

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. 012-R2

APPLICANT AND PERMITTEE:

Washington Gas Company
6801 Industrial Road
Springfield, VA 22151

FACILITY LOCATION:

Watergate Central Plant
2500 Virginia Avenue NW
Washington, DC 20037

FACILITY DESCRIPTION:

Washington Gas Company (WGC) operates the Watergate Central Plant (the Watergate plant), located in the subbasement of the east building of the Watergate Complex in Downtown Washington, DC. It should be noted that while WGC owns and operates the equipment described in the permit, they do not own the facility. WGC rents the space from the owner of the complex and runs the plant which provides steam to the entire complex and hotel. The Permittee is covered under Standard Industrial Classification (SIC) Code 4961, heating, hot water and cooling for Watergate building complex.

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 plant consists of three (3) boilers. Boilers No. 1 and No.2, both Wicks (Type A) boilers, were installed in 1964 are rated at 51.75 million BTU per hour (MMBTU/hr). Boiler No. 3, a Cleaver Brooks (Type D) boiler, was installed in 1970 and is rated at 52.82 MMBTU/hr. All three boilers are permitted to fire natural gas and No.2 oil.



Fact Sheet and Statement of Basis

Permit No. 012-R2

Washington Gas Company, Watergate Central Plant

May 7, 2013

Page 2

There are five (5) 10,000 gallon fuel oil tanks located in the basement of the building and three (3) electric chillers using R-134a refrigerant. These will be listed under miscellaneous activities on the permit. Additionally, the facility has one (1) 30-gallon cold solvent cleaner which was installed August 2004 after the first Title V permit. WGC submitted a chapter 2 application for the cold solvent cleaner with the Title V application. The Title V permit will be issued as a merged Chapter 2 and Chapter 3 permit, covering the degreaser with a permit for the first time. The degreaser is subject to the requirements of 20 DCMR 764.

The source requested an application shield and permit shield. As a matter of policy, AQD generally does not issue permit shields, and especially not when the request is submitted without a thorough regulatory review. The application shield request was received as part of the renewal application package which was timely. The application shield is granted, and as a result the source is allowed to continue operation until a final renewed permit is issued.

The source also requested the following changes from the requirements of the previous permit:

- Permittee should not be required to conduct weekly observation when firing natural gas. AQD disagrees. Since the facility still has the potential to emit visible emissions when burning natural gas, a brief weekly visible emissions observation is reasonable. Therefore, the source is still required to do a weekly observation for visible emission while burning natural gas.
- Permittee should be require to do a visible emissions (Method 9) test only once per permit term instead of once per year. This request is not granted because AQD feels that once a year is reasonable.
- If Permittee did not receive any shipment of fuel oil during the reporting period, permittee is not required to re-submit the quality of fuel information, but should state "No fuel oil was received during the reporting period. This is reasonable and is reflected in the standardized requirements contained in Condition I(d)(2)(B)(ii).
- If fuel oil has not been fired in a boiler in the previous twelve (12) months, combustion adjustment need only be performed for firing natural gas in the boiler. AQD disagrees. Permittee is still required to adjust combustion using #2 oil so that boiler is properly tuned up when it begins to fire fuel oil.

Fact Sheet and Statement of Basis

Permit No. 012-R2

Washington Gas Company, Watergate Central Plant

May 7, 2013

Page 3

EMISSIONS SUMMARY:

Plant-wide Emissions Summary (tons per year)	
Pollutant	Potential Emissions
Sulfur Dioxide (SO ₂)	99.64
Oxides of Nitrogen (NO _x)	49.73
Particulate Matter (PM/PM10)	4.47
Volatile Organic Compounds (VOCs)	2.40
Carbon Monoxide (CO)	37.48
Total Hazardous Air Pollutants (HAPs)	0.80

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

This facility has the potential to emit 49.73 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 the 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.

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.

It should also be noted that this permit will be issued to include updated requirements established pursuant to 20 DCMR Chapter 2. As such, it will be issued for public notice as a merged permit under the authority of both Chapters 2 and 3.

Fact Sheet and Statement of Basis

Permit No. 012-R2

Washington Gas Company, Watergate Central Plant

May 7, 2013

Page 4

REGULATORY REVIEW:

This facility has been found to be subject to the requirements of the following regulations, except a specifically noted below:

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 764 – Solvent Cleaning – Cold Cleaning
- 20 DCMR 800 - Control of Asbestos
- 20 DCMR 801 - Sulfur Contents of Fuel Oils
- 20 DCMR 805 – Reasonably Available Control Technology for Major Stationary Sources of the Oxides of Nitrogen
- 40 CFR 63, Subpart JJJJJ - National Emission Standards for Hazardous Air Pollutants for Industrial, Commercial, and Institutional Boilers Area Sources
- 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 61.12 – Credible Evidence

District Enforceable Only:

- 20 DCMR 402 – Chemical Accident Prevention (*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.*)
- 20 DCMR 900 - Engine idling.
- 20 DCMR 901 - Vehicular exhaust emissions.
- 20 DCMR 902 - Lead Content of Gasoline (*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.*)

Fact Sheet and Statement of Basis

Permit No. 012-R2

Washington Gas Company, Watergate Central Plant

May 7, 2013

Page 5

20 DCMR 903 - Odorous or other nuisance air pollutants.

Chapter 2 Permits:

No Chapter 2 permits have been issued to this facility since the last Title V permit was issued. The source submitted a Chapter 2 application for a cold solvent cleaner with this Title V renewal application. The Chapter 2 permit requirements for the solvent cleaner have been incorporated into the Title V permit which is being handled as a merged permit. No separate chapter 2 permit will be issued for the solvent cleaner.

Chapter 2 authority was used to establish a number of limits in the permit based on proper operation of the equipment. NO_x emission limits placed in Condition III(a)(1)(C) are based on manufacturer's specifications cited in the permit for Boilers 1 and 2 and AP-42 factors for Boiler 3. It should be noted that the AP-42 factors are higher than the manufacturer's emission factors for Boilers 1 and 2.

Greenhouse Gas (GHG) Requirements:

Because Chapter 3 (Title V) was triggered by other pollutants, no evaluation was made to determine if the facility would trigger Title V applicability under the GHG Tailoring Rule. No modifications have been made to the source that would trigger PSD applicability under the GHG Tailoring Rule. Other than this requirement, there are no other applicable requirements related to GHGs at this time, therefore none were included in the permit.

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

The three boilers at this facility are existing boilers and are permitted to burn natural gas and No. 2 fuel oil. The permittee did not indicate that fuel oil is used only during gas interruption; therefore the requirements of this NESHAP are applicable. Specifically, the facility is required 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)

Compliance Assurance Monitoring (CAM) regulations apply to pollutant-specific emission units at a major source that have pre-control devices emissions greater than the Title V major source thresholds and use a control device to achieve compliance. Since this facility does not have any emission units with control devices, CAM is not applicable.

Fact Sheet and Statement of Basis

Permit No. 012-R2

Washington Gas Company, Watergate Central Plant

May 7, 2013

Page 6

COMMENT PERIOD:

Beginning Date: May 10, 2013

Ending Date: June 10, 2013

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

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

PROCEDURE FOR REQUESTING PUBLIC HEARING:

During the 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 a 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:

Olivia Achuko
Environmental Engineer
District Department of the Environment
Air Quality Division
1200 First Street NE, 5th Floor
Washington, DC 20002
(202) 535-2997

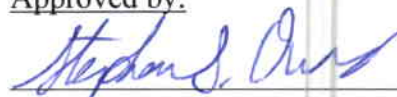
REVIEWS:

Prepared by:



Olivia Achuko
Environmental Engineer
OA

Approved by:



Stephen S. Ours, P.E.
Chief, Permitting Branch