



THE WCM GROUP, INC.
110 S. Bender Ave.
Humble, TX 77338

July 20, 2020

Mr. David Owen
Bureau of Operating Permits
New Jersey Department of Environmental Protection
Mail Code 401-02
401 East State Street, 2nd Floor
Trenton, NJ 08625-0027

VIA E-MAIL

REFERENCE Application for Minor Modification to Remove Quarterly H₂S Monitoring Requirements
Newark Bay Cogeneration Partnership, L.P.
Newark, Essex County; New Jersey
Program Interest No. 07617; Permit Activity No. BOP190001

Dear Mr. Owen:

On behalf of Newark Bay Cogeneration Partnership, L.P. (Newark Bay), The WCM Group, Inc. is submitting an application for a Minor Modification to Air Pollution Control Operating Permit BOP190001 in accordance with N.J.A.C. 7:27-22.23 to remove the quarterly hydrogen sulfide (H₂S) monitoring requirements.

1.0 Background

Newark Bay operates a cogeneration facility located at 414-462 Avenue P, Newark, Essex County, New Jersey. The facility consists of two (2) Westinghouse CW251/B-12 combustion turbines with unfired heat recovery steam generators (HRSGs) with a nominal heat input of 640 MMBtu/hr each, and one (1) Victory Energy package boiler with a nominal heat input of 38 MMBtu/hr. The primary fuel for the combustion turbines and boiler is natural gas with ultra-low sulfur distillate oil (ULSD) as backup. A selective catalyst reduction (SCR) is utilized to control nitrogen oxides (NO_x) in the combustion turbine/HRSG units.

2.0 Hydrogen Sulfide Monitoring Requirement

Newark Bay is currently required to conduct quarterly monitoring for H₂S at each of the six (6) landfill exhaust vents (U6). According to U6 OS1 Ref. #4, if the facility achieves and maintains compliance with quarterly monitoring in four (4) consecutive quarters then Newark Bay may submit a modification request to remove the monitoring from the permit. Quarterly monitoring has been conducted in accordance with the approved monitoring protocol beginning in the third quarter of 2019. The maximum monitored value averaged over a 30-minute period was 3.2 ppbv H₂S (Unit 001, 4th quarter 2019). The H₂S monitoring data is provided in Attachment A.

Newark Bay has satisfied the monitoring requirement of Ref. #4 and requests that the quarterly H₂S monitoring requirement be removed from the permit. This application constitutes a minor modification to the operating permit as the H₂S monitoring requirement is not provided for in New Jersey's current State Implementation Plan (SIP). Therefore, the monitoring requirement is not a federally enforceable provision and removal of the requirement may be done as a minor modification. The application has been prepared in RADIUS version 5 and uploaded to the NJDEP web portal. A hard copy of the RADIUS application is provided in Attachment B.

Should you have any questions regarding the information provided, please do not hesitate to contact me at (281) 446-7070.

Sincerely,



John S. Pandolph
Sr. Special Consultant, Technical Services

JSP/Ilb
ENCLOSURE

cc: M. Driscoll (electronic)
J. Lopez (electronic)

