adhesives.

This attachment and Rule 74.2 do not apply to architectural coatings that are sold in a container with a volume of one liter (1.057 quart) or less and do not apply to any aerosol coating product.

Conditions:

1. Pursuant to Rule 74.2.B.1, the volatile organic compound (VOC) content of architectural coatings shall not exceed the following standards, as found in Table 2 of Rule 74.2.B.1, unless specifically exempted by Rule 74.2:

    a. The VOC content of flat coatings shall not exceed 50 grams per liter of coating.

    b. The VOC content of nonflat coatings shall not exceed 100 grams per liter of coating.

    c. The VOC content of nonflat-high gloss coatings shall not exceed 150 grams per liter of coating.

    Limits are expressed as VOC Regulatory (unless otherwise specified in Rule 74.2) thinned to the manufacturer's maximum recommendation, excluding colorant added to the tint bases. VOC Regulatory is defined in Rule 74.2.

2. Pursuant to Rule 74.2.B.1, the VOC content of specialty architectural coatings shall not exceed the VOC limits in the Table of Standards in Rule 74.2, unless specifically exempted by Rule 74.2.

    Specifically, the VOC content of industrial maintenance coatings shall not exceed 250 grams per liter of coating.

Limits are expressed as VOC Regulatory (unless otherwise specified in Rule 74.2) thinned to the manufacturer's maximum recommendation, excluding colorant added to the tint bases. VOC Regulatory is defined in Rule 74.2.

3. Pursuant to Rule 74.2.B.4, all architectural coating containers used to apply the contents therein to a surface directly from the container by pouring, siphoning, brushing, rolling, padding, ragging or other means, shall be closed when not in use. These architectural coating containers include, but are not limited to, drums, buckets, cans, pails, trays or other application containers. Containers of any VOC-containing materials used for thinning and cleanup shall also be closed when not in use.

4. Pursuant to Rule 74.2.B.5, no person who applies or solicits the application of any architectural coating shall apply or solicit the application of any coating that is thinned to exceed the applicable VOC limit specified in the Tables in Subsection B.1.

5. Permittee shall monitor each architectural coating operation to ensure that compliance with Rule 74.2 is being maintained. Permittee shall specify the usage of compliant coatings and shall maintain VOC records of coatings used at the stationary source. This information shall be submitted to the District upon request.

6. The VOC content of architectural coatings, along with other specified physical and chemical properties, shall be measured using the testing procedures in Rule 74.2.G.

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Ventura County Air Pollution Control District
40 CFR Part 61, Subpart M Applicable Requirements
National Emission Standard for Asbestos

40 CFR Part 61, Subpart M, "National Emission Standard for Asbestos"
Federally Enforceable

Applicability:

This attachment applies to short term activities conducted at this facility pertaining to procedures for asbestos demolition or renovation activities as detailed in 40 CFR Part 61.145.

As defined in 40 CFR Part 61.141, asbestos means the asbestiform varieties of serpentinite (chrysotile), riebeckite (crocidolite), cummingtonite-grunerite, anthophyllite, and actinolite-tremolite. Renovation means altering a facility or one or more facility components in any way, including the stripping or removal of regulated asbestos containing material (RACM) from a facility component. Operations in which load-supporting structural members are wrecked or taken out are demolitions.

Conditions:

1. Permittee shall insure compliance with 40 CFR Part 61 Subpart M, "National Emission Standard for Asbestos." The owner or operator of a demolition or renovation activity, as defined in 40 CFR Part 61.141, shall comply with the applicable inspection, notification, removal, and disposal procedures for asbestos containing materials as specified in 40 CFR Part 61.145, "Standards for Demolition and Renovation."

2. During times when asbestos renovation or demolition are underway at the facility, permittee shall ensure that all applicable requirements of 40 CFR Part 61.145 are met.

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10. GENERAL REQUIREMENTS FOR SHORT-TERM ACTIVITIES (ATTACHMENTS)

The general requirements for short-term activities are broadly applicable requirements that apply to temporary activities at the facility (e.g., abrasive blasting, architectural coatings, degassing operations, etc.). These are activities occurring infrequently and for a short duration. Requirements for short-term activities can normally be adequately addressed in the permit application with minimal or no reference to any specific emissions unit, provided that the scope of the requirement and the manner of its enforcement are clear.

As detailed in the Title V Permit Reissuance Application, general applicable requirements for short-term activities that apply to this facility were determined. The permit conditions associated with each requirement for a short-term activity are listed in an individual attachment. The attachment is identified with the label "Attachment (APCD Rule No.) ____" or "Attachment 40CFR61.M" in the lower left corner of each attachment.

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Ventura County Air Pollution Control District
General Part 70 Permit Conditions

1. The permittee shall comply with all federally-enforceable conditions of the Part 70 permit. Any permit noncompliance constitutes a violation of the federal Clean Air Act and is grounds for enforcement action; for permit termination, revocation and reissuance, or modification; or for denial of an application for reissuance of the permit. (40 CFR 70.6(a)(6)(i), APCD Rule 33.3.B.1)

2. The permittee shall continue to comply with all the applicable requirements with which the company has certified that it is already in compliance. The permittee shall comply in a timely manner with applicable requirements that become effective during the permit term of this permit.

3. The permittee shall promptly report deviations from Part 70 permit requirements, including those attributable to upset conditions as defined in the Part 70 permit, the probable cause of the deviations, and any corrective actions or preventive measures taken. Promptly is defined as no later than four (4) hours after its detection by such owner or operator, or his agents or employees. (40 CFR 70.6(a)(3)(iii)(B), APCD Rule 33.3.A.3, APCD Rule 32.B.1)

4. The need to halt or reduce activity is not a defense. It shall not be a defense for a permittee in an enforcement action that it would be necessary to halt or reduce the permitted activity in order to maintain compliance with the conditions of this Part 70 permit. (40 CFR 70.6(a)(6)(ii), APCD Rule 33.3.B.2)

5. All applicable records, monitoring data, and support information shall be maintained for a period of at least 5 years from the date of the monitoring sample, measurement, report, or application. Support information includes all calibration and maintenance records and all original strip chart recordings for continuous monitoring instrumentation, and copies of all reports required by the Part 70 permit. All applicable reports shall be submitted to the District every 6 months and shall be certified by a responsible official. Such reports shall identify any deviations from Part 70 permit conditions. (40 CFR 70.6(a)(3)(ii)(B), 40 CFR 70.6(a)(3)(iii)(A), APCD Rule 33.3.A.3)

6. The permittee shall furnish to the District, within a reasonable time, any information that the District may request in writing to determine whether cause exists for modifying, revoking and reissuing, or terminating the Part 70 permit or to determine compliance with the Part 70 permit. Upon request, the permittee shall also furnish to the District copies of records required to be kept by the Part 70 permit or, for information claimed to be confidential, the permittee may furnish such records directly to the Administrator of the EPA along with a claim of confidentiality. (40 CFR 70.6(a)(6)(v), APCD Rule 33.3.B.5)

7. Upon presentation of credentials and other documents as may be required by law, the permittee shall allow the District or an authorized representative to perform the following:

   a. Enter upon the permittee's premises where a Part 70 source is located or emissions-related activity is conducted, or where records must be kept under the conditions of the Part 70 permit;

   b. Have access to and copy, at reasonable times, any records that must be kept under the conditions of the Part 70 permit;

   c. Inspect at reasonable times any facilities, equipment (including monitoring and air pollution control equipment), practices, or operations regulated or required under the Part 70 permit; and

   d. As authorized by the federal Clean Air Act, sample or monitor at reasonable times substances or parameters for the purpose of assuring compliance with the Part 70 permit or applicable requirements.

   (40 CFR 70.6(c)(2), APCD Rule 8, APCD Rule 33.3.B.7)

8. The Part 70 permit may be modified, revoked, reopened, reissued, or terminated for cause. The filing of a request by the permittee for a permit modification, revocation and reissuance, or termination, or of a notification of planned changes or anticipated noncompliance does not stay any permit condition. (40 CFR 70.6(a)(6)(iii), APCD Rule 33.3.B.3)

9. A Part 70 permit shall be reopened under the following conditions:

   a. Additional applicable requirements under the federal Clean Air Act become applicable to the facility with a remaining Part 70 permit term of 3 or more years. Such a reopening shall be completed not later than 18 months after promulgation of the applicable requirement. No such reopening is required if the effective date of the requirement is later than the date on which the Part 70 permit is due to expire, unless the original Part 70 permit or any of its terms and conditions has been extended pursuant to APCD Rule 33.6.D;

   b. Additional requirements (including excess emissions requirements) become applicable to an affected source under the acid rain program. Upon approval by the Administrator of the EPA, excess emissions offset plans shall be deemed to be incorporated into the Part 70 permit;

c. The District or EPA determines that the Part 70 permit contains a material mistake or that inaccurate statements were made in establishing the emissions standards or other terms or conditions of the Part 70 permit; or

d. The Administrator of the EPA or the District determines that the Part 70 permit must be revised or revoked to assure compliance with the applicable requirements.

(40 CFR 70.7(f), APCD Rule 33.8.A)

10. All fees required by District Regulation III, Fees, shall be paid on a timely basis as requested by the District. Notwithstanding the term of the Part 70 permit, if the permittee fails to pay the annual renewal fees required pursuant to APCD Rule 42.H within the time period specified in APCD Rule 30, the Part 70 permit will be void. (40 CFR 70.6(a)(7), APCD Rule 30, APCD Rule 33.3.B.6)

11. The Part 70 permit does not convey any property rights of any sort, or any exclusive privilege. (40 CFR 70.6(a)(6)(iv), APCD Rule 33.3.B.4)

12. The provisions of this Part 70 permit shall be severable, and in the event of any challenge to any portion of the permit, or if any portion is held invalid, the remaining permit conditions shall remain valid and in force. (40 CFR 70.6(a)(5), APCD Rule 33.3.B.8)

13. An application for reissuance of this Part 70 Permit shall be submitted no more than 18 months prior to the expiration date and no less than 6 months prior to the expiration date as stated on this permit. The application shall be subject to the same procedural requirements, including those for public participation and EPA review, that apply to initial Part 70 permit issuance. (40 CFR 70.5(a)(1)(iii), 40 CFR 70.7(c)(1)(i), APCD Rule 33.6.B)

14. Any Part 70 application and any document, including reports, schedule of compliance progress reports, and compliance certification, required by this Part 70 permit shall be certified by a responsible official. The certification shall state that, based on information and belief formed after a reasonable inquiry, the statements and information in the document are true, accurate, and complete (40 CFR 70.5(d), APCD Rule 33.9.C)

15. Permittee must submit certification of compliance with all applicable requirements and all Part 70 permit conditions. A compliance certification shall be submitted with any Part 70 permit application and annually, on the anniversary date of the Part 70 permit, or on a more frequent schedule if required by an applicable requirement or permit condition.

This compliance certification shall identify each applicable requirement or condition of the Part 70 permit, the compliance status of the stationary source, whether the compliance

was continuous or intermittent since the last certification, and the method(s) used to determine compliance. In addition, the certification shall indicate the stationary source's compliance status with any applicable enhanced monitoring and compliance certification requirement of the federal Clean Air Act. A copy of each compliance certification shall be submitted to EPA Region IX. (40 CFR 70.5(c)(9), 40 CFR 70.6(c)(5), APCD Rule 33.3.A.9, APCD Rule 33.9.B)

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Ventura County Air Pollution Control District
General Permit to Operate Conditions

1. Within 30 days after receipt of a permit to operate, the permittee may petition the Hearing Board, in writing, to review any new or modified condition on the permit. (APCD Rule 22)

2. This permit to operate, or a copy, shall be posted reasonably close to the subject equipment and shall be readily accessible to inspection personnel from the District. Posting a copy of the "Permitted Equipment and Applicable Requirements Table" contained in Section No. 2 will fulfill this requirement if the entire permit to operate is readily available at another location at the stationary source. (APCD Rule 19)

3. This permit to operate is not transferable from one location to another unless the equipment is specifically listed as being portable. (APCD Rule 20)

4. If, within a reasonable amount of time, any permittee refuses to furnish information requested by the District, the District may suspend this permit to operate. The permittee will be informed, in writing, of the permit suspension and the reasons for the suspension. (APCD Rule 27)

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11. MISCELLANEOUS FEDERAL PROGRAM CONDITIONS

This section contains miscellaneous federal program conditions that are not emission unit-specific or short-term. These federal requirements are broadly applicable requirements that apply and are enforced in the same manner for all subject emissions units or short-term activities. Permit conditions associated with these miscellaneous federal program requirements are listed in individual attachments. The attachment is identified with the label "Attachment 40CFR (Part No.) __" in the lower left corner of each attachment.

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Ventura County Air Pollution Control District
40 CFR Part 68 Applicable Requirements
Accidental Release Prevention and Risk Management Plans

40 CFR Part 68, "List of Regulated Substances and Thresholds for Accidental Release Prevention"
Federally-Enforceable

Applicability:

This attachment applies to regulated substances that are contained in a process at this stationary source and that exceed the threshold quantity, as presented in 40 CFR Part 68.130. This regulation addresses the requirements of section 112(r) of the federal Clean Air Act as amended. Specifically, this attachment applies to a facility that has stated that a federal Risk Management Plan pursuant to section 112(r) is currently not required, but where flexibility is desired to preclude a permit reopening should 40 CFR Part 68 become an applicable requirement. This stationary source does utilize a regulated substance, anhydrous ammonia (NH_3); however, the application states that the stored amount is less than the 10,000 pound threshold.

Conditions:

1. Should the stationary source, as defined in 40 CFR Part 68.3, become subject to Part 68, then the owner or operator shall submit a risk management plan (RMP) by the date specified in Part 68.10 and shall certify compliance with the requirements of Part 68 as part of the annual compliance certification as required by 40 CFR Part 70.

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Ventura County Air Pollution Control District
40 CFR Part 82 Applicable Requirements
Protection of Stratospheric Ozone

40 CFR Part 82, "Protection of Stratospheric Ozone"
40 CFR Part 82, Subpart B, "Servicing of Motor Vehicle Air Conditioners"
40 CFR Part 82, Subpart F, "Recycling and Emissions Reduction"
Federally Enforceable (last revised 11/18/16)

Applicability:

This attachment applies to activities conducted at this facility that involve producing, importing, exporting, or consuming of the specified controlled substances described under 40 CFR Part 82.4. Specifically, this attachment includes the requirements of 40 CFR Part 82, Subpart B, "Servicing of Motor Vehicle Air Conditioners," and 40 CFR Part 82, Subpart F, "Recycling and Emissions Reduction."

As stated in 40 CFR Part 82.30, 40 CFR Part 82, Subpart B applies to any person performing service on a motor vehicle for consideration when this service involves the refrigerant in the motor vehicle air conditioner.

As stated in 40 CFR Part 82.150, 40 CFR Part 82, Subpart F applies to any person maintaining, servicing, or repairing appliances containing class I, class II, or non-exempt substitute refrigerants. This subpart also applies to persons disposing of such appliances (including small appliances and motor vehicle air conditioners), refrigerant reclaimers, technician certifying programs, appliance owners and operators, manufacturers of appliances, manufacturers of recovery and/or recycling equipment, approved recovery and/or recycling equipment testing organizations, and persons buying, selling, or offering to sell class I, class II, or non-exempt substitute refrigerants.

As defined in 40 CFR82.152, *appliance* means any device which contains and uses a class I or class II substance or substitute as a refrigerant and which is used for household or commercial purposes, including any air conditioner, motor vehicle air conditioner, refrigerator, chiller, or freezer. For a system with multiple circuits, each independent circuit is considered a separate appliance. *Refrigerant* means, for purposes of this subpart, any substance, including blends and mixtures, consisting in part or whole of a class I or class II ozone-depleting substance or substitute that is used for heat transfer purposes and provides a cooling effect.

Conditions:

1. If the permittee performs a service on motor (fleet) vehicles when this service involves ozone-depleting substance refrigerant (or regulated substitute substance) in the motor vehicle air conditioner (MVAC), the permittee is subject to all the applicable

requirements as specified in 40 CFR Part 82, Subpart B, "Servicing of Motor Vehicle Air Conditioners."

The term "motor vehicle" as used in Subpart B does not include a vehicle in which final assembly of the vehicle has not been completed. The term "MVAC" as used in Subpart B does not include the air-tight sealed refrigeration system used as refrigerated cargo, or system used on passenger buses using HCFC-22 refrigerant.

2. If the permittee performs maintenance on, or services, repairs, or disposes of appliances, the permittee is subject to all of the applicable requirements as specified in 40 CFR Part 82, Subpart F, "Recycling and Emissions Reduction."

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Ventura County Air Pollution Control District
Permit Shield - New Source Performance Standards
40 CFR Part 60, Subparts D, Da, Db, and Dc

40 CFR Part 60, Subpart D, "Standards of Performance for Fossil - Fuel - Fired Steam Generators for Which Construction Is Commenced After August 17, 1971"

40 CFR Part 60, Subpart Da, "Standards of Performance for Electric Utility Steam Generating Units for Which Construction Is Commenced After September 18, 1978"

40 CFR Part 60, Subpart Db, "Standards of Performance for Industrial - Commercial - Institutional Steam Generating Units"

40 CFR Part 60, Subpart Dc, "Standards of Performance for Small Industrial - Commercial - Institutional Steam Generating Units"

Permit Shield:

The New Source Performance Standards listed above have been reviewed; and it has been determined that they are not applicable to this stationary source. The following discussions detail the determination of this permit shield for the 51 MMBTU/Hr Coen Duct Burner, the 4.9 MMBTU/Hr Maxon Duct Burner, and the 108.0 MMBTU/Hr Nebraska Steam Boiler. The units burn natural gas only.

40 CFR Part 60, Subparts D and Da are applicable to electric utility steam generating units combusting more than 73 megawatts (250 million BTU/Hr) heat input. Therefore, since none of the above units has a heat input greater than 250 MMBTU/Hr, Subparts D and Da are not applicable.

40 CFR Part 60, Subpart Db is applicable to steam generating units for which construction, modification, or reconstruction was commenced after June 19, 1984; and that have a maximum design heat input capacity of greater than 29 megawatts (100 million BTU/Hr). Since construction of the 108.0 MMBTU/Hr Nebraska Steam Boiler commenced prior to June 19, 1984; and since the unit has not undergone any reconstruction or modifications, as defined in the New Source Performance Standards, Subpart Db of 40 CFR Part 60 is not applicable to the Nebraska boiler. Since the duct burners have heat inputs less than 100 MMBTU/Hr, Subpart Db is not applicable to the 51 MMBTU/Hr Coen Duct Burner or the 4.9 MMBTU/Hr Maxon Duct Burner.

40 CFR Part 60, Subpart Dc is applicable to steam generating units for which construction, modification, or reconstruction was commenced after June 9, 1989; and that have a maximum design heat input capacity of 29 megawatts (100 million BTU/Hr) or less, but greater than or equal to 2.9 MW (10 MMBTU/Hr). Construction of both the 51 MMBTU/Hr Coen Duct Burner

and the 4.9 Maxon Duct Burner commenced prior to June 9, 1989. The Coen unit was first permitted with the Cogeneration Unit on May 24, 1989. The Maxon unit has also been determined to be part of the original construction of the Cogeneration Unit. Also the Maxon duct burner was de-rated from 10.0 MMBTU/hr to 4.9 MMBTU/hr in 2017. Neither duct burner has undergone any reconstruction or modifications, as defined in the 40 CFR Part 60, Sections 60.14 and 60.15. A "modification" requires an emission increase and a "reconstruction" means that the fixed capital cost of the new components exceeds 50 percent of the capital cost that would be required to construct a comparable entirely new facility. The burner elements of the Coen duct burner were replaced after June 9, 1989 (Authority to Construct No. 0157-180); however, the capital cost of this project did not exceed 50 percent of the fixed capital cost that would be required to construct a comparable entirely new facility. The Heat Recovery Steam Generator associated with the duct burners has not been replaced or modified as part of this project. Therefore, Subpart Dc of 40 CFR Part 60 is not applicable to this stationary source.

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Ventura County Air Pollution Control District
Permit Shield
Standard of Performance for Stationary Spark Ignition Internal combustion Engines

40 CFR Part 60, Subpart JJJJ, "Standards of Performance for Stationary Spark Ignition Internal Combustion Engines"

Permit Shield:

The New Source Performance Standard listed above has been reviewed; and it has been determined that it is not applicable to this stationary source. The following discussion details the determination of this permit shield for the 88 BHP natural gas fired backup generator engine listed in the Insignificant Activities Table and Table No. 2.

Discussion:

40 CFR Part 60, Subpart JJJJ, "Standards of Performance for Stationary Spark Ignition Internal Combustion Engines," is applicable to various categories of spark ignition engines that are manufactured, modified, or reconstructed after specific listed dates. The earliest applicable date listed in the regulation is June 12, 2006. Submitted applications have stated that the subject engine was constructed prior to June 12, 2006.

If a new engine is installed or an existing engine is modified or reconstructed at the stationary source, it may be subject to 40 CFR Part 60, Subpart JJJJ.

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Ventura County Air Pollution Control District
Permit Shield – Standards of Performance for Stationary Combustion Turbines
40 CFR Part 60, Subpart KKKK

40 CFR Part 60, Subpart KKKK, "Standards of Performance for Stationary Combustion Turbines"

Permit Shield:

The requirements of 40 CFR Part 60, Subpart KKKK, "Standards of Performance for Stationary Combustion Turbines" have been reviewed; and it has been determined that this federal regulation is not applicable to this stationary source. The following discussion details the determination of this permit shield for the GE LM 2500-PK Turbine.

Discussion:

40 CFR Part 60, Subpart KKKK, is applicable to stationary combustion turbines with a heat input at peak load equal to or greater than 10 MMBTU/hr which commenced construction, modification, or reconstruction after February 18, 2005. The GE LM 2500-PK Turbine is rated at 290 MMBTU/hr; however, it was constructed prior to February 18, 2005. The turbine has been a part of Part 70 Permit No. 00157 since it was initially issued on April 1, 1999; and there have been no physical modifications to the turbine since that time. The unit was initially permitted with the District on May 24, 1989.

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Ventura County Air Pollution Control District
Permit Shield – National Emission Standards for Hazardous Air Pollutants
40 CFR Part 63, Subpart YYYY

40 CFR Part 63, Subpart YYYY, "National Emission Standards for Hazardous Air Pollutants for Stationary Combustion Turbines"

Permit Shield:

The requirements of 40 CFR Part 63, Subpart YYYY, "National Emission Standards for Hazardous Air Pollutants for Stationary Combustion Turbines" have been reviewed; and it has been determined that this federal regulation is not applicable to this stationary source. The following discussion details the determination of this permit shield for the GE LM2500-PK Turbine. The unit is fired on natural gas.

Discussion:

40 CFR Part 63, Subpart YYYY, is applicable to stationary combustion turbines that operate at a major source of HAP (Hazardous Air Pollutant) emissions. A stationary source is a major source of HAP emissions when the HAP emissions exceed thresholds of 10 tons per year of a single HAP or 25 tons per year of combined HAPs. Emissions at this stationary source do not exceed these HAP thresholds; therefore, this stationary source is not a major source of HAP emissions. The HAP emissions for the stationary source are shown in the Reissuance Application.

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Ventura County Air Pollution Control District
Permit Shield
National Emission Standards for Hazardous Air Pollutants for Industrial, Commercial, and Institutional Boilers Area Sources

40 CFR Part 63, Subpart JJJJJJ, "National Emission Standards for Hazardous Air Pollutants for Industrial, Commercial, and Institutional Boilers Area Sources"

Permit Shield:

The requirements of 40 CFR Part 63, Subpart JJJJJJ, "National Emission Standards for Hazardous Air Pollutants for Industrial, Commercial, and Institutional Boilers Area Sources" have been reviewed; and it has been determined that the boilers at this stationary source are not subject to this federal regulation. The following discussion details the determination of this permit shield for the 108 MMBTU/hr Nebraska Boiler. The unit is fired on natural gas only.

Discussion:

Section 63.1195(e) of 40 CFR Part 63, Subpart JJJJJJ, states that gas-fired boilers are not subject to Subpart JJJJJJ. Gas-fired boilers are defined in the subpart as any boiler that burns gaseous fuels not combined with any solid fuels and burns liquid fuels only during periods of gas curtailment, gas supply interruption, startups, or periodic testing on liquid fuel. Periodic testing of liquid fuel shall not exceed a combined total of 48 hours during any calendar year (Section 63.11237). The 108 MMBTU/hr Nebraska boiler meets this definition as used at this stationary source because it is required to burn natural gas only.

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Ventura County Air Pollution Control District
Permit Shield - Acid Rain Program
40 CFR Parts 72- 78

40 CFR Part 72, "Permits Regulation"

40 CFR Part 73, "Sulfur Dioxide Allowance System"

40 CFR Part 74, "Sulfur Dioxide Opt-Ins"

40 CFR Part 75, "Continuous Emission Monitoring"

40 CFR Part 76, "Acid Rain Nitrogen Oxides Emission Reduction Program"

40 CFR Part 77, "Excess Emissions"

40 CFR Part 78, "Appeal Procedures for Acid Rain Program"

Permit Shield:

The following discussion details the determination of this permit shield for the cogeneration unit which consists of a General Electric LM 2500-PK natural gas-fired turbine that drives a 29 MW electrical generator, and which is also equipped with a 51 MMBTU/Hr natural gas-fired Coen duct burner.

Although the cogeneration unit commenced commercial operation before November 15, 1990, the original engine portion of the cogeneration unit (a General Electric LM 2500-PE gas turbine) was replaced with the current engine (General Electric LM 2500-PK gas turbine) in 1998.

This stationary source supplies equal to or less than 219,000 Mwe-hr actual electrical output on an annual basis to any utility power distribution system for sale (on a gross basis). Therefore, the exemption in 40 CFR Part 72.6(b)(4)(i) or 40 CFR Part 72.6(b)(4)(ii) applies to this cogeneration unit.

This permit shield remains in effect as long as the cogeneration unit supplies equal to or less than 219,000 Mwe-hr actual electrical output on an annual basis to any utility power distribution system for sale (on a gross basis).

Permittee shall maintain records of the actual electrical output on a gross basis and shall make this records available upon request.

12. PART 70 PERMIT APPLICATION PACKAGE

The Part 70 permit application, which was submitted by this facility, is included in this section for reference only and is not a part of the Part 70 permit.

During the processing of the permit application, additional information was submitted by the facility in response to District requests. This additional information is included with the application. If the applicant was asked to replace a page or a portion of the application, the original submittal is stamped "REPLACED" and the replacement page or section is placed in front of the original. The applicant and District correspondence for the Part 70 permit application is located in the District permit file for this stationary source.

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APPENDIX E - AETB Information and Certifications

South Coast
Air Quality Management District
21865 Copley Drive, Diamond Bar, CA 91765-4178
(909) 396-2000 • www.aqmd.gov

March 13, 2020

Mr. Richard Vacherot
Horizon Air Measurement Services, Inc.
310 Cortez Circle
Camarillo, CA 93012

Subject: LAP Approval Notice
Reference # 94LA0211

Dear Mr. Vacherot:

We completed our review of the renewal application you submitted for approval under the South Coast Air Quality Management District's Laboratory Approval Program (LAP). We are pleased to inform you that your firm is approved for the period beginning May 31, 2020, and ending May 31, 2021 for the following methods:

Methods 1-4
Method 100.1
Method 25.1 (Sampling & Trap Burning)
Method 25.3 (Sampling)
Methods 5.1, 5.2, 5.3, and 6.1 (Sampling & Analysis)
Rule 462 Testing
Rule 1174 Protocol
Rule 1420/ 1420.1/ 1420.2 – Source Sampling

Thank you for participating in the LAP. Your cooperation helps us to achieve the goal of the LAP: to maintain high standards of quality in the sampling and analysis of source emissions. You may direct any questions or information to LAP Coordinator, Glenn Kasai. He may be reached by telephone at (909) 396-2271, or via e-mail at gkasai@aqmd.gov.

Sincerely,

D. Sarkar

Dipankar Sarkar
Program Supervisor
Source Test Engineering

DS:GK/gk

200313 LapRenewal.doc

October 5, 2020

Mr. Richard Vacherot
Horizon Air Measurement Services, Incorporated
310 Cortez Circle
Camarillo, California 93012

Dear Mr. Vacherot:

I am pleased to inform you that the California Air Resources Board (CARB) has approved, by means of enclosed Executive Order I-20-012, Horizon Air Measurement Services, Incorporated to perform CARB Test Methods 1, 2, 3, 4, 5, 8, 17, 100 (CO, CO_2, NO_x, O_2, SO_2, THC), U.S. Environmental Protection Agency Test Methods 18, 201A and 202, and Visible Emissions Evaluation. These approvals are valid through June 30, 2023, during which time additional audits of Horizon Air Measurement Services, Incorporated's testing ability may be performed.

If you have questions or need further assistance, please contact Kathryn Gugeler at kathryn.gugeler@arb.ca.gov or Christopher Dilbeck at christopher.dilbeck@arb.ca.gov.

Sincerely,

Catherine Dunwoody, Chief
Monitoring and Laboratory Division

Enclosure

cc: Christopher Dilbeck, Manager
Testing and Certification Section

Kathryn Gugeler
Monitoring and Laboratory Division

arb.ca.gov 1001 I Street • P.O. Box 2815 • Sacramento, California 95812 (800) 242-4450

HORIZON

AIR MEASUREMENT SERVICES, INC.

Air Emissions Testing Body Certification

Horizon Air Measurement Services, Inc.
310 Cortez Circle
Camarillo, California 93012
(805) 482-8753
testing@horizonairmeasurement.com

As the Technical Director and President of Horizon Air Measurement Services, Inc., I hereby certify that Horizon Air Measurement Services, Inc. operates in conformance with ASTM D7036 with respect to all EPA Reference Methods applicable to source emissions testing required by 40 CFR Part 75.

Richard Vacherot
Technical Director
Horizon Air Measurement Services, Inc.

Date: 1/4/21

Q:\QA-QC Manual\QSTI-AETB\AETB Certification.wpd

310 CORTEZ CIRCLE, CAMARILLO, CALIFORNIA 93012 • (805) 482-8753 • FAX (805) 482-8754
WWW.HORIZONAIRMEASUREMENT.COM

AETB Information

1. Qualified Individual Information

Name	Test Date	Expiration Date	Group Numbers
Richard John Vacherot	February 2, 2017	February 2, 2022	1, 3 & 4
Scott Hamilton Bunch	February 2, 2017 May 3, 2017	February 2, 2022 May 3, 2022	1 & 3 4
Joseph Michael Bennett	February 2, 2017	February 2, 2022	1, 3 & 4
Paul David Koster	November 4, 2016 January 24, 2020 February 3, 2020	November 4, 2021 January 24, 2025 February 3, 2025	3 1 4
Martin Craig Harrild	May 9, 2019 May 31, 2019 October 24, 2019	May 9, 2024 May 31, 2024 October 24, 2024	1 4 3
Gerardo Pinales Jr.	February 6, 2020 June 3, 2020	February 6, 2025 June 3, 2025	1 3
Hayley Aarsvold	January 29, 2020 February 17, 2020 May 18, 2020	January 29, 2025 February 17, 2025 May 18, 2025	1 3 4

2. Testing Company Information

Horizon Air Measurement Services, Inc.
(805) 482-8753
testing@horizonairmeasurement.com

3. Qualification Exam Provider Information

Eastern Technical Associates
kristy@smokeschool.com

APPENDIX F - Test Plan Approval Letter

RE: New-Indy Initial CEMS Certification and RATA Protocol Approval

From: Ed Swede <ed@vcapcd.org>
Sent: Wed, Mar 17, 2021 at 2:00 pm
To: 'Kathy Kennedy', Robyn.Lebrilla@new-indycb.com
Cc: Joe Bennett, Rich Vacherot, Deborah Vacherot

image001.gif (4.1 KB) 00157_20210322_STPA_CEMCertLM2500.pdf (661 KB)
– Download all

Images not displayed.
SHOW IMAGES | ALWAYS SHOW IMAGES FROM THIS SENDER

Kathy,

Please find attached the requested approval to conduct an initial CEMS certification and RATA on the new system monitoring the GE LM2500 Gas Turbine located at New-Indy in Oxnard, CA. Please retain this attachment for your records. A hard copy will not be provided. Testing is currently scheduled for March 22 and 23, 2021.

If you have any questions or comments, please contact me.

Sincerely,

Ed Swede
Engineer, Compliance Division
Ventura County APCD
4567 Telephone Rd, 2nd Floor
Ventura, CA 93003
805/303-3708
logo w text

From: Kathy Kennedy <kathy@horizonairmeasurement.com>
Sent: Tuesday, March 9, 2021 11:21 AM
To: Robyn.Lebrilla@new-indycb.com; Ed Swede <ed@vcapcd.org>
Cc: Joe Bennett <joe@horizonairmeasurement.com>; Rich Vacherot <rich@horizonairmeasurement.com>; Deborah Vacherot <deborah@horizonairmeasurement.com>
Subject: New-Indy Test Plan (N20-002-TP)

Hello Robyn,

Please find the attached pdf copy of the Test Plan entitled, "Test Plan to Conduct an Initial Continuous Emissions Monitoring System Certification Test Program on One Natural Gas-Fired Turbine."

Please note that one copy has been sent directly to you and one copy directly to Ed Swede at VCAPCD.

Should you have any questions or concerns please feel free to contact our office.

Thank you,

Kathy Kennedy
Technical Administrative Assistant
Horizon Air Measurement Services, Inc.
310 Cortez Circle
Camarillo, CA 93012
(805) 482-8753

Ventura County
Air Pollution
Control District

4567 Telephone Rd
Ventura, California 93003

tel 805/303-4005
fax 805/456-7797
www.vcapcd.org

Dr. Laki Tisopulos, P.E.
Air Pollution Control Officer

October 17, 2021

Mr. Joseph Bennett
Horizon Air Measurement Services, Inc.
310 Cortez Circle
Camarillo, CA 93012

Subject: VCAPCD Title V Permit No. 00157, Initial Continuous Emissions Monitoring System (CEMS) Certification Protocol Approval for GE LM2500 Gas Turbine

Dear Mr. Bennett:

We have reviewed the initial CEMS certification test protocol for the New-Indy Oxnard, LLC replacement CEMS monitoring the GE LM2500 Gas Turbine located at 5936 Perkins Road Oxnard, CA 93033 dated March 9, 2021. We find that the protocol is acceptable.

You are authorized to conduct the CEMS certification and RATA testing on March 22 and 23, 2021.

Thank you for your cooperation in this matter. If you have any questions, please contact me at 805-303-3704 or ed@vcapcd.org.

Sincerely,

Ed Swede, Air Quality Engineer
VCAPCD, Compliance Division

c. Robyn Lebrilla, New-Indy Oxnard LLC

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OF THIS DOCUMENT

AIRx Testing Services, Inc.

LM2500 – PK GENERAL ELECTRIC
GAS TURBINE
ANNUAL COMPLIANCE and RATA EMISSIONS TESTING
VCAPCD PTO #0157
March 15, 2021

For:
NEW INDY OXNARD
5936 Perkins Road,
Oxnard, CA 93033

Attn: Robyn Lebrilla

Facility Location:
NEW INDY OXNARD
5936 Perkins Road,
Oxnard, CA 93033

For Submission to:
Ventura County Air Pollution Control District
669 County Square Drive
Ventura, California 93003

Attn: Ed Swede

Prepared by:
AIRx Testing Services, Inc.
2472 Eastman Avenue #34
Ventura, CA 93003

Job No.: 23022

Lab No.: 221-014

Ken Kennepohl
Test Team Leader

Reviewed by:
Tom Porter

Submitted
March 31, 2021

Table of Contents

AIRX TESTING SERVICES, INC.

SUMMARY OF SOURCE TEST RESULTS

New Indy
Gas Turbine
Rosemount CEM
3/15/2021

CONSTITUENTS	Run 1	Run 2	Run 3	*Average*	*Allowable*
NOx, ppmv:	10.6	10.3	10.1	*10.3*	-
NOx ppmv @ 15 % O2:	10.9	10.4	10.0	*10.4*	*12*
NOx, lb/hr:	10.46	10.12	9.73	*10.10*	-
NOx, lb/MMBtu	0.0012	0.0012	0.0011	*0.0012*	-
CO, ppmv:	14.9	12.7	13.7	*13.8*	-
CO, ppmv @ 15% O2:	15.3	12.9	13.6	*13.9*	-
CO, lb/hr:	8.95	7.61	8.06	*8.21*	*59.65*
CO, lb/MMBtu	0.0010	0.00087	0.00093	*0.00094*	-
O2, %:	15.2	15.1	15.0	*15.1*	-
NH3, ppmv:	1.2	1.2	1.4	*1.3*	-
NH3, ppmv @ 15% O2:	1.2	1.2	1.4	*1.3*	*20*
Stack Flow:	137968	137303	135105	*136792*	-
Ammonia Injection Rate, lb/hr (avg):	22.27	23.88	24.44	*23.53*	-
Fuel Usage (Turbine & Duct), dscfm:	4147.9	4178.1	4192.7	*4172.9*	-
Turbine Load, MWh (avg):	23.44	23.63	23.58	*23.55*	-

AIRx Testing Services, Inc.

New Indy
Turbine
3/15/2021

CEMS RATA
Calculations

Run	AIRx Testing - Reference Method		
	NOx ppmv @ 15% O2	O2 Dry %	CO ppmv @ 15% O2
1	10.86	15.09	18.11
2	10.90	15.20	13.88
3	10.85	15.17	13.82
4	10.62	15.12	13.07
5	10.40	15.09	13.01
6	10.32	15.05	12.62
7	10.17	15.02	12.98
8	9.89	15.00	12.98
9	10.00	14.91	14.94

Run	New Indy		CEMS
	NOx ppmv @ 15%	O2 Dry %	CO ppmv @ 15%
1	10.64	15.10	18.62
2	10.46	15.21	15.20
3	10.61	15.20	13.54
4	10.45	15.24	13.46
5	10.53	15.26	13.56
6	10.52	15.26	13.56
7	10.58	15.26	13.56
8	10.39	15.26	13.56
9	10.62	15.15	15.77

Run	Reference Method - CEM, Difference		
	NOx ppmv @ 15%	O2 Dry %	CO ppmv @ 15%
1	0.2	0.0	-0.5
2	0.4	0.0	-1.3
3	0.2	0.0	0.3
4	0.2	-0.1	-0.4
5	-0.1	-0.2	-0.6
6	-0.2	-0.2	-0.9
7	-0.4	-0.2	-0.6
8	-0.5	-0.3	-0.6
9	-0.6	-0.2	-0.8

Arithmetic Mean, d	-0.1	-0.1	-0.6
Standard Deviation, Sd	0.4	0.1	0.4
Confidence Coefficient, CC	0.3	0.1	0.3
Avg Reference Method, RM	10.4	15.1	13.9
Relative Accuracy, RA	**3.6**	**1.5**	**6.7**

NOTE: Calculations based on "Code of Federal Regulations 40", 1988, Part 60, Appendix B, Specification 2, p. 939.

AIR TESTING SERVICES, INC.

New Indy
Turbine
3/15/2021

CEM Bias Adjustment Factor (BAF) Calculations Summary

Raw NOx, ppmv	
Average Difference, RM-CEM; d	-0.1
Std Deviation; Sdev	0.4
T' Value	2.306
Number of Runs; n	9
Conf. Coefficient; CC	0.29
|CC|-|d| ; If > zero, No BAF Required	0.199
Mean CEM Results, CEM	10.5
Raw NOx ppm, BAF	1.009

CO, ppmv @ 15% O2	
Average Difference, RM-CEM; d	-0.6
Std Deviation; Sdev	0.4
T' Value	2.306
Number of Runs; n	9
Conf. Coefficient; CC	0.3
|CC|-|d| ; If > zero, No BAF Required	-0.3
Mean CEM Results, CEM	14.5
CO @ 15% O2, BAF	-0.052

NOTES:
1. Calculation of BAF based on SCAQMD protocol for Rule 2012, Volume 3, SCAQMD Rules and Regulations XVIII - XXX, Sept 9, 1994; Att.B
2. If |NOx ppm diff.| < 1 ppm, then the NOx ppm BAF is not reqd.
3. If (RM - CEM avg diff.) < zero, the CEM is biased high; no BAF is reqd.
4. BAF = 1+(|d|/CEM) where 'd' refers to the average RM-CEM difference, and CEM refers to the average CEM results.

INTRODUCTION

1.0 INTRODUCTION

On March 15, 2021 AIRx Testing Services, Inc. conducted the annual compliance/RATA source test on a natural gas fired General Electric LM2500-PK Gas Turbine. The unit is located at the New Indy Plant on Perkins Road, in Oxnard. The turbine is used for the generation of electrical power and process heat for the facility operations. The tests were required to satisfy requirements detailed in PTO #0157.

The objective of the testing was to determine NOx, CO and NH3 emissions from the unit at one (1) operating load of approximately 100% capacity. Additionally, data taken from the compliance tests was used to determine the relative accuracy (RATA) of the facility CEM (Rosemont) equipment. Operational data reported by New Indy personnel was turbine and duct burner fuel usage (mscfh), Ammonia injection rate (lb/hr) and turbine load (KWh).

PROCESS DETAILS: The LM2500-PK is rated for 290 MMBtu/hr heat input and exhausts into an HRSG with a COEN duct burner. The duct burner is rated at 50.8 MMBtu/hr. Emissions are controlled with a Babcock-Hitachi Selective Catalytic Converter (SCR). The SCR uses ammonia injection for NOx reduction. The duct dimensions at the sample location are 54" x 125". An integrated sampling probe has been installed by the facility. All sampling was performed from the integrated sampling probe. The sample port locations are located zero diameters upstream and one (1) equivalent diameter downstream from a disturbance; consequently velocity traverses could not be accurately performed.

CEM DATA: CEM data was recorded by a Data Acquisition System (DAS) during the test program in the form of one (1) minute averages. The one (1) minute data averages were then printed out and averaged to obtain CEM data for comparison to the RM data. The CEM data was obtained by plant personnel during the test program and was provided to the test team. The CEM data monitored NOx in ppmv and CO ppmv concentrations corrected to 15% oxygen and oxygen concentrations. NOx, CO and O2 response times were conducted prior to the start of the testing.

CONTINUOUS MONITORS: NOx, CO, and O2 sampling utilized a stainless steel multi-point sampling probe connected with a Teflon sampling line to a sample conditioner. The dry gases were then transported through a Teflon line to the sample gas flow panel for distribution to the individual analyzers. Triplicate 96 minute sampling for NOx, CO and O2 was performed in accordance with CARB Method 100 and EPA Method 20. NOx measurements were made utilizing an API 200EH chemiluminescent analyzer. CO concentrations were determined with an API 300EM NDIR w/GFC analyzer. Oxygen concentration was measured utilizing a Servomex Model 1400 paramagnetic analyzer. Initial three (3) point calibrations were performed at the analyzers. Subsequent calibrations were performed through the sample system probe tip (Bias checks). All initial bias checks correlated with the initial instrument calibrations to within 2% of analyzer range. Bias calibrations were performed before and after each test run and used to correct the emissions data for any analyzer drift. All monitor calibrations were performed with EPA Protocol 1 calibration gases.

During all tests, the NOx and O2 RM analyzers were operated on the 25 ppmv and 25% scales, respectively. The CO monitor was setup and calibrated for operation on the 50 ppmv scale.

There were no deviations from CARB Method 100 or EPA Method 20 methodology during the test.

1.0 INTRODUCTION (cont)

CONTINUOUS MONITORS cont):

All monitored data was continuously recorded on a 10" analog chart recorder. Chart speed was maintained at 10 cm/hr. Analyzer output was also recorded with a PC based Data Acquisition System (DAS) and imported into spreadsheets for determination of average run concentrations.

FLOWRATE: Stack flow calculations were performed using fuel consumption data provided by plant personnel (turbine and duct burner fuel usages added together) and the stack oxygen, in accordance with EPA Method 19.

AMMONIA: Exhaust duct ammonia samples were collected and analyzed in accordance with BAAQMD Method ST-1B. The sample train consists of four (4) iced impingers, the first two (2) contained approximately 150 ml 0.1N HCl, the third is empty and the fourth contains silica gel. The sample was collected utilizing an EPA Method 5 sampling console, Three (3) 96 minute runs were collected for compliance determination. Samples were collected utilizing stainless a steel sampling probe. Analysis of the collected ammonia samples was performed by the AIRx Testing Services laboratory.

All reporting and calculations have been performed using VCAPCD standard conditions of 68°F and 29.92 inches of Hg. If you have any questions regarding this test program or report, please contact the undersigned at (805) 644-1099.

Respectfully Submitted
AIRx Testing Services, Inc.

Ken Kennepohl
Senior Engineer

Reviewed by:

Tom Porter
Vice President of Testing Services

CALCULATIONS

CONTINUOUS EMISSIONS MONITORING - CARB METHOD 1-100

Client : New Indy
Site : Oxnard
Unit : Turbine

Date : 3/15/2021
Job# : 23022
Lab# : 219-012

FIELD DATA

Test Length 96 mins. Points 1 Minute

Standard Temperature: 68 ° *F*

Drift Corrected Emissions Data

	Run #1		*Run #2*		*Run #3*	
Outlet						
NOx	10.6	ppm	10.3	ppm	10.1	ppm
O2	15.2	%	15.1	%	15.0	%
CO	14.9	ppm	12.7	ppm	13.7	ppm

Process Data

Exhaust Flow	137968	dscfm	137303	dscfm	135105	dscfm
F-Factor	8710	dscf/MMBtu	8710	dscf/MMBtu	8710	dscf/MMBtu

Equations used;
Tfact = (10^-6*(29.92/(21.85*(460+Tstd)))*60
lb/hr = [ppmv] * Q * MW * (Tfact)
lb/MM Btu = [lb/hr]/[MMBtu/hr]
ppmv @ 15% O2 = ppm * 5.9(20.9/(20.9-O2))
MW NOx = 46; CO = 28

CALCULATED EMISSIONS

NOx	10.9	ppm @ 15% O2	10.4	ppm @ 15% O2	10.0	ppm @ 15% O2
	10.46	lb/hr	10.12	lb/hr	9.73	lb/hr
	0.0012	lb/MMBtu	0.0012	lb/MMBtu	0.0011	lb/MMBtu
CO	15.3	ppm @ 15% O2	12.9	ppm @ 15% O2	13.6	ppm @ 15% O2
	8.95	lb/hr	7.61	lb/hr	8.06	lb/hr
	0.0010	lb/MMBtu	0.00087	lb/MMBtu	0.00093	lb/MMBtu

Compliance Bias Adjustment

Facility: International Paper
Source: Turbine
Date: 03/15/21

Compliance Testing
Run No. 1

Parameter	Measured Conc. (ppm,%)	Reference Span gas (ppm.%)	Initial Bias Zero (ppm.%)	Final Bias Zero (ppm.%)	Average Bias Zero (ppm.%)	Initial Bias Span (ppm.%)	Final Bias Span (ppm.%)	Average Bias Span (ppm.%)	Bias Adjusted Conc. (ppm.%)
NOx	10.61	12.0	0.0	0.0	0.0	12.0	12.0	12.0	**10.59**
O2	15.19	12.0	0.0	0.0	0.0	12.0	12.0	12.0	**15.15**
CO	14.89	20.5	0.0	0.0	0.0	20.5	20.5	20.5	**14.89**

Run No. 2

Parameter	Measured Conc. (ppm,%)	Reference Span gas (ppm.%)	Initial Bias Zero (ppm.%)	Final Bias Zero (ppm.%)	Average Bias Zero (ppm.%)	Initial Bias Span (ppm.%)	Final Bias Span (ppm.%)	Average Bias Span (ppm.%)	Bias Adjusted Conc. (ppm.%)
NOx	10.31	12.0	0.0	0.0	0.0	12.0	12.0	12.0	**10.30**
O2	15.11	12.0	0.0	0.0	0.0	12.0	12.0	12.0	**15.08**
CO	12.72	20.5	0.0	0.0	0.0	20.5	20.5	20.5	**12.72**

Run No. 3

Parameter	Measured Conc. (ppm,%)	Reference Span gas (ppm.%)	Initial Bias Zero (ppm.%)	Final Bias Zero (ppm.%)	Average Bias Zero (ppm.%)	Initial Bias Span (ppm.%)	Final Bias Span (ppm.%)	Average Bias Span (ppm.%)	Bias Adjusted Conc. (ppm.%)
NOx	10.07	12.0	0.0	0.0	0.0	12.0	12.0	12.0	**10.06**
O2	14.99	12.0	0.0	0.0	0.0	12.0	12.0	12.0	**14.97**
CO	13.70	20.5	0.0	0.0	0.0	20.5	20.5	20.5	**13.70**

RATA Bias Adjustment

Facility: New Indy
Source: Turbine
Date: 03/15/21

Run No. 1

Parameter	Measured Conc. (ppm,%)	Reference Span gas (ppm.%)	Initial Zero (ppm.%)	Final Zero (ppm.%)	Average Zero (ppm.%)	Initial Span (ppm.%)	Final Span (ppm.%)	Average Span (ppm.%)	Adjusted Conc. (ppm.%)
NOx	10.72	12.0	0.0	0.0	0.0	12.0	12.0	12.0	**10.70**
O2	15.12	12.0	0.0	0.0	0.0	12.0	12.0	12.0	**15.09**
CO	17.86	20.5	0.0	0.0	0.0	20.5	20.5	20.5	**17.85**

Run No. 2

Parameter	Measured Conc. (ppm,%)	Reference Span gas (ppm.%)	Initial Zero (ppm.%)	Final Zero (ppm.%)	Average Zero (ppm.%)	Initial Span (ppm.%)	Final Span (ppm.%)	Average Span (ppm.%)	Adjusted Conc. (ppm.%)
NOx	10.55	12.0	0.0	0.0	0.0	12.0	12.0	12.0	**10.53**
O2	15.24	12.0	0.0	0.0	0.0	12.0	12.0	12.0	**15.20**
CO	13.41	20.5	0.0	0.0	0.0	20.5	20.5	20.5	**13.41**

Run No. 3

Parameter	Measured Conc. (ppm,%)	Reference Span gas (ppm.%)	Initial Zero (ppm.%)	Final Zero (ppm.%)	Average Zero (ppm.%)	Initial Span (ppm.%)	Final Span (ppm.%)	Average Span (ppm.%)	Adjusted Conc. (ppm.%)
NOx	10.56	12.0	0.0	0.0	0.0	12.0	12.0	12.0	**10.53**
O2	15.21	12.0	0.0	0.0	0.0	12.0	12.0	12.0	**15.17**
CO	13.42	20.5	0.0	0.0	0.0	20.5	20.5	20.5	**13.41**

Run No. 4

Parameter	Measured Conc. (ppm,%)	Reference Span gas (ppm.%)	Initial Zero (ppm.%)	Final Zero (ppm.%)	Average Zero (ppm.%)	Initial Span (ppm.%)	Final Span (ppm.%)	Average Span (ppm.%)	Adjusted Conc. (ppm.%)
NOx	10.42	12.0	0.0	0.0	0.0	12.0	12.0	12.0	**10.41**
O2	15.14	12.0	0.0	0.0	0.0	12.0	12.0	12.0	**15.12**
CO	12.82	20.5	0.0	0.0	0.0	20.5	20.5	20.5	**12.82**

Run No. 5

Parameter	Measured Conc. (ppm,%)	Reference Span gas (ppm.%)	Initial Zero (ppm.%)	Final Zero (ppm.%)	Average Zero (ppm.%)	Initial Span (ppm.%)	Final Span (ppm.%)	Average Span (ppm.%)	Adjusted Conc. (ppm.%)
NOx	10.26	12.0	0.0	0.0	0.0	12.0	12.0	12.0	**10.24**
O2	15.11	12.0	0.0	0.0	0.0	12.0	12.0	12.0	**15.09**
CO	12.82	20.5	0.0	0.0	0.0	20.5	20.5	20.5	**12.82**

RATA Bias Adjustment

Facility: New Indy
Source: Turbine
Date: 03/15/21

Run No. 6

Parameter	Measured Conc. (ppm,%)	Reference Span gas (ppm.%)	Initial Zero (ppm.%)	Final Zero (ppm.%)	Average Zero (ppm.%)	Initial Span (ppm.%)	Final Span (ppm.%)	Average Span (ppm.%)	Adjusted Conc. (ppm.%)
NOx	10.25	12.0	0.0	0.0	0.0	12.0	12.0	12.0	**10.24**
O2	15.08	12.0	0.0	0.0	0.0	12.0	12.0	12.0	**15.05**
CO	12.52	20.5	0.0	0.0	0.0	20.5	20.5	20.5	**12.52**

Run No. 7

Parameter	Measured Conc. (ppm,%)	Reference Span gas (ppm.%)	Initial Zero (ppm.%)	Final Zero (ppm.%)	Average Zero (ppm.%)	Initial Span (ppm.%)	Final Span (ppm.%)	Average Span (ppm.%)	Adjusted Conc. (ppm.%)
NOx	10.15	12.0	0.0	0.0	0.0	12.0	12.0	12.0	**10.13**
O2	15.04	12.0	0.0	0.0	0.0	12.0	12.0	12.0	**15.02**
CO	12.94	20.5	0.0	0.0	0.0	20.5	20.5	20.5	**12.94**

Run No. 8

Parameter	Measured Conc. (ppm,%)	Reference Span gas (ppm.%)	Initial Zero (ppm.%)	Final Zero (ppm.%)	Average Zero (ppm.%)	Initial Span (ppm.%)	Final Span (ppm.%)	Average Span (ppm.%)	Adjusted Conc. (ppm.%)
NOx	9.91	12.0	0.0	0.0	0.0	12.0	12.0	12.0	**9.89**
O2	15.02	12.0	0.0	0.0	0.0	12.0	12.0	12.0	**15.00**
CO	12.99	20.5	0.0	0.0	0.0	20.5	20.5	20.5	**12.99**

Run No. 9

Parameter	Measured Conc. (ppm,%)	Reference Span gas (ppm.%)	Initial Zero (ppm.%)	Final Zero (ppm.%)	Average Zero (ppm.%)	Initial Span (ppm.%)	Final Span (ppm.%)	Average Span (ppm.%)	Adjusted Conc. (ppm.%)
NOx	10.16	12.0	0.0	0.0	0.0	12.0	12.0	12.0	**10.15**
O2	14.93	12.0	0.0	0.0	0.0	12.0	12.0	12.0	**14.91**
CO	15.17	20.5	0.0	0.0	0.0	20.5	20.5	20.5	**15.17**

FIELD DATA & CALCULATIONS SUMMARY

Client: **International Paper**
Site: **Oxnard**
Unit: **Turbine**

Date: **3/15/2021**
Type: ***T std = 68 °F***
Run: **1-NH3**

Vm	Metered Sample Gas Volume	**68.306**	**dcf**		
Lp	Avg. Leak Rate	0.000	cf		
Vn	Leak Corrected Sample Gas Volume	68.306	dcf		
Y	Dry Gas Meter Calibration Factor	**1.0078**			
Pbar	Barometric Pressure	**30.02**	**in. Hg**		
del H	Dry Gas Meter Press. Differential, Average	**1.7**	**in. H2O**		
Tm	Dry Gas Meter Temperature, Average	65.6	°F	**525.6**	**°R**
Vm(std)	Sample Gas Volume	**69.6732**	**dscf**		
O2	Oxygen, Dry	**15.2**	**%**		
Theta	Sampling Time	**96**	**min.**		

CALCULATED EMISSION RESULTS

Client: **International Paper**
Site: **Oxnard**
Unit: **Turbine**

Date: **3/15/2021**
Type: ***T std = 68 °F***
Run: **1-NH3**

AMMONIA AS NH3

Ws	Ammonia Weight	**0.0017**	g
Cs	Ammonia Emissions	**0.00037**	grain/dscf
	Ammonia Concentration	**1.2**	ppmv
	Ammonia Concentration	**1.2**	ppmv @ 15% O2

FIELD DATA & CALCULATIONS SUMMARY

Client: **New Indy**
Site: **Oxnard**
Unit: **Turbine**

Date: **3/15/2021**
Type: ***T std = 68 °F***
Run: **2-NH3**

Vm	Metered Sample Gas Volume	**70.091**	**dcf**		
Lp	Avg. Leak Rate	0.002	cf		
Vn	Leak Corrected Sample Gas Volume	70.091	dcf		
Y	Dry Gas Meter Calibration Factor	**1.0078**			
Pbar	Barometric Pressure	**30.00**	**in. Hg**		
del H	Dry Gas Meter Press. Differential, Average	**1.7**	**in. H2O**		
Tm	Dry Gas Meter Temperature, Average	73.2	°F	**533.2**	**°R**
Vm(std)	Sample Gas Volume	**70.4281**	**dscf**		
O2	Oxygen, Dry	**15.1**	**%**		
Theta	Sampling Time	**96**	**min.**		

CALCULATED EMISSION RESULTS

Client: **New Indy**
Site: **Oxnard**
Unit: **Turbine**

Date: **3/15/2021**
Type: ***T std = 68 °F***
Run: **2-NH3**

AMMONIA AS NH3

Ws	Ammonia Weight	**0.00168**	g
Cs	Ammonia Emissions	**0.00037**	grain/dscf
	Ammonia Concentration	**1.2**	ppmv
	Ammonia Concentration	**1.2**	ppmv @ 15% O2

FIELD DATA & CALCULATIONS SUMMARY

Client: **New Indy**
Site: **Oxnard**
Unit: **Turbine**

Date: **3/15/2021**
Type: ***T std = 68 °F***
Run: **3-NH3**

Vm	Metered Sample Gas Volume	**72.568**	**dcf**		
Lp	Avg. Leak Rate	0.001	cf		
Vn	Leak Corrected Sample Gas Volume	72.568	dcf		
Y	Dry Gas Meter Calibration Factor	**1.0078**			
Pbar	Barometric Pressure	**29.98**	**in. Hg**		
del H	Dry Gas Meter Press. Differential, Average	**1.7**	**In. H2O**		
Tm	Dry Gas Meter Temperature, Average	77.7	°F	537.7	°R
Vm(std)	Sample Gas Volume	**72.2587**	**dscf**		
O2	Oxygen, Dry	**15.0**	**%**		
Theta	Sampling Time	**96**	**min.**		

CALCULATED EMISSION RESULTS

Client: **New Indy**
Site: **Oxnard**
Unit: **Turbine**

Date: **3/15/2021**
Type: ***T std = 68 °F***
Run: **3-NH3**

AMMONIA AS NH3

Ws	Ammonia Weight	**0.00212**	g
Cs	Ammonia Emissions	**0.00045**	grain/dscf
	Ammonia Concentration	**1.4**	ppmv
	Ammonia Concentration	**1.4**	ppmv @ 15% O2

"F" FACTOR EXHAUST GAS FLOWRATE CALCULATION

Client : New Indy
Site : Oxnard
Unit : Turbine

Date : 3/15/2021
Job# : 23022
Lab# : 219-012

"F" Factor, Q(std): 8710 dscf/MMBTU

Standard Temperature, T std: 68 deg. F

	Run 1	*Run 2*	*Run 3*
Oxygen, % (avg)	15.2	15.1	15.0
Fuel Usage, dscfm (avg)	4147.9	4178.1	4192.7
MMBTU/min	4.3553	4.3870	4.4023
Flowrate ("F" Factor), dscfm	137968	137303	135105

formulae:
MMBTU/min = (Fuel Usage * 1050 Btu/ft3)/10^6
Flowrate ("F" Factor) = "F" Factor * MMBTU/min * (20.0/(20.9-O2))

LABORATORY ANALYSIS

AIRX TESTING SERVICES Inc.

AMMONIA ANALYSIS
BAAQMD Method ST-1B

Client: New Indy
Site: Oxnard
Unit: Turbine

Analysis Date: 3/15/20218
Lab: 221-014

	Sample Volume (ml)	Aliquot Volume (ml)	Reading ug/ml	Dilution
Run#: R1	405.1	49	3.35	1
	Total NH3 mg/sample		1.65	
Run#: R-2	377.5	49	3.65	1
	Total NH3 mg/sample		1.68	
Run#: R-3	409.5	49	4.31	1
	Total NH3 mg/sample		2.16	
Run #: R3 (Duplicate)	409.5	49	4.23	1
	Total NH3 mg/sample		2.12	
0.1 N HCL Blank	200	49	0.05	1
Run #: R-3	409.5	48	5.23	1

Spike (1 ug/ml) Theoretical Value = 5.14 (ug/ml)
% Recovery 101.8 %

Total NH3 mg/sample = (ug/ml-HCl blank)*60.71*Dilution*Sample Vol/(Aliquot*1000)

Analyst: Ferodie Torres

AIRX TESTING SERVICES Inc.

BAAQMD ST-1B
AMMONIA

Client: NEW INDY
Site: OXNARD, CA
Unit: TURBINE

Analysis Date: 03.17.21
Lab: 220.

		Sample Volume (ml)	Aliquot Volume (ml)	Reading ug/ml	Dilution
Run#: 1	<2	405.1	49	3.35	1
		Total NH3 mg/sample			
Run#: 2	<2	377.5	49	3.65	1
		Total NH3 mg/sample			
Run#: 3	<2	409.5	49	4.31	1
		Total NH3 mg/sample			
Run #: 3 DUP		409.5	49	4.23	1
		Total NH3 mg/sample			
0.1 N HCL Solution		200	49	0.05	NA
		200	49	0.05	NA
0.1 N HCL Trip Blank		200	49	0.05	NA
		200	49	0.05	NA
Run #: 3		409.5	48	5.23 / 5.25	NA

Spike (1 ug/ml) Theoretical Value = 5.14 (ug/ml)

Analyst:

FIELD DATA & STRIP CHARTS

EMISSIONS TEST - SCAQMD Method 100.1

Date: 03/15/21

Job #: 221-014
Client #: 23022

**** Test Information ****

Client: New Indy
County: Ventura
Site(s): Oxnard, CA
Unit(s): Turbine

**** Personnel ****

AIRx: KK/FT
Client: RL
APCD: -

Run Length:	32	Inlet ( )	Outlet(X)	Fuel ( )	HC's( )	
No. Points:	Single	S.T.(X)	E.I.( )	Data( )	H2S ( )	NH3 ( )

	Time	Baro.	Temp.	Weather.
Arrive:	6:30 AM	30.02	50	Clear
Depart:	3:30 PM	29.96	67	Clear

**** Instrument Information ****

Instrument	"On"	Unit#	Make/Model		
Outlet NOx:	1	3	API 200EH		
O2:	1	12	Servomex 1400		
CO:	1	3	API 300EM		
Recorders:			Soltec 6 pin	10	cm/hr

**** Calibration Information ****

	Units	Zero	Span	Range	Gas Cyl.#	Gas Flow
NOx:	ppmv	0.0	12.0	25	DT0011049	1.0
NOx:	ppmv	0.0	20.2	25	CC724456	1.0
NO2:	ppmv	0.0	19.0	25	CC3240	1.0
O2:	%	0.0	12.0	25	CC134279	0.6
O2:	%	0.0	20.1	25	CC144381	0.6
CO:	ppmv	0.0	20.5	50	DT0012296	1.0
CO:	ppmv	0.0	40.0	50	CC272657	0.6

**** Recorder Information ****

		Chanl.	Pen Type	Color
Outlet NOx:	ppmv	1	Cont.	Brown
O2:	%	2	Cont.	Green
CO:	ppmv	3	Cont.	Purple

CLIENT:	New Indy	JOB#	219-012
PLANT:	Oxnard	RUN#	Compliance R1
DATE:	3/15/2021	RUN START:	9:00 AM
ENGINEER:	KK/FT		

NOx. ppm	CO. ppm	O2. %	NOx. ppm @ 15% O2	CO. ppm @ 15% O2	TIME
10.61	**14.89**	**15.19**	**10.96**	**15.36**	**Averages**
10.83	18.21	15.12	11.05	18.60	9:00
10.66	18.18	15.03	10.74	18.30	9:01
10.61	18.14	15.03	10.67	18.24	9:02
10.74	18.00	15.13	10.99	18.42	9:03
10.70	18.02	15.15	10.97	18.49	9:04
10.55	17.99	15.14	10.81	18.44	9:05
10.55	17.91	15.14	10.81	18.36	9:06
10.65	17.95	15.15	10.92	18.41	9:07
10.64	18.03	15.14	10.90	18.47	9:08
10.63	18.02	15.14	10.90	18.48	9:09
10.68	17.97	15.14	10.93	18.41	9:10
10.95	17.79	15.13	11.20	18.20	9:11
10.94	17.87	15.14	11.20	18.30	9:12
10.85	17.86	15.13	11.10	18.28	9:13
10.89	17.89	15.14	11.15	18.32	9:14
10.66	17.95	15.14	10.92	18.38	9:15
10.63	18.05	15.15	10.91	18.52	9:16
10.48	17.92	15.13	10.72	18.33	9:17
10.71	17.92	15.12	10.93	18.30	9:18
10.69	17.78	15.12	10.92	18.16	9:19
10.65	17.88	15.12	10.87	18.25	9:20
10.87	17.80	15.11	11.08	18.14	9:21
10.79	17.79	15.11	11.00	18.13	9:22
10.79	17.62	15.11	10.99	17.95	9:23
10.86	17.58	15.11	11.07	17.92	9:24
10.86	17.52	15.11	11.06	17.85	9:25
10.74	17.62	15.12	10.97	18.00	9:26
10.60	17.70	15.12	10.82	18.06	9:27
10.83	17.72	15.11	11.05	18.08	9:28
10.73	17.67	15.11	10.95	18.02	9:29
10.66	17.72	15.11	10.87	18.06	9:30
10.63	17.58	15.10	10.82	17.90	9:31
10.81	17.57	15.10	11.00	17.89	9:32
10.81	17.57	15.10	11.00	17.89	9:33
10.62	13.30	15.25	11.09	13.88	9:34
10.47	13.29	15.25	10.93	13.87	9:35
10.55	13.32	15.24	11.00	13.89	9:36
10.56	13.32	15.24	11.01	13.89	9:37
10.53	13.36	15.24	10.98	13.93	9:38
10.72	13.41	15.24	11.18	13.98	9:39
10.62	13.30	15.25	11.09	13.88	9:40
10.35	13.27	15.25	10.80	13.86	9:41
10.47	13.29	15.25	10.93	13.87	9:42
10.36	13.29	15.25	10.82	13.88	9:43
10.57	13.23	15.25	11.03	13.80	9:44
10.52	13.36	15.25	10.97	13.94	9:45
10.54	13.25	15.24	10.99	13.81	9:46
10.55	13.18	15.24	11.00	13.75	9:47
10.63	13.25	15.25	11.09	13.83	9:48
10.44	13.38	15.25	10.90	13.97	9:49
10.41	13.36	15.24	10.86	13.94	9:50
10.55	13.32	15.24	11.00	13.89	9:51
10.56	13.32	15.24	11.01	13.89	9:52
10.53	13.33	15.24	10.98	13.90	9:53
10.53	13.36	15.24	10.98	13.93	9:54
10.49	13.34	15.24	10.93	13.90	9:55
10.57	13.33	15.24	11.01	13.89	9:56
10.56	13.30	15.24	11.00	13.85	9:57
10.56	13.17	15.23	10.99	13.71	9:58
10.70	13.11	15.23	11.13	13.65	9:59
10.67	13.18	15.22	11.09	13.69	10:00
10.62	13.19	15.23	11.04	13.71	10:01
10.66	13.11	15.23	11.08	13.63	10:02
10.56	13.19	15.23	11.00	13.73	10:03
10.47	13.23	15.23	10.89	13.76	10:04
10.46	13.31	15.23	10.89	13.85	10:05
10.30	17.87	15.04	10.38	17.97	10:06
10.32	19.05	15.14	10.57	19.50	10:07
10.56	14.00	15.24	11.01	14.59	10:08
10.54	13.23	15.25	11.01	13.81	10:09
10.45	13.26	15.24	10.89	13.82	10:10
10.49	13.19	15.24	10.93	13.75	10:11
10.48	13.06	15.22	10.89	13.57	10:12
10.70	12.87	15.21	11.09	13.34	10:13
10.81	12.73	15.21	11.20	13.20	10:14
10.63	12.94	15.21	11.02	13.42	10:15
10.34	12.86	15.21	10.71	13.33	10:16
10.45	12.95	15.22	10.85	13.44	10:17
10.40	12.99	15.21	10.79	13.47	10:18
10.61	12.83	15.20	10.99	13.29	10:19
10.83	12.80	15.21	11.24	13.27	10:20
10.55	12.88	15.21	10.94	13.35	10:21
10.37	12.88	15.21	10.76	13.36	10:22
10.31	12.98	15.22	10.71	13.49	10:23
10.32	13.29	15.22	10.73	13.81	10:24
10.51	13.23	15.22	10.92	13.74	10:25
10.57	13.27	15.21	10.96	13.77	10:26
10.74	13.20	15.21	11.15	13.70	10:27
10.75	13.17	15.22	11.17	13.68	10:28
10.66	13.23	15.22	11.08	13.75	10:29
10.70	13.18	15.22	11.12	13.69	10:30
10.62	13.14	15.21	11.00	13.62	10:31
10.69	13.11	15.21	11.09	13.60	10:32
10.58	13.21	15.21	10.97	13.70	10:33
10.64	13.10	15.20	11.02	13.56	10:34
10.70	13.04	15.20	11.08	13.50	10:35
10.66	13.05	15.20	11.04	13.51	10:36
10.47	13.10	15.20	10.84	13.55	10:37
10.60	13.01	15.18	10.94	13.42	10:38

CLIENT:	[illegible] Indv	JOB#	219-012
PLANT:	Oxnard	RUN#	Compliance R2
DATE:	3/15/2021	RUN START:	10:55 AM
ENGINEER:	KK/FT		

NOx, ppm	CO, ppm	O2, %	NOx, ppm @ 15% O2	CO, ppm @ 15% O2	TIME
10.31	**12.72**	**15.11**	**10.51**	**12.96**	**Averages**
10.53	12.58	15.16	10.82	12.94	10:55
10.52	12.71	15.16	10.82	13.07	10:56
10.61	12.79	15.16	10.89	13.13	10:57
10.67	12.83	15.16	10.96	13.18	10:58
10.48	12.88	15.15	10.76	13.23	10:59
10.56	12.74	15.14	10.82	13.05	11:00
10.84	12.47	15.13	11.08	12.75	11:01
10.69	12.64	15.14	10.96	12.95	11:02
10.44	12.66	15.14	10.69	12.96	11:03
10.55	12.68	15.14	10.81	13.00	11:04
10.53	12.73	15.14	10.79	13.05	11:05
10.47	12.86	15.15	10.75	13.20	11:06
10.42	12.85	15.14	10.67	13.17	11:07
10.51	12.76	15.15	10.79	13.11	11:08
10.31	12.89	15.16	10.59	13.25	11:09
10.23	12.84	15.15	10.50	13.17	11:10
10.34	12.81	15.15	10.60	13.13	11:11
10.21	12.87	15.15	10.47	13.20	11:12
10.34	12.74	15.14	10.59	13.04	11:13
10.33	12.78	15.14	10.59	13.10	11:14
10.21	12.91	15.15	10.47	13.25	11:15
10.14	12.91	15.14	10.39	13.23	11:16
10.29	12.77	15.14	10.54	13.08	11:17
10.40	12.87	15.15	10.68	13.21	11:18
10.21	12.93	15.14	10.46	13.25	11:19
10.34	12.95	15.14	10.58	13.26	11:20
10.35	12.83	15.13	10.59	13.12	11:21
10.30	12.97	15.13	10.54	13.27	11:22
10.28	12.90	15.13	10.52	13.20	11:23
10.34	13.01	15.14	10.59	13.32	11:24
10.45	12.99	15.14	10.70	13.30	11:25
10.44	12.98	15.13	10.68	13.28	11:26
10.54	12.85	15.13	10.78	13.13	11:27
10.50	12.77	15.13	10.74	13.06	11:28
10.40	12.94	15.14	10.64	13.25	11:29
10.14	13.04	15.14	10.38	13.36	11:30
10.14	13.10	15.14	10.39	13.42	11:31
10.31	12.87	15.13	10.54	13.15	11:32
10.46	12.79	15.13	10.69	13.08	11:33
10.31	12.88	15.13	10.53	13.16	11:34
10.37	12.80	15.13	10.60	13.10	11:35
10.33	12.79	15.12	10.55	13.06	11:36
10.34	12.89	15.12	10.56	13.16	11:37
10.34	12.86	15.13	10.57	13.14	11:38
10.31	12.74	15.12	10.52	13.01	11:39
10.26	12.70	15.12	10.46	12.95	11:40
10.08	12.83	15.11	10.27	13.08	11:41
10.30	12.75	15.11	10.49	12.99	11:42
10.42	12.62	15.10	10.60	12.84	11:43
10.19	12.79	15.10	10.38	13.02	11:44
10.15	12.73	15.10	10.33	12.96	11:45
10.37	12.72	15.10	10.55	12.94	11:46
10.43	12.70	15.10	10.61	12.92	11:48
10.22	12.82	15.11	10.42	13.07	11:47
10.09	12.87	15.11	10.28	13.11	11:49
10.40	12.77	15.11	10.60	13.00	11:50
10.23	12.85	15.11	10.42	13.09	11:51
10.36	12.78	15.10	10.54	13.01	11:52
10.25	12.87	15.11	10.44	13.11	11:53
10.04	12.83	15.11	10.24	13.08	11:54
10.17	12.83	15.11	10.36	13.07	11:55
10.16	12.85	15.11	10.35	13.08	11:56
10.09	12.86	15.10	10.26	13.08	11:57
10.12	12.76	15.10	10.29	12.97	11:58
10.07	12.79	15.10	10.24	13.01	11:59
10.09	12.75	15.10	10.27	12.97	12:00
10.09	12.75	15.10	10.27	12.97	12:01
10.19	12.72	15.09	10.36	12.92	12:02
10.37	12.59	15.09	10.54	12.80	12:03
10.44	12.56	15.09	10.59	12.75	12:04
10.25	12.54	15.09	10.41	12.73	12:05
10.25	12.55	15.08	10.39	12.73	12:06
10.33	12.58	15.08	10.47	12.75	12:07
10.25	12.63	15.09	10.41	12.83	12:08
10.25	12.48	15.08	10.40	12.65	12:09
10.39	12.49	15.08	10.53	12.66	12:10
10.33	12.40	15.07	10.45	12.55	12:11
10.32	12.50	15.07	10.45	12.66	12:12
10.22	12.46	15.07	10.35	12.62	12:13
10.19	12.47	15.07	10.32	12.63	12:14
10.19	12.48	15.08	10.33	12.65	12:15
10.34	12.51	15.09	10.50	12.70	12:16
10.26	12.52	15.08	10.40	12.69	12:17
10.34	12.50	15.08	10.48	12.66	12:18
10.22	12.60	15.09	10.37	12.80	12:19
10.13	12.60	15.08	10.28	12.78	12:20
10.21	12.55	15.08	10.36	12.72	12:21
10.15	12.52	15.07	10.27	12.67	12:22
10.27	12.38	15.07	10.40	12.53	12:23
10.38	12.39	15.08	10.51	12.55	12:24
10.46	12.43	15.07	10.59	12.58	12:25
10.37	12.40	15.06	10.48	12.53	12:26
10.34	12.35	15.06	10.46	12.48	12:27
10.24	12.45	15.06	10.34	12.58	12:28
10.01	12.55	15.06	10.11	12.67	12:29
10.11	12.49	15.06	10.21	12.61	12:30
10.16	12.57	15.06	10.26	12.69	12:31
10.11	12.63	15.06	10.20	12.75	12:32
10.09	12.57	15.05	10.17	12.67	12:33

CLIENT:	[illegible]ndv	JOB#	219-012
PLANT:	Oxnard	RUN#	Compliance R3
DATE:	3/15/2021	RUN START:	12:45 PM
ENGINEER:	KK/FT		

NOx, ppm	CO, ppm	O2, %	NOx, ppm @ 15% O2	CO, ppm @ 15% O2	TIME
10.1	**13.7**	**15.0**	**10.1**	**13.7**	**Averages**
10.37	12.64	15.05	10.46	12.75	12:45
10.44	12.93	15.04	10.51	13.02	12:46
10.44	12.95	15.05	10.53	13.06	12:47
10.26	13.07	15.05	10.35	13.18	12:48
10.33	13.08	15.05	10.42	13.19	12:49
10.37	12.98	15.06	10.47	13.11	12:50
10.40	13.03	15.04	10.48	13.13	12:51
10.40	13.04	15.04	10.46	13.12	12:52
10.35	12.94	15.05	10.43	13.04	12:53
10.20	13.12	15.06	10.30	13.25	12:54
10.07	13.13	15.05	10.14	13.23	12:55
10.09	13.08	15.04	10.16	13.17	12:56
10.13	13.04	15.03	10.19	13.11	12:57
10.21	13.07	15.04	10.28	13.16	12:58
10.21	13.00	15.04	10.29	13.09	12:59
10.42	12.91	15.03	10.49	12.99	13:00
10.22	12.89	15.03	10.27	12.96	13:01
10.31	12.82	15.03	10.37	12.89	13:02
10.15	12.77	15.04	10.21	12.85	13:03
9.99	12.86	15.04	10.06	12.95	13:04
10.04	12.95	15.04	10.11	13.03	13:05
9.81	12.96	15.04	9.88	13.05	13:06
9.94	12.97	15.04	10.00	13.05	13:07
9.95	13.00	15.04	10.02	13.09	13:08
10.04	12.80	15.02	10.08	12.85	13:09
10.04	12.91	15.03	10.09	12.99	13:10
9.89	12.98	15.02	9.92	13.02	13:11
9.92	12.79	15.01	9.95	12.82	13:12
10.05	12.88	15.02	10.08	12.92	13:13
9.89	12.93	15.02	9.93	12.98	13:14
9.97	12.81	15.02	10.00	12.84	13:15
9.92	12.93	15.02	9.95	12.98	13:16
10.04	12.91	15.03	10.09	12.99	13:17
9.86	13.01	15.03	9.91	13.07	13:18
9.90	12.99	15.04	9.96	13.07	13:19
9.93	12.93	15.03	9.98	12.99	13:20
10.03	12.82	15.02	10.07	12.87	13:21
9.98	12.87	15.02	10.02	12.92	13:22
10.12	12.86	15.01	10.14	12.90	13:23
10.01	12.85	15.01	10.03	12.88	13:24
9.90	12.85	15.02	9.92	12.88	13:25
9.86	12.95	15.02	9.89	12.98	13:26
9.98	12.90	15.03	10.03	12.96	13:27
9.89	12.97	15.03	9.94	13.03	13:28
9.80	13.02	15.02	9.84	13.07	13:29
9.85	13.06	15.02	9.88	13.11	13:30
9.97	12.97	15.01	9.99	13.00	13:31
9.80	13.04	15.02	9.83	13.08	13:32
9.74	12.91	15.02	9.77	12.96	13:33
9.92	12.90	15.01	9.94	12.92	13:34
10.18	12.83	15.02	10.22	12.88	13:35
9.80	12.93	15.02	9.84	12.98	13:36
9.70	13.08	15.02	9.73	13.11	13:37
9.68	12.95	15.01	9.69	12.96	13:38
9.97	12.97	15.01	9.99	13.00	13:39
9.82	13.03	15.01	9.84	13.07	13:40
9.81	13.08	15.01	9.83	13.11	13:41
9.90	13.02	15.01	9.92	13.05	13:42
9.98	12.99	15.01	9.99	13.01	13:43
10.03	13.08	15.00	10.04	13.08	13:44
9.97	12.98	15.00	9.97	12.99	13:45
9.87	13.07	15.00	9.87	13.08	13:46
9.96	13.20	15.01	9.97	13.21	13:47
9.74	13.26	15.00	9.74	13.25	13:48
9.95	13.08	15.00	9.95	13.08	13:49
9.98	13.17	15.01	9.99	13.18	13:50
9.98	13.17	15.01	9.99	13.18	13:51
10.05	13.18	15.00	10.05	13.17	13:52
10.22	13.13	14.99	10.21	13.12	13:53
10.11	13.10	15.00	10.11	13.09	13:54
10.07	13.20	15.01	10.08	13.22	13:55
9.84	13.20	15.00	9.84	13.20	13:56
9.97	13.14	14.99	9.96	13.12	13:57
9.98	13.04	14.99	9.95	13.01	13:58
10.02	13.02	14.99	9.99	12.99	13:59
10.23	12.93	14.98	10.19	12.89	14:00
10.13	12.95	14.98	10.10	12.91	14:01
9.95	13.08	14.99	9.93	13.05	14:02
10.07	12.99	14.98	10.04	12.96	14:03
10.08	13.00	14.98	10.05	12.97	14:04
9.97	13.28	15.01	9.98	13.30	14:05
9.64	13.33	15.00	9.65	13.34	14:06
9.74	13.29	15.00	9.75	13.30	14:07
9.87	13.23	15.00	9.87	13.23	14:08
10.12	13.08	14.99	10.11	13.06	14:09
10.15	13.16	14.99	10.13	13.14	14:10
9.90	17.50	14.83	9.63	16.99	14:11
9.95	21.21	14.82	9.65	20.58	14:12
10.34	19.67	14.84	10.07	19.15	14:13
10.71	18.68	14.83	10.41	18.16	14:14
10.75	18.21	14.84	10.46	17.72	14:15
10.53	18.03	14.84	10.24	17.54	14:16
10.59	17.85	14.83	10.29	17.35	14:17
10.53	17.86	14.83	10.24	17.37	14:18
10.31	17.80	14.83	10.03	17.31	14:19
10.24	17.80	14.83	9.95	17.29	14:20
10.43	17.80	14.81	10.11	17.25	14:21
10.52	17.83	14.81	10.20	17.28	14:22
10.38	17.76	14.81	10.06	17.21	14:23

CLIENT:	New Indy	JOB#	221-014			
PLANT:	Oxnard, CA	RUN#	RATA 1			
DATE:	3/15/2021	UNIT ID:	Turbine			
ENGINEER:	KK/FT	RUN START:	9:00 AM			
NOx, ppm	CO, ppm	O2, %	NOx, ppm @ 15% O2	CO, ppm @ 15% O2	TIME	
10.83	18.21	15.12	11.05	18.60	9:00	
10.66	18.18	15.03	10.74	18.30	9:01	
10.61	18.14	15.03	10.67	18.24	9:02	
10.74	18.00	15.13	10.99	18.42	9:03	
10.70	18.02	15.15	10.97	18.49	9:04	
10.55	17.99	15.14	10.81	18.44	9:05	
10.55	17.91	15.14	10.81	18.36	9:06	
10.65	17.95	15.15	10.92	18.41	9:07	
10.64	18.03	15.14	10.90	18.47	9:08	
10.63	18.02	15.14	10.90	18.48	9:09	
10.68	17.97	15.14	10.93	18.41	9:10	
10.95	17.79	15.13	11.20	18.20	9:11	
10.94	17.87	15.14	11.20	18.30	9:12	
10.85	17.86	15.13	11.10	18.28	9:13	
10.89	17.89	15.14	11.15	18.32	9:14	
10.66	17.95	15.14	10.92	18.38	9:15	
10.63	18.05	15.15	10.91	18.52	9:16	
10.48	17.92	15.13	10.72	18.33	9:17	
10.71	17.92	15.12	10.93	18.30	9:18	
10.69	17.78	15.12	10.92	18.16	9:19	
10.65	17.88	15.12	10.87	18.25	9:20	
10.87	17.80	15.11	11.08	18.14	9:21	
10.79	17.79	15.11	11.00	18.13	9:22	
10.79	17.62	15.11	10.99	17.95	9:23	
10.86	17.58	15.11	11.07	17.92	9:24	
10.86	17.52	15.11	11.06	17.85	9:25	
10.74	17.62	15.12	10.97	18.00	9:26	
10.60	17.70	15.12	10.82	18.06	9:27	
10.83	17.72	15.11	11.05	18.08	9:28	
10.73	17.67	15.11	10.95	18.02	9:29	
10.66	17.72	15.11	10.87	18.06	9:30	
10.63	17.58	15.10	10.82	17.90	9:31	
10.81	17.57	15.10	11.00	17.89	9:32	
10.72	**17.86**	**15.12**	**10.95**	**18.23**	**Averages**	

CLIENT:	New Indy	JOB#	221-014		
PLANT:	Oxnard, CA	RUN#	RATA 2		
DATE:	3/15/2021	UNIT ID:	Turbine		
ENGINEER:	KK/FT	RUN START:	9:33 AM		
NOx, ppm	CO, ppm	O2, %	NOx, ppm @ 15% O2	CO, ppm @ 15% O2	TIME
10.81	17.57	15.10	11.00	17.89	9:33
10.62	13.30	15.25	11.09	13.88	9:34
10.47	13.29	15.25	10.93	13.87	9:35
10.55	13.32	15.24	11.00	13.89	9:36
10.56	13.32	15.24	11.01	13.89	9:37
10.53	13.36	15.24	10.98	13.93	9:38
10.72	13.41	15.24	11.18	13.98	9:39
10.62	13.30	15.25	11.09	13.88	9:40
10.35	13.27	15.25	10.80	13.86	9:41
10.47	13.29	15.25	10.93	13.87	9:42
10.36	13.29	15.25	10.82	13.88	9:43
10.57	13.23	15.25	11.03	13.80	9:44
10.52	13.36	15.25	10.97	13.94	9:45
10.54	13.25	15.24	10.99	13.81	9:46
10.55	13.18	15.24	11.00	13.75	9:47
10.63	13.25	15.25	11.09	13.83	9:48
10.44	13.38	15.25	10.90	13.97	9:49
10.41	13.36	15.24	10.86	13.94	9:50
10.55	13.32	15.24	11.00	13.89	9:51
10.56	13.32	15.24	11.01	13.89	9:52
10.53	13.33	15.24	10.98	13.90	9:53
10.53	13.36	15.24	10.98	13.93	9:54
10.49	13.34	15.24	10.93	13.90	9:55
10.57	13.33	15.24	11.01	13.89	9:56
10.56	13.30	15.24	11.00	13.85	9:57
10.56	13.17	15.23	10.99	13.71	9:58
10.70	13.11	15.23	11.13	13.65	9:59
10.67	13.18	15.22	11.09	13.69	10:00
10.62	13.19	15.23	11.04	13.71	10:01
10.66	13.11	15.23	11.08	13.63	10:02
10.56	13.19	15.23	11.00	13.73	10:03
10.47	13.23	15.23	10.89	13.76	10:04
10.46	13.31	15.23	10.89	13.85	10:05
10.55	**13.41**	**15.24**	**10.99**	**13.96**	**Averages**

CLIENT:	New Indy	JOB#	221-014		
PLANT:	Oxnard, CA	RUN#	RATA 3		
DATE:	3/15/2021	UNIT ID:	Turbine		
ENGINEER:	KK/FT	RUN START:	10:06 AM		
NOx, ppm	CO, ppm	O2, %	NOx, ppm @ 15% O2	CO, ppm @ 15% O2	Time
10.30	17.87	15.04	10.38	17.97	10:06
10.32	19.05	15.14	10.57	19.50	10:07
10.56	14.00	15.24	11.01	14.59	10:08
10.54	13.23	15.25	11.01	13.81	10:09
10.45	13.26	15.24	10.89	13.82	10:10
10.49	13.19	15.24	10.93	13.75	10:11
10.48	13.06	15.22	10.89	13.57	10:12
10.70	12.87	15.21	11.09	13.34	10:13
10.81	12.73	15.21	11.20	13.20	10:14
10.63	12.94	15.21	11.02	13.42	10:15
10.34	12.86	15.21	10.71	13.33	10:16
10.45	12.95	15.22	10.85	13.44	10:17
10.40	12.99	15.21	10.79	13.47	10:18
10.61	12.83	15.20	10.99	13.29	10:19
10.83	12.80	15.21	11.24	13.27	10:20
10.55	12.88	15.21	10.94	13.35	10:21
10.37	12.88	15.21	10.76	13.36	10:22
10.31	12.98	15.22	10.71	13.49	10:23
10.32	13.29	15.22	10.73	13.81	10:24
10.51	13.23	15.22	10.92	13.74	10:25
10.57	13.27	15.21	10.96	13.77	10:26
10.74	13.20	15.21	11.15	13.70	10:27
10.75	13.17	15.22	11.17	13.68	10:28
10.66	13.23	15.22	11.08	13.75	10:29
10.70	13.18	15.22	11.12	13.69	10:30
10.62	13.14	15.21	11.00	13.62	10:31
10.69	13.11	15.21	11.09	13.60	10:32
10.58	13.21	15.21	10.97	13.70	10:33
10.64	13.10	15.20	11.02	13.56	10:34
10.70	13.04	15.20	11.08	13.50	10:35
10.66	13.05	15.20	11.04	13.51	10:36
10.47	13.10	15.20	10.84	13.55	10:37
10.60	13.01	15.18	10.94	13.42	10:38
10.56	**13.42**	**15.21**	**10.94**	**13.90**	**Averages**

CLIENT:	New Indy	JOB#	221-014
PLANT:	Oxnard, CA	RUN#	RATA 4
DATE:	3/15/2021	UNIT ID:	Turbine
ENGINEER:	KK/FT	RUN START:	10:55 AM

NOx, ppm	CO, ppm	O2, %	NOx, ppm @ 15% O2	CO, ppm @ 15% O2	TIME
10.53	12.58	15.16	10.82	12.94	10:55
10.52	12.71	15.16	10.82	13.07	10:56
10.61	12.79	15.16	10.89	13.13	10:57
10.67	12.83	15.16	10.96	13.18	10:58
10.48	12.88	15.15	10.76	13.23	10:59
10.56	12.74	15.14	10.82	13.05	11:00
10.84	12.47	15.13	11.08	12.75	11:01
10.69	12.64	15.14	10.96	12.95	11:02
10.44	12.66	15.14	10.69	12.96	11:03
10.55	12.68	15.14	10.81	13.00	11:04
10.53	12.73	15.14	10.79	13.05	11:05
10.47	12.86	15.15	10.75	13.20	11:06
10.42	12.85	15.14	10.67	13.17	11:07
10.51	12.76	15.15	10.79	13.11	11:08
10.31	12.89	15.16	10.59	13.25	11:09
10.23	12.84	15.15	10.50	13.17	11:10
10.34	12.81	15.15	10.60	13.13	11:11
10.21	12.87	15.15	10.47	13.20	11:12
10.34	12.74	15.14	10.59	13.04	11:13
10.33	12.78	15.14	10.59	13.10	11:14
10.21	12.91	15.15	10.47	13.25	11:15
10.14	12.91	15.14	10.39	13.23	11:16
10.29	12.77	15.14	10.54	13.08	11:17
10.40	12.87	15.15	10.68	13.21	11:18
10.21	12.93	15.14	10.46	13.25	11:19
10.34	12.95	15.14	10.58	13.26	11:20
10.35	12.83	15.13	10.59	13.12	11:21
10.30	12.97	15.13	10.54	13.27	11:22
10.28	12.90	15.13	10.52	13.20	11:23
10.34	13.01	15.14	10.59	13.32	11:24
10.45	12.99	15.14	10.70	13.30	11:25
10.44	12.98	15.13	10.68	13.28	11:26
10.54	12.85	15.13	10.78	13.13	11:27
10.42	**12.82**	**15.14**	**10.68**	**13.14**	**Averages**

CLIENT:	New Indy	JOB#	221-014		
PLANT:	Oxnard, CA	RUN#	RATA 5		
DATE:	3/15/2021	UNIT ID:	Turbine		
ENGINEER:	KK/FT	RUN START:	11:28 AM		
NOx, ppm	CO, ppm	O2, %	NOx, ppm @ 15% O2	CO, ppm @ 15% O2	TIME
10.50	12.77	15.13	10.74	13.06	11:28
10.40	12.94	15.14	10.64	13.25	11:29
10.14	13.04	15.14	10.38	13.36	11:30
10.14	13.10	15.14	10.39	13.42	11:31
10.31	12.87	15.13	10.54	13.15	11:32
10.46	12.79	15.13	10.69	13.08	11:33
10.31	12.88	15.13	10.53	13.16	11:34
10.37	12.80	15.13	10.60	13.10	11:35
10.33	12.79	15.12	10.55	13.06	11:36
10.34	12.89	15.12	10.56	13.16	11:37
10.34	12.86	15.13	10.57	13.14	11:38
10.31	12.74	15.12	10.52	13.01	11:39
10.26	12.70	15.12	10.46	12.95	11:40
10.08	12.83	15.11	10.27	13.08	11:41
10.30	12.75	15.11	10.49	12.99	11:42
10.42	12.62	15.10	10.60	12.84	11:43
10.19	12.79	15.10	10.38	13.02	11:44
10.15	12.73	15.10	10.33	12.96	11:45
10.37	12.72	15.10	10.55	12.94	11:46
10.43	12.70	15.10	10.61	12.92	11:48
10.22	12.82	15.11	10.42	13.07	11:47
10.09	12.87	15.11	10.28	13.11	11:49
10.40	12.77	15.11	10.60	13.00	11:50
10.23	12.85	15.11	10.42	13.09	11:51
10.36	12.78	15.10	10.54	13.01	11:52
10.25	12.87	15.11	10.44	13.11	11:53
10.04	12.83	15.11	10.24	13.08	11:54
10.17	12.83	15.11	10.36	13.07	11:55
10.16	12.85	15.11	10.35	13.08	11:56
10.09	12.86	15.10	10.26	13.08	11:57
10.12	12.76	15.10	10.29	12.97	11:58
10.07	12.79	15.10	10.24	13.01	11:59
10.09	12.75	15.10	10.27	12.97	12:00
10.26	**12.82**	**15.11**	**10.46**	**13.07**	**Averages**

CLIENT:	New Indy	JOB#	221-014		
PLANT:	Oxnard, CA	RUN#	RATA 6		
DATE:	3/15/2021	UNIT ID:	Turbine		
ENGINEER:	KK/FT	RUN START:	12:01 PM		
NOx, ppm	CO, ppm	O2, %	NOx, ppm @ 15% O2	CO, ppm @ 15% O2	TIME
10.09	12.75	15.10	10.27	12.97	12:01
10.19	12.72	15.09	10.36	12.92	12:02
10.37	12.59	15.09	10.54	12.80	12:03
10.44	12.56	15.09	10.59	12.75	12:04
10.25	12.54	15.09	10.41	12.73	12:05
10.25	12.55	15.08	10.39	12.73	12:06
10.33	12.58	15.08	10.47	12.75	12:07
10.25	12.63	15.09	10.41	12.83	12:08
10.25	12.48	15.08	10.40	12.65	12:09
10.39	12.49	15.08	10.53	12.66	12:10
10.33	12.40	15.07	10.45	12.55	12:11
10.32	12.50	15.07	10.45	12.66	12:12
10.22	12.46	15.07	10.35	12.62	12:13
10.19	12.47	15.07	10.32	12.63	12:14
10.19	12.48	15.08	10.33	12.65	12:15
10.34	12.51	15.09	10.50	12.70	12:16
10.26	12.52	15.08	10.40	12.69	12:17
10.34	12.50	15.08	10.48	12.66	12:18
10.22	12.60	15.09	10.37	12.80	12:19
10.13	12.60	15.08	10.28	12.78	12:20
10.21	12.55	15.08	10.36	12.72	12:21
10.15	12.52	15.07	10.27	12.67	12:22
10.27	12.38	15.07	10.40	12.53	12:23
10.38	12.39	15.08	10.51	12.55	12:24
10.46	12.43	15.07	10.59	12.58	12:25
10.37	12.40	15.06	10.48	12.53	12:26
10.34	12.35	15.06	10.46	12.48	12:27
10.24	12.45	15.06	10.34	12.58	12:28
10.01	12.55	15.06	10.11	12.67	12:29
10.11	12.49	15.06	10.21	12.61	12:30
10.16	12.57	15.06	10.26	12.69	12:31
10.11	12.63	15.06	10.20	12.75	12:32
10.09	12.57	15.05	10.17	12.67	12:33
10.25	**12.52**	**15.08**	**10.38**	**12.68**	**Averages**

CLIENT:	New Indy	JOB#	221-014			
PLANT:	Oxnard, CA	RUN#	RATA 7			
DATE:	3/15/2021	UNIT ID:	Turbine			
ENGINEER:	KK/FT	RUN START:	12:45 PM			
NOx, ppm	CO, ppm	O2, %		NOx, ppm @ 15% O2	CO, ppm @ 15% O2	TIME
10.37	12.64	15.05		10.46	12.75	12:45
10.44	12.93	15.04		10.51	13.02	12:46
10.44	12.95	15.05		10.53	13.06	12:47
10.26	13.07	15.05		10.35	13.18	12:48
10.33	13.08	15.05		10.42	13.19	12:49
10.37	12.98	15.06		10.47	13.11	12:50
10.40	13.03	15.04		10.48	13.13	12:51
10.40	13.04	15.04		10.46	13.12	12:52
10.35	12.94	15.05		10.43	13.04	12:53
10.20	13.12	15.06		10.30	13.25	12:54
10.07	13.13	15.05		10.14	13.23	12:55
10.09	13.08	15.04		10.16	13.17	12:56
10.13	13.04	15.03		10.19	13.11	12:57
10.21	13.07	15.04		10.28	13.16	12:58
10.21	13.00	15.04		10.29	13.09	12:59
10.42	12.91	15.03		10.49	12.99	13:00
10.22	12.89	15.03		10.27	12.96	13:01
10.31	12.82	15.03		10.37	12.89	13:02
10.15	12.77	15.04		10.21	12.85	13:03
9.99	12.86	15.04		10.06	12.95	13:04
10.04	12.95	15.04		10.11	13.03	13:05
9.81	12.96	15.04		9.88	13.05	13:06
9.94	12.97	15.04		10.00	13.05	13:07
9.95	13.00	15.04		10.02	13.09	13:08
10.04	12.80	15.02		10.08	12.85	13:09
10.04	12.91	15.03		10.09	12.99	13:10
9.89	12.98	15.02		9.92	13.02	13:11
9.92	12.79	15.01		9.95	12.82	13:12
10.05	12.88	15.02		10.08	12.92	13:13
9.89	12.93	15.02		9.93	12.98	13:14
9.97	12.81	15.02		10.00	12.84	13:15
9.92	12.93	15.02		9.95	12.98	13:16
10.04	12.91	15.03		10.09	12.99	13:17
10.15	**12.94**	**15.04**		**10.21**	**13.03**	**Averages**

CLIENT:	New Indy	JOB#	221-014		
PLANT:	Oxnard, CA	RUN#	RATA 8		
DATE:	3/15/2021	UNIT ID:	Turbine		
ENGINEER:	KK/FT	RUN START:	1:18 PM		
NOx, ppm	CO, ppm	O2, %	NOx, ppm @ 15% O2	CO, ppm @ 15% O2	TIME
9.86	13.01	15.03	9.91	13.07	13:18
9.90	12.99	15.04	9.96	13.07	13:19
9.93	12.93	15.03	9.98	12.99	13:20
10.03	12.82	15.02	10.07	12.87	13:21
9.98	12.87	15.02	10.02	12.92	13:22
10.12	12.86	15.01	10.14	12.90	13:23
10.01	12.85	15.01	10.03	12.88	13:24
9.90	12.85	15.02	9.92	12.88	13:25
9.86	12.95	15.02	9.89	12.98	13:26
9.98	12.90	15.03	10.03	12.96	13:27
9.89	12.97	15.03	9.94	13.03	13:28
9.80	13.02	15.02	9.84	13.07	13:29
9.85	13.06	15.02	9.88	13.11	13:30
9.97	12.97	15.01	9.99	13.00	13:31
9.80	13.04	15.02	9.83	13.08	13:32
9.74	12.91	15.02	9.77	12.96	13:33
9.92	12.90	15.01	9.94	12.92	13:34
10.18	12.83	15.02	10.22	12.88	13:35
9.80	12.93	15.02	9.84	12.98	13:36
9.70	13.08	15.02	9.73	13.11	13:37
9.68	12.95	15.01	9.69	12.96	13:38
9.97	12.97	15.01	9.99	13.00	13:39
9.82	13.03	15.01	9.84	13.07	13:40
9.81	13.08	15.01	9.83	13.11	13:41
9.90	13.02	15.01	9.92	13.05	13:42
9.98	12.99	15.01	9.99	13.01	13:43
10.03	13.08	15.00	10.04	13.08	13:44
9.97	12.98	15.00	9.97	12.99	13:45
9.87	13.07	15.00	9.87	13.08	13:46
9.96	13.20	15.01	9.97	13.21	13:47
9.74	13.26	15.00	9.74	13.25	13:48
9.95	13.08	15.00	9.95	13.08	13:49
9.98	13.17	15.01	9.99	13.18	13:50
9.91	**12.99**	**15.02**	**9.93**	**13.02**	**Averages**

CLIENT:	New Indy	JOB#	221-014			
PLANT:	Oxnard, CA	RUN#	RATA 9			
DATE:	3/15/2021	UNIT ID:	Turbine			
ENGINEER:	KK/FT	RUN START:	1:51 PM			
NOx, ppm	CO, ppm	O2, %	NOx, ppm @ 15% O2	CO, ppm @ 15% O2	TIME	
9.98	13.17	15.01	9.99	13.18	13:51	
10.05	13.18	15.00	10.05	13.17	13:52	
10.22	13.13	14.99	10.21	13.12	13:53	
10.11	13.10	15.00	10.11	13.09	13:54	
10.07	13.20	15.01	10.08	13.22	13:55	
9.84	13.20	15.00	9.84	13.20	13:56	
9.97	13.14	14.99	9.96	13.12	13:57	
9.98	13.04	14.99	9.95	13.01	13:58	
10.02	13.02	14.99	9.99	12.99	13:59	
10.23	12.93	14.98	10.19	12.89	14:00	
10.13	12.95	14.98	10.10	12.91	14:01	
9.95	13.08	14.99	9.93	13.05	14:02	
10.07	12.99	14.98	10.04	12.96	14:03	
10.08	13.00	14.98	10.05	12.97	14:04	
9.97	13.28	15.01	9.98	13.30	14:05	
9.64	13.33	15.00	9.65	13.34	14:06	
9.74	13.29	15.00	9.75	13.30	14:07	
9.87	13.23	15.00	9.87	13.23	14:08	
10.12	13.08	14.99	10.11	13.06	14:09	
10.15	13.16	14.99	10.13	13.14	14:10	
9.90	17.50	14.83	9.63	16.99	14:11	
9.95	21.21	14.82	9.65	20.58	14:12	
10.34	19.67	14.84	10.07	19.15	14:13	
10.71	18.68	14.83	10.41	18.16	14:14	
10.75	18.21	14.84	10.46	17.72	14:15	
10.53	18.03	14.84	10.24	17.54	14:16	
10.59	17.85	14.83	10.29	17.35	14:17	
10.53	17.86	14.83	10.24	17.37	14:18	
10.31	17.80	14.83	10.03	17.31	14:19	
10.24	17.80	14.83	9.95	17.29	14:20	
10.43	17.80	14.81	10.11	17.25	14:21	
10.52	17.83	14.81	10.20	17.28	14:22	
10.38	17.76	14.81	10.06	17.21	14:23	
10.16	**15.17**	**14.93**	**10.04**	**14.95**	**Averages**	

Down 53	Up 54 sec	CO 40
Down 54	Up 53 sec	40 CO
Down 53 sec	Up 53 sec	40 CO
Down 45 sec	Up 47.	O2 20.13
Down 45	Up 47	O2 20.13
		O2 20.13
Down 45	Up 47 sec	
Down 58	Up 58	20.2 NOx
Down 58	Up 59	20.2 NOx
Down 57	Up 58	NOx 20.2

Response Times

Started 4/2 10:55

540 30.00

CO

NOx

O2

CO 20.5

O2 11.97

NOX 11.99

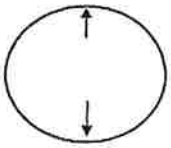
Post Bias Cal R3

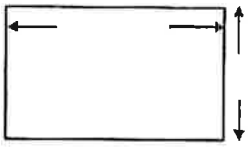
AIR TESTING

Plant: NEW INDY	Amb. Temp: 50	Nozzle: 3/8" (TAP/CEM LINE)
Location: ONTARIO, CA	Pbar: 30.02	Prob Heat: —
Unit: TURBINE	Pitot: —	Wind Vel.: 0-5
Date: 03.15.21	Pyro: —	Static Press.: —
Run #: 1	Mag Δ P: —	O2: 15.7
Cold Box: 1 ST-1B	Mag Δ H: MANO	CO2: —
Meter #: 3	% H2O: —	Engineer: KK
Meter Factor: 1.0078	Box Heat: —	Technician: FT

Stack Dia.: ____
"A": ____
"B": ____
Port Size: ____
Offset: ____
M / F: ____

Stack Sample Port Location





Imp.	Gross	Tare	Total
1			
2			
3			
4			

Filter 1: ____

Filter 2: ____

START TIME: 9:05 END TIME: 10:36 "K" FACTOR: ____

Point No.	Traverse Distance	Time Minutes	Stack °F	Δ P	√Δ P	Dry Gas Meter Volume	Δ H In H2O	Inlet ° F	Outlet ° F	Impinger Exit° F	Meter Vacuum	Filter Temp.°F	Probe Temp.°F	Cyl. Flow
		0				109.792	1.7	62	60	49	3			
		10				117.2	1.7	65	61	48	3			
		20				124.3	1.7	67	62	49	3			
		30				131.2	1.7	67	63	49	3			
		40				138.6	1.7	67	63	49	3			
		50				145.5	1.7	68	64	49	3			
		60				152.6	1.7	69	65	50	3			
		70				159.8	1.7	70	66	50	3			
		80				165.8	1.7	70	66	50	3			
		90				172.0	1.7	71	66	51	3			
		96				178.098	—	—	—	—	—			
Average:		96				68.306	1.70		65.6		3.0			

Leak Checks:

Pre	Top	Bottom
ΔP		

Pitots

Post	Top	Bottom
ΔP		

Sample Train Leak Check

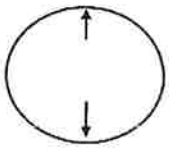
CFM: 0.000 In. HG: 17
CFM: 0.000 In. HG: 5

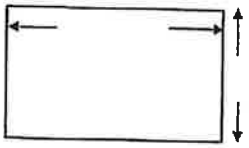
AIR X TESTING

Plant :	NEW INDY	Amb. Temp :	54	Nozzle :	3/8 " (TAP NEW INDY CEM LINE)
Location :	OXNARD, CA	Pbar :	30.00	Prob Heat :	
Unit :	TURBINE	Pitot :	—	Wind Vel. :	
Date :	05.16.21	Pyro :	—	Static Press. :	—
Run # :	2	Mag Δ P :		O2 :	19.1
Cold Box :	10	Mag Δ H :	MANO	CO2 :	—
Meter # :	4	% H2O :		Engineer :	KR
Meter Factor :	1.0078	Box Heat :		Technician :	FT

Stack Dia. :
"A" :
"B" :
Port Size :
Offset :
M / F :

Stack Sample Port Location





Imp.	Gross	Tare	Total
1			
2			
3			
4			

START TIME: 10:55 END TIME: 12:33 "K" FACTOR:

Filter 1 :
Filter 2 :

Point No.	Traverse Distance	Time Minutes	Stack °F	Δ P	√Δ P	Dry Gas Meter Volume	Δ H In H2O	Inlet ° F	Outlet ° F	Impinger Exit° F	Meter Vacuum	Filter Temp.°F	Probe Temp.°F	Cyl. Flow
		0				178.310	1.7	69	67	50	3.5			
		10				185.7	1.7	72	69	51	3.5			
		20				193.1	1.7	73	69	51	3.5			
		30				200.3	1.7	75	72	51	3.5			
		40				207.5	1.7	76	73	51	3.5			
		50				214.6	1.7	77	75	51	3.5			
		60				221.9	1.7	76	74	50	3.5			
		70				229.2	1.7	76	73	50	3.5			
		80				236.5	1.7	76	73	50	3.5			
		90				243.9	1.7	76	73	50	3.5			
		96				248.401	—	—	—	—	—			
Average:		96				70.091	1.70		73.2		3.5			

Leak Checks : Pitots

Pre	Top	Bottom
ΔP		

Post	Top	Bottom
ΔP		

Sample Train Leak Check

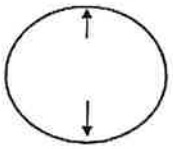
CFM :	0.005	In. HG :	15
CFM :	0.000	In. HG :	5

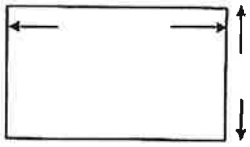
AIR X TESTING

Plant : NEW INDY	Amb. Temp : 55	Nozzle : 3/8" (NEW INDY CEM LINE)
Location : OXNARD, CA	Pbar : 29.98	Prob Heat : —
Unit : TURBINE	Pitot : —	Wind Vel. : 0-10
Date : 03.15.21	Pyro : —	Static Press. : —
Run # : 3	Mag Δ P : —	O2 : 15.0
Cold Box :	Mag Δ H : ON WOOD	CO2 : —
Meter # : U	% H2O : —	Engineer : KK
Meter Factor : 1.0078	Box Heat : —	Technician : FT

Stack Dia. :
"A" :
"B" :
Port Size :
Offset :
M / F :

Stack Sample Port Location





Imp.	Gross	Tare	Total
1			
2			
3			
4			

Filter 1 :
Filter 2 : FT

START TIME: 12:45 END TIME: 14:23 "K" FACTOR:

VAC TEMP

Point No.	Traverse Distance	Time Minutes	Stack °F	Δ P	√Δ P	Dry Gas Meter Volume	Δ H In H2O	Inlet ° F	Outlet ° F	Impinger Exit° F	Meter Vacuum	Filter Temp.°F	Probe Temp.°F	Cyl. Flow
		0				248.710	1.7	76	74	15/13	49			
		10				255.8	1.7	78	75	3	49			
		20				263.0	1.7	79	75	3	50			
		30				270.2	1.7	79	75	3	50			
		40				277.4	1.7	80	76	3	50			
		50				284.5	1.7	80	76	3	51			
		60				291.9	1.7	81	76	3	51			
		70				299.3	1.7	81	77	3	51			
		80				306.6	1.7	81	77	3	51			
		90				313.8	1.7	81	77	3	50			
		96				321.278	—	—	—	3	—	—		
Average:		96				72.568	1.70		77.7	3.0				

Leak Checks : Pitots

Pre	Top	Bottom
ΔP		

Post	Top	Bottom
ΔP		

Sample Train Leak Check

CFM : 0.000 In. HG : 15
CFM : 0.000 In. HG : 5

New-Indy Oxnard, LLC
ROSEMOUNT CEMS SOURCE TEST - March 15, 2021

Run 1

Stack NOx		Stack CO		Stack O2		Duct Burner Gas Flow		Turbine Gas Flow		Steam Injection		Ammonia Injection		Turbine Load	
RS_NOX PPM		RS_931AIC1111C.CCO		RS_931AIC1111B.O2		DSGASFLOW_A		GTGASFLOW		921-2015.WQ		931FIC1173_MV		921-2015.DWATT	
15-Mar-21 09:00:00	10.86	15-Mar-21 09:00:00	18.87	15-Mar-21 09:00:00	15.10	15-Mar-21 09:00:00	6.36	15-Mar-21 09:00:00	246.14	15-Mar-21 09:00:00	1.90	15-Mar-21 09:00:00	21.45	15-Mar-21 09:00:00	23.41
15-Mar-21 09:01:00	10.82	15-Mar-21 09:01:00	18.75	15-Mar-21 09:01:00	15.10	15-Mar-21 09:01:00	6.22	15-Mar-21 09:01:00	245.86	15-Mar-21 09:01:00	1.90	15-Mar-21 09:01:00	21.48	15-Mar-21 09:01:00	23.40
15-Mar-21 09:02:00	10.79	15-Mar-21 09:02:00	18.82	15-Mar-21 09:02:00	15.10	15-Mar-21 09:02:00	6.39	15-Mar-21 09:02:00	245.86	15-Mar-21 09:02:00	1.90	15-Mar-21 09:02:00	21.43	15-Mar-21 09:02:00	23.39
15-Mar-21 09:03:00	10.69	15-Mar-21 09:03:00	18.49	15-Mar-21 09:03:00	15.10	15-Mar-21 09:03:00	6.74	15-Mar-21 09:03:00	245.86	15-Mar-21 09:03:00	1.92	15-Mar-21 09:03:00	21.46	15-Mar-21 09:03:00	23.40
15-Mar-21 09:04:00	10.59	15-Mar-21 09:04:00	18.40	15-Mar-21 09:04:00	15.10	15-Mar-21 09:04:00	7.04	15-Mar-21 09:04:00	245.66	15-Mar-21 09:04:00	1.91	15-Mar-21 09:04:00	21.45	15-Mar-21 09:04:00	23.40
15-Mar-21 09:05:00	10.52	15-Mar-21 09:05:00	18.48	15-Mar-21 09:05:00	15.10	15-Mar-21 09:05:00	6.84	15-Mar-21 09:05:00	245.66	15-Mar-21 09:05:00	1.90	15-Mar-21 09:05:00	21.43	15-Mar-21 09:05:00	23.38
15-Mar-21 09:06:00	10.48	15-Mar-21 09:06:00	18.59	15-Mar-21 09:06:00	15.10	15-Mar-21 09:06:00	6.58	15-Mar-21 09:06:00	245.86	15-Mar-21 09:06:00	1.91	15-Mar-21 09:06:00	21.45	15-Mar-21 09:06:00	23.39
15-Mar-21 09:07:00	10.57	15-Mar-21 09:07:00	18.70	15-Mar-21 09:07:00	15.10	15-Mar-21 09:07:00	6.35	15-Mar-21 09:07:00	245.86	15-Mar-21 09:07:00	1.91	15-Mar-21 09:07:00	21.43	15-Mar-21 09:07:00	23.43
15-Mar-21 09:08:00	10.68	15-Mar-21 09:08:00	18.81	15-Mar-21 09:08:00	15.10	15-Mar-21 09:08:00	6.21	15-Mar-21 09:08:00	245.86	15-Mar-21 09:08:00	1.90	15-Mar-21 09:08:00	21.52	15-Mar-21 09:08:00	23.51
15-Mar-21 09:09:00	10.65	15-Mar-21 09:09:00	18.92	15-Mar-21 09:09:00	15.10	15-Mar-21 09:09:00	6.57	15-Mar-21 09:09:00	245.86	15-Mar-21 09:09:00	1.91	15-Mar-21 09:09:00	21.64	15-Mar-21 09:09:00	23.47
15-Mar-21 09:10:00	10.63	15-Mar-21 09:10:00	19.03	15-Mar-21 09:10:00	15.10	15-Mar-21 09:10:00	6.97	15-Mar-21 09:10:00	245.86	15-Mar-21 09:10:00	1.91	15-Mar-21 09:10:00	21.73	15-Mar-21 09:10:00	23.48
15-Mar-21 09:11:00	10.70	15-Mar-21 09:11:00	19.14	15-Mar-21 09:11:00	15.10	15-Mar-21 09:11:00	7.12	15-Mar-21 09:11:00	245.86	15-Mar-21 09:11:00	1.90	15-Mar-21 09:11:00	21.87	15-Mar-21 09:11:00	23.45
15-Mar-21 09:12:00	10.78	15-Mar-21 09:12:00	19.25	15-Mar-21 09:12:00	15.10	15-Mar-21 09:12:00	7.15	15-Mar-21 09:12:00	245.86	15-Mar-21 09:12:00	1.90	15-Mar-21 09:12:00	21.84	15-Mar-21 09:12:00	23.47
15-Mar-21 09:13:00	10.71	15-Mar-21 09:13:00	19.36	15-Mar-21 09:13:00	15.10	15-Mar-21 09:13:00	6.69	15-Mar-21 09:13:00	245.86	15-Mar-21 09:13:00	1.90	15-Mar-21 09:13:00	21.68	15-Mar-21 09:13:00	23.27
15-Mar-21 09:14:00	10.65	15-Mar-21 09:14:00	19.24	15-Mar-21 09:14:00	15.10	15-Mar-21 09:14:00	6.27	15-Mar-21 09:14:00	245.86	15-Mar-21 09:14:00	1.92	15-Mar-21 09:14:00	21.79	15-Mar-21 09:14:00	23.46
15-Mar-21 09:15:00	10.65	15-Mar-21 09:15:00	18.83	15-Mar-21 09:15:00	15.10	15-Mar-21 09:15:00	6.44	15-Mar-21 09:15:00	245.86	15-Mar-21 09:15:00	1.92	15-Mar-21 09:15:00	21.89	15-Mar-21 09:15:00	23.35
15-Mar-21 09:16:00	10.64	15-Mar-21 09:16:00	18.46	15-Mar-21 09:16:00	15.10	15-Mar-21 09:16:00	6.72	15-Mar-21 09:16:00	245.86	15-Mar-21 09:16:00	1.91	15-Mar-21 09:16:00	21.88	15-Mar-21 09:16:00	23.47
15-Mar-21 09:17:00	10.58	15-Mar-21 09:17:00	18.40	15-Mar-21 09:17:00	15.10	15-Mar-21 09:17:00	7.04	15-Mar-21 09:17:00	245.86	15-Mar-21 09:17:00	1.90	15-Mar-21 09:17:00	21.89	15-Mar-21 09:17:00	23.44
15-Mar-21 09:18:00	10.53	15-Mar-21 09:18:00	18.40	15-Mar-21 09:18:00	15.10	15-Mar-21 09:18:00	7.26	15-Mar-21 09:18:00	245.86	15-Mar-21 09:18:00	1.91	15-Mar-21 09:18:00	21.92	15-Mar-21 09:18:00	23.52
15-Mar-21 09:19:00	10.54	15-Mar-21 09:19:00	18.40	15-Mar-21 09:19:00	15.10	15-Mar-21 09:19:00	6.89	15-Mar-21 09:19:00	245.86	15-Mar-21 09:19:00	1.91	15-Mar-21 09:19:00	21.94	15-Mar-21 09:19:00	23.52
15-Mar-21 09:20:00	10.56	15-Mar-21 09:20:00	18.40	15-Mar-21 09:20:00	15.10	15-Mar-21 09:20:00	6.50	15-Mar-21 09:20:00	245.86	15-Mar-21 09:20:00	1.89	15-Mar-21 09:20:00	21.94	15-Mar-21 09:20:00	23.43
15-Mar-21 09:21:00	10.62	15-Mar-21 09:21:00	18.40	15-Mar-21 09:21:00	15.10	15-Mar-21 09:21:00	6.41	15-Mar-21 09:21:00	245.86	15-Mar-21 09:21:00	1.91	15-Mar-21 09:21:00	22.03	15-Mar-21 09:21:00	23.50
15-Mar-21 09:22:00	10.67	15-Mar-21 09:22:00	18.40	15-Mar-21 09:22:00	15.10	15-Mar-21 09:22:00	6.40	15-Mar-21 09:22:00	245.86	15-Mar-21 09:22:00	1.90	15-Mar-21 09:22:00	22.17	15-Mar-21 09:22:00	23.50
15-Mar-21 09:23:00	10.65	15-Mar-21 09:23:00	18.40	15-Mar-21 09:23:00	15.10	15-Mar-21 09:23:00	6.59	15-Mar-21 09:23:00	245.86	15-Mar-21 09:23:00	1.89	15-Mar-21 09:23:00	22.18	15-Mar-21 09:23:00	23.40
15-Mar-21 09:24:00	10.62	15-Mar-21 09:24:00	18.40	15-Mar-21 09:24:00	15.10	15-Mar-21 09:24:00	6.79	15-Mar-21 09:24:00	245.86	15-Mar-21 09:24:00	1.89	15-Mar-21 09:24:00	22.14	15-Mar-21 09:24:00	23.42
15-Mar-21 09:25:00	10.61	15-Mar-21 09:25:00	18.40	15-Mar-21 09:25:00	15.10	15-Mar-21 09:25:00	6.88	15-Mar-21 09:25:00	245.86	15-Mar-21 09:25:00	1.91	15-Mar-21 09:25:00	22.09	15-Mar-21 09:25:00	23.45
15-Mar-21 09:26:00	10.61	15-Mar-21 09:26:00	18.40	15-Mar-21 09:26:00	15.10	15-Mar-21 09:26:00	6.80	15-Mar-21 09:26:00	245.86	15-Mar-21 09:26:00	1.92	15-Mar-21 09:26:00	22.15	15-Mar-21 09:26:00	23.46
15-Mar-21 09:27:00	10.57	15-Mar-21 09:27:00	18.40	15-Mar-21 09:27:00	15.10	15-Mar-21 09:27:00	6.57	15-Mar-21 09:27:00	245.86	15-Mar-21 09:27:00	1.91	15-Mar-21 09:27:00	22.17	15-Mar-21 09:27:00	23.37
15-Mar-21 09:28:00	10.54	15-Mar-21 09:28:00	18.40	15-Mar-21 09:28:00	15.10	15-Mar-21 09:28:00	6.30	15-Mar-21 09:28:00	245.86	15-Mar-21 09:28:00	1.90	15-Mar-21 09:28:00	21.99	15-Mar-21 09:28:00	23.47
15-Mar-21 09:29:00	10.65	15-Mar-21 09:29:00	18.40	15-Mar-21 09:29:00	15.10	15-Mar-21 09:29:00	6.59	15-Mar-21 09:29:00	245.86	15-Mar-21 09:29:00	1.92	15-Mar-21 09:29:00	22.14	15-Mar-21 09:29:00	23.45
15-Mar-21 09:30:00	10.75	15-Mar-21 09:30:00	18.40	15-Mar-21 09:30:00	15.10	15-Mar-21 09:30:00	6.98	15-Mar-21 09:30:00	245.86	15-Mar-21 09:30:00	1.91	15-Mar-21 09:30:00	22.20	15-Mar-21 09:30:00	23.46
15-Mar-21 09:31:00	10.71	15-Mar-21 09:31:00	18.40	15-Mar-21 09:31:00	15.10	15-Mar-21 09:31:00	7.32	15-Mar-21 09:31:00	245.86	15-Mar-21 09:31:00	1.91	15-Mar-21 09:31:00	22.22	15-Mar-21 09:31:00	23.52
15-Mar-21 09:32:00	10.65	15-Mar-21 09:32:00	18.40	15-Mar-21 09:32:00	15.10	15-Mar-21 09:32:00	7.62	15-Mar-21 09:32:00	245.86	15-Mar-21 09:32:00	1.91	15-Mar-21 09:32:00	22.43	15-Mar-21 09:32:00	23.43
Average Stack NOx, ppm (15% O2)	10.64	Average Stack CO, ppm (15% O2)	18.62	Average Stack O2 (%)	15.10	Average Duct Burner Gas Flow (MSCFH)	6.72	Average Turbine Gas Flow (MSCFH)	245.87	Ave. Steam Injection Rate (lb/s)	1.91	Ave. Ammonia Injection (lb/hr)	21.85	Ave. Turbine Load (MWh)	23.44

252.59 × 1000/60 = 4209.8 dscfm

Average Runs 1-2-3

4147.8 dscfm

Average 1-2-3
22.27

Average 1-2-3
23.44

New-Indy Oxnard, LLC
ROSEMOUNT CEMS SOURCE TEST - March 15, 2021

Kata 2

Stack NOx		Stack CO		Stack O2		Duct Burner Gas Flow		Turbine Gas Flow		Steam Injection		Ammonia Injection		Turbine Load	
RS_NOX PPM		RS_931AIC1111C.CCO		RS_931AIC1111B.O2		DBGASFLOW_A		GTGASFLOW		921-2015.WQ		931FIC1173_MV		921-2015.DWATT	
15-Mar-21 09:33:00	10.48	15-Mar-21 09:33:00	17.35	15-Mar-21 09:33:00	15.16	15-Mar-21 09:33:00	6.96	15-Mar-21 09:33:00	245.86	15-Mar-21 09:33:00	1.89	15-Mar-21 09:33:00	22.34	15-Mar-21 09:33:00	23.35
15-Mar-21 09:34:00	10.36	15-Mar-21 09:34:00	17.20	15-Mar-21 09:34:00	15.17	15-Mar-21 09:34:00	5.93	15-Mar-21 09:34:00	245.86	15-Mar-21 09:34:00	1.91	15-Mar-21 09:34:00	22.16	15-Mar-21 09:34:00	23.44
15-Mar-21 09:35:00	10.40	15-Mar-21 09:35:00	15.05	15-Mar-21 09:35:00	15.18	15-Mar-21 09:35:00	3.07	15-Mar-21 09:35:00	245.86	15-Mar-21 09:35:00	1.91	15-Mar-21 09:35:00	22.15	15-Mar-21 09:35:00	23.44
15-Mar-21 09:36:00	10.44	15-Mar-21 09:36:00	14.14	15-Mar-21 09:36:00	15.21	15-Mar-21 09:36:00	0.38	15-Mar-21 09:36:00	245.86	15-Mar-21 09:36:00	1.88	15-Mar-21 09:36:00	22.16	15-Mar-21 09:36:00	23.38
15-Mar-21 09:37:00	10.39	15-Mar-21 09:37:00	14.22	15-Mar-21 09:37:00	15.23	15-Mar-21 09:37:00	0.04	15-Mar-21 09:37:00	245.86	15-Mar-21 09:37:00	1.89	15-Mar-21 09:37:00	22.10	15-Mar-21 09:37:00	23.36
15-Mar-21 09:38:00	10.33	15-Mar-21 09:38:00	14.22	15-Mar-21 09:38:00	15.23	15-Mar-21 09:38:00	0.04	15-Mar-21 09:38:00	245.86	15-Mar-21 09:38:00	1.89	15-Mar-21 09:38:00	22.10	15-Mar-21 09:38:00	23.45
15-Mar-21 09:39:00	10.38	15-Mar-21 09:39:00	14.22	15-Mar-21 09:39:00	15.21	15-Mar-21 09:39:00	0.04	15-Mar-21 09:39:00	245.86	15-Mar-21 09:39:00	1.90	15-Mar-21 09:39:00	22.09	15-Mar-21 09:39:00	23.32
15-Mar-21 09:40:00	10.45	15-Mar-21 09:40:00	14.22	15-Mar-21 09:40:00	15.23	15-Mar-21 09:40:00	0.04	15-Mar-21 09:40:00	245.86	15-Mar-21 09:40:00	1.91	15-Mar-21 09:40:00	22.12	15-Mar-21 09:40:00	23.37
15-Mar-21 09:41:00	10.55	15-Mar-21 09:41:00	14.22	15-Mar-21 09:41:00	15.23	15-Mar-21 09:41:00	0.04	15-Mar-21 09:41:00	245.86	15-Mar-21 09:41:00	1.91	15-Mar-21 09:41:00	22.11	15-Mar-21 09:41:00	23.37
15-Mar-21 09:42:00	10.62	15-Mar-21 09:42:00	14.22	15-Mar-21 09:42:00	15.23	15-Mar-21 09:42:00	0.04	15-Mar-21 09:42:00	245.86	15-Mar-21 09:42:00	1.92	15-Mar-21 09:42:00	22.11	15-Mar-21 09:42:00	23.40
15-Mar-21 09:43:00	10.57	15-Mar-21 09:43:00	14.22	15-Mar-21 09:43:00	15.23	15-Mar-21 09:43:00	0.04	15-Mar-21 09:43:00	245.86	15-Mar-21 09:43:00	1.93	15-Mar-21 09:43:00	22.11	15-Mar-21 09:43:00	23.44
15-Mar-21 09:44:00	10.50	15-Mar-21 09:44:00	14.22	15-Mar-21 09:44:00	15.23	15-Mar-21 09:44:00	0.04	15-Mar-21 09:44:00	245.86	15-Mar-21 09:44:00	1.92	15-Mar-21 09:44:00	22.20	15-Mar-21 09:44:00	23.44
15-Mar-21 09:45:00	10.34	15-Mar-21 09:45:00	14.22	15-Mar-21 09:45:00	15.23	15-Mar-21 09:45:00	0.04	15-Mar-21 09:45:00	245.86	15-Mar-21 09:45:00	1.89	15-Mar-21 09:45:00	22.12	15-Mar-21 09:45:00	23.37
15-Mar-21 09:46:00	10.23	15-Mar-21 09:46:00	14.22	15-Mar-21 09:46:00	15.23	15-Mar-21 09:46:00	0.04	15-Mar-21 09:46:00	245.86	15-Mar-21 09:46:00	1.92	15-Mar-21 09:46:00	22.10	15-Mar-21 09:46:00	23.39
15-Mar-21 09:47:00	10.35	15-Mar-21 09:47:00	14.22	15-Mar-21 09:47:00	15.23	15-Mar-21 09:47:00	0.04	15-Mar-21 09:47:00	245.86	15-Mar-21 09:47:00	1.89	15-Mar-21 09:47:00	22.09	15-Mar-21 09:47:00	23.42
15-Mar-21 09:48:00	10.49	15-Mar-21 09:48:00	14.22	15-Mar-21 09:48:00	15.23	15-Mar-21 09:48:00	0.04	15-Mar-21 09:48:00	245.86	15-Mar-21 09:48:00	1.88	15-Mar-21 09:48:00	22.11	15-Mar-21 09:48:00	23.42
15-Mar-21 09:49:00	10.51	15-Mar-21 09:49:00	14.22	15-Mar-21 09:49:00	15.23	15-Mar-21 09:49:00	0.04	15-Mar-21 09:49:00	245.86	15-Mar-21 09:49:00	1.88	15-Mar-21 09:49:00	22.10	15-Mar-21 09:49:00	23.32
15-Mar-21 09:50:00	10.51	15-Mar-21 09:50:00	14.22	15-Mar-21 09:50:00	15.23	15-Mar-21 09:50:00	0.04	15-Mar-21 09:50:00	245.86	15-Mar-21 09:50:00	1.90	15-Mar-21 09:50:00	22.11	15-Mar-21 09:50:00	23.29
15-Mar-21 09:51:00	10.49	15-Mar-21 09:51:00	14.22	15-Mar-21 09:51:00	15.23	15-Mar-21 09:51:00	0.04	15-Mar-21 09:51:00	245.86	15-Mar-21 09:51:00	1.91	15-Mar-21 09:51:00	22.12	15-Mar-21 09:51:00	23.39
15-Mar-21 09:52:00	10.49	15-Mar-21 09:52:00	14.22	15-Mar-21 09:52:00	15.23	15-Mar-21 09:52:00	0.04	15-Mar-21 09:52:00	245.86	15-Mar-21 09:52:00	1.91	15-Mar-21 09:52:00	22.11	15-Mar-21 09:52:00	23.36
15-Mar-21 09:53:00	10.51	15-Mar-21 09:53:00	14.22	15-Mar-21 09:53:00	15.23	15-Mar-21 09:53:00	0.04	15-Mar-21 09:53:00	245.86	15-Mar-21 09:53:00	1.92	15-Mar-21 09:53:00	22.10	15-Mar-21 09:53:00	23.37
15-Mar-21 09:54:00	10.54	15-Mar-21 09:54:00	14.22	15-Mar-21 09:54:00	15.23	15-Mar-21 09:54:00	0.04	15-Mar-21 09:54:00	245.86	15-Mar-21 09:54:00	1.93	15-Mar-21 09:54:00	22.12	15-Mar-21 09:54:00	23.37
15-Mar-21 09:55:00	10.53	15-Mar-21 09:55:00	14.22	15-Mar-21 09:55:00	15.23	15-Mar-21 09:55:00	0.04	15-Mar-21 09:55:00	245.86	15-Mar-21 09:55:00	1.92	15-Mar-21 09:55:00	22.17	15-Mar-21 09:55:00	23.39
15-Mar-21 09:56:00	10.52	15-Mar-21 09:56:00	14.22	15-Mar-21 09:56:00	15.23	15-Mar-21 09:56:00	0.04	15-Mar-21 09:56:00	245.86	15-Mar-21 09:56:00	1.90	15-Mar-21 09:56:00	22.34	15-Mar-21 09:56:00	23.43
15-Mar-21 09:57:00	10.53	15-Mar-21 09:57:00	14.44	15-Mar-21 09:57:00	15.23	15-Mar-21 09:57:00	0.04	15-Mar-21 09:57:00	245.86	15-Mar-21 09:57:00	1.91	15-Mar-21 09:57:00	22.32	15-Mar-21 09:57:00	23.46
15-Mar-21 09:58:00	10.54	15-Mar-21 09:58:00	15.29	15-Mar-21 09:58:00	15.21	15-Mar-21 09:58:00	0.04	15-Mar-21 09:58:00	245.86	15-Mar-21 09:58:00	1.90	15-Mar-21 09:58:00	22.23	15-Mar-21 09:58:00	23.47
15-Mar-21 09:59:00	10.53	15-Mar-21 09:59:00	16.19	15-Mar-21 09:59:00	15.19	15-Mar-21 09:59:00	0.04	15-Mar-21 09:59:00	245.86	15-Mar-21 09:59:00	1.91	15-Mar-21 09:59:00	22.29	15-Mar-21 09:59:00	23.52
15-Mar-21 10:00:00	10.52	15-Mar-21 10:00:00	17.09	15-Mar-21 10:00:00	15.17	15-Mar-21 10:00:00	0.04	15-Mar-21 10:00:00	245.86	15-Mar-21 10:00:00	1.90	15-Mar-21 10:00:00	22.29	15-Mar-21 10:00:00	23.38
15-Mar-21 10:01:00	10.53	15-Mar-21 10:01:00	17.99	15-Mar-21 10:01:00	15.14	15-Mar-21 10:01:00	0.04	15-Mar-21 10:01:00	245.86	15-Mar-21 10:01:00	1.90	15-Mar-21 10:01:00	22.28	15-Mar-21 10:01:00	23.40
15-Mar-21 10:02:00	10.52	15-Mar-21 10:02:00	18.89	15-Mar-21 10:02:00	15.12	15-Mar-21 10:02:00	0.97	15-Mar-21 10:02:00	245.86	15-Mar-21 10:02:00	1.88	15-Mar-21 10:02:00	22.25	15-Mar-21 10:02:00	23.28
15-Mar-21 10:03:00	10.36	15-Mar-21 10:03:00	21.05	15-Mar-21 10:03:00	15.07	15-Mar-21 10:03:00	8.77	15-Mar-21 10:03:00	245.86	15-Mar-21 10:03:00	1.89	15-Mar-21 10:03:00	22.22	15-Mar-21 10:03:00	23.36
15-Mar-21 10:04:00	10.24	15-Mar-21 10:04:00	18.10	15-Mar-21 10:04:00	15.09	15-Mar-21 10:04:00	11.44	15-Mar-21 10:04:00	245.86	15-Mar-21 10:04:00	1.90	15-Mar-21 10:04:00	22.12	15-Mar-21 10:04:00	23.42
15-Mar-21 10:05:00	10.42	15-Mar-21 10:05:00	14.53	15-Mar-21 10:05:00	15.22	15-Mar-21 10:05:00	6.34	15-Mar-21 10:05:00	245.86	15-Mar-21 10:05:00	1.91	15-Mar-21 10:05:00	22.20	15-Mar-21 10:05:00	23.25
Average Stack NOx, ppm (15% O2)	10.46	Average Stack CO, ppm (15% O2)	15.20	Average Stack O2 (%)	15.21	Average Duct Burner Gas Flow (MSCFH)	1.30	Average Turbine Gas Flow (MSCFH)	245.86	Ave. Steam Injection Rate (lb/s)	1.90	Ave. Ammonia Injection (lb/hr)	22.17	Ave. Turbine Load (MWh)	23.39

247.16 × 1000 / 60 = 4119,3 dscfm

New-Indy Oxnard, LLC
ROSEMOUNT CEMS SOURCE TEST - March 15, 2021

Rata 3

Stack NOx		Stack CO		Stack O2		Duct Burner Gas Flow		Turbine Gas Flow		Steam Injection		Ammonia Injection		Turbine Load	
RS_NOX PPM		RS_931AIC1111C.CCO		RS_931AIC11118.02		DBGASFLOW_A		GTGASFLOW		921-2015.WQ		931FIC1173_MV		921-2015.DWATT	
15-Mar-21 10:06:00	10.62	15-Mar-21 10:06:00	14.60	15-Mar-21 10:06:00	15.25	15-Mar-21 10:06:00	0.75	15-Mar-21 10:06:00	245.86	15-Mar-21 10:06:00	1.92	15-Mar-21 10:06:00	22.35	15-Mar-21 10:06:00	23.28
15-Mar-21 10:07:00	10.69	15-Mar-21 10:07:00	14.36	15-Mar-21 10:07:00	15.25	15-Mar-21 10:07:00	0.05	15-Mar-21 10:07:00	245.88	15-Mar-21 10:07:00	1.92	15-Mar-21 10:07:00	22.41	15-Mar-21 10:07:00	23.29
15-Mar-21 10:08:00	10.72	15-Mar-21 10:08:00	14.04	15-Mar-21 10:08:00	15.23	15-Mar-21 10:08:00	0.05	15-Mar-21 10:08:00	245.86	15-Mar-21 10:08:00	1.93	15-Mar-21 10:08:00	22.46	15-Mar-21 10:08:00	23.30
15-Mar-21 10:09:00	10.58	15-Mar-21 10:09:00	13.72	15-Mar-21 10:09:00	15.22	15-Mar-21 10:09:00	0.05	15-Mar-21 10:09:00	245.88	15-Mar-21 10:09:00	1.91	15-Mar-21 10:09:00	22.50	15-Mar-21 10:09:00	23.49
15-Mar-21 10:10:00	10.50	15-Mar-21 10:10:00	13.53	15-Mar-21 10:10:00	15.21	15-Mar-21 10:10:00	0.05	15-Mar-21 10:10:00	245.86	15-Mar-21 10:10:00	1.91	15-Mar-21 10:10:00	22.59	15-Mar-21 10:10:00	23.62
15-Mar-21 10:11:00	10.85	15-Mar-21 10:11:00	13.45	15-Mar-21 10:11:00	15.20	15-Mar-21 10:11:00	0.05	15-Mar-21 10:11:00	245.86	15-Mar-21 10:11:00	1.90	15-Mar-21 10:11:00	22.90	15-Mar-21 10:11:00	23.47
15-Mar-21 10:12:00	11.16	15-Mar-21 10:12:00	13.45	15-Mar-21 10:12:00	15.20	15-Mar-21 10:12:00	0.05	15-Mar-21 10:12:00	245.86	15-Mar-21 10:12:00	1.90	15-Mar-21 10:12:00	22.84	15-Mar-21 10:12:00	23.58
15-Mar-21 10:13:00	10.91	15-Mar-21 10:13:00	13.45	15-Mar-21 10:13:00	15.20	15-Mar-21 10:13:00	0.05	15-Mar-21 10:13:00	245.86	15-Mar-21 10:13:00	1.92	15-Mar-21 10:13:00	22.71	15-Mar-21 10:13:00	23.59
15-Mar-21 10:14:00	10.62	15-Mar-21 10:14:00	13.45	15-Mar-21 10:14:00	15.20	15-Mar-21 10:14:00	0.05	15-Mar-21 10:14:00	245.88	15-Mar-21 10:14:00	1.90	15-Mar-21 10:14:00	22.69	15-Mar-21 10:14:00	23.48
15-Mar-21 10:15:00	10.48	15-Mar-21 10:15:00	13.45	15-Mar-21 10:15:00	15.20	15-Mar-21 10:15:00	0.05	15-Mar-21 10:15:00	245.86	15-Mar-21 10:15:00	1.91	15-Mar-21 10:15:00	22.68	15-Mar-21 10:15:00	23.55
15-Mar-21 10:16:00	10.41	15-Mar-21 10:16:00	13.45	15-Mar-21 10:16:00	15.20	15-Mar-21 10:16:00	0.05	15-Mar-21 10:16:00	248.22	15-Mar-21 10:16:00	1.91	15-Mar-21 10:16:00	22.71	15-Mar-21 10:16:00	23.61
15-Mar-21 10:17:00	10.52	15-Mar-21 10:17:00	13.45	15-Mar-21 10:17:00	15.20	15-Mar-21 10:17:00	0.05	15-Mar-21 10:17:00	248.51	15-Mar-21 10:17:00	1.90	15-Mar-21 10:17:00	22.96	15-Mar-21 10:17:00	23.55
15-Mar-21 10:18:00	10.62	15-Mar-21 10:18:00	13.45	15-Mar-21 10:18:00	15.20	15-Mar-21 10:18:00	0.05	15-Mar-21 10:18:00	250.34	15-Mar-21 10:18:00	1.91	15-Mar-21 10:18:00	23.08	15-Mar-21 10:18:00	23.52
15-Mar-21 10:19:00	10.48	15-Mar-21 10:19:00	13.45	15-Mar-21 10:19:00	15.20	15-Mar-21 10:19:00	0.05	15-Mar-21 10:19:00	248.33	15-Mar-21 10:19:00	1.91	15-Mar-21 10:19:00	23.13	15-Mar-21 10:19:00	23.47
15-Mar-21 10:20:00	10.33	15-Mar-21 10:20:00	13.45	15-Mar-21 10:20:00	15.20	15-Mar-21 10:20:00	0.05	15-Mar-21 10:20:00	246.14	15-Mar-21 10:20:00	1.89	15-Mar-21 10:20:00	22.83	15-Mar-21 10:20:00	23.39
15-Mar-21 10:21:00	10.33	15-Mar-21 10:21:00	13.45	15-Mar-21 10:21:00	15.20	15-Mar-21 10:21:00	0.05	15-Mar-21 10:21:00	245.86	15-Mar-21 10:21:00	1.90	15-Mar-21 10:21:00	22.70	15-Mar-21 10:21:00	23.44
15-Mar-21 10:22:00	10.35	15-Mar-21 10:22:00	13.45	15-Mar-21 10:22:00	15.20	15-Mar-21 10:22:00	0.05	15-Mar-21 10:22:00	245.86	15-Mar-21 10:22:00	1.92	15-Mar-21 10:22:00	22.69	15-Mar-21 10:22:00	23.44
15-Mar-21 10:23:00	10.43	15-Mar-21 10:23:00	13.45	15-Mar-21 10:23:00	15.20	15-Mar-21 10:23:00	0.05	15-Mar-21 10:23:00	245.86	15-Mar-21 10:23:00	1.91	15-Mar-21 10:23:00	22.68	15-Mar-21 10:23:00	23.48
15-Mar-21 10:24:00	10.50	15-Mar-21 10:24:00	13.45	15-Mar-21 10:24:00	15.20	15-Mar-21 10:24:00	0.05	15-Mar-21 10:24:00	245.86	15-Mar-21 10:24:00	1.89	15-Mar-21 10:24:00	22.70	15-Mar-21 10:24:00	23.48
15-Mar-21 10:25:00	10.57	15-Mar-21 10:25:00	13.45	15-Mar-21 10:25:00	15.20	15-Mar-21 10:25:00	0.05	15-Mar-21 10:25:00	245.86	15-Mar-21 10:25:00	1.90	15-Mar-21 10:25:00	22.82	15-Mar-21 10:25:00	23.45
15-Mar-21 10:26:00	10.63	15-Mar-21 10:26:00	13.45	15-Mar-21 10:26:00	15.20	15-Mar-21 10:26:00	0.05	15-Mar-21 10:26:00	245.86	15-Mar-21 10:26:00	1.92	15-Mar-21 10:26:00	22.79	15-Mar-21 10:26:00	23.39
15-Mar-21 10:27:00	10.65	15-Mar-21 10:27:00	13.45	15-Mar-21 10:27:00	15.20	15-Mar-21 10:27:00	0.05	15-Mar-21 10:27:00	245.88	15-Mar-21 10:27:00	1.93	15-Mar-21 10:27:00	22.80	15-Mar-21 10:27:00	23.43
15-Mar-21 10:28:00	10.67	15-Mar-21 10:28:00	13.45	15-Mar-21 10:28:00	15.20	15-Mar-21 10:28:00	0.05	15-Mar-21 10:28:00	248.22	15-Mar-21 10:28:00	1.90	15-Mar-21 10:28:00	22.73	15-Mar-21 10:28:00	23.51
15-Mar-21 10:29:00	10.72	15-Mar-21 10:29:00	13.45	15-Mar-21 10:29:00	15.20	15-Mar-21 10:29:00	0.05	15-Mar-21 10:29:00	248.51	15-Mar-21 10:29:00	1.91	15-Mar-21 10:29:00	22.87	15-Mar-21 10:29:00	23.42
15-Mar-21 10:30:00	10.74	15-Mar-21 10:30:00	13.45	15-Mar-21 10:30:00	15.20	15-Mar-21 10:30:00	0.05	15-Mar-21 10:30:00	250.70	15-Mar-21 10:30:00	1.88	15-Mar-21 10:30:00	22.85	15-Mar-21 10:30:00	23.50
15-Mar-21 10:31:00	10.63	15-Mar-21 10:31:00	13.45	15-Mar-21 10:31:00	15.20	15-Mar-21 10:31:00	0.05	15-Mar-21 10:31:00	250.98	15-Mar-21 10:31:00	1.90	15-Mar-21 10:31:00	22.87	15-Mar-21 10:31:00	23.48
15-Mar-21 10:32:00	10.52	15-Mar-21 10:32:00	13.45	15-Mar-21 10:32:00	15.20	15-Mar-21 10:32:00	0.05	15-Mar-21 10:32:00	250.82	15-Mar-21 10:32:00	1.92	15-Mar-21 10:32:00	22.84	15-Mar-21 10:32:00	23.49
15-Mar-21 10:33:00	10.55	15-Mar-21 10:33:00	13.45	15-Mar-21 10:33:00	15.20	15-Mar-21 10:33:00	0.05	15-Mar-21 10:33:00	248.33	15-Mar-21 10:33:00	1.92	15-Mar-21 10:33:00	22.97	15-Mar-21 10:33:00	23.61
15-Mar-21 10:34:00	10.58	15-Mar-21 10:34:00	13.45	15-Mar-21 10:34:00	15.20	15-Mar-21 10:34:00	0.05	15-Mar-21 10:34:00	246.14	15-Mar-21 10:34:00	1.90	15-Mar-21 10:34:00	22.78	15-Mar-21 10:34:00	23.48
15-Mar-21 10:35:00	10.58	15-Mar-21 10:35:00	13.45	15-Mar-21 10:35:00	15.20	15-Mar-21 10:35:00	0.05	15-Mar-21 10:35:00	245.86	15-Mar-21 10:35:00	1.91	15-Mar-21 10:35:00	22.96	15-Mar-21 10:35:00	23.58
15-Mar-21 10:36:00	10.58	15-Mar-21 10:36:00	13.45	15-Mar-21 10:36:00	15.20	15-Mar-21 10:36:00	0.05	15-Mar-21 10:36:00	245.86	15-Mar-21 10:36:00	1.90	15-Mar-21 10:36:00	22.96	15-Mar-21 10:36:00	23.48
15-Mar-21 10:37:00	10.67	15-Mar-21 10:37:00	13.45	15-Mar-21 10:37:00	15.20	15-Mar-21 10:37:00	0.05	15-Mar-21 10:37:00	245.86	15-Mar-21 10:37:00	1.92	15-Mar-21 10:37:00	23.12	15-Mar-21 10:37:00	23.60
15-Mar-21 10:38:00	10.76	15-Mar-21 10:38:00	13.45	15-Mar-21 10:38:00	15.20	15-Mar-21 10:38:00	0.05	15-Mar-21 10:38:00	246.22	15-Mar-21 10:38:00	1.90	15-Mar-21 10:38:00	23.20	15-Mar-21 10:38:00	23.67
Average Stack NOx, ppm (15% O2)	**10.61**	**Average Stack CO, ppm (15% O2)**	**13.54**	**Average Stack O2 (%)**	**15.20**	**Average Duct Burner Gas Flow (MSCFH)**	**0.07**	**Average Turbine Gas Flow (MSCFH)**	**246.80**	**Ave. Steam Injection Rate (lb/s)**	**1.91**	**Ave. Ammonia Injection (lb/hr)**	**22.79**	**Ave. Turbine Load (MWh)**	**23.49**

246.87 × 1000/60 = 4114.5 dscfm

New-Indy Oxnard, LLC
ROSEMOUNT CEMS SOURCE TEST - March 15, 2021

Run 4

Stack NOx		Stack CO		Stack O2		Duct Burner Gas Flow		Turbine Gas Flow		Steam Injection		Ammonia Injection		Turbine Load	
RS_NOX.PPM		RS_931AIC1111C.CCO		RS_931AIC11111B.02		DBGASFLOW_A		GTGASFLOW		921-2015.WQ		931FIC1173_MV		921-2015.DWATT	
15-Mar-21 10:55:00	10.57	15-Mar-21 10:55:00	12.82	15-Mar-21 10:55:00	15.20	15-Mar-21 10:55:00	0.05	15-Mar-21 10:55:00	250.98	15-Mar-21 10:55:00	1.94	15-Mar-21 10:55:00	23.96	15-Mar-21 10:55:00	23.72
15-Mar-21 10:56:00	10.57	15-Mar-21 10:56:00	12.68	15-Mar-21 10:56:00	15.20	15-Mar-21 10:56:00	0.05	15-Mar-21 10:56:00	250.98	15-Mar-21 10:56:00	1.92	15-Mar-21 10:56:00	24.02	15-Mar-21 10:56:00	23.60
15-Mar-21 10:57:00	10.55	15-Mar-21 10:57:00	12.51	15-Mar-21 10:57:00	15.20	15-Mar-21 10:57:00	0.05	15-Mar-21 10:57:00	250.98	15-Mar-21 10:57:00	1.91	15-Mar-21 10:57:00	24.09	15-Mar-21 10:57:00	23.91
15-Mar-21 10:58:00	10.54	15-Mar-21 10:58:00	12.99	15-Mar-21 10:58:00	15.20	15-Mar-21 10:58:00	0.05	15-Mar-21 10:58:00	250.98	15-Mar-21 10:58:00	1.89	15-Mar-21 10:58:00	24.36	15-Mar-21 10:58:00	23.83
15-Mar-21 10:59:00	10.52	15-Mar-21 10:59:00	13.44	15-Mar-21 10:59:00	15.20	15-Mar-21 10:59:00	0.05	15-Mar-21 10:59:00	250.98	15-Mar-21 10:59:00	1.91	15-Mar-21 10:59:00	24.19	15-Mar-21 10:59:00	23.75
15-Mar-21 11:00:00	10.51	15-Mar-21 11:00:00	13.48	15-Mar-21 11:00:00	15.20	15-Mar-21 11:00:00	0.05	15-Mar-21 11:00:00	250.98	15-Mar-21 11:00:00	1.92	15-Mar-21 11:00:00	24.01	15-Mar-21 11:00:00	23.78
15-Mar-21 11:01:00	10.54	15-Mar-21 11:01:00	13.51	15-Mar-21 11:01:00	15.20	15-Mar-21 11:01:00	0.05	15-Mar-21 11:01:00	250.98	15-Mar-21 11:01:00	1.90	15-Mar-21 11:01:00	23.97	15-Mar-21 11:01:00	23.80
15-Mar-21 11:02:00	10.56	15-Mar-21 11:02:00	13.54	15-Mar-21 11:02:00	15.23	15-Mar-21 11:02:00	0.05	15-Mar-21 11:02:00	250.98	15-Mar-21 11:02:00	1.89	15-Mar-21 11:02:00	24.02	15-Mar-21 11:02:00	23.65
15-Mar-21 11:03:00	10.56	15-Mar-21 11:03:00	13.56	15-Mar-21 11:03:00	15.26	15-Mar-21 11:03:00	0.05	15-Mar-21 11:03:00	250.98	15-Mar-21 11:03:00	1.93	15-Mar-21 11:03:00	24.07	15-Mar-21 11:03:00	23.68
15-Mar-21 11:04:00	10.54	15-Mar-21 11:04:00	13.56	15-Mar-21 11:04:00	15.26	15-Mar-21 11:04:00	0.05	15-Mar-21 11:04:00	250.98	15-Mar-21 11:04:00	1.91	15-Mar-21 11:04:00	24.11	15-Mar-21 11:04:00	23.68
15-Mar-21 11:05:00	10.42	15-Mar-21 11:05:00	13.56	15-Mar-21 11:05:00	15.26	15-Mar-21 11:05:00	0.05	15-Mar-21 11:05:00	250.98	15-Mar-21 11:05:00	1.90	15-Mar-21 11:05:00	24.05	15-Mar-21 11:05:00	23.63
15-Mar-21 11:06:00	10.33	15-Mar-21 11:06:00	13.56	15-Mar-21 11:06:00	15.26	15-Mar-21 11:06:00	0.05	15-Mar-21 11:06:00	250.98	15-Mar-21 11:06:00	1.88	15-Mar-21 11:06:00	23.95	15-Mar-21 11:06:00	23.61
15-Mar-21 11:07:00	10.41	15-Mar-21 11:07:00	13.56	15-Mar-21 11:07:00	15.26	15-Mar-21 11:07:00	0.05	15-Mar-21 11:07:00	250.98	15-Mar-21 11:07:00	1.90	15-Mar-21 11:07:00	23.90	15-Mar-21 11:07:00	23.70
15-Mar-21 11:08:00	10.48	15-Mar-21 11:08:00	13.56	15-Mar-21 11:08:00	15.26	15-Mar-21 11:08:00	0.05	15-Mar-21 11:08:00	250.98	15-Mar-21 11:08:00	1.92	15-Mar-21 11:08:00	23.86	15-Mar-21 11:08:00	23.62
15-Mar-21 11:09:00	10.37	15-Mar-21 11:09:00	13.56	15-Mar-21 11:09:00	15.26	15-Mar-21 11:09:00	0.05	15-Mar-21 11:09:00	250.98	15-Mar-21 11:09:00	1.89	15-Mar-21 11:09:00	23.83	15-Mar-21 11:09:00	23.75
15-Mar-21 11:10:00	10.28	15-Mar-21 11:10:00	13.56	15-Mar-21 11:10:00	15.26	15-Mar-21 11:10:00	0.05	15-Mar-21 11:10:00	250.98	15-Mar-21 11:10:00	1.91	15-Mar-21 11:10:00	23.79	15-Mar-21 11:10:00	23.59
15-Mar-21 11:11:00	10.37	15-Mar-21 11:11:00	13.56	15-Mar-21 11:11:00	15.26	15-Mar-21 11:11:00	0.05	15-Mar-21 11:11:00	250.98	15-Mar-21 11:11:00	1.90	15-Mar-21 11:11:00	23.75	15-Mar-21 11:11:00	23.60
15-Mar-21 11:12:00	10.45	15-Mar-21 11:12:00	13.56	15-Mar-21 11:12:00	15.26	15-Mar-21 11:12:00	0.05	15-Mar-21 11:12:00	250.98	15-Mar-21 11:12:00	1.92	15-Mar-21 11:12:00	23.84	15-Mar-21 11:12:00	23.69
15-Mar-21 11:13:00	10.32	15-Mar-21 11:13:00	13.56	15-Mar-21 11:13:00	15.26	15-Mar-21 11:13:00	0.05	15-Mar-21 11:13:00	250.98	15-Mar-21 11:13:00	1.90	15-Mar-21 11:13:00	23.68	15-Mar-21 11:13:00	23.69
15-Mar-21 11:14:00	10.18	15-Mar-21 11:14:00	13.56	15-Mar-21 11:14:00	15.26	15-Mar-21 11:14:00	0.05	15-Mar-21 11:14:00	250.98	15-Mar-21 11:14:00	1.88	15-Mar-21 11:14:00	23.60	15-Mar-21 11:14:00	23.60
15-Mar-21 11:15:00	10.20	15-Mar-21 11:15:00	13.56	15-Mar-21 11:15:00	15.26	15-Mar-21 11:15:00	0.05	15-Mar-21 11:15:00	250.98	15-Mar-21 11:15:00	1.91	15-Mar-21 11:15:00	23.75	15-Mar-21 11:15:00	23.50
15-Mar-21 11:16:00	10.24	15-Mar-21 11:16:00	13.56	15-Mar-21 11:16:00	15.26	15-Mar-21 11:16:00	0.05	15-Mar-21 11:16:00	250.98	15-Mar-21 11:16:00	1.91	15-Mar-21 11:16:00	23.63	15-Mar-21 11:16:00	23.56
15-Mar-21 11:17:00	10.33	15-Mar-21 11:17:00	13.56	15-Mar-21 11:17:00	15.26	15-Mar-21 11:17:00	0.05	15-Mar-21 11:17:00	250.98	15-Mar-21 11:17:00	1.92	15-Mar-21 11:17:00	23.59	15-Mar-21 11:17:00	23.55
15-Mar-21 11:18:00	10.42	15-Mar-21 11:18:00	13.56	15-Mar-21 11:18:00	15.26	15-Mar-21 11:18:00	0.05	15-Mar-21 11:18:00	250.98	15-Mar-21 11:18:00	1.90	15-Mar-21 11:18:00	23.61	15-Mar-21 11:18:00	23.49
15-Mar-21 11:19:00	10.43	15-Mar-21 11:19:00	13.56	15-Mar-21 11:19:00	15.26	15-Mar-21 11:19:00	0.05	15-Mar-21 11:19:00	250.98	15-Mar-21 11:19:00	1.91	15-Mar-21 11:19:00	23.60	15-Mar-21 11:19:00	23.64
15-Mar-21 11:20:00	10.42	15-Mar-21 11:20:00	13.56	15-Mar-21 11:20:00	15.26	15-Mar-21 11:20:00	0.05	15-Mar-21 11:20:00	250.98	15-Mar-21 11:20:00	1.91	15-Mar-21 11:20:00	23.56	15-Mar-21 11:20:00	23.69
15-Mar-21 11:21:00	10.41	15-Mar-21 11:21:00	13.56	15-Mar-21 11:21:00	15.26	15-Mar-21 11:21:00	0.05	15-Mar-21 11:21:00	250.98	15-Mar-21 11:21:00	1.91	15-Mar-21 11:21:00	23.59	15-Mar-21 11:21:00	23.66
15-Mar-21 11:22:00	10.40	15-Mar-21 11:22:00	13.56	15-Mar-21 11:22:00	15.26	15-Mar-21 11:22:00	0.05	15-Mar-21 11:22:00	250.98	15-Mar-21 11:22:00	1.90	15-Mar-21 11:22:00	23.62	15-Mar-21 11:22:00	23.61
15-Mar-21 11:23:00	10.44	15-Mar-21 11:23:00	13.56	15-Mar-21 11:23:00	15.26	15-Mar-21 11:23:00	0.05	15-Mar-21 11:23:00	250.98	15-Mar-21 11:23:00	1.92	15-Mar-21 11:23:00	23.60	15-Mar-21 11:23:00	23.62
15-Mar-21 11:24:00	10.50	15-Mar-21 11:24:00	13.56	15-Mar-21 11:24:00	15.26	15-Mar-21 11:24:00	0.05	15-Mar-21 11:24:00	250.62	15-Mar-21 11:24:00	1.90	15-Mar-21 11:24:00	23.73	15-Mar-21 11:24:00	23.67
15-Mar-21 11:25:00	10.63	15-Mar-21 11:25:00	13.56	15-Mar-21 11:25:00	15.29	15-Mar-21 11:25:00	0.05	15-Mar-21 11:25:00	248.33	15-Mar-21 11:25:00	1.89	15-Mar-21 11:25:00	23.67	15-Mar-21 11:25:00	23.51
15-Mar-21 11:26:00	10.70	15-Mar-21 11:26:00	13.56	15-Mar-21 11:26:00	15.26	15-Mar-21 11:26:00	0.05	15-Mar-21 11:26:00	248.50	15-Mar-21 11:26:00	1.90	15-Mar-21 11:26:00	23.61	15-Mar-21 11:26:00	23.42
15-Mar-21 11:27:00	10.50	15-Mar-21 11:27:00	13.56	15-Mar-21 11:27:00	15.28	15-Mar-21 11:27:00	0.05	15-Mar-21 11:27:00	248.51	15-Mar-21 11:27:00	1.90	15-Mar-21 11:27:00	23.57	15-Mar-21 11:27:00	23.55
Average Stack NOx, ppm (15% O2)	10.45	Average Stack CO, ppm (15% O2)	13.46	Average Stack O2 (%)	15.24	Average Duct Burner Gas Flow (MSCFH)	0.05	Average Turbine Gas Flow (MSCFH)	250.68	Ave. Steam Injection Rate (lb/s)	1.91	Ave. Ammonia Injection (lb/hr)	23.83	Ave. Turbine Load (MWh)	23.65

250.73 × 1000/60 = 4178.8 dscfm

Average Runs 4-5-6

4178.1 dscfm

Average 4-5-6
23.88

Average 4-5-6
23.63

New-Indy Oxnard, LLC
ROSEMOUNT CEMS SOURCE TEST - March 15, 2021

Rata 5

Stack NOx		Stack CO		Stack O2		Duct Burner Gas Flow		Turbine Gas Flow		Steam Injection		Ammonia Injection		Turbine Load	
RS_NOX PPM		RS_931AIC1111C.CCO		RS_931AIC1111B.O2		DBGASFLOW_A		GTGASFLOW		921-2015.WQ		931FIC1173_MV		921-2015.DWATT	
15-Mar-21 11:28:00	10.32	15-Mar-21 11:28:00	13.56	15-Mar-21 11:28:00	15.26	15-Mar-21 11:28:00	0.05	15-Mar-21 11:28:00	250.34	15-Mar-21 11:28:00	1.92	15-Mar-21 11:28:00	23.58	15-Mar-21 11:28:00	23.50
15-Mar-21 11:29:00	10.48	15-Mar-21 11:29:00	13.56	15-Mar-21 11:29:00	15.26	15-Mar-21 11:29:00	0.05	15-Mar-21 11:29:00	248.33	15-Mar-21 11:29:00	1.90	15-Mar-21 11:29:00	23.61	15-Mar-21 11:29:00	23.58
15-Mar-21 11:30:00	10.65	15-Mar-21 11:30:00	13.56	15-Mar-21 11:30:00	15.26	15-Mar-21 11:30:00	0.05	15-Mar-21 11:30:00	248.50	15-Mar-21 11:30:00	1.90	15-Mar-21 11:30:00	23.78	15-Mar-21 11:30:00	23.58
15-Mar-21 11:31:00	10.55	15-Mar-21 11:31:00	13.56	15-Mar-21 11:31:00	15.26	15-Mar-21 11:31:00	0.05	15-Mar-21 11:31:00	248.51	15-Mar-21 11:31:00	1.91	15-Mar-21 11:31:00	23.71	15-Mar-21 11:31:00	23.59
15-Mar-21 11:32:00	10.45	15-Mar-21 11:32:00	13.56	15-Mar-21 11:32:00	15.26	15-Mar-21 11:32:00	0.05	15-Mar-21 11:32:00	250.70	15-Mar-21 11:32:00	1.91	15-Mar-21 11:32:00	23.79	15-Mar-21 11:32:00	23.55
15-Mar-21 11:33:00	10.49	15-Mar-21 11:33:00	13.56	15-Mar-21 11:33:00	15.26	15-Mar-21 11:33:00	0.05	15-Mar-21 11:33:00	250.98	15-Mar-21 11:33:00	1.91	15-Mar-21 11:33:00	23.76	15-Mar-21 11:33:00	23.55
15-Mar-21 11:34:00	10.55	15-Mar-21 11:34:00	13.56	15-Mar-21 11:34:00	15.26	15-Mar-21 11:34:00	0.05	15-Mar-21 11:34:00	250.98	15-Mar-21 11:34:00	1.90	15-Mar-21 11:34:00	23.78	15-Mar-21 11:34:00	23.56
15-Mar-21 11:35:00	10.57	15-Mar-21 11:35:00	13.56	15-Mar-21 11:35:00	15.26	15-Mar-21 11:35:00	0.05	15-Mar-21 11:35:00	250.98	15-Mar-21 11:35:00	1.90	15-Mar-21 11:35:00	23.72	15-Mar-21 11:35:00	23.58
15-Mar-21 11:36:00	10.58	15-Mar-21 11:36:00	13.56	15-Mar-21 11:36:00	15.26	15-Mar-21 11:36:00	0.05	15-Mar-21 11:36:00	250.98	15-Mar-21 11:36:00	1.92	15-Mar-21 11:36:00	23.77	15-Mar-21 11:36:00	23.57
15-Mar-21 11:37:00	10.61	15-Mar-21 11:37:00	13.56	15-Mar-21 11:37:00	15.26	15-Mar-21 11:37:00	0.05	15-Mar-21 11:37:00	250.98	15-Mar-21 11:37:00	1.90	15-Mar-21 11:37:00	23.69	15-Mar-21 11:37:00	23.60
15-Mar-21 11:38:00	10.45	15-Mar-21 11:38:00	13.56	15-Mar-21 11:38:00	15.26	15-Mar-21 11:38:00	0.05	15-Mar-21 11:38:00	250.98	15-Mar-21 11:38:00	1.91	15-Mar-21 11:38:00	23.71	15-Mar-21 11:38:00	23.68
15-Mar-21 11:39:00	10.53	15-Mar-21 11:39:00	13.56	15-Mar-21 11:39:00	15.26	15-Mar-21 11:39:00	0.05	15-Mar-21 11:39:00	250.98	15-Mar-21 11:39:00	1.92	15-Mar-21 11:39:00	23.74	15-Mar-21 11:39:00	23.72
15-Mar-21 11:40:00	10.59	15-Mar-21 11:40:00	13.56	15-Mar-21 11:40:00	15.26	15-Mar-21 11:40:00	0.05	15-Mar-21 11:40:00	250.98	15-Mar-21 11:40:00	1.90	15-Mar-21 11:40:00	23.74	15-Mar-21 11:40:00	23.68
15-Mar-21 11:41:00	10.49	15-Mar-21 11:41:00	13.56	15-Mar-21 11:41:00	15.26	15-Mar-21 11:41:00	0.05	15-Mar-21 11:41:00	250.98	15-Mar-21 11:41:00	1.89	15-Mar-21 11:41:00	23.68	15-Mar-21 11:41:00	23.61
15-Mar-21 11:42:00	10.39	15-Mar-21 11:42:00	13.56	15-Mar-21 11:42:00	15.26	15-Mar-21 11:42:00	0.05	15-Mar-21 11:42:00	250.98	15-Mar-21 11:42:00	1.91	15-Mar-21 11:42:00	23.65	15-Mar-21 11:42:00	23.70
15-Mar-21 11:43:00	10.48	15-Mar-21 11:43:00	13.56	15-Mar-21 11:43:00	15.26	15-Mar-21 11:43:00	0.05	15-Mar-21 11:43:00	250.98	15-Mar-21 11:43:00	1.91	15-Mar-21 11:43:00	23.78	15-Mar-21 11:43:00	23.73
15-Mar-21 11:44:00	10.57	15-Mar-21 11:44:00	13.56	15-Mar-21 11:44:00	15.26	15-Mar-21 11:44:00	0.05	15-Mar-21 11:44:00	250.98	15-Mar-21 11:44:00	1.90	15-Mar-21 11:44:00	23.72	15-Mar-21 11:44:00	23.70
15-Mar-21 11:45:00	10.51	15-Mar-21 11:45:00	13.56	15-Mar-21 11:45:00	15.26	15-Mar-21 11:45:00	0.05	15-Mar-21 11:45:00	250.98	15-Mar-21 11:45:00	1.90	15-Mar-21 11:45:00	23.66	15-Mar-21 11:45:00	23.58
15-Mar-21 11:46:00	10.48	15-Mar-21 11:46:00	13.56	15-Mar-21 11:46:00	15.26	15-Mar-21 11:46:00	0.05	15-Mar-21 11:46:00	250.98	15-Mar-21 11:46:00	1.90	15-Mar-21 11:46:00	23.66	15-Mar-21 11:46:00	23.58
15-Mar-21 11:47:00	10.61	15-Mar-21 11:47:00	13.56	15-Mar-21 11:47:00	15.26	15-Mar-21 11:47:00	0.05	15-Mar-21 11:47:00	250.98	15-Mar-21 11:47:00	1.89	15-Mar-21 11:47:00	23.66	15-Mar-21 11:47:00	23.62
15-Mar-21 11:48:00	10.74	15-Mar-21 11:48:00	13.56	15-Mar-21 11:48:00	15.26	15-Mar-21 11:48:00	0.05	15-Mar-21 11:48:00	250.98	15-Mar-21 11:48:00	1.91	15-Mar-21 11:48:00	23.72	15-Mar-21 11:48:00	23.60
15-Mar-21 11:49:00	10.60	15-Mar-21 11:49:00	13.56	15-Mar-21 11:49:00	15.26	15-Mar-21 11:49:00	0.05	15-Mar-21 11:49:00	250.98	15-Mar-21 11:49:00	1.82	15-Mar-21 11:49:00	23.72	15-Mar-21 11:49:00	23.65
15-Mar-21 11:50:00	10.45	15-Mar-21 11:50:00	13.56	15-Mar-21 11:50:00	15.26	15-Mar-21 11:50:00	0.05	15-Mar-21 11:50:00	250.98	15-Mar-21 11:50:00	1.89	15-Mar-21 11:50:00	23.65	15-Mar-21 11:50:00	23.62
15-Mar-21 11:51:00	10.46	15-Mar-21 11:51:00	13.56	15-Mar-21 11:51:00	15.26	15-Mar-21 11:51:00	0.05	15-Mar-21 11:51:00	250.98	15-Mar-21 11:51:00	1.91	15-Mar-21 11:51:00	23.67	15-Mar-21 11:51:00	23.59
15-Mar-21 11:52:00	10.50	15-Mar-21 11:52:00	13.56	15-Mar-21 11:52:00	15.26	15-Mar-21 11:52:00	0.05	15-Mar-21 11:52:00	250.62	15-Mar-21 11:52:00	1.90	15-Mar-21 11:52:00	23.64	15-Mar-21 11:52:00	23.56
15-Mar-21 11:53:00	10.58	15-Mar-21 11:53:00	13.56	15-Mar-21 11:53:00	15.26	15-Mar-21 11:53:00	0.05	15-Mar-21 11:53:00	248.33	15-Mar-21 11:53:00	1.91	15-Mar-21 11:53:00	23.69	15-Mar-21 11:53:00	23.58
15-Mar-21 11:54:00	10.60	15-Mar-21 11:54:00	13.56	15-Mar-21 11:54:00	15.26	15-Mar-21 11:54:00	0.05	15-Mar-21 11:54:00	248.50	15-Mar-21 11:54:00	1.90	15-Mar-21 11:54:00	23.66	15-Mar-21 11:54:00	23.51
15-Mar-21 11:55:00	10.49	15-Mar-21 11:55:00	13.56	15-Mar-21 11:55:00	15.26	15-Mar-21 11:55:00	0.05	15-Mar-21 11:55:00	248.51	15-Mar-21 11:55:00	1.91	15-Mar-21 11:55:00	23.64	15-Mar-21 11:55:00	23.52
15-Mar-21 11:56:00	10.40	15-Mar-21 11:56:00	13.56	15-Mar-21 11:56:00	15.26	15-Mar-21 11:56:00	0.05	15-Mar-21 11:56:00	250.70	15-Mar-21 11:56:00	1.91	15-Mar-21 11:56:00	23.64	15-Mar-21 11:56:00	23.54
15-Mar-21 11:57:00	10.53	15-Mar-21 11:57:00	13.56	15-Mar-21 11:57:00	15.26	15-Mar-21 11:57:00	0.05	15-Mar-21 11:57:00	250.98	15-Mar-21 11:57:00	1.91	15-Mar-21 11:57:00	23.64	15-Mar-21 11:57:00	23.57
15-Mar-21 11:58:00	10.67	15-Mar-21 11:58:00	13.56	15-Mar-21 11:58:00	15.26	15-Mar-21 11:58:00	0.05	15-Mar-21 11:58:00	250.98	15-Mar-21 11:58:00	1.94	15-Mar-21 11:58:00	23.64	15-Mar-21 11:58:00	23.60
15-Mar-21 11:59:00	10.69	15-Mar-21 11:59:00	13.56	15-Mar-21 11:59:00	15.26	15-Mar-21 11:59:00	0.05	15-Mar-21 11:59:00	250.98	15-Mar-21 11:59:00	1.94	15-Mar-21 11:59:00	23.81	15-Mar-21 11:59:00	23.65
15-Mar-21 12:00:00	10.70	15-Mar-21 12:00:00	13.56	15-Mar-21 12:00:00	15.26	15-Mar-21 12:00:00	0.05	15-Mar-21 12:00:00	250.98	15-Mar-21 12:00:00	1.94	15-Mar-21 12:00:00	23.87	15-Mar-21 12:00:00	23.65
Average Stack NOx, ppm (15% O2)	10.53	Average Stack CO, ppm (15% O2)	13.56	Average Stack O2 (%)	15.26	Average Duct Burner Gas Flow (MSCFH)	0.05	Average Turbine Gas Flow (MSCFH)	250.35	Ave. Steam Injection Rate (lb/s)	1.91	Ave. Ammonia Injection (lb/hr)	23.71	Ave. Turbine Load (MWh)	23.60

250.40 x 1000 / 60 = 4173.3 dscfm

New-Indy Oxnard, LLC
ROSEMOUNT CEMS SOURCE TEST.- March 15, 2021

Data 6

Stack NOx		Stack CO		Stack O2		Duct Burner Gas Flow		Turbine Gas Flow		Steam Injection		Ammonia Injection		Turbine Load	
RS_NOX PPM		RS_931AIC1111C.CCO		RS_931AIC1111B.O2		DBGASFLOW_A		GTGASFLOW		921-2015.WQ		931FIC1173_MV		921-2015.DWATT	
15-Mar-21 12:01:00	10.76	15-Mar-21 12:01:00	13.56	15-Mar-21 12:01:00	15.26	15-Mar-21 12:01:00	0.05	15-Mar-21 12:01:00	250.98	15-Mar-21 12:01:00	1.90	15-Mar-21 12:01:00	23.88	15-Mar-21 12:01:00	23.63
15-Mar-21 12:02:00	10.80	15-Mar-21 12:02:00	13.56	15-Mar-21 12:02:00	15.26	15-Mar-21 12:02:00	0.05	15-Mar-21 12:02:00	250.98	15-Mar-21 12:02:00	1.89	15-Mar-21 12:02:00	23.82	15-Mar-21 12:02:00	23.69
15-Mar-21 12:03:00	10.72	15-Mar-21 12:03:00	13.56	15-Mar-21 12:03:00	15.26	15-Mar-21 12:03:00	0.05	15-Mar-21 12:03:00	250.98	15-Mar-21 12:03:00	1.88	15-Mar-21 12:03:00	23.96	15-Mar-21 12:03:00	23.75
15-Mar-21 12:04:00	10.63	15-Mar-21 12:04:00	13.56	15-Mar-21 12:04:00	15.26	15-Mar-21 12:04:00	0.05	15-Mar-21 12:04:00	250.98	15-Mar-21 12:04:00	1.91	15-Mar-21 12:04:00	24.01	15-Mar-21 12:04:00	23.60
15-Mar-21 12:05:00	10.62	15-Mar-21 12:05:00	13.56	15-Mar-21 12:05:00	15.26	15-Mar-21 12:05:00	0.05	15-Mar-21 12:05:00	250.98	15-Mar-21 12:05:00	1.93	15-Mar-21 12:05:00	24.06	15-Mar-21 12:05:00	23.70
15-Mar-21 12:06:00	10.63	15-Mar-21 12:06:00	13.56	15-Mar-21 12:06:00	15.26	15-Mar-21 12:06:00	0.05	15-Mar-21 12:06:00	250.98	15-Mar-21 12:06:00	1.92	15-Mar-21 12:06:00	24.11	15-Mar-21 12:06:00	23.70
15-Mar-21 12:07:00	10.69	15-Mar-21 12:07:00	13.56	15-Mar-21 12:07:00	15.26	15-Mar-21 12:07:00	0.05	15-Mar-21 12:07:00	250.98	15-Mar-21 12:07:00	1.91	15-Mar-21 12:07:00	24.20	15-Mar-21 12:07:00	23.79
15-Mar-21 12:08:00	10.73	15-Mar-21 12:08:00	13.56	15-Mar-21 12:08:00	15.26	15-Mar-21 12:08:00	0.05	15-Mar-21 12:08:00	250.98	15-Mar-21 12:08:00	1.90	15-Mar-21 12:08:00	24.22	15-Mar-21 12:08:00	23.73
15-Mar-21 12:09:00	10.65	15-Mar-21 12:09:00	13.56	15-Mar-21 12:09:00	15.26	15-Mar-21 12:09:00	0.05	15-Mar-21 12:09:00	250.98	15-Mar-21 12:09:00	1.89	15-Mar-21 12:09:00	24.21	15-Mar-21 12:09:00	23.68
15-Mar-21 12:10:00	10.57	15-Mar-21 12:10:00	13.56	15-Mar-21 12:10:00	15.26	15-Mar-21 12:10:00	0.05	15-Mar-21 12:10:00	250.98	15-Mar-21 12:10:00	1.88	15-Mar-21 12:10:00	24.29	15-Mar-21 12:10:00	23.68
15-Mar-21 12:11:00	10.59	15-Mar-21 12:11:00	13.56	15-Mar-21 12:11:00	15.26	15-Mar-21 12:11:00	0.05	15-Mar-21 12:11:00	250.98	15-Mar-21 12:11:00	1.92	15-Mar-21 12:11:00	24.29	15-Mar-21 12:11:00	23.65
15-Mar-21 12:12:00	10.60	15-Mar-21 12:12:00	13.56	15-Mar-21 12:12:00	15.26	15-Mar-21 12:12:00	0.05	15-Mar-21 12:12:00	250.98	15-Mar-21 12:12:00	1.90	15-Mar-21 12:12:00	24.27	15-Mar-21 12:12:00	23.65
15-Mar-21 12:13:00	10.49	15-Mar-21 12:13:00	13.56	15-Mar-21 12:13:00	15.26	15-Mar-21 12:13:00	0.05	15-Mar-21 12:13:00	250.98	15-Mar-21 12:13:00	1.92	15-Mar-21 12:13:00	24.23	15-Mar-21 12:13:00	23.70
15-Mar-21 12:14:00	10.36	15-Mar-21 12:14:00	13.56	15-Mar-21 12:14:00	15.26	15-Mar-21 12:14:00	0.05	15-Mar-21 12:14:00	250.98	15-Mar-21 12:14:00	1.80	15-Mar-21 12:14:00	24.27	15-Mar-21 12:14:00	23.69
15-Mar-21 12:15:00	10.41	15-Mar-21 12:15:00	13.56	15-Mar-21 12:15:00	15.26	15-Mar-21 12:15:00	0.05	15-Mar-21 12:15:00	250.98	15-Mar-21 12:15:00	1.90	15-Mar-21 12:15:00	24.15	15-Mar-21 12:15:00	23.61
15-Mar-21 12:16:00	10.48	15-Mar-21 12:16:00	13.56	15-Mar-21 12:16:00	15.26	15-Mar-21 12:16:00	0.05	15-Mar-21 12:16:00	250.98	15-Mar-21 12:16:00	1.90	15-Mar-21 12:16:00	24.06	15-Mar-21 12:16:00	23.59
15-Mar-21 12:17:00	10.48	15-Mar-21 12:17:00	13.56	15-Mar-21 12:17:00	15.26	15-Mar-21 12:17:00	0.05	15-Mar-21 12:17:00	250.98	15-Mar-21 12:17:00	1.91	15-Mar-21 12:17:00	24.11	15-Mar-21 12:17:00	23.58
15-Mar-21 12:18:00	10.48	15-Mar-21 12:18:00	13.56	15-Mar-21 12:18:00	15.26	15-Mar-21 12:18:00	0.05	15-Mar-21 12:18:00	250.98	15-Mar-21 12:18:00	1.92	15-Mar-21 12:18:00	24.15	15-Mar-21 12:18:00	23.65
15-Mar-21 12:19:00	10.44	15-Mar-21 12:19:00	13.56	15-Mar-21 12:19:00	15.25	15-Mar-21 12:19:00	0.05	15-Mar-21 12:19:00	250.98	15-Mar-21 12:19:00	1.89	15-Mar-21 12:19:00	24.11	15-Mar-21 12:19:00	23.71
15-Mar-21 12:20:00	10.41	15-Mar-21 12:20:00	13.56	15-Mar-21 12:20:00	15.26	15-Mar-21 12:20:00	0.05	15-Mar-21 12:20:00	250.98	15-Mar-21 12:20:00	1.91	15-Mar-21 12:20:00	24.06	15-Mar-21 12:20:00	23.61
15-Mar-21 12:21:00	10.48	15-Mar-21 12:21:00	13.56	15-Mar-21 12:21:00	15.26	15-Mar-21 12:21:00	0.05	15-Mar-21 12:21:00	250.98	15-Mar-21 12:21:00	1.92	15-Mar-21 12:21:00	24.02	15-Mar-21 12:21:00	23.63
15-Mar-21 12:22:00	10.56	15-Mar-21 12:22:00	13.56	15-Mar-21 12:22:00	15.26	15-Mar-21 12:22:00	0.05	15-Mar-21 12:22:00	250.98	15-Mar-21 12:22:00	1.90	15-Mar-21 12:22:00	24.12	15-Mar-21 12:22:00	23.69
15-Mar-21 12:23:00	10.62	15-Mar-21 12:23:00	13.56	15-Mar-21 12:23:00	15.26	15-Mar-21 12:23:00	0.05	15-Mar-21 12:23:00	250.98	15-Mar-21 12:23:00	1.90	15-Mar-21 12:23:00	24.20	15-Mar-21 12:23:00	23.66
15-Mar-21 12:24:00	10.65	15-Mar-21 12:24:00	13.56	15-Mar-21 12:24:00	15.26	15-Mar-21 12:24:00	0.05	15-Mar-21 12:24:00	250.98	15-Mar-21 12:24:00	1.90	15-Mar-21 12:24:00	24.26	15-Mar-21 12:24:00	23.56
15-Mar-21 12:25:00	10.43	15-Mar-21 12:25:00	13.56	15-Mar-21 12:25:00	15.26	15-Mar-21 12:25:00	0.05	15-Mar-21 12:25:00	250.98	15-Mar-21 12:25:00	1.91	15-Mar-21 12:25:00	24.26	15-Mar-21 12:25:00	23.68
15-Mar-21 12:26:00	10.24	15-Mar-21 12:26:00	13.56	15-Mar-21 12:26:00	15.26	15-Mar-21 12:26:00	0.05	15-Mar-21 12:26:00	250.98	15-Mar-21 12:26:00	1.90	15-Mar-21 12:26:00	24.15	15-Mar-21 12:26:00	23.59
15-Mar-21 12:27:00	10.28	15-Mar-21 12:27:00	13.56	15-Mar-21 12:27:00	15.26	15-Mar-21 12:27:00	0.05	15-Mar-21 12:27:00	250.98	15-Mar-21 12:27:00	1.92	15-Mar-21 12:27:00	24.09	15-Mar-21 12:27:00	23.59
15-Mar-21 12:28:00	10.35	15-Mar-21 12:28:00	13.56	15-Mar-21 12:28:00	15.26	15-Mar-21 12:28:00	0.05	15-Mar-21 12:28:00	250.98	15-Mar-21 12:28:00	1.89	15-Mar-21 12:28:00	24.04	15-Mar-21 12:28:00	23.54
15-Mar-21 12:29:00	10.33	15-Mar-21 12:29:00	13.56	15-Mar-21 12:29:00	15.26	15-Mar-21 12:29:00	0.05	15-Mar-21 12:29:00	250.98	15-Mar-21 12:29:00	1.93	15-Mar-21 12:29:00	24.04	15-Mar-21 12:29:00	23.67
15-Mar-21 12:30:00	10.31	15-Mar-21 12:30:00	13.56	15-Mar-21 12:30:00	15.26	15-Mar-21 12:30:00	0.05	15-Mar-21 12:30:00	250.98	15-Mar-21 12:30:00	1.92	15-Mar-21 12:30:00	24.04	15-Mar-21 12:30:00	23.71
15-Mar-21 12:31:00	10.40	15-Mar-21 12:31:00	13.56	15-Mar-21 12:31:00	15.26	15-Mar-21 12:31:00	0.05	15-Mar-21 12:31:00	250.98	15-Mar-21 12:31:00	1.90	15-Mar-21 12:31:00	24.04	15-Mar-21 12:31:00	23.68
15-Mar-21 12:32:00	10.47	15-Mar-21 12:32:00	13.56	15-Mar-21 12:32:00	15.26	15-Mar-21 12:32:00	0.05	15-Mar-21 12:32:00	250.62	15-Mar-21 12:32:00	1.88	15-Mar-21 12:32:00	24.04	15-Mar-21 12:32:00	23.57
15-Mar-21 12:33:00	10.39	15-Mar-21 12:33:00	13.56	15-Mar-21 12:33:00	15.26	15-Mar-21 12:33:00	0.05	15-Mar-21 12:33:00	248.33	15-Mar-21 12:33:00	1.91	15-Mar-21 12:33:00	24.04	15-Mar-21 12:33:00	23.66
Average Stack NOx, ppm (15% O2)	10.52	Average Stack CO, ppm (15% O2)	13.56	Average Stack O2 (%)	15.26	Average Duct Burner Gas Flow (MSCFH)	0.05	Average Turbine Gas Flow (MSCFH)	250.89	Ave. Steam Injection Rate (lb/s)	1.90	Ave. Ammonia Injection (lb/hr)	24.11	Ave. Turbine Load (MWh)	23.65

250.94 x 1000/60 = 4182.3 dscfm