

**WASHINGTON STATE DEPARTMENT OF ECOLOGY  
POST OFFICE BOX 47600  
OLYMPIA, WASHINGTON 98504-7600**

<b>IN THE MATTER OF:</b>	]	
	]	
<b>Northwest Pipeline Corporation</b>	]	<b>NO. PSD-01-09 Amendment 6</b>
<b>Mount Vernon Compressor Station</b>	]	
<b>Williams Gas Pipeline–West</b>	]	<b>FINAL APPROVAL</b>
<b>295 Chipeta Way</b>	]	<b>OF PSD APPLICATION</b>
<b>Salt Lake City, UT 84158-0900</b>	]	

This approval is issued pursuant to the United States Environmental Protection Agency (EPA) regulations for the Prevention of Significant Deterioration (PSD) set forth in Title 40, Code of Federal Regulations, Part 52, and regulations set forth in the Washington Administrative Code (WAC) 173-400-700. The original approval was based upon the complete application submitted by Williams Gas Pipeline–West for the Northwest Pipeline Corporation (NWP) Mount Vernon Compressor Station on December 4, 2001. The first amendment was based on a letter of request dated April 23, 2004. The second and third amendments were based on letters of request dated April 23 and July 21, 2004, respectively. The fourth, fifth, and sixth amendments were based on letters of request dated September 20, 2004; February 8, 2006; and October 18, 2011, respectively. The technical analysis performed by the Washington State Department of Ecology (Ecology) finds the following:

**FINDINGS**

1. The reason for the sixth administrative amendment is to clarify and simplify NO<sub>x</sub> monitoring and reporting procedures used by portable NO<sub>x</sub> monitors in preparation for renewal of the facility's Title V permit. Testing using a portable analyzer to monitor the volume percent of NO<sub>x</sub> every 336 hours has proven adequate to indicate compliance, so the additional calculation of NO<sub>x</sub> mass flow during these periodic tests is no longer required (Approval Condition 5.1.6.1). If noncompliance is indicated by a portable monitor test, the turbine will now be shut down as soon as reasonably possible and repaired rather than have further emissions testing (Approval Condition 5.1.6.1.3). No compliance testing conditions for NO<sub>x</sub> (reference Method 20) are affected by these changes, but the NO<sub>x</sub> limit's averaging time is reduced from a three- to one-hour time period, which is more stringent. No physical changes are requested.
2. The reason for the fifth administrative amendment was to allow a reduction in the required frequency of nitrogen oxides (NO<sub>x</sub>) routine monitoring testing. A portable emissions analyzer is used for these routine monitoring tests. More than three years of testing every 14 days had shown that testing every 28 days was sufficient to monitor compliance. There were no changes to emission limits in Amendment 5.
3. The reason for the fourth administrative amendment was to address NWP's request for less frequent emissions testing for the boiler (Seller C-80-w with heat input of 3.348 MMBtu/hr)

and standby generator. NWP requested that Ecology change the permitted frequency of NO<sub>x</sub> performance tests from an annual basis to every five years starting from the date of the most recent compliance test.

At their fully allowed operating time, NO<sub>x</sub> emissions from the standby generator and the boiler together are less than three-quarters of a ton per year. Ecology agreed that a once every five years emissions test for these small emission units was satisfactory to assure air quality protection.

4. The reason for the third administrative amendment was to implement changes requested by NWP that clarified and streamlined the permit. There were no changes to the emission limits in this amendment. Therefore, public notice was not required.
5. The reason for the second amendment was that NWP and Ecology discovered the inability of the Predictive Emissions Monitoring System (PEMS) to accurately predict real-time emissions. This finding was based upon completion of one year of PEMS data gathering and analysis, and Ecology agreed with NWP. There was no change to emission limits in the second amendment as well. Therefore, public notice was not required.
6. NWP owns and operates the existing Mount Vernon Compressor Station (MVCS) located about nine miles east of Mt. Vernon, Washington (48°N 25' 19" latitude, 122°W 12' 58" longitude).
7. MVCS is located within a Class II area that is currently designated in attainment for all national and state air quality standards. PSD permit 01-09 allowed an expansion to this facility described in Findings 10 through 23 below.
8. The site is 57 kilometers (km) from the nearest Class I area, North Cascades National Park, and within 100 km of four other Class I areas (Alpine Lakes Wilderness, Glacier Peak Wilderness, Olympic National Park, and Pasayten Wilderness).
9. The site is about 45 kilometers from the U.S.–Canadian border.
10. This project consists of:
  - 10.1. Adding one Mars 90-TI3002S (Mars 90S) gas turbine site-rated at 12,787 horsepower (59°F).
  - 10.2. Substituting an existing Centaur 40-T4500 upgraded to a Centaur 50-T6100S (Centaur 50S) at 5,950 hp (59°F.) for the originally permitted Centaur 40-T4700S (Centaur 40S) gas turbine site-rated at 4,554 horsepower.
  - 10.3. Replacing an existing standby generator with one of larger capacity (450 kW) as originally permitted.
  - 10.4. Replacing an existing 2.5 million British thermal units per hour (MMBtu/hr) heater/boiler with one of larger capacity (3.348 MMBtu/hr Sellers C-80-w) as originally permitted.
11. This project is subject to New Source Performance Standards (NSPS): 40 CFR Subpart GG (Standards of Performance for Stationary Gas Turbines).

12. The emissions of all air pollutants from the proposed modification are subject to review under Chapter 173-400 WAC, Chapter 173-460 WAC, and the regulations of the Northwest Clean Air Agency (NWCAA). Chapter 173-400 WAC includes provision for PSD review (WAC 173-400-700). This permit considers only PSD-applicable issues. All other air quality related notice of construction approval issues are subject to the NWCAA.
13. MVCS currently has the potential to emit more than 250 tons per year (TPY) of any one pollutant that is subject to the federal Clean Air Act. This qualifies MVCS as an existing major stationary source. Any net increases in potential emissions from the site that are considered significant will be subject to PSD review under WAC 173-400-700.
14. Because of this project, the net increase in MVCS's potential to emit nitrogen oxides (NO<sub>x</sub>) is 62.8 TPY.
15. Because MVCS is an existing major stationary source, and the net emissions increase for NO<sub>x</sub> is more than 40 TPY, the project qualifies as a major modification. As a result, the project is subject to PSD review under WAC 173-400-700. Additionally, the project is subject to federal PSD review because it qualifies as a major modification under federal rules [40 CFR 52.21(b)(2)(i), 40 CFR 52.21(b)(3)(i), and 40 CFR 52.21(b)(23)(i)].
16. Other than NO<sub>x</sub>, the net emissions increases of all pollutants subject to regulation under the federal Clean Air Act are below the significance levels specified in 40 CFR 52.21(b)(23)(i). As a result, they are not subject to inclusion in this PSD permit.
17. The PSD permit application was submitted December 4, 2001, and determined to be complete on January 3, 2002.
18. MVCS will operate the standby generator fewer than 500 hours in any calendar year. The limit will be federally enforceable under the conditions of this PSD permit.
19. The Mars 90S turbine, the Centaur 50S turbine, the standby generator, and the heater/boiler being installed for this project will burn only natural gas from the pipeline.
20. Best Available Control Technology (BACT) determinations for NO<sub>x</sub> emissions:
  - 20.1. Dry low-NO<sub>x</sub> control (SoLoNO<sub>x</sub>) for the Mars 90S and Centaur 50S turbines.
  - 20.2. Nonselective catalytic reduction for the standby generator.
  - 20.3. Good combustion practice for the Sellers C-80-w heater/boiler.
21. Allowable emissions from the new emissions units will not cause or contribute to air pollution in violation of:
  - 21.1. Any ambient air quality standard.
  - 21.2. Any applicable maximum allowable increase over the baseline ambient concentration.
  - 21.3. National Ambient Air Quality Standards (NAAQS) and PSD increment consumption: Modeling to determine impacts was not required because the applicant demonstrated the impacts to be below modeling significance thresholds.

- 21.4. Visibility impact in the surrounding Class I areas: The highest modeled impact was a 4.8 percent degradation, which occurred in North Cascades National Park in mid-winter. Federal land manager guidance considers this to be below the "concern" threshold.
- 21.5. Visibility impact in nearby Class II parks and recreational areas: The highest modeled impact in Mt. Baker Wilderness was 6.2 percent degradation in mid-winter, and less than four percent the rest of the year. Federal land manager guidance considers this acceptable under PSD procedures and BACT requirements.
22. Ambient impact analysis indicates that there will be no significant pollutant deposition on soils and vegetation in the Class I or Class II areas.
  - 22.1. Modeled emissions ambient impact levels are substantially below all secondary NAAQS. This indicates a low likelihood of negative impact on Class II area flora and fauna. No sensitive species have been identified.
  - 22.2. NWP has agreed with the Washington Department of Fish and Wildlife to conduct a nesting survey for bald eagles expected to be near the facility.
  - 22.3. The highest modeled nitrogen deposition in the surrounding Class I areas is less than 50 percent of the "concern" threshold in federal land manager guidance.
23. No significant effect on industrial, commercial, or residential growth in the Mt. Vernon, Washington, area is anticipated because of this project.

Ecology finds that all requirements for PSD have been satisfied. Approval of the PSD application is granted subject to the following conditions.

### **APPROVAL CONDITIONS**

1. The Mars 90S turbine, the Centaur 50S turbine, the standby generator, and the heater/boiler being installed for this project:
  - 1.1. Are only allowed to burn natural gas from the pipeline.
  - 1.2. NWP shall monitor and report (see Condition 8) the analytical data from the Sumas monitor location regarding the chemical composition of the fuel used to comply with Condition 1.1.
2. The standby generator:
  - 2.1. NWP shall operate the standby generator no more than 500 hours in any consecutive 12-month period.
  - 2.2. NWP shall monitor compliance with Condition 2.1 with:
    - 2.2.1. An hour meter for generator operation.
    - 2.2.2. NWP shall not reset the hour meter without written authorization of Ecology or NWCAA.

- 2.3. NO<sub>x</sub> emissions from the standby generator are limited to not greater than 82 grams per hour.
- 2.4. NWP shall demonstrate initial compliance with Condition 2.3:
  - 2.4.1. Within 180 days after initial start-up, NWP will have a source test performed by an independent testing firm.
  - 2.4.2. The run-time on the standby generator for the initial compliance demonstration test shall not count toward the operating time limit in Condition 2.1.
  - 2.4.3. The source test shall be in accordance with 40 CFR 60 Appendix A, Methods 2, 2A, 2C, or 2D, and Method 7E.
  - 2.4.4. For the source test, NWP shall run the generator at maximum achievable load.
  - 2.4.5. NWP shall determine the emissions rate in units of grams per hour by using the source test results in applicable engineering calculations.
  - 2.4.6. NWP shall submit a test plan to Ecology and NWCAA for approval at least 30 days prior to testing.
  - 2.4.7. Within 90 days of initial start-up, NWP will confirm to Ecology in writing that the existing standby generator has been taken out of service.
- 2.5. NWP shall monitor compliance with Condition 2.3 by periodic NO<sub>x</sub> emission performance tests:
  - 2.5.1. NWP shall conduct NO<sub>x</sub> emission performance tests not less frequently than once every 500 hours of operation.
  - 2.5.2. NWP may conduct the periodic performance tests by use of a portable emission analyzer verified as accurate in accordance with the process outlined in Condition 6.
    - 2.5.2.1. Testing shall be in accordance with USEPA Designated Conditional Test Method 34. An alternate test method may be used if approved in writing by Ecology or NWCAA at least 30 days prior to its first application.
    - 2.5.2.2. NWP shall follow the currently approved performance test procedure until acquiring approval from Ecology or NWCAA for a revised procedure.
    - 2.5.2.3. For the source test, NWP shall run the generator at maximum achievable load.
  - 2.5.3. NWP shall determine the emissions rate in units of grams per hour by using the source test results in applicable engineering calculations.
3. The 3.348 MMBtu/hr Sellers C-80-w boiler:
  - 3.1. The NO<sub>x</sub> emissions concentration from the boiler stack is limited to not greater than 34 parts per million on a dry volumetric basis (ppmdv) over a 24-hour average when corrected to three percent oxygen.

- 3.2. NWP shall demonstrate initial compliance with Condition 3.1:
  - 3.2.1. Within 180 days after initial start-up, performed by an independent testing firm.
  - 3.2.2. By source test in accordance with 40 CFR 60 Appendix A, Methods 7E and 19.
  - 3.2.3. NWP shall submit a test plan to Ecology and NWCAA for approval at least 30 days prior to testing.
  - 3.2.4. Within 90 days of initial start-up, NWP will confirm to Ecology in writing that the existing 2.5 MMBtu/hr heater/boiler has been taken out of service.
- 3.3. NWP shall monitor compliance with Condition 3.1 by periodic NO<sub>x</sub> emission performance tests:
  - 3.3.1. NWP shall conduct NO<sub>x</sub> emission performance tests not less frequently than once every five years of operation.
  - 3.3.2. NWP may conduct the periodic performance tests by use of a portable emissions analyzer capable of adjustment to the three percent oxygen concentration basis, and verified as accurate in accordance with the process outlined in Condition 6.
    - 3.3.2.1. Testing shall be in accordance with USEPA Designated Conditional Test Method 34. An alternate test method may be used if approved in writing by Ecology or NWCAA at least 30 days prior to its first application.
    - 3.3.2.2. NWP shall follow the currently approved performance test procedure until acquiring approval from Ecology or NWCAA for a revised procedure.
- 3.4. NO<sub>x</sub> emissions from the boiler are limited to not greater than:
  - 3.4.1. Four lb/calendar day.
  - 3.4.2. 0.66 tons in any 12 consecutive months.
- 3.5. NWP shall monitor compliance with Condition 3.4 by:
  - 3.5.1. Keeping a log of the operating hours for the boiler, and
  - 3.5.2. Using the following to determine the mass NO<sub>x</sub> emissions:
    - 3.5.2.1. The most recent performance test results intended to satisfy Condition 3.3.1.
    - 3.5.2.2. Assume maximum achievable fuel consumption for all boiler operating hours.
    - 3.5.2.3. Use the appropriate F-factor from 40 CFR Part 60, Appendix A Method 19 to estimate exhaust gas volumetric flowrate.
4. For the Mars 90S and Centaur 50S combustion turbines:
  - 4.1. Start-up is defined as any operating period that is ramping up from less than 90 percent of full load, and less than 15 minutes has elapsed since fuel was introduced to the turbine after the immediately preceding shutdown.

- 4.2. Shutdown is defined as any operating period below 90 percent of full load, and fuel feed has continued for not more than 15 minutes after going below 90 percent of full load operation.
- 4.3. NWP shall keep a record of each start-up and shutdown event.
5. Emissions of nitrogen oxides (NO<sub>x</sub>) for the combustion turbines are limited as follows:
  - 5.1. For the Mars 90 combustion turbine:
    - 5.1.1. Not greater than 25 parts per million NO<sub>x</sub> emission concentration on a dry volumetric basis (ppmdv) over a 1-hour average when corrected to 15.0 percent oxygen, ISO.
    - 5.1.2. Condition 5.1.1 is relieved during start-up and shutdown.
    - 5.1.3. Mass emissions of NO<sub>x</sub> shall not exceed:
      - 5.1.3.1. 258 lb NO<sub>x</sub>/calendar day.
      - 5.1.3.2. 43.6 tons of NO<sub>x</sub> for any consecutive 12-month period.
    - 5.1.4. NWP shall count NO<sub>x</sub> emissions during start-up and shutdown toward monitoring compliance with the 12-month mass emission limit in Condition 5.1.3.2 at a rate of 4 lb NO<sub>x</sub> per start-up or shutdown.
    - 5.1.5. NWP shall demonstrate compliance with Conditions 5.1.1 and 5.1.3.1 initially and annually thereafter:
      - 5.1.5.1. Initial compliance shall be demonstrated within 180 days after initial start-up, performed by an independent testing firm. Annual compliance shall be demonstrated no later than 13 months after the previous test.
      - 5.1.5.2. Compliance shall be demonstrated in accordance with 40 CFR 60 Subpart GG and 40 CFR 60 Appendix A, Method 20 except that the instrument span shall be reduced as appropriate.
      - 5.1.5.3. NWP shall submit a test plan to NWCAA for approval at least 30 days prior to testing. NWP shall submit a complete test report to the NWCAA no later than 60 days after completion of the tests.
    - 5.1.6. Compliance monitoring:
      - 5.1.6.1. NWP shall monitor compliance with Condition 5.1.1 by measuring NO<sub>x</sub> concentration from each turbine exhaust stack no less frequently than every 336 hours of turbine operation.
        - 5.1.6.1.1. NWP may conduct these measurements by use of a portable emissions analyzer capable of adjustment to the 15 percent oxygen concentration basis, and verify as accurate in accordance with the process outlined in Condition 6.
        - 5.1.6.1.2. Portable emissions analyzer testing shall be in accordance with USEPA Designated Conditional Test Method 34. An alternate test

method may be used if approved in writing by Ecology prior to the test.

5.1.6.1.3. NWP shall perform three consecutive tests using the portable analyzer. Should the average of the three test results indicate potential noncompliance with Condition 5.1.1, NWP shall shut down the unit as soon as is practical and contact the NWCAA as promptly as possible and in no event more than 12 hours later. Exceedance of the limit imposed by Condition 5.1.1 as indicated by the average of the three consecutive tests shall be prima facie evidence of a violation of Condition 5.1.1.

5.1.6.1.4. Upon submission of six consecutive months monitoring results during which every test using the portable emissions analyzer indicates compliance with Condition 5.1.1 for a given turbine, NWP may submit a request that the testing frequency for that turbine be reduced to not less frequently than every 672 hours of operation.

The request must include an analysis of the accuracy of the portable emissions analyzer using recent accuracy verification data and an analysis of the portable emissions data collected during the monitoring period and an explanation as to why these data support the request. Upon Ecology's approval of the request, NWP may test at the reduced frequency until such time as the results indicate potential noncompliance with Condition 5.1.1. If this occurs, NWP must revert to the 336 hour testing frequency for the turbine in potential noncompliance with Conditions 5.1.1 for at least six consecutive months at which time NWP may again request the reduced testing frequency using the same process as above.

5.1.6.2. Within 20 days of the end of each month, pursuant to Condition 5.1.3.2, NWP shall determine the tons of NO<sub>x</sub> emissions from each of the turbines for the most recent consecutive 12 months. For this calculation, NWP shall utilize a time-weighted average of the relevant reference method stack test results wherein the results of each source test shall be the presumed emission rate until the next source test.

5.2. For the Centaur 50S combustion turbine:

5.2.1. Not greater than 25 parts per million NO<sub>x</sub> emissions concentration on a dry volumetric basis (ppmdv) over a 1-hour average when corrected to 15.0 percent oxygen, ISO.

5.2.2. Condition 5.2.1 is relieved during start-up and shutdown.

5.2.3. Mass emissions of NO<sub>x</sub> shall not exceed

5.2.3.1. 106 lb NO<sub>x</sub>/calendar day.

5.2.3.2. 18.5 tons of NO<sub>x</sub> for any consecutive 12-month period.

- 5.2.4. NWP shall count emissions during start-up and shutdown towards monitoring compliance with the 12-month mass emission limit in Condition 5.2.3.2 at a rate of 2 lb NO<sub>x</sub> per start-up or shutdown.
- 5.2.5. NWP shall demonstrate compliance with Conditions 5.2.1 and 5.2.3.1 initially and annually thereafter:
  - 5.2.5.1. Initial compliance shall be demonstrated within 180 days after initial start-up, performed by an independent testing firm. Annual compliance shall be demonstrated no later than 13 months after the previous test.
  - 5.2.5.2. Compliance shall be demonstrated in accordance with 40 CFR 60 Subpart GG and 40 CFR 60 Appendix A, Method 20, except that the instrument span shall be reduced as appropriate.
  - 5.2.5.3. NWP shall submit a test plan to NWCAA for approval at least 30 days prior to testing. NWP shall submit a complete test report to the NWCAA no later than 60 days after completion of the tests.
- 5.2.6. Compliance monitoring:
  - 5.2.6.1. NWP shall monitor compliance with Condition 5.2.1 by measuring the NO<sub>x</sub> concentration from each turbine exhaust stack no less frequently than once every 336 hours of turbine operation.
    - 5.2.6.1.1. NWP may conduct these measurements by use of a portable emissions analyzer capable of adjustment to the 15 percent oxygen concentration basis, and verify as accurate in accordance with the process outlined in Condition 6.
    - 5.2.6.1.2. Portable emissions analyzer testing shall be in accordance with USEPA Designated Conditional Test Method 34. An alternate test method may be used if approved in writing by Ecology prior to the test.
    - 5.2.6.1.3. NWP shall perform three consecutive tests using the portable analyzer. Should the average of the three test results indicate potential noncompliance with Condition 5.2.1, NWP shall shut down the unit as soon as is practical and contact the NWCAA as promptly as possible and in no event more than 12 hours later. Exceedance of the limit imposed by Condition 5.2.1 as indicated by the average of the three consecutive tests shall be prima facie evidence of a violation of Condition 5.2.1.
    - 5.2.6.1.4. Upon submission of six consecutive months' monitoring results during which every test using the portable emissions analyzer indicates compliance with Condition 5.2.1 for a given turbine, NWP may submit a request that the testing frequency for that turbine be reduced to not less frequently than every 672 hours of operation.

The request must include an analysis of the accuracy of the portable emissions analyzer using recent accuracy verification data and an analysis of the portable emissions data collected during the monitoring period and an explanation as to why these data support the request. Upon Ecology's approval of the request, NWP may test at the reduced frequency until such time as the results indicate potential noncompliance with Condition 5.2.1. If this occurs, NWP must revert to the 336 hour testing frequency for the turbine in potential noncompliance with Condition 5.2.1 for at least six consecutive months at which time NWP may again request the reduced testing frequency using the same process as above.

- 5.2.6.2. Within 20 days of the end of each month, pursuant to Condition 5.2.3.2, NWP shall determine the tons of NO<sub>x</sub> emissions from the turbine for the most recent consecutive 12 months. For this calculation, NWP shall utilize a time-weighted average of the relevant stack test results wherein the results of each source test shall be the presumed emission rate until the next source test.
6. NWP shall verify the accuracy of any portable emissions analyzers used to satisfy the monitoring requirements of this permit.
  - 6.1. NWP shall submit a protocol to Ecology and NWCAA for written approval by Ecology for verifying the accuracy of any portable emissions analyzer.
  - 6.2. NWP shall use the procedure specified in the protocol required by Condition 6.1 to verify the accuracy of any portable emissions analyzer prior to its use in satisfaction of the monitoring requirements of this permit.
  - 6.3. Not less than once every calendar year, NWP shall use the procedure specified in the protocol required by Condition 6.1 to verify the accuracy of any portable emissions analyzer intended to be used in satisfaction of the monitoring requirements of this permit.
  - 6.4. NWP shall keep records of the emissions analyzer accuracy verifications for not less than five years for Ecology and NWCAA review.
7. NWP shall provide safe access and sampling ports for source testing of the standby generator, the heater/boiler, the Mars 90S turbine, and the Centaur 50S turbine being installed for this project, after each final pollution control device:
  - 7.1. Safe access for the standby generator and the heater/boiler shall consist of not less than a man-lift or situation-specific scaffolding.
  - 7.2. Safe access for the Mars 90S turbine, the Centaur 50S turbine shall consist of permanently constructed platforms on the respective stacks.
  - 7.3. The sampling ports shall meet the requirements of 40 CFR, Part 60, Appendix A, Method 20.

- 7.4. Other arrangements may be acceptable if approved by Ecology prior to installation.
8. NWP shall report the monitoring and process data from MVCS to Ecology and NWCAA as follows:
  - 8.1. Notifications:
    - 8.1.1. Commencement of construction of the project described in Finding 10 of this permit: In accordance with 40 CFR 60.7(1), no later than 30 calendar days after such date.
    - 8.1.2. Initial start-up of the project described in Finding 10 of this permit: In accordance with 40 CFR 60.7(3), no later than 15 calendar days after such date.
    - 8.1.3. Completion of the entry into the operation and maintenance manual of the items specified in Condition 9.
    - 8.1.4. In the first quarterly report required under Condition 8.2, certification by the responsible party for the facility that the relevant equipment was installed consistent with the parameters developed pursuant to Condition 9.
  - 8.2. Submit reports not less than once each calendar quarter or on another reporting schedule approved by Ecology, and in the format approved by Ecology.
  - 8.3. The reports shall include, but not necessarily be limited to, the following:
    - 8.3.1. Certification by the responsible party for the facility that only natural gas from the pipeline has been used as fuel.
    - 8.3.2. Analytical data on the fuel composition per Condition 1.2.
    - 8.3.3. Certification by the responsible party for the facility that the relevant equipment was operated and maintained in accordance with the operational parameters and practices developed pursuant to Condition 9.2.
    - 8.3.4. For the standby generator:
      - 8.3.4.1. Total hours of operation for the 12 immediately preceding months.
      - 8.3.4.2. The total NO<sub>x</sub> mass emissions for the 12 immediately preceding months.
      - 8.3.4.3. Results of any compliance monitoring source tests performed since the last report.
    - 8.3.5. For the 3.348 MMBtu/hr Sellers C-80-w boiler:
      - 8.3.5.1. The total NO<sub>x</sub> mass emissions for the 12 immediately preceding months.
      - 8.3.5.2. Results of any compliance monitoring source tests performed since the last report.
    - 8.3.6. For each combustion turbine stack:
      - 8.3.6.1. All exhaust stack NO<sub>x</sub> concentrations since the last report pursuant to measurement under Conditions 5.1.6.1 and 5.2.6.1.

- 8.3.6.2. The total NO<sub>x</sub> mass emissions for the 12 immediately preceding months ending with each month included in the report.
- 8.3.6.3. Results of any compliance monitoring source tests received since the last quarterly report including verification of the accuracy of NO<sub>x</sub> concentration portable analyzers emissions allowed in Conditions 2.5.2, 3.3.2, 5.1.6.1.1, and 5.2.6.1.1. If reported separately, these results need not be duplicated in the quarterly reporting.
- 8.3.6.4. For each occurrence of NO<sub>x</sub> monitored emissions pursuant to measurement under Conditions 5.1.6.1 and 5.2.6.1 in excess of the limits in Conditions 5.1.1 or 5.2.1:
  - 8.3.6.4.1. The time of the occurrence.
  - 8.3.6.4.2. Magnitude of the emission or process parameters excess.
  - 8.3.6.4.3. The duration of the excess.
  - 8.3.6.4.4. The probable cause.
  - 8.3.6.4.5. Corrective actions taken or planned.
  - 8.3.6.4.6. Any other agency contacted.
- 8.4. NWP shall maintain MVCS monitoring and process records for at least five years.
  - 8.4.1. NWP shall inform Ecology and NWCAA on the location of the monitoring and process records.
  - 8.4.2. NWP shall provide Ecology and NWCAA with the monitoring and process records for any period within the 5-year archive within 10 working days of request.
  - 8.4.3. The monitoring and process records maintained in the 5-year archive shall include, but not necessarily be limited to, the following:
    - 8.4.3.1. Fuel monitoring records pursuant to Condition 1.2.
    - 8.4.3.2. Operating time records pursuant to Condition 2.2.
    - 8.4.3.3. Operating hours records pursuant to Condition 3.5.1.
    - 8.4.3.4. Record of start-ups and shutdowns for the Mars 90S and Centaur 50S turbines pursuant to Condition 4.3.
- 9. An Operation and Maintenance (O&M) manual for the facility:
  - 9.1. Within 90 days of start-up, NWP shall identify operational parameters and practices for MVCS.
    - 9.1.1. The operational parameters and practices will constitute proper operation relative to compliance with the emission limitation conditions of this permit.

- 9.1.2. The operational parameters and practices will be for the standby generator, the 3.348 MMBtu/hr Sellers C-80-w boiler, and the combustion turbines.
- 9.2. NWP shall include these operational parameters and practices in the MVCS O&M manual. As a minimum, these shall include:
  - 9.2.1. Manufacturers' operating instructions and design specifications.
  - 9.2.2. Normal operating parameters and design specifications.
  - 9.2.3. Updates to reflect any modifications of the equipment or its operating procedures.
- 9.3. NWP shall keep the MVCS O&M manual up to date.
- 9.4. NWP shall assure that the MVCS O&M manual is readily available at the facility for review by state, federal, and local agencies.
10. Nothing in this determination shall be construed to relieve NWP of its obligations under any state, local, or federal laws or regulations.
11. NWP shall permit the Environmental Protection Agency, state and local regulatory personnel access to the source upon request for the purposes of compliance assurance inspections. Failure to allow such access is grounds for an enforcement action.
12. This approval shall become invalid if construction of the project is not commenced within eighteen (18) months after receipt of the final approval, or if construction of the facility is discontinued for a period of eighteen (18) months, NWP extends the 18-month period upon satisfactorily showing that an extension is justified, pursuant to 40 C.F.R. 52.21(r)(2) and applicable EPA guidance.

Reviewed by:

Robert C. Burmark

Robert C. Burmark, P. E.  
Science and Engineering Section  
Air Quality Program  
Washington State Department of Ecology

2/22/2012

Date



Approved by:

Stuart A. Clark

Stuart A. Clark  
Air Quality Program Manager  
Washington State Department of Ecology

2/22/12

Date