ATTACHMENT A
H₂S MONITORING DATA

Table 1 - Quarterly Hydrogen Sulfide Monitoring Field Log

Newark Bay Cogeneration Facility

Newark, NJ

Langan Project No.: 200065001

Date: 9/25/2019

Weather: Clear ~ 65F

Field Staff: KN

Wind Direction: SE

Wind Speed: 2-5 mph

Blower ID	Operation Status (on/off)	Average H2S Concentration (ppbv)	Methane (% LEL)	Oxygen (Vol %)	Start Time of 5 Minute Sample	Sample H2S Concentration (ppbv)	Notes
Unit 001	ON	2.0	0	20.9	9:05	2	
					9:10	2	
					9:15	2	
					9:20	1	
					9:25	2	
					9:30	2	
Unit 002	ON	0.0	0	20.9	7:50	0	
					7:55	0	
					8:00	0	
					8:05	0	
					8:10	0	
					8:15	0	
Unit 003	ON	1.0	0	20.9	11:30	1	
					11:35	2	
					11:40	1	
					11:45	1	
					11:50	1	
					11:55	1	
Unit 004	ON	1.0	0	20.9	8:35	1	
					8:40	1	
					8:45	1	
					8:50	1	
					8:55	0	
					9:00	1	
Unit 005	ON	0.5	0	20.9	10:20	1	
					10:25	1	
					10:30	0	
					10:35	0	
					10:40	1	
					10:45	0	
Unit 006	ON	1.0	0	20.9	9:45	0	
					9:50	1	
					9:55	1	
					10:00	2	
					10:05	1	
					10:10	1	
Unit 007	ON	1.5	0	20.9	10:55	1	
					11:00	1	
					11:05	2	
					11:10	2	
					11:15	2	
					11:20	2	

Notes:

H2S - Hydrogen Sulfide

ppbv - parts per billion by volume

Unit 001 - Sample location at each of the mitigation system blowers' vents

1. Measurements are collected at the effluent of each blower using a Jerome ® 631-X Hydrogen Sulfide Analyzer. The detection limit of said device is 3 ppbv, thus any results below the detection limit (3 ppbv) are estimates.

2. Refer to the attached Site Plan figure for the respective location of each blower's vent monitoring location.

Table 1 - Quarterly Hydrogen Sulfide Monitoring Field Log

Newark Bay Cogeneration Facility

Newark, NJ

Langan Project No.: 200065001

Date: **12/19/2019**

Weather: **Clear ~ 5-15F**

Field Staff: **KN**

Wind Direction: **SE**

Wind Speed: **10-15 mph**

Blower ID	Operation Status (on/off)	Average H2S Concentration (ppbv)	Methane (% LEL)	Oxygen (Vol %)	Start Time of 5 Minute Sample	Sample H2S Concentration (ppbv)	Notes
Unit 001	ON	3.2	0	20.9	9:00	5	
					9:05	3	
					9:10	2	
					9:15	3	
					9:20	3	
					9:25	3	
Unit 002	ON	0.3	0	20.9	7:43	0	
					7:49	0	
					7:55	0	
					8:00	1	
					8:06	0	
					8:11	1	
Unit 003	ON	1.7	0	20.9	10:40	2	
					10:45	2	
					10:50	2	
					10:55	1	
					11:00	1	
					11:05	2	
Unit 004	ON	1.0	0	20.9	8:20	2	
					8:25	1	
					8:30	1	
					8:36	0	
					8:41	1	
					8:46	1	
Unit 005	ON	1.0	0	20.9	10:08	1	
					10:13	2	
					10:18	1	
					10:23	1	
					10:28	1	
					10:33	0	
Unit 006	ON	2.0	0	20.9	9:35	2	
					9:40	2	
					9:45	2	
					9:50	2	
					9:55	2	
					10:00	2	
Unit 007	ON	1.2	0	20.9	11:25	1	
					11:30	1	
					11:35	2	
					11:40	1	
					11:45	1	
					11:50	1	

Notes:

H2S - Hydrogen Sulfide

ppbv - parts per billion by volume

Unit 001 - Sample location at each of the mitigation system blowers' vents

1. Measurements are collected at the effluent of each blower using a Jerome * 631-X Hydrogen Sulfide Analyzer. The detection limit of said device is 3 ppbv, thus any results below the detection limit (3 ppbv) are estimates.

2. Refer to the attached Site Plan figure for the respective location of each blower's vent monitoring location.

Table 1 - Quarterly Hydrogen Sulfide Monitoring Field Log

Newark Bay Cogeneration Facility

Newark, NJ

Langan Project No.: 200065001

Date: 3/16/2020

Weather: Clear ~ 35-40F

Field Staff: KN

Wind Direction: NE

Wind Speed: 8-12 mph

Blower ID	Operation Status (on/off)	Average H2S Concentration (ppbv)	Methane (% LEL)	Oxygen (Vol %)	Start Time of 5 Minute Sample	Sample H2S Concentration (ppbv)	Notes
Unit 001	ON	2.3	0	22.0	11:35	3	
					11:40	3	
					11:45	2	
					11:50	2	
					11:55	2	
					12:00	2	
Unit 002	ON	0.0	0	21.8	8:12	0	
					8:17	0	
					8:22	0	
					8:27	0	
					8:32	0	
					8:37	0	
Unit 003	ON	1.8	0	22.1	10:25	1	
					10:30	2	
					10:35	2	
					10:40	2	
					10:45	2	
					10:50	2	
Unit 004	ON	1.0	0	22.0	9:05	1	
					9:10	1	
					9:15	1	
					9:20	1	
					9:25	1	
					9:30	1	
Unit 005	ON	0.0	0	22.1	11:00	0	
					11:05	0	
					11:10	0	
					11:15	0	
					11:20	0	
					11:25	0	
Unit 006	ON	1.0	0	22.1	12:10	1	
					12:15	1	
					12:20	1	
					12:25	2	
					12:30	1	
					12:35	1	
Unit 007	ON	1.5	0	21.9	9:55	1	
					10:00	2	
					10:05	1	
					10:10	1	
					10:15	2	
					10:20	2	

Notes:

H2S - Hydrogen Sulfide

ppbv - parts per billion by volume

Unit 001 - Sample location at each of the mitigation system blowers' vents

1. Measurements are collected at the effluent of each blower using a Jerome * 631-X Hydrogen Sulfide Analyzer. The detection limit of said device is 3 ppbv, thus any results below the detection limit (3 ppbv) are estimates.

2. Refer to the attached Site Plan figure for the respective location of each blower's vent monitoring location.

Table 1 - Quarterly Hydrogen Sulfide Monitoring Field Log

Newark Bay Cogeneration Facility

Newark, NJ

Langan Project No.: 200065001

Date: 6/19/2020

Weather: Clear ~ 70-80F

Field Staff: KN

Wind Direction: E

Wind Speed: 2-6 mph

Blower ID	Operation Status (on/off)	Average H2S Concentration (ppbv)	Methane (% LEL)	Oxygen (Vol %)	Start Time of 5 Minute Sample	Sample H2S Concentration (ppbv)	Notes
Unit 001	ON	0.5	0	20.9	7:22	1	
					7:27	0	
					7:32	0	
					7:37	0	
					7:42	1	
					7:47	1	
Unit 002	ON	0.0	0	20.9	10:40	0	
					10:45	0	
					10:50	0	
					10:55	0	
					11:00	0	
					11:05	0	
Unit 003	ON	0.3	0	20.9	9:30	1	
					9:35	0	
					9:40	0	
					9:45	0	
					9:50	0	
					9:55	1	
Unit 004	ON	0.8	0	20.9	10:05	1	
					10:10	2	
					10:15	0	
					10:20	1	
					10:25	1	
					10:30	0	
Unit 005	ON	0.2	0	20.9	8:27	0	
					8:32	0	
					8:37	0	
					8:42	0	
					8:47	1	
					8:52	0	
Unit 006	ON	0.0	0	20.9	7:55	0	
					8:00	0	
					8:05	0	
					8:10	0	
					8:15	0	
					8:20	0	
Unit 007	ON	1.0	0	20.9	9:00	1	
					9:05	1	
					9:10	1	
					9:15	1	
					9:20	1	
					9:25	1	

Notes:

H2S - Hydrogen Sulfide

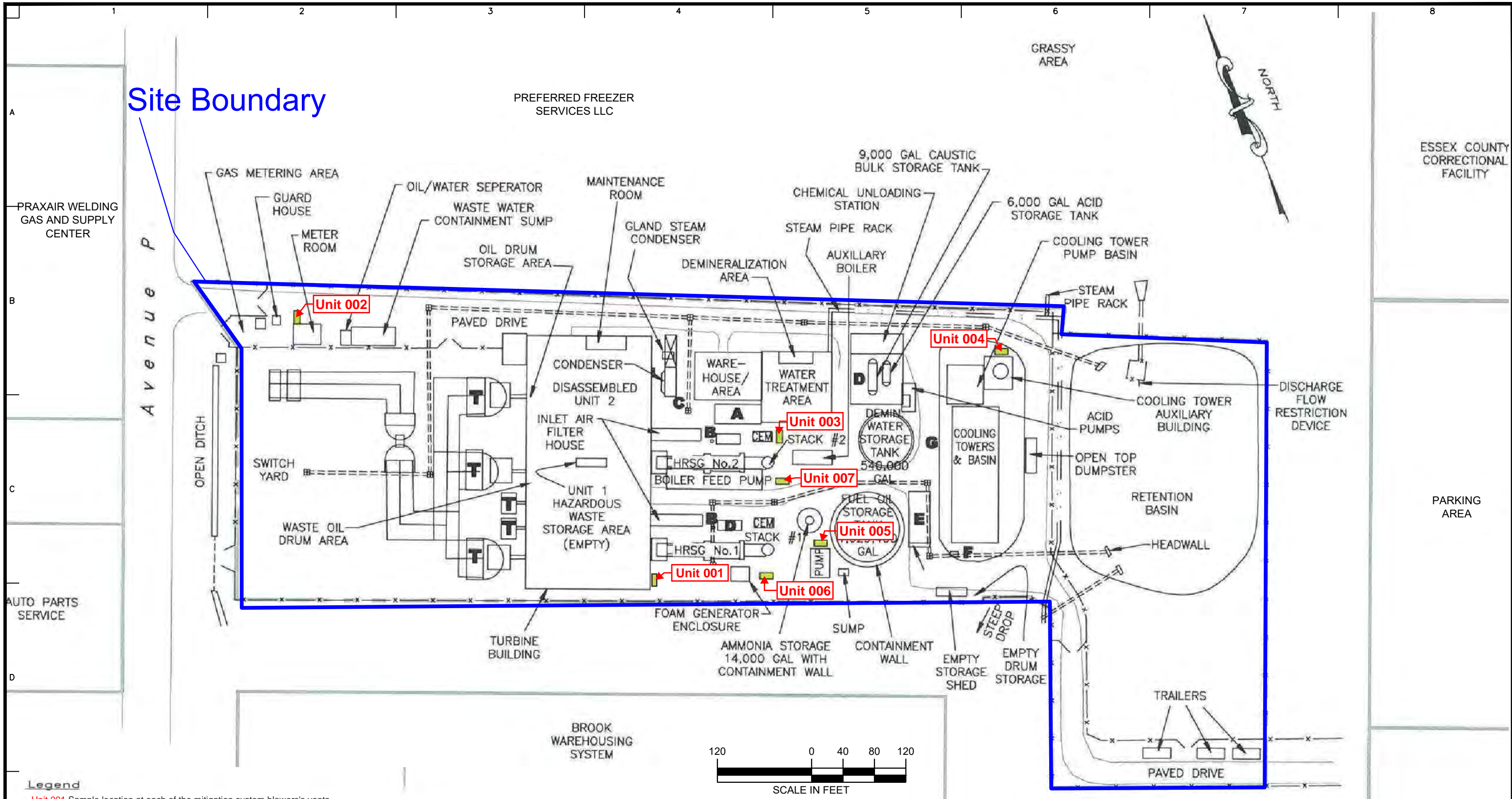
ppbv - parts per billion by volume

Unit 001 - Sample location at each of the mitigation system blowers' vents

1. Measurements are collected at the effluent of each blower using a Jerome * 631-X Hydrogen Sulfide Analyzer. The detection limit of said device is 3 ppbv, thus any results below the detection limit (3 ppbv) are estimates.

2. Refer to the attached Site Plan figure for the respective location of each blower's vent monitoring location.

Site Boundary



Legend

Unit 001 Sample location at each of the mitigation system blowers's vents

- | | | |
|--|---|--------------------------------------|
| A CHEM FD/ AIR COMP EQPT | F SUPPLEMENTAL FOAM STORAGE TANK | ■ STORM GRATE |
| B BLOWDOWN TANK | G ACID FEED REGEN PUMPS | --- FENCELINE |
| C CONDENSATE PUMPS | T TRANSFORMER | --- SUBJECT PROPERTY BOUNDARY |
| D NEUTRALIZATION BASIN | ■ METHANE VENT | |
| E FUEL OIL/AQUA AMMONIA UNLOADING STATION | | |

NOTE:
SITE PLAN FROM "PHASE I ESA UPDATE AND MATERIAL COMPLIANCE EVALUATION" BY AECOM, DATED FEBRUARY 2011.

LANGAN

Stone Manor Corporate Center, 2700 Kelly Road, Suite 200
Warrington, PA 18976

T: 215.491.6500 F: 215.491.6501 www.langan.com

Langan Engineering, Environmental, Surveying and
Landscape Architecture, D.P.C.
Langan Engineering and Environmental Services, Inc.
Langan CT, Inc.
Langan International LLC

Collectively known as Langan

Project

**NEWARK BAY
CONGENERATION
FACILITY**

NEWARK

ESSEX COUNTY

NEW JERSEY

Drawing Title

**HYDROGEN SULFIDE
QUARTERLY
MONITORING
SAMPLE LOCATIONS**

Project No.
200065001

Date
2/4/2019

Scale
1"=120'

Drawn By
KN

Checked By
NN

Submission Date
02/27/19

Drawing No.

1

Sheet 1 of 1

THE WCM GROUP, INC.

110 S. Bender Ave.

Humble, TX 77338

ATTACHMENT B
RADIUS APPLICATION

**New Jersey Department of Environmental Protection
Reason for Application**

Permit Being Modified

Permit Class: BOP **Number:** 190001

Description of Modifications: In accordance with N.J.A.C 7:27-22.23, Newark Bay Cogeneration Partnership LP, is submitting a application for a minor modification to remove the quarterly hydrogen sulfide (H₂S) monitoring requirement.

**New Jersey Department of Environmental Protection
Facility Profile (General)**

Facility Name (AIMS): Newark Bay Cogeneration Partnership LP

Facility ID (AIMS): 07617

Street 414-462 AVE P
Address: NEWARK, NJ 07105

Mailing 414-462 AVE P
Address: NEWARK, NJ 07105

County: Essex
Location
Description:

State Plane Coordinates:	
X-Coordinate:	594,597
Y-Coordinate:	687,466
Units:	Feet
Datum:	Unknown
Source Org.:	Other/Unknown
Source Type:	Hard Copy Map

Industry:	
Primary SIC:	4931
Secondary SIC:	
NAICS:	221112

**New Jersey Department of Environmental Protection
Facility Profile (General)**

Contact Type: Air Permit Information Contact**Organization:** Newark Bay Cogeneration Partnership, L.P.**Org. Type:** Partnership**Name:** Mark Driscoll**NJ EIN:** 51030292900**Title:** Environmental Director**Phone:** (848) 448-4852 x**Mailing Address:** 414-462 Avenue P
Newark, NJ 07105**Fax:** (973) 491-9560 x**Other:** () - x**Type:****Email:** Mark.Driscoll@TalenEnergy.com

Contact Type: Consultant**Organization:** The WCM Group, Inc.**Org. Type:** Corporation**Name:** Kerry Higgins**NJ EIN:** 51030292900**Title:** Vice President, Technical Services**Phone:** (281) 446-7070 x**Mailing Address:** P.O. Box 3247
Humble, TX 77347-3247**Fax:** (281) 446-3348 x**Other:** () - x**Type:****Email:** khiggins@wcmgroup.com

Contact Type: Emission Statements**Organization:** Newark Bay Cogeneration Partnership, L.P.**Org. Type:** Partnership**Name:** Mark Driscoll**NJ EIN:** 51030292900**Title:** Environmental Director**Phone:** (848) 448-4852 x**Mailing Address:** 414-462 Avenue P
Newark, NJ 07105**Fax:** (973) 491-9560 x**Other:** () - x**Type:****Email:** Mark.Driscoll@TalenEnergy.com

**New Jersey Department of Environmental Protection
Facility Profile (General)**

Contact Type: Environmental Officer**Organization:** Newark Bay Cogeneration Partnership, L.P.**Org. Type:** Partnership**Name:** Mark Driscoll**NJ EIN:** 51030292900**Title:** Environmental Director**Phone:** (848) 448-4852 x**Mailing Address:** 414-462 Avenue P
Newark, NJ 07105**Fax:** (973) 491-9560 x**Other:** () - x**Type:****Email:** Mark.Driscoll@TalenEnergy.com

Contact Type: Fees/Billing Contact**Organization:** Ethos Energy Group**Org. Type:** Corporation**Name:** Joseph Lopez**NJ EIN:** 50130292900**Title:** Facility Manager**Phone:** (973) 491-9559 x0213**Mailing Address:** 414-465 Avenue P
Newark, NJ 07105**Fax:** (973) 491-9650 x**Other:** () - x**Type:****Email:** Joseph.Lopez@ethosenergygroup.com

Contact Type: On-Site Manager**Organization:** Ethos Energy Group**Org. Type:** Corporation**Name:** Joseph Lopez**NJ EIN:** 50130292900**Title:** Facility Manager**Phone:** (973) 491-9559 x0213**Mailing Address:** 414-465 Avenue P
Newark, NJ 07105**Fax:** (973) 491-9650 x**Other:** () - x**Type:****Email:** Joseph.Lopez@ethosenergygroup.com

**New Jersey Department of Environmental Protection
Facility Profile (General)**

Contact Type: Operator**Organization:** Ethos Energy Group**Org. Type:** Corporation**Name:** Joseph Lopez**NJ EIN:** 50130292900**Title:** Facility Manager**Phone:** (973) 491-9559 x0213**Mailing Address:** 414-465 Avenue P
Newark, NJ 07105**Fax:** (973) 491-9650 x**Other:** () - x**Type:****Email:** Joseph.Lopez@ethosenergygroup.com

Contact Type: Owner (Current Primary)**Organization:** Newark Bay Cogeneration Partnership, LP**Org. Type:** Partnership**Name:** Scott M. Blair**NJ EIN:** 51030292900**Title:** Vice President**Phone:** (410) 787-5017 x**Mailing Address:** 1005 Brandon Shores Road
Baltimore, MD 21226**Fax:** () - x**Other:** (410) 917-6068 x**Type:** Mobile**Email:** Scott.Blair@TalenEnergy.com

Contact Type: Responsible Official**Organization:** Newark Bay Cogeneration Partnership, L.P.**Org. Type:** Partnership**Name:** Mark Driscoll**NJ EIN:** 51030292900**Title:** Environmental Director**Phone:** (848) 448-4852 x**Mailing Address:** 414-462 Avenue P
Newark, NJ 07105**Fax:** (973) 491-9560 x**Other:** () - x**Type:****Email:** Mark.Driscoll@TalenEnergy.com

**New Jersey Department of Environmental Protection
Facility Profile (Permitting)**

- | | |
|---|-----|
| 1. Is this facility classified as a small business by the USEPA? | No |
| 2. Is this facility subject to N.J.A.C. 7:27-22? | Yes |
| 3. Are you voluntarily subjecting this facility to the requirements of Subchapter 22? | No |
| 4. Has a copy of this application been sent to the USEPA? | Yes |
| 5. If not, has the EPA waived the requirement? | |
| 6. Are you claiming any portion of this application to be confidential? | No |
| 7. Is the facility an existing major facility? | Yes |
| 8. Have you submitted a netting analysis? | No |
| 9. Are emissions of any pollutant above the SOTA threshold? | No |
| 10. Have you submitted a SOTA analysis? | No |
| 11. If you answered "Yes" to Question 9 and "No" to Question 10, explain why a SOTA analysis was not required | |
| | |
| 12. Have you provided, or are you planning to provide air contaminant modeling? | No |

RADIUS File Submission

Note: Following is a summary of the information contained in your application. If you have completed the submittal, the service will appear in the "My Services - Submitted" section of your My Workspace page. Please check the "Status" column to confirm whether it was successfully transmitted or not. If the status of the service is "Submission Failed - Please Contact NJDEP," please send an e-mail message to njdeponlinesupport@dep.nj.gov for assistance, including the Service ID number of the failed submittal in the message. If you have not yet completed the submittal, the service will appear in the "My Services - In Progress" section of the My Workspace page instead, and the "Status" column will indicate the stage of the submittal.

Selected Facility Name: NEWARK BAY COGENERATION PARTNERSHIP L P

Selected Facility ID: 07617

Submittal Type: Operating Permit Application - Initial - (Modification)

[Click here](#) to access the pdf version of the information submitted in the RADIUS file.

Uploaded Attachments

Attachment Type	Attachment Description	File Name
RADIUS Attachment	Minor Mod Application to remove H2S Monitoring	Newark Bay Minor Mod to Remove H2S Monitoring_07-20-2020.pdf

Certification

Certifier: John Pandolph
Certifier ID: JPANDOLPH
Challenge/Response Question: What is your favorite color?
Challenge/Response Answer: *****
Certification PIN: *****
Date/Time of Certification: 07/20/2020 11:46

For Air Permits:

"I certify under penalty of law that I believe the information provided in this document is true, accurate, and complete. I am aware that there are significant civil and criminal penalties, including the possibility of fine or imprisonment or both, for submitting false, inaccurate or incomplete information."

For Emission Statements:

"I certify under penalty of law that I believe the information provided in this document is true, accurate, and complete. For those portions of the document that are based on estimates, those estimates are the result of good faith application of sound professional judgment, using techniques, factors, or standards approved by the Department or EPA, or generally accepted in the trade. I am aware that there are significant civil and criminal penalties, including fines or imprisonment or both, for submitting false, inaccurate or incomplete information."

John Pandolph
Individual With Direct Knowledge **Date** 07/20/2020

Certifier: Mark Driscoll
Certifier ID: MKDRISCOLL
Challenge/Response Question: What is your favorite pet?
Challenge/Response Answer: *****
Certification PIN: *****
Date/Time of Certification: 07/20/2020 15:52

For Air Permits:

"I certify under penalty of law that I have personally examined and am familiar with the information submitted in this document and all attachments and that, based on my inquiry of those individuals immediately responsible for obtaining the information, I believe that the information is true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment."

For Emission Statements:

"I certify under penalty of law that I have personally examined and am familiar with the information submitted in the attached document and, based on my inquiry of those officials immediately responsible for obtaining the information, I believe that the submitted information is true, accurate and complete. I certify that, based on my inquiry of those officials immediately responsible for obtaining the information, I believe that any estimates are the result of good faith application of sound professional judgment, using techniques, factors, or standards approved by the Department or EPA, or generally accepted in the trade. I am aware that there are significant civil and criminal penalties, including fines or imprisonment or both, for submitting false, inaccurate or incomplete information."

Mark Driscoll
Responsible Official **Date** 07/20/2020

Payment Information

Total Payment Amount: \$0.00

Payment Date:

Payment Method: