

GOVERNMENT OF THE DISTRICT OF COLUMBIA
District Department of the Environment

Air Quality Division



**FACT SHEET AND STATEMENT OF BASIS
FOR PROPOSED PERMITTING ACTION
UNDER 20 DCMR 300 (TITLE V-OPERATING PERMIT PROGRAM)**

This “Fact Sheet and Statement of Basis” has been prepared pursuant to 20 DCMR 303.1(c) and 40 CFR 70.7(a)(5).

PERMIT NO. 037

APPLICANT AND PERMITTEE:

Trigen-Pepco Energy Services
4423 Lehigh Road
College Park, MD 20740-3072

FACILITY LOCATION:

Walter E. Washington Convention Center-Central Plant
801 Mount Vernon Place NW
Washington, DC 20001

FACILITY DESCRIPTION:

Trigen-Pepco Energy Services provides emergency electricity to critical life and safety equipment at the Walter E. Washington Convention Center. It also generates electricity to meet electric demand during other high demand periods when electric costs are high (i.e., for on-site “peak-shaving”). It also provides space heating for the facility.

The Permittee is covered under Standard Industrial Classification (SIC) Code 6512.

This facility includes emission units that are capable of operating twenty-four (24) hours per day, seven (7) days per week, and fifty-two (52) weeks per year. The units consist of two (2) 30.6 million BTU per hour Gorden-Piatt boilers and four (4) 10.14 million BTU per hour of heat input capacity electricity generators. The generators are equipped with emission controls utilizing urea injection and selective catalytic reduction (SCR).

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EMISSIONS SUMMARY:

| Plantwide Emissions Summary (tons per year) | |
|--|----------------------------|
| Pollutant | Potential Emissions |
| Sulfur Dioxide (SO ₂) | 14.66 |
| Oxides of Nitrogen (NO _x) | 47.75 |
| Particulates (TSP) | 3.65 |
| Volatile Organic Compounds (VOCs) | 6.60 |
| Carbon Monoxide (CO) | 23.30 |
| Total Hazardous Air Pollutants (HAPs) | 0.07 |

BASIS OF 20 DCMR CHAPTER 3 (TITLE V) APPLICABILITY:

Trigen-Pepco Energy Services at the Walter E. Washington Convention Center has the potential to emit 47.75 tons per year of oxides of nitrogen (NO_x). This exceeds the major source threshold in the District of 25 tons per year. As such, pursuant to 20 DCMR 300.1(a), the source is subject to Chapter 3 and must obtain an operating permit in accordance with that regulation and Title V of the federal Clean Air Act.

LEGAL AND FACTUAL BASIS FOR DRAFT PERMIT CONDITIONS:

The conditions contained in the Title V operating permit are based on underlying requirements of 20 DCMR as well as various federal regulations promulgated pursuant to the federal Clean Air Act. The regulations that are the basis of each condition are cited in the permit, except that conditions added to make another condition, with a direct underlying regulation, enforceable as a practical matter may, in some cases, not have a specific citation. These latter, un-cited conditions generally consist of monitoring, record keeping, and reporting requirements authorized under 20 DCMR 500.1.

The permit has been developed to incorporate the requirements of all applicable requirements as defined in 20 DCMR 399.1 along with additional conditions necessary to make all such requirements enforceable as a practical matter.

It should be noted that the Permittee calculated its potential to emit based on a maximum usage of #2 fuel oil in each boiler of 720 hours per 12 month rolling period. As such, this has been incorporated in the permit as an enforceable limit contained in Condition III (a)(2)(C) of the permit.

It should also be noted that this permit is being issued pursuant to the District's authority under 20 DCMR Chapter 2 as well as Chapter 3. When the permit is issued for public review, the

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public notice will reflect this fact.

Any condition of the draft Title V Permit that is enforceable by the District but is not federally-enforceable is identified in the Title V permit as such with an asterisk.

REGULATORY REVIEW:

This facility has been found to be subject to the requirements of the following regulations:

Federal and District Enforceable:

- 20 DCMR Chapter 1 - General Rules
- 20 DCMR Chapter 2 - General and Non-Attainment Area Permits
- 20 DCMR Chapter 3 – Operating Permits and Acid Rain Programs
- 20 DCMR 500 - Records and Reports
- 20 DCMR 502 - Sampling, Tests, and Measurements.
- 20 DCMR 600 – Fuel-Burning Particulate Emission.
- 20 DCMR 604 - Open Burning
- 20 DCMR 605 - Control of Fugitive Dust
- 20 DCMR 606 - Visible Emissions
- 20 DCMR 800 - Control of Asbestos.
- 20 DCMR 801 - Sulfur Contents of Fuel Oils
- 20 DCMR 803 – Sulfur Process Emissions
- 20 DCMR 805 – Reasonably Available Control Technology for Major Stationary Sources of the Oxides of Nitrogen
- 40 CFR 82, Subpart G - Protection of Stratospheric Ozone (Federally enforceable only except through Title V) (*Note: AQD did not make a positive determination that this regulation was applicable to the facility, but included it as a standard requirement in the permit.*)
- 40 CFR 82, Subpart H – Halon Emissions Reduction (Federally enforceable only except through Title V) (*Note: AQD did not make a positive determination that this regulation was applicable to the facility, but included it as a standard requirement in the permit.*)
- 40 CFR 60, Subpart Dc – Standards of Performance for Small Industrial-Commercial-Institutional Steam Generating Units
- 40 CFR 63, Subpart JJJJJ - National Emission Standards for Hazardous Air Pollutants for Industrial, Commercial, and Institutional Boilers Area Sources
- 40 CFR 61.12 – Credible Evidence
- 40 CFR 64 – Compliance Assurance Monitoring

District Enforceable Only:

- 20 DCMR 402 – Chemical Accident Prevention (*Note: AQD did not make a positive*

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determination that this regulation was applicable to the facility, but included it as a standard requirement in the permit.)

20 DCMR 900 - Engine idling.

20 DCMR 901 - Vehicular exhaust emissions.

20 DCMR 902 - Lead Content of Gasoline.

20 DCMR 903 - Odorous or other nuisance air pollutants.

40 CFR 63, Subpart JJJJJ - National Emission Standards for Hazardous Air Pollutants for Industrial, Commercial, and Institutional Boilers Area Sources

Because the two large boilers use fuel oil, the requirements of this NESHAP are applicable. Specifically, the facility is required to submit an initial notification of applicability to the EPA, perform biennial boiler tune-ups (the requirement for which was changed to annual tune-ups in the permit due to a similar requirement in 20 DCMR 805, but which requires annual tune-ups), and to have performed a one-time energy assessment. All of these requirements have been included in the permit.

40 CFR 64 - Compliance Assurance Monitoring (CAM)

CAM was determined to be applicable as a result of the following conditions:

- 1) The facility is a major source of oxides of nitrogen.
- 2) The facility is required to obtain a Part 70 permit.
- 3) The units are subject to emission limits [Condition III(b)(1)]
- 4) The units have control devices required to meet these emission limits, specifically selective catalytic reduction systems (SCR).
- 5) Potential pre-control device emissions of NO_x do not exceed major source thresholds for any individual unit, but when the four units are considered as a single system, potential pre-control emissions are 55 tons per year, well in excess of the 25 tons per year major source threshold.

For purposes of CAM applicability, the District determined that the four engines should be considered a single emissions unit as they are to be used as a single system for performing energy generation for peak shaving purposes.

The applicant submitted a CAM plan as required, dated November 20, 2006. A copy of this plan is attached. It was determined to be acceptable. Its monitoring approach was incorporated into the permit as Condition III (c).

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Chapter 2 Permits:

The requirements of the following permit(s) issued under the authority of 20 DCMR Chapter 2 have been incorporated into the Title V permit:

- Permit #5607 – Permit to Operate Two Boilers and Four Internal Combustion Generators at the New Washington Convention Center. This permit was issued March 12, 2004.

COMMENT PERIOD:

Beginning Date:

Ending Date:

All written comments should be addressed to the following individual and office:

Stephen S. Ours, P.E.
Chief, Permitting and Enforcement
District Department of the Environment
Air Quality Division
1200 First Street, NE, 5th Floor
Washington, D.C. 20002

PROCEDURE FOR REQUESTING PUBLIC HEARING:

During public comment period any interested person may submit written comments on the draft permit and may request a public hearing, if no public hearing has already been scheduled. A request for public hearing shall be in writing and shall state the nature of the issues proposed to be raised in the hearing. The District shall grant such a request if it is deemed appropriate. The venue, date, and time for any public hearing shall be announced in the District Register and a daily newspaper.

POINT OF CONTACT FOR INQUIRIES:

Abraham T. Hagos
Environmental Engineer
District Department of the Environment
Air Quality Division
1200 First Street NE, 5th Floor

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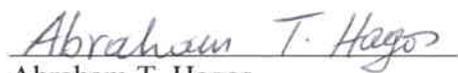
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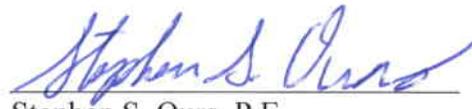
REVIEWS:

Prepared by:



Abraham T. Hagos
Environmental Engineer

Approved by:



Stephen S. Ours, P.E.
Chief, Permitting and Enforcement

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