

**Air Pollution Control  
Title V Permit to Operate  
Statement of Basis for Permit No. V-UO-0009-05.00  
November 2010**

**Wind River Resources Corporation  
North Hill Creek Compressor Station  
Uintah & Ouray Indian Reservation  
Uintah County, Utah**

**1. Facility Information**

a. Location

The North Hill Creek Compressor Station (NHC), owned and operated by Wind River Resources Corporation (Wind River) is located within the exterior boundaries of the Uintah and Ouray Indian Reservation, in the northeastern part of the State of Utah. The exact location is Section SW ¼ SE ¼ Section 3, T15S, R20E, Uintah County, Utah. The mailing address is:

Wind River Resources Corporation  
North Hill Creek Compressor Station  
1245 E. Brickyard Road, Suite 110  
Salt Lake City, UT 84106

b. Contacts

**Responsible Official:**

Marc T. Eckels, Chief Operating Officer – Vice President  
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**Tribal Contact:**

Manuel Myore, Energy, Minerals, & Air Director  
Ute Indian Tribe  
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**c. Description of operations**

The North Hill Creek facility is a natural gas compressor station. Natural gas from area wells is sent to the compressor station through gathering flow lines. The gas enters the station at 75 psig, and then flows through a three-phase separator in order to remove the free water and condensate in the natural gas stream prior to entry into two compressors.

The condensate exits the separator at 56 psig and is routed to a 400 bbl condensate tank (T-1) operating at ambient pressure. The produced water is routed from the separator to a 400 bbl water tank (T-2) operating at ambient pressure. A 400 bbl tank (T-3) is a slop tank that is used for compressor dumps, coalescing filter dumps, dehydrator dumps, slug catcher dumps, and flash separator dumps. Both the produced water and the condensate are removed from the site via tanker truck.

The natural gas exits the top of the separator at 56 psig and is then compressed using two natural gas fired 1,680 hp 4-stroke rich burn engine driven compressors (C-1 and C-2), increasing the gas pressure to 868 psig. Both engines are equipped with non-selective catalytic reduction (NSCR) systems.

After compression, the natural gas enters two tri-ethylene glycol dehydrators (D-1 and D-2) where the remaining water is removed. D-1 has a design throughput of 27 MMscfd of natural gas, and has a 0.55 MMBtu/hr natural gas fired reboiler. D-2 has a design throughput of 10 MMscfd of natural gas, and has a 0.75 MMBtu/hr natural gas fired reboiler. Both dehydrators are operated with a NATCO BTEX Buster Condenser to capture emissions from each dehydrator's flash tank separators, as product. A closed vent system is used to convey vapors from the two dehydration units, their associated condenser, and the three atmospheric storage tanks to a flare for control of emissions.

Electricity is not supplied to North Hill Creek due to the remote location. Solar is the primary source of generating power, followed by a 98 hp diesel generator (G-1) as an emergency back-up.

Once the natural gas is dried, it is metered and delivered to a sales pipeline. Both the produced water and the condensate are removed from the site via tanker truck.

d. List of all units and emission-generating activities

In the initial part 71 operating permit application for NHC, Wind River provided the information shown in Tables 1 and 2 below. Table 1 lists emission units and emission generating activities, including any air pollution control devices. Emission units identified as “insignificant” emission units (IEUs) are listed separately in Table 2.

**Table 1 - Emission Units  
Wind River Resources Corporation  
North Hill Creek Compressor Station**

<b>Emission Unit ID</b>	<b>Description</b>	<b>Control Equipment</b>
C-1 C-2	Waukesha L 7044 GSI, 4-Stroke Rich Burn Compressor Engines, 1,680 site-rated bhp, natural gas fired:  Serial no: C-14843/1                      Installed: 12/2003 Serial no: C-14844/1                      Installed: 12/2003	Non-Selective Catalytic Reduction (NSCR) Miratech Model No. MCS-36Y3621-14-C1
D-1	Dehydrator Still Vent, 27 MMscf/day maximum natural gas throughput:  Serial no: NT9F28302-01                      Installed: 12/2003	Condenser/Combustor NATCO Group BTEX Buster Unit & Flare
D-2	Dehydrator Still Vent, 10 MMscf/day maximum natural gas throughput:  Serial no: EL9E91102-03                      Installed: 5/2004	Condenser/Combustor NATCO Group BTEX Buster Unit & Flare
T-1	400 bbl Condensate Storage Tank, 0.6 bbls/day condensate throughput:  Installed: 12/2003	Flare

Part 71 allows sources to separately list in the permit application units or activities that qualify as “insignificant” based on potential emissions below 2 tons per year (tpy) for all regulated pollutants that are not listed as hazardous air pollutants (HAPs) under section 112(b) and below 1,000 lbs/year or the de minimis level established under section 112(g), whichever is lower, for HAPs. However, the application may not omit information needed to determine the applicability of, or to impose, any applicable requirement. Units that qualify as “insignificant” for the purposes of the part 71 application are in no way exempt from applicable requirements or any requirements of the part 71 permit.

The emissions calculations provided by Wind River in its part 71 permit application indicate that the emission units in Table 2, below, are IEUs. Wind River calculated the emissions for the condensate truck loading and the heaters using AP-42 emission factors, and the dehydrator reboilers using GRI-GLY-Calc V4.0. The supporting data provided in the application justifies the source’s claim that these units qualify as IEUs.

**Table 2 -- Insignificant Emission Units  
Wind River Resources Corporation  
North Hill Creek Compressor Station**

<b>Emission Unit Description</b>
1 – 60 kW Genset by Ford WGS-1086, 98 hp natural gas fired engine (G-1)
1 – 750 MBtu/hr Glycol Dehydrator Reboiler; natural gas fired
1 – 550 MBtu/hr Glycol Dehydrator Reboiler; natural gas fired
3 – 550 MBtu/hr Storage Tank Heaters, natural gas fired
1 – 400 bbl Water Storage Tank (T-2)
1 400 bbl Slop tank used for storage of excess compressor liquids and used oil (T-3)
4 – Pneumatic Pumps
FUG – Facility Equipment Leaks
LOAD – Tank Truck Loading Losses

e. Construction, permitting, and compliance history

NHC was constructed by Wind River in partnership with the Bill Barrett Corporation. Wind River operates the station. Construction at the facility began in December of 2003 with the installation of the two Waukesha 4-stroke rich burn engines, a diesel fired generator, a 400 bbl condensate tank and a single glycol dehydrator. A second dehydrator was installed in May of 2004. NHC commenced operations in February of 2004.

The Environmental Protection Agency (EPA) received an initial part 71 operating permit application for NHC on February 14, 2005. In the initial application, Wind River stated that the facility was major for criteria and HAP pollutants, and the engines and dehydrators were subject to 40 CFR 63, subpart ZZZZ and 40 CFR 63, subpart, HH, respectively. The application was determined to be complete on March 10, 2005. Additional information was provided by Wind River on August 17, 2005.

On May 11, 2006, EPA inspected the facility. During the inspection it was discovered that emission control requirements for the engines under 40 CFR 63, subpart ZZZZ, and for the dehydrators under 40 CFR 63, subpart HH were not being met. In addition, it was determined that the construction of the facility should have gone through a Prevention of Significant Deterioration (PSD) review prior to construction.

EPA, Wind River, and the Bill Barrett Corporation entered into agreement on addressing the proposed violations and a Consent Decree (Civil Action No. 2:09-cv-330-T5) was lodged on April 17, 2009, and entered on November 13, 2009.

EPA has no record of any other federal permitting activity, such as PSD or minor New Source Review (NSR), at this facility.

Table 3 below shows the construction and permitting history of NHC. The history includes information from the 2006 initial permit application, the May 2007 partial compliance report, and the February 2010 revised application for this permit action.

**Table 3 – Construction, Permitting, and Compliance History  
Wind River Resources, North Hill Creek Compressor Station**

**August 7, 1980 → Prevention of Significant Deterioration Pre-Construction Permitting Program Promulgated  
(the 8/7/80 rules form the basis of the current regulations)**

**Applicability:**

PSD is a preconstruction review requirement that applies to proposed projects that are sufficiently large (in terms of emissions) to be a “major” stationary source or “major” modification. Source size is defined in terms of “potential to emit,” which is its capability at maximum design capacity to emit a pollutant, except as constrained by federally and practically enforceable conditions. A new source or a modification to an existing minor source is major if the proposed project has the potential to emit any pollutant regulated under the CAA in amounts equal to or exceeding specified major source thresholds [100 tpy for the 28 listed industrial source categories and 250 tpy for all other sources].

PSD also applies to modifications at existing major sources that cause a significant “net emissions increase” at that source. A modification is a physical change or change in the method of operation. Significance levels for each pollutant are defined in the PSD regulations at 40 CFR 52.21.

**Compliance:** No new source or modification of a source subject to PSD review may be constructed without a permit.

**February 19, 1999 → Part 71 (Title V) Operating Permit Program Promulgated  
(the 2/19/99 rules form the basis of the current regulations)**

**Applicability:**

Any major source (criteria pollutants > 100 tpy, or any single HAP > 10 tpy, or aggregated HAPS > 25 tpy);  
Any source, including an area source, subject to a standard, limitations, or other requirements under 111 or 112 of the CAA promulgated on or before July 21, 1992. Non-major sources subject to 111 or 112 regulation promulgated after July 21, 1992 are subject unless the rule specifies otherwise;  
Any Acid Rain source;  
Any Solid Waste Incineration Unit;

**Application Due Date:** Within 12 months after commencing operation.

**June 17, 1999 → MACT HH for Major HAP Oil and Gas Production Sources Promulgated  
(HAP > 10/25 tpy)**

**For the purposes of the subpart, HAP PTE for an oil and gas production facility is determined by the facility-wide HAP emissions from dehydrators and storage vessels with a potential for flash emissions only.**

**Affected Sources:**

Glycol dehydration units  
Storage vessels with the potential for flash emissions  
Group of ancillary equipment (pumps, valves, flanges, etc...)  
Compressors intended to operate in volatile hazardous air pollutant service, located at natural gas processing plants

**Final Compliance Dates**

Construction or reconstruction commenced before February 6, 1998 – June 17, 2002  
Construction or reconstruction commenced after February 6, 1998 – Upon startup or June 17, 2002, whichever date is later  
Area → Major HAP Source  
Construction or reconstruction of the affected unit commenced before February 6, 1998, causing source to become major – 3 years after becoming major  
Construction or reconstruction of the affected unit commenced after February 6, 1998, causing source to become major – Upon startup

**Limited Requirements/Exemptions**

Actual average benzene emissions from glycol dehydrators < 1 tpy

**Applicability to Source**

*Subject - Major Source of HAP -Potential for flash emissions on site from dehydration unit has PTE > 10/25 tpy of Single HAP/Total HAPs.*

**Table 3 – Construction, Permitting, and Compliance History (continued...)**  
**Wind River Resources, North Hill Creek Compressor Station**

<b>February 2004 → Commenced Operations; Part 71 application received February 2005</b>					
	<b>PTE (tpy) (uncontrolled/controlled)</b>				
	<b>NO<sub>x</sub></b>	<b>CO</b>	<b>VOC</b>	<b>HAPs</b>	<b>CH<sub>2</sub>O</b>
C-1 1,680 hp,Waukesha L7044GSI	202.5*/16.2	190.6*/32.4	4.1*/4.1	3.4*/1.7	1.62*/0.81
C-2 1,680 hp,Waukesha L7044GSI	202.5*/16.2	190.6*/32.4	4.1*/4.1	3.4*/1.7	1.62*/0.81
G-1 98 hp Ford natural gas-fired generator set	1.0/1.0	0.3/0.3	1.2/1.2	0.8/0.8	0.0/0.0
G-2 158 hp Caterpillar diesel engine	7.1/7.1	0.9/0.9	0.4/0.4	0.0/0.0	0.0/0.0
D-1 27 MMscfd Glycol Dehydrator Vent	-	-	59.7*/0.3	43.3*/0.2	-
D-2, 10 MMscfd Glycol Dehydrator vent	-	-	46.9*/0.2	32.4*/0.1	-
T-1 400-bbl condensate tank	-	-	10.6*/0.2	0.5*/0.0	-
IEUs: Truck loading (condensate), 550 MBtu/hr Glycol Dehydrator Reboiler, 500 MBtu/hr heater for condensate tank #1, 500 MBtu/hr heater for condensate tank #2, 250 MBtu/hr heater for separator	1.6/1.6	1.3/1.3	5.9/5.9	0.3/0.3	-
<b>February 2004 PTE Cumulative Totals</b>	<b>414.7/40.5</b>	<b>383.7/66.0</b>	<b>132.9/16.4</b>	<b>84.1/4.8</b>	<b>3.2/3.2</b>
<p>*Uncontrolled emission values back calculated from the assumed controlled emissions from the 2/10/2005 part 71 application.</p> <p>The following summary of status is based on uncontrolled emissions. Uncontrolled emissions have been used here due to the findings in the May 11, 2008 EPA inspection report.</p> <div style="display: flex; justify-content: space-between;"> <div> <b>PSD Status of Facility:</b> Major  <b>HAP Status of Facility per Subpart HH:</b> Major         </div> <div> <b>HAP Status of Facility:</b> Major (Subject to MACT ZZZZ)  <b>Title V Status of Facility:</b> Subject         </div> </div>					

June 15, 2004 → MACT ZZZZ for Reciprocating Internal Combustion Engines (RICE) Promulgated	
Affected Sources:	<p>Existing RICE <math>\geq</math> 500 bhp, located at major sources of HAP emissions, constructed or reconstructed on or before 12/19/2002</p> <p>New/Reconstructed RICE <math>\geq</math> 500 bhp, located at major sources of HAP emissions, constructed or reconstructed after 12/19/2002</p>
Final Compliance Dates	<p>Existing lean burn RICE – Exempt</p> <p>Existing rich burn RICE – June 15, 2007</p> <p>New or reconstructed rich or lean burn RICE constructed on or before August 16, 2004</p> <p>New or reconstructed rich or lean burn RICE constructed after August 16, 2004 – upon startup</p>
Applicability to Source	<p><i>Subject – Major source of HAP emissions and engines were constructed after August 16, 2004.</i></p>

**Table 3 – Construction, Permitting, and Compliance History (continued...)  
Wind River Resources, North Hill Creek Compressor Station**

<b>January 3, 2007 → MACT HH Amendments to Include Area Sources of Oil &amp; Gas Production Facilities Promulgated (HAP &lt; 10/25 tpy)</b>
<p>Affected Sources: Triethylene Glycol (TEG) dehydration units</p> <p>Final Compliance Dates Construction or reconstruction of the affected unit located in an Urban-1 county commenced before February 6, 1998: Located w/i Urban Area (UA) Plus Offset and Urban Cluster (UC) boundary – January 4, 2010 Not Located w/i UA Plus Offset and UC boundary – January 5, 2009 Construction or reconstruction of the affected unit located in an Urban-1 county commenced on or after February 6, 1998 – Upon startup or January 3, 2007, whichever date is later. Construction or reconstruction of the affected unit not located in an Urban-1 county commenced before July 8, 2005: Located w/i UA Plus Offset and UC boundary – January 4, 2010 Not Located w/i UA Plus Offset and UC boundary – January 5, 2009</p> <p>Limited Requirements/Exemptions Actual average benzene emissions from glycol dehydrators &lt; 1 tpy</p> <p>Applicability to Source <i>Subject – Major Source of HAP -Potential for flash emissions on site from dehydration unit has PTE &gt; 10/25 tpy of Single HAP/Total HAPs.</i></p>
<b>January 18, 2008 → MACT ZZZZ Amendments Promulgated to Include: Area Sources (HAP &lt; 25 tpy &amp; for any size engine) Major Sources (HAP &gt; 25 tpy &amp; for engines ≤ 500 hp)</b>
<p>Affected Sources: New or reconstructed RICE of any hp at area sources of HAP emissions, constructed or reconstructed on or after 6/12/06 New or reconstructed RICE ≤ 500 hp at major sources of HAP emissions, constructed or reconstructed on or after 6/12/06</p> <p>Final Compliance Dates Major HAP source Start up a new or reconstructed RICE ≤ 500 hp before January 18, 2008 – January 18, 2008 Start up a new or reconstructed RICE ≤ 500 hp after January 18, 2008 – upon startup Area HAP source Start up a new or reconstructed RICE of any hp before January 18, 2008 – January 18, 2008 Start up a new or reconstructed RICE of any hp after January 18, 2008 – upon startup</p> <p>Applicability to Source <i>Subject – Major source of HAP emissions and engines were constructed after August 16, 2004.</i></p>
<b>January 18, 2008 → NSPS JJJJ for Spark Ignition (SI) Internal Combustion Engines (ICE) and Amendments to NESHAP for RICE Promulgated</b>
<p>RICE MACT Affected Sources:</p> <ul style="list-style-type: none"> <li>As above for 2004 RICE NESHAP promulgation for &gt;500 bhp at major sources</li> <li>New/Reconstructed SI ICE at minor HAP Sources that commenced construction, modification, or reconstruction after 6/12/2006 (SI ICE NSPS)</li> <li>Existing RICE &lt; 500 bhp, located at major sources of HAP emissions, constructed or reconstructed before 6/12/2006</li> <li>New/Reconstructed RICE &lt; 500 bhp, located at major sources of HAP emissions, constructed or reconstructed on or after 6/12/2006</li> </ul> <p>Final Compliance Dates</p> <ul style="list-style-type: none"> <li>As above for 2004 RICE NESHAP Promulgation for &gt;500 bhp at major sources</li> <li>Existing lean burn RICE at minor HAP source or ≤ 500 bhp at major source - No requirements</li> <li>Existing rich burn RICE at minor HAP source or ≤ 500 bhp at major source - No requirements</li> <li>New/Reconstructed RICE at minor HAP source or ≤ 500 bhp at major HAP source started up before January 18, 2008 → January 18, 2008</li> <li>New/Reconstructed RICE at minor HAP source or ≤ 500 bhp at major source started up after January 18, 2008 → upon startup</li> </ul> <p>Applicability to Source <i>Subject – According to Wind River, NHC has three engines (C-1, C-2, and G-1) that meet the manufacture dates applicable to the requirement.</i></p>

**Table 3 – Construction, Permitting, and Compliance History (continued...)  
Wind River Resources, North Hill Creek Compressor Station**

<b>April 17, 2009 - Consent Decree Lodged to Address Clean Air Act Violations; November 13, 2009 Consent Decree Entered</b>					
A Consent Decree was negotiated between Wind River, the Bill Barrett Corporation, and U.S. EPA to settle the alleged violations of the CAA. The Consent Decree was lodged on April 17, 2009 and entered into the federal district court of Utah on November 13, 2009 (Civil Action No.: 2:09-CV-330-T5).					
<b>February 24, 2010 → Revised Part 71 Permit Application Received</b>					
	<b>PTE (tpy)</b> <b>(Based on Units having Enforceable Controls)</b>				
	<b>NO<sub>x</sub></b>	<b>CO</b>	<b>VOC</b>	<b>HAPs</b>	<b>CH<sub>2</sub>O</b>
C-1 1,680 hp, Waukesha L7044GSI	16.2	32.4	4.1	1.7	0.4
C-2 1,680 hp, Waukesha L7044GSI	16.2	32.4	4.1	1.7	0.4
G-1 98 hp Ford natural gas-fired generator set	1.0	0.3	1.2	0.8	0.0
D-1 27 MMscfd Glycol Dehydrator Vent	-	-	0.2	0.2	-
D-2, 10 MMscfd Glycol Dehydrator vent	-	-	0.2	0.2	-
T-1 400-bbl condensate tank	-	-	0.0	0.0	-
IEUs: Truck loading (condensate), 550 MBtu/hr Glycol Dehydrator Reboiler, 500 MBtu/hr heater for condensate tank #1, 500 MBtu/hr heater for condensate tank #2, 250 MBtu/hr heater for separator, three tank heaters totaling 1.65 MMBtu/hr	2.3	1.9	5.9	0.3	-
<b>February 2010 PTE Cumulative Totals</b>	<b>35.7</b>	<b>67.0</b>	<b>15.7</b>	<b>4.9</b>	<b>0.8</b>
<b>PSD Status of Facility:</b> Minor <b>HAP Status of Facility per Subpart HH:</b> Major (Subject) <b>HAP Status of Facility:</b> Subject to MACT ZZZZ <b>Title V Status of Facility:</b> Subject *Engine Unit G-2 was removed from the site June 11, 2010 prior to this initial permit being issued final.					

f. Potential to emit

Pursuant to 40 CFR 52.21, potential to emit (PTE) is defined as the maximum capacity of a stationary source to emit a pollutant under its physical and operational design. Any physical or operational limitation on the capacity of the source to emit a pollutant, including air pollution control equipment and restrictions on hours of operation or on the type or amount of material combusted, stored, or processed, shall be treated as part of its design if the limitation, or the effect it would have on emissions, is federally enforceable. Independently enforceable applicable requirements are considered enforceable to the extent that the source is in compliance with the standard. In addition, beneficial reductions in non-targeted pollutants resulting from compliance with an independently enforceable applicable requirement may be counted towards PTE provided the emission reduction of the non-targeted pollutant is enforceable as a practical matter. See the 1995 guidance memo signed by John Seitz, Director of OAQPS titled, “Options for Limiting Potential to Emit of a Stationary Source under Section 112 and Title V of the Clean Air Act.”



The facility-wide PTE for NHC with enforceable controls is:

Nitrogen oxides (NO<sub>x</sub>) – 35.7 tpy  
Carbon monoxide (CO) – 67.0 tpy  
Volatile organic compounds (VOC) – 15.7 tpy  
Sulfur dioxide (SO<sub>2</sub>) – 0.1 tpy  
Small particulates (PM<sub>10</sub>) – 0.6 tpy  
Lead – 0.00 tpy  
Total hazardous air pollutants (HAPs) – 4.9 tpy

## **2. Tribe Information**

### **a. Indian country**

NHC is located in “Indian country” as defined at 18 U.S.C. §1151, within the exterior boundaries of the Uintah and Ouray Reservation. The Ute Tribe does not have a federally-approved Clean Air Act (CAA) title V operating permits program nor does EPA’s approval of the State of Utah’s title V program extend to Indian country. Thus, EPA is the appropriate governmental entity to issue the title V permit to this facility.

### **b. The Reservation**

The Uintah and Ouray Reservation consists of two separate but contiguous tracts of land set aside in the nineteenth century for the exclusive use and occupancy of the three bands of Indians (Uncompahgre, Uintah and Whiteriver) who make up the present-day Ute Indian Tribe. The Uintah Valley Reservation along the Duchesne River was established in 1861 and confirmed by Congress in the Act of May 5, 1864. An Executive Order, dated January 5, 1882, established the Uncompahgre Reservation for the use and occupancy of the Uncompahgre Utes.

### **c. Tribal government**

The Ute Tribe operates under a constitutional government organized pursuant to the authority of section 16 of the Indian Reorganization Act of June 16, 1934, 48 Stat. 986. The Tribe adopted its Constitution and By-Laws on December 19, 1936, for the government, protection and common welfare of the Ute Indian Tribe and its members. It was approved by the Secretary of the Interior on January 19, 1937.

The governing body of the Ute Tribe consists of six individuals who are elected to the Ute Tribal Business Committee. Members of the Business Committee are elected by band: two representatives each from the Uncompahgre, Uintah and Whiteriver Bands. Members are elected for a term of four years by the eligible members of the respective bands. The Business Committee is responsible for the overall social, economic and natural resource development of the Reservation and for the members of the Ute Tribe. They are delegated broad powers under the Tribe’s Constitution to carry out these responsibilities. The Tribe also operates an extensive tribal court system, including a lower court, a court of appeals, and a juvenile court.

d. Local air quality and attainment status

The Uintah and Ouray Reservation either attains the national ambient air quality standard or is “unclassifiable” for all criteria pollutants. An area is unclassifiable when there is insufficient monitoring data. The Ute Indian Tribe has operated samplers to collect data for PM<sub>10</sub> (particulate matter with an aerodynamic diameter less than or equal to ten micrometers). Until 2006, two stations reported daily and annual averages of PM<sub>10</sub> concentrations under a grant from EPA Region 8. As of mid-2009 the Tribe began independently monitoring criteria pollutants (including particulate matter, ozone, and oxides of nitrogen) and meteorological conditions.

**3. Facility Requirements**

a. Consent Decree - Civil Action No. 2:09-cv-330-T5

NHC is subject to the requirements of federal Consent Decree Civil Action No. 2:09-cv-330-T5, lodged on April 17, 2009 and entered into the federal district court of Utah on November 13, 2009. Notwithstanding conditions of the title V permit, the permittee shall comply with all applicable requirements of the Consent Decree. A copy of the Consent Decree is attached as an appendix to the permit. The following discussion only summarizes the emission limits and control requirements that apply specifically to NHC, as discussed in Section IV.A. – Emission Reduction Requirements, of the Consent Decree.

**Emission Reduction Requirements – Existing Dehydration Units**

The dehydration units are subject to the applicable requirements for affected facilities under 40 CFR part 63, subpart HH – Nation Emission Standards for Hazardous Air Pollutants From Oil & Natural Gas Production Facilities.

A condenser and enclosed flare in combination is required to be used to achieve a 95% or greater reduction of VOC or total HAP emissions and in accordance with 40 CFR 63.772(e). The enclosed flare is to be operated in accordance with 40 CFR 63.11(b) and the manufacturer’s written instructions or procedures.

**Emission Reduction Requirements – Existing Condensate, Slop Oil, and Water Tanks**

Emissions from the condensate, slop oil, and water tanks are required to be continuously controlled using the enclosed flare at the site that is also used to control dehydrator emissions.

**Emission Reduction Requirements – Existing Compressor Engines**

The reciprocating internal combustions engines (RICE) are subject to the applicable HAP emission reduction requirements for affected facilities under 40 CFR part 63, subpart ZZZZ - National Emission Standards for Hazardous air Pollutants From Reciprocating Internal Combustion Engines. The Consent Decree also requires the following additional emission limits for the compressor engines when operating at 90% load or higher:

- CO: 2.0 g/hp-hr at  $\geq 90\%$  operating load
- NO<sub>x</sub>: 1.0 g/hp-hr at  $\geq 90\%$  operating load

Non-selective catalytic reduction (NSCR) and air-to-fuel ratio (AFR) control devices are to be used on each engine to achieve 76% destruction efficiency for formaldehyde in addition to the CO and NO<sub>x</sub> emissions provided above. The NSCR and AFR controls are to be maintained and operated in accordance with manufacturer recommendations and additional requirements stated in the Consent Decree. Monitoring, recordkeeping and reporting is required to confirm that the emissions limits are being met.

## **Pneumatic Controllers**

“High-bleed” pneumatic controls identified in Appendix C of the Consent Decree are to be retrofitted or replaced with “low-bleed” actuators. During the retrofit/replacement project, leaking gaskets, tubing fittings, and seals are to be repaired or replaced.

### **b. Applicable requirement review**

The following discussion addresses some of the regulations from the Code of Federal Regulations (CFR) at title 40. Note, that this discussion does not include the full spectrum of potentially applicable regulations and is not intended to represent official applicability determinations. These discussions are based on the information provided by Wind River in the most recent part 71 application and are only intended to present the information certified to be true and accurate by the Responsible Official of this facility.

## **Prevention of Significant Deterioration (PSD)**

New major stationary sources of air pollution and major modifications to major stationary sources are required by the CAA to obtain an air pollution permit before commencing construction. The process is called new source review (NSR).

A major stationary source for purposes of PSD is any source belonging to a list of 28 source categories which emits or has the potential to emit 100 tpy of any pollutant regulated under the CAA or any other source type which emits or has the potential-to-emit such pollutants in amounts equal to or greater than 250 tpy. Furthermore, when an existing “minor” source, i.e., one that does not meet the definition of “major” source, makes a physical change or change in the method of operation that is by itself a major source (i.e. 100 tpy or 250 tpy), that physical or operational change constitutes a major stationary source that is subject to PSD review.

A major modification is generally a physical change or a change in the method of operation of a major stationary source which would result in a significant “net emission increase” of any regulated pollutant under the CAA. Significant emissions thresholds are defined in two ways. The first is in terms of emission rates (tpy). Significant emissions rates are lower than major sources thresholds and can be found in 40 CFR 52.21. Significant increases in emission rates are subject to PSD review under two circumstances:

1. For a new source which is major for at least one regulated pollutant (i.e., subject to PSD review), all other pollutants which are emitted in amounts equal to or greater than the significance increase are also subject to PSD review; and
2. For any emission rate at a new major stationary source (or any net emissions increase associated with a modification to an existing major stationary source) that is constructed within 10 kilometers of a Class I area, and which would increase the 24-hour average concentration of any regulated pollutant in that area by  $1 \mu\text{g}/\text{m}^3$  or greater.

The PSD requirements are pollutant specific. In other words, a proposed new project or modification that emits many different air pollutants may only be subject to NSR review for one or only a few of the air pollutants depending on the magnitude of the proposed emissions of each pollutant.

NHC does not fall within one of the 28 named source categories in 40 CFR part 52.21(b)(1)(i)(a); therefore, the major source applicability threshold for new stationary sources is 250 tpy. Based on the legally and practically enforceable emission limits created through compliance with Consent Decree Civil Action No. 2:09-cv-330-T5, NHC is currently not a PSD source. Any future modification at this facility with a potential increase in any pollutant regulated under the CAA of 250 tpy or more would require PSD review.

### **New Source Performance Standards (NSPS)**

40 CFR Part 60, Subpart A: General Provisions. This subpart applies to the owner or operator of any stationary source which contains an affected facility, the construction or modification of which is commenced after the date of publication of any standard in part 60. The general provisions under subpart A apply to sources that are subject to the specific subparts of part 60.

Based on the information provided by Wind River, NHC is not subject to any specific subparts of part 60; therefore, the General Provisions of part 60 do not apply.

40 CFR Part 60, Subpart Dc: Standards of Performance for Small Industrial-Commercial-Institutional Steam Generating Units. This rule applies to steam generating units with a maximum design heat capacity of 100 MMBtu/hr or less, but greater than or equal to 10 MMBtu/hr.

According to Wind River, NHC has no steam generating units with a maximum heat design capacity between 10 and 100 MMBtu/hr operating at the facility. Therefore, there are no units potentially subject to this rule.

40 CFR Part 60, Subpart K: Standards of Performance for Storage Vessels for Petroleum Liquids for which Construction, Reconstruction, or Modification Commenced After June 11, 1973, and Prior to May 19, 1978. This rule applies to storage vessels for petroleum liquids with a storage capacity greater than 40,000 gallons. 40 CFR part 60, subpart K does not apply to storage vessels for petroleum or condensate stored, processed, and/or treated at a drilling and production facility prior to custody transfer.

According to Wind River, this subpart does not apply to the storage vessels at NHC because the facility is a production facility that processes natural gas prior to custody transfer.

40 CFR Part 60, Subpart Ka: Standards of Performance for Storage Vessels for Petroleum Liquids for which Construction, Reconstruction, or Modification Commenced After May 18, 1978, and Prior to June 23, 1984. This rule applies to storage vessels for petroleum liquids with a storage capacity greater than 40,000 gallons. Subpart Ka does not apply to petroleum storage vessels with a capacity of less than 420,000 gallons used for petroleum or condensate stored, processed, or treated prior to custody transfer.

According to Wind River, this subpart does not apply to the storage vessels at NHC because the facility is a production facility that processes natural gas prior to custody transfer.

40 CFR Part 60, Subpart Kb: Standards of Performance for Volatile Organic Liquid Storage Vessels (Including Petroleum Liquid Storage Vessels) for which Construction, Reconstruction, or Modification Commenced After July 23, 1984. This rule applies to storage vessels with a capacity greater than or equal to 75 cubic meters (10,000 bbl or 1,589,874 m<sup>3</sup>).

According to Wind River, this subpart does not apply to the storage vessels at NHC because the facility has no tanks greater than or equal to 75 cubic meters (10,000 bbls) that store volatile organic liquids. Each tank is 400 bbls.

40 CFR Part 60, Subpart GG: Standards of Performance for Stationary Gas Turbines. This rule applies to stationary gas turbines, with a heat input at peak load equal to or greater than 10.7 gigajoules per hour (10 MMBtu/hr), that commenced construction, modification, or reconstruction after October 3, 1977.

According to Wind River, there are no stationary gas turbines located at NHC; therefore, this subpart does not apply.

40 CFR Part 60, Subpart KKK: Standards of Performance for Equipment Leaks of VOC from Onshore Natural Gas Processing Plants. This subpart establishes requirements for controlling fugitive VOC emissions from onshore natural gas processing plants.

Subpart KKK requires a source to comply with several requirements of 40 CFR 60, subpart VV, Standards of Performance for Equipment Leaks of VOC in the Synthetic Organic Chemicals Manufacturing Industry for which Construction, Reconstruction, or Modification Commenced After January 5, 1981 and on or Before November 7, 2006. Both subpart VV and subpart KKK regulate fugitive emissions of VOCs at onshore natural gas processing plants. The regulations for subpart VV are found at 40 CFR 60 §§60.480 through 60.489.

#### *Natural Gas Processing Plant*

Pursuant to the definitions at 40 CFR 60.631, a *natural gas processing plant* “means any processing site engaged in the extraction of natural gas liquids (NGLs) from field gas, fractionation of mixed NGLs to natural gas products, or both.”

## *Natural Gas Liquids*

Pursuant to the definitions at 40 CFR 60.631, *natural gas liquids* “means the hydrocarbons, such as ethane, propane, butane, and pentane that are extracted from field gas.” The use of “such as” in this definition indicates that this definition is inclusive of the listed hydrocarbons liquids but does not exclude all others. In fact, the definition of *natural gas liquids* found in Frick’s Petroleum Production Handbook, Vol. II states that NGLs are divided into more specific categories, including: (1) condensate; (2) natural gasoline; and (3) liquefied petroleum gases.

## *Process Unit*

Process units are defined as equipment assembled for the extraction of NGLs from field gas, the fractionation of the liquids into natural gas products, or other operations associated with the processing of natural gas products. A process unit can operate independently if supplied with sufficient feed or raw materials and sufficient storage facilities for the products.

According to an April 7, 2009 memo from Cynthia J. Reynolds, Director of the Region 8 Technical Enforcement Program to Callie A. Videtich, Director of the Region 8 Air Program, titled Clarification of Applicability of 40 CFR 60, Subpart KKK to Dew Point and Joules Thompson Skids at Natural Gas Processing Operations, the use of dew point or Joules Thompson (JT) skids meet the definition of “Natural Gas Processing Plant.” As such, while compressor stations are typically not considered natural gas processing plants, the use of either a dew point or JT skid causes these facilities to meet the definition natural gas processing plants and would thus be subject to the requirements of this rule.

## *Applicability and Designation of Affected Facilities*

The provisions of this subpart apply to the following components at onshore natural gas processing plants that commenced construction, reconstruction, or modification after January 20, 1984:

- 1) Compressors in VOC service or wet gas service are subject to this rule. A compressor is in VOC service if it contains or contacts a process fluid that is at least 10% VOC by weight. In wet gas service means that a piece of equipment contains or contacts the field gas before the extraction step in the process.
- 2) All equipment except compressors within a process unit.

A compressor station, dehydration unit, sweetening unit, underground storage tank, field gas gathering system, or liquefied natural gas unit is covered by this subpart if it is located at an onshore natural gas processing plant. If the unit is not located at the plant site, then it is exempt from the provisions of this subpart.

## *Equipment*

Equipment means each pump, pressure relief device, open-ended valve or line, valve, compressor, and flange or other connector that is in VOC service or in wet gas service, and any device or system required by this subpart.

Subpart KKK establishes monitoring/testing requirements, recordkeeping requirements and reporting requirements for the following components that may be located at an onshore natural gas processing plant:

- Pumps in light liquid service
- Compressors in VOC service or wet gas service
- Pressure relief devices in gas vapor service
- Sampling connection systems
- Open-ended valves or lines
- Valves in Gas / Vapor or light liquid service
- Pumps and valves in heavy liquid service, pressure relieve devices in light or heavy liquid service, and flanges and other connectors
- Closed Vent Systems and Control Devices
- Vapor recovery systems
- Enclosed combustion devices
- Flares

In addition, the rule establishes separate requirements for the following:

- Delay of repair of equipment for which leaks have been detected.
- Alternative means of emissions limitation for components subject to the rule
- Determining components that are not in VOC or wet gas service

*Applicability to North Hill Creek:*

According to Wind River, NHC does not extract NGLs from field gas, nor does it fractionate mixed NGLs to natural gas products, and thus does not meet the definition of a natural gas processing plant under this subpart. Therefore, this rule does not apply.

40 CFR Part 60, Subpart LLL: Standards of Performance for Onshore Natural Gas Processing; SO<sub>2</sub> Emissions. This rule applies to sweetening units and sulfur recovery units at onshore natural gas processing facilities. As defined in this subpart, sweetening units are process devices that separate hydrogen sulfide (H<sub>2</sub>S) and carbon dioxide (CO<sub>2</sub>) from a sour natural gas stream. Sulfur recovery units are defined as process devices that recover sulfur from the acid gas (consisting of H<sub>2</sub>S and CO<sub>2</sub>) removed by a sweetening unit.

According to Wind River, NHC does not perform sweetening or sulfur recovery at the facility. Therefore, this rule does not apply.

40 CFR Part 60, Subpart IIII: Standards of Performance for Stationary Compression Ignition Internal Combustion Engines. This rule applies, in part, to owners and operators of stationary compression ignition (CI) internal combustion engines (ICE) that commence construction after July 11, 2005 where the stationary CI ICE are:

- a. Manufactured after April 1, 2006 and are not fire pump engines, or
- b. Manufactured as certified National Fire Protection Association (NFPA) fire pump engines after July 1, 2006.

For the purposes of this subpart, the date that construction commences is the date the engine is ordered by the owner or operator.

This subpart also applies to owners and operators of stationary CI ICE that modify or reconstruct their stationary ICE after July 11, 2005.

Wind River operates one CI ICE (G2) for water well control at NHC; however, according to Wind River, the engine was installed in December of 2003, implying that construction commenced prior to the trigger date of July 11, 2005. In addition and according to Wind River, this engine has not been modified or reconstructed after July 11, 2005. Therefore, this rule does not apply at this time.

40 CFR Part 60, Subpart JJJJ: Standards of Performance for Stationary Spark Ignition Internal Combustion Engines. This subpart establishes emission standards and compliance requirements for the control of emissions from stationary spark ignition (SI) internal combustion engines (ICE) that commenced construction, modification or reconstruction after June 12, 2006, where the SI ICE are manufactured on or after specified manufacture trigger dates. The manufacture trigger dates are based on the engine type, fuel used, and maximum engine horsepower.

For the purposes of this subpart, the date that construction commences is the date the engine is ordered by the owner or operator (See 40 CFR 60.4230(a)).

Wind River provided the following information:

**Table 6 –NSPS Subpart JJJJ Applicability Determination  
Wind River Resources Corporation – North Hill Creek Compressor Station**

Unit	Serial Number	Unit Description	Fuel	BHP	Manufacture Date	Install Date	Subpart JJJJ Trigger Date – Manufactured on or after
C-1	C-14843/1	Waukesha 7044 GSI 4SRB	Natural Gas	1,680	Pre-2006	12/2003	7/1/07
C-2	C-14844/1	Waukesha 7044 GSI 4SRB	Natural Gas	1,680	Pre-2006	12/2003	7/1/07
G-1	Unknown	Ford WSG 1068	Natural Gas	98	Pre-2006	12/2003	7/1/2008 and prior to 1/1/2011

According to the information provided by Wind River, none of the engines currently operating at the facility commenced construction, were modified, or reconstructed after June 12, 2006; therefore, the requirements in subpart JJJJ do not apply to the engines at NHC.



40 CFR part 60, subpart KKKK: Standards of Performance for Stationary Combustion Turbines.

This subpart establishes emission standards and compliance schedules for the control of emissions from stationary combustion turbines that commenced construction, modification or reconstruction after February 18, 2005. The rule applies to stationary combustion turbines with a heat input at peak load equal to or greater than 10.7 gigajoules (10 MMBtu) per hour.

According to Wind River, there is no stationary gas turbine located at NHC; therefore, this subpart does not apply.

### **National Emissions Standards for Hazardous Air Pollutants (NESHAP)**

40 CFR Part 63, Subpart A: General Provisions. This subpart contains national emissions standards for HAPs that regulate specific categories of sources that emit one or more HAP regulated pollutants under the CAA. The general provisions under subpart A apply to sources that are subject the specific subparts of part 63.

As explained below, North Hill Creek is subject to 40 CFR part 63, subpart HH National Emission Standards for Hazardous Air Pollutants from Oil and Natural Gas Production Facilities and subpart ZZZZ, National Emission Standards for Hazardous Air Pollutants for Stationary Reciprocating Internal Combustion Engines; therefore, the General Provisions of part 63 apply.

40 CFR Part 63, Subpart HH: National Emission Standards for Hazardous Air Pollutants from Oil and Natural Gas Production Facilities. This subpart applies to the owners and operators of affected units located at natural gas production facilities that are major sources of HAPs, and that process, upgrade, or store natural gas prior to the point of custody transfer, or that process, upgrade, or store natural gas prior to the point at which natural gas enters the natural gas transmission and storage source category or is delivered to a final end user. The affected units are glycol dehydration units, storage vessels with the potential for flash emissions, and the group of ancillary equipment, and compressors intended to operate in volatile hazardous air pollutant service, which are located at natural gas processing plants.

#### *Throughput Exemption*

Those sources whose maximum natural gas throughput, as appropriately calculated in §63.760(a)(1)(i) through (a)(1)(iii), is less than 18,400 standard cubic meters per day are exempt from the requirements of this subpart.

#### *Source Aggregation*

Major source, as used in this subpart, has the same meaning as in §63.2, except that:

- 1) Emissions from any oil and gas production well with its associated equipment and emissions from any pipeline compressor station or pump station shall not be aggregated with emissions from other similar units.
- 2) Emissions from processes, operations, or equipment that are not part of the same facility shall not be aggregated.

- 3) For facilities that are production field facilities, only HAP emissions from glycol dehydration units and storage tanks with flash emission potential shall be aggregated for a major source determination.

### *Facility*

For the purpose of a major source determination, facility means oil and natural gas production and processing equipment that is located within the boundaries of an individual surface site as defined in subpart HH. Examples of facilities in the oil and natural gas production category include, but are not limited to: well sites, satellite tank batteries, central tank batteries, a compressor station that transports natural gas to a natural gas processing plant, and natural gas processing plants.

### *Production Field Facility*

Production field facilities are those located prior to the point of custody transfer. The definition of custody transfer (40 CFR 63.761) means the point of transfer after the processing/treating in the producing operation, except for the case of a natural gas processing plant, in which case the point of custody transfer is the inlet to the plant.

### *Natural Gas Processing Plant*

A natural gas processing plant is defined in 40 CFR 63.761 as any processing site engaged in the extraction of NGLs from field gas, or the fractionation of mixed NGLs to natural gas products, or a combination of both. A treating plant or gas plant that does not engage in these activities is considered to be a production field facility.

### *Major Source Determination for Production Field Facilities*

The definition of major source in this subpart (at 40 CFR 63.761) states, in part, that only emissions from the dehydration units and storage vessels with a potential for flash emissions at production field facilities shall be aggregated when comparing to the major source thresholds.

For facilities that are not production field facilities, HAP emissions from all HAP emission units shall be aggregated.

### *Area Source Applicability*

40 CFR part 63, subpart HH applies also to area sources of HAPs. An area source is a HAP source whose total HAP emissions are less than 10 tpy of any single HAP or 25 tpy for all HAPs in aggregate. This subpart requires different emission reduction requirements for glycol dehydration units found at oil and gas production facilities based on their geographical location.

Units located in densely populated areas (determined by the Bureau of Census) and known as urbanized areas with an added 2-mile offset and urban clusters of 10,000 people or more, are required to have emission controls. Units located outside these areas will be required to have the glycol recirculation pump rate optimized or operators can document that PTE of benzene is less than 1 tpy.

### *Applicability of Subpart HH to North Hill Creek*

According to Wind River, NHC does not engage in the extraction of NGLs per the definition in this subpart, and therefore, is not considered a natural gas processing plant. Hence, the point of custody transfer, as defined in subpart HH, occurs downstream of the station and the facility would therefore be considered a production field facility. For production field facilities, only emissions from the dehydration units and storage vessels with a potential for flash emissions are to be aggregated to determine major source status. The uncontrolled HAP emissions from the dehydration units and condensate tank at the facility are above the major source thresholds of 10 tpy of a single HAP (benzene & xylene) and 25 tpy of aggregated HAPs. **As a result, units D1, D2, and T1 are affected units for this rule. Units D1 and D2 are subject to applicable requirements found in 40 CFR 63.764(d)(2), 63.774, and 63.775.**

In order for tank T1 to meet the definition of a “storage vessel with the potential for flash emissions,” it must have a hydrocarbon liquid throughput equal to or greater than 79,500 liters per day (500 bbl/d). According to Wind River, T1 has a throughput capacity less than 500 bbl/d. Therefore, it does not meet the definition under this subpart and is therefore not subject to any of the requirements of this standard. See 40 CFR 63.761.

40 CFR Part 63, Subpart HHH: National Emission Standards for Hazardous Air Pollutants from Natural Gas Transmission and Storage Facilities. This rule applies to natural gas transmission and storage facilities that transport or store natural gas prior to entering the pipeline to a local distribution company or to a final end user, and that are a major source of HAP emissions. Natural gas transmission means the pipelines used for long distance transport and storage vessel is a tank or other vessel designed to contain an accumulation of crude oil, condensate, intermediate hydrocarbon, liquids, produced water or other liquid and is constructed of wood, concrete, steel or plastic structural support.

According to Wind River, this subpart does not apply to NHC, as the facility is a natural gas production facility and not a natural gas transmission or storage facility.

40 CFR Part 63, Subpart YYYY: National Emission Standards for Hazardous Air Pollutants from Stationary Combustion Turbines. This rule establishes national emission limitations and work practice standards for HAPs emitted from Stationary Combustion Turbines. The affected source includes the stationary combustion turbine located at a major source of HAP emissions.

### *Stationary Combustion Turbine*

Stationary combustion turbines are defined in §63.6175 as all equipment, including but not limited to the turbine, the fuel, air, lubrication and exhaust gas systems, control systems (except emissions control equipment), and any ancillary components and sub-components comprising any simple cycle stationary combustion turbine, any regenerative/recuperative cycle stationary combustion turbine, the combustion turbine portion of any stationary cogeneration cycle combustion system, or the combustion turbine portion of any stationary combined cycle steam/electric generating system. Stationary means that the combustion turbine is not self propelled or intended to be propelled while performing its function. Stationary combustion turbines do not include turbines located at a research or laboratory facility, if research is

conducted on the turbine itself and the turbine is not being used to power other applications at the research or laboratory facility.

### *Major Source*

Major source for purposes of this subpart has the same meaning as provided in 40 CFR 63.2 with the exception that emissions from any oil or gas exploration or production well (with its associated equipment) and emissions from any pipeline compressor station or pump station shall not be aggregated with emissions from other similar units, to determine whether such emission points or stations are major sources, even when emission points are contiguous or are under common control.

### *Applicability to North Hill Creek*

According to Wind River, there are no stationary combustion turbines operating at NHC. Therefore, this subpart does not apply.

40 CFR Part 63, Subpart ZZZZ (MACT ZZZZ): National Emission Standards for Hazardous Air Pollutants for Stationary Reciprocating Internal Combustion Engines. This rule establishes national emission limitations and operating limitations for HAPs emitted from stationary spark ignition internal combustion engines (SI ICE) and stationary compression ignition internal combustion engines (CI ICE).

For the purposes of this standard, construction or reconstruction is as defined in §63.2.

### *Rule History*

#### **June 15, 2004: SI and CI ICE > 500 bhp at Major HAP Source**

This rule was originally promulgated in June 15, 2004 (69 FR 33474). The original rule regulated all new and reconstructed lean burn and rich burn stationary SI ICE and CI ICE greater than 500 bhp located at major HAP sources. Only one category of existing ICE was subject to the rule at that time: Existing 4SRB SI ICE with a horse power rating equal to or greater than 500 bhp.

For this version of the rule,

Existing means: Construction or reconstruction commenced on or before 12/19/2002.

New means: Construction or reconstruction commenced after 12/19/2002.

#### **January 18, 2008: New SI & CI ICE at Area HAP Sources & New SI & CI ICE with Horse Power Rating < 500 bhp at Major HAP Sources**

The first round of amendments to MACT ZZZZ was promulgated on January 18, 2008 (73 FR 3568). Requirements were established for new SI & CI ICE of any horse power rating located at area sources of HAPs and new SI & CI ICE with a horse power rating less than or equal to 500 bhp at major sources of HAPs.

For this version of the rule:

Existing means: Construction or reconstruction commenced before 6/12/2006.

New means: Construction or reconstruction commenced on or after 6/12/2006.

### **February 17, 2010: Existing Compression Ignition Diesel Fired Engines (CI ICE) at Area & Major HAP Sources**

The second round of amendments to MACT ZZZZ was promulgated on February 17, 2010. New requirements were established for existing CI ICE (diesel fired engines) of any horse power rating located at area sources of HAPs, existing CI RICE with a horse power rating less than or equal to 500 bhp at major sources of HAPs, and existing non-emergency CI ICE with a horse power rating greater than 500 bhp at major sources of HAPs.

For this version of the rule

Existing CI at Area Source any HP = Construction or reconstruction commenced before 6/12/2006.

Existing CI at Major Source, bhp  $\leq$  500 = Construction or reconstruction commenced before 6/12/2006.

Existing Non-Emergency CI at Major Source, bhp  $>$  500 = Construction or reconstruction commenced on or before 12/19/2002.

While engines identified above are subject to the final rule and its amendments (February 17, 2010, January 18, 2008, June 15, 2004), there are distinct requirements for each engine depending on their design, use, horsepower rating, fuel, and major or area HAP emission status.

#### *Summary of Applicability to Engines at Major HAP Sources*

<b>Major HAP Sources</b>			
<b>Engine Type</b>	<b>Horse Power Rating</b>	<b>New or Existing?</b>	<b>Trigger Date</b>
SI ICE – All <sup>1</sup>	$\geq$ 500 hp	New	On or After 12/19/2002
SI ICE - 4SRB	$>$ 500 hp	Existing	Before 12/19/2002
SI ICE – All <sup>1</sup>	$\leq$ 500 hp	New	On or After 6/12/2006
CI ICE - All <sup>2</sup>	$\geq$ 500 hp	New	On or After 12/19/2002
CI ICE - Non Emergency	$>$ 500 hp	Existing	Before 12/19/2002
CI ICE - All <sup>2</sup>	$\leq$ 500 hp	New	On or After 6/12/2006
CI ICE - All <sup>2</sup>	$\leq$ 500 hp	Existing	Before 6/12/2006

1. All includes emergency ICE, limited use ICE, ICE that burn and fill gas, 4SLB, 2SLB, and 4SRB.

2. All includes emergency ICE and limited use ICE

*Summary of Applicability to Engines at Area HAP Sources*

<b>Area HAP Sources</b>			
<b>Engine Type</b>	<b>Horse Power Rating</b>	<b>New or Existing?</b>	<b>Trigger Date</b>
SI ICE - All <sup>1</sup>	All hp	New	On or After 6/12/2006
CI ICE - All <sup>2</sup>	All hp	New	On or After 6/12/2006
CI ICE - All <sup>2</sup>	All hp	Existing	Before 6/12/2006

1. All includes emergency ICE, limited use ICE, ICE that burn land fill or digester gas, 4SLB, 2SLB, and 4SRB.

2. All includes emergency ICE and limited use ICE

*Applicability of 40 CFR 63, Subpart ZZZZ to North Hill Creek*

Wind River provided the following information:

**Table 7- NESHAP Subpart ZZZZ Applicability Determination  
Wind River Resources Corporation – North Hill Creek Compressor Station**

<b>Unit</b>	<b>Serial Number</b>	<b>Unit Description</b>	<b>Fuel</b>	<b>BHP</b>	<b>Commenced Construction Reconstruction or Modification Date</b>	<b>Subpart ZZZZ Requirements</b>
C-1	C-14843/1	Waukesha 7044 GSI 4SRB	Natural Gas	1,680	Installed Post 12/19/2002	New SI ICE– Subject to major source requirements pursuant to Consent Decree.
C-2	C-14844/1	Waukesha 7044 GSI 4SRB	Natural Gas	1,680	Installed Post 12/19/2002	New SI ICE – Subject to major source requirements pursuant to Consent Decree.
G-1	Unknown	Ford WSG 1068	Natural Gas	98	Pre 6/12/2006 (Installed 12/2003 and no reconstruction has been identified by Wind River)	Existing SI ICE – Not Subject

According to the information provided in Wind River’s application, NHC is a major HAP source. There are no requirements that exist as of this time for engine unit G-1, so it is not subject. Engine units C-1 and C-2 commenced construction after December 19, 2002 and are considered new units. Therefore, engine units C-1 and C-2 are subject to the requirements of the RICE MACT.

## Compliance Assurance Monitoring (CAM) Rule

40 CFR Part 64: Compliance Assurance Monitoring Provisions. According to 40 CFR 64.2(a), the CAM rule applies to each Pollutant Specific Emission Unit (PSEU) at a major source that is required to obtain a part 70 or part 71 permit if the unit satisfies all of the following criteria:

- 1) The unit is subject to an emission limitation or standard for the applicable regulated air pollutant other than an emissions limitation or standard that is exempt under §64.2(b)(1);

*“§64.2(b)(1): Exempt emission limitations or standards. The requirements of this part shall not apply to any of the following emission limitations or standards:*

- (i) Emission limitations or standards proposed by the Administrator after November 15, 1990 pursuant to Section 111 or 112 of the Act;*
- (ii) Stratospheric ozone protection requirements under title VI of the Act;*
- (iii) Acid Rain Program requirements pursuant to Sections 404, 405, 406, 407(a), 407(b) or 410 of the Act;*
- (iv) Emissions limitations or standards or other applicable requirements that apply solely under an emissions trading program approved or promulgated by the Administrator under the Act that allows for trading emissions with a source or between sources;*
- (v) An emissions cap that meets the requirements specified in §70.4(b)(12) or §71.6(a)(13)(iii) of this chapter;*
- (vi) Emission limitations or standards for which a part 70 or 71 permit specifies a continuous compliance determination method, as defined in §64.1.”*

*“§64.1: Continuous compliance method means a method, specified by the applicable standard or an applicable permit condition, which:*

- (1) Is used to determine compliance with an emission limitation or standard on a continuous basis, consistent with the averaging period established for the emission limitation or standard; and*
- (2) Provides data either in units of the standard or correlated directly with the compliance limit.”*

- 2) The unit uses a control device to achieve compliance with any such limit or standard; and
- 3) The unit has pre-control device emissions of the applicable regulated pollutant that are equal to or greater than 100 percent of the amount, in tons per year, required for a source to be classified as a major source.

NHC is a major facility for NO<sub>x</sub>, CO, VOCs, and HAPs. However, only dehydrator still vents D-1 and D-2 have pre-controlled emission greater than or equal to 100% of the major source threshold. (They are both major and subject to 40 CFR part 63, subpart HH.) However, since both these units are subject to 40 CFR part 63, subpart HH, they meet the exemption at §64.1(b)(1) and are thus not subject to CAM.

While the engines C-1 and C-2 are subject to 40 CFR part 63, subpart ZZZZ, no single unit has emissions that equal or exceed 100% of major HAP thresholds, and are thus not subject to CAM.

### **Chemical Accident Prevention Program**

40 CFR Part 68: Chemical Accident Prevention Provisions. Based on Wind River's application, NHC does not meet the definition of a natural gas processing plant under 40 CFR part 68 and the exemption for determining a threshold quantity found at §68.115(b)(2)(iii) for naturally occurring hydrocarbon mixtures applies to this facility. Therefore, NHC is not subject to the requirement to develop and submit a risk management plan. However, Wind River has an ongoing responsibility to submit this plan IF a substance is listed that the total source has in quantities over the threshold amount or IF the total source ever increases the amount of any regulated substance above the threshold quantity.

### **Stratospheric Ozone and Climate Protection**

40 CFR Part 82, Subpart F: Air Conditioning Units. Based on information provided by Wind River, they are not currently subject to this requirement. However, should Wind River perform any maintenance, service, repair, or disposal of any equipment containing chlorofluorocarbons (CFCs), or contract with someone to do this work, Wind River would be required to comply with title VI of the CAA and submit an application for a modification to this title V permit.

40 CFR Part 82, Subpart H: Halon Fire Extinguishers. Based on information provided by Wind River, they are not currently subject to this requirement. However, should Wind River obtain any halon fire extinguishers, then it must comply with the standards of 40 CFR part 82, subpart H for halon emissions reduction, if it services, maintains, tests, repairs, or disposes of equipment that contains halons or uses such equipment during technician training. Specifically, Wind River would be required to comply with 40 CFR part 82 and submit an application for a modification to this title V permit.

### **Mandatory Greenhouse Gas Reporting**

40 CFR Part 98: Mandatory Greenhouse Gas Reporting. This rule requires sources above certain emission thresholds to calculate, monitor, and report greenhouse gas emissions. According to the definition of "applicable requirement" in 40 CFR 71.2, neither 40 CFR part 98, nor CAA §§ 114(a)(1) and 208, the CAA authority under which 40 CFR part 98 was promulgated, are listed as applicable requirements for the purpose of title V permitting. Although the rule is not an applicable requirement under 40 CFR part 71, the source is not relieved from the requirement to comply with the rule separately from compliance with their part 71 operating permit. It is the responsibility of each source to determine applicability to part 98 and to comply, if necessary.



### c. Conclusion

Since NHC is located in Indian country, the State of Utah's implementation plan does not apply to this source. In addition, no tribal implementation plan (TIP) has been submitted and approved for the Ute Indian Tribe, and EPA has not promulgated a federal implementation plan (FIP) for the area of jurisdiction governing the Uintah & Ouray Indian Reservation. Therefore, NHC is not subject to any implementation plan.

Based on the information provided in Wind River's applications for NHC, EPA has determined that the facility is subject only to those applicable federal CAA programs discussed in 3.a and 3.b, above.

EPA recognizes that, in some cases, sources of air pollution located in Indian country are subject to fewer requirements than similar sources located on land under the jurisdiction of a state or local air pollution control agency. To address this regulatory gap, EPA is in the process of developing national regulatory programs for preconstruction review of major sources in nonattainment areas and of minor sources in both attainment and nonattainment areas. These programs will establish, where appropriate, control requirements for sources that would be incorporated into part 71 permits. To establish additional applicable, federally-enforceable emission limits, EPA Regional Offices will, as necessary and appropriate, promulgate FIPs that will establish federal requirements for sources in specific areas. EPA will establish priorities for its direct federal implementation activities by addressing as its highest priority the most serious threats to public health and the environment in Indian country that are not otherwise being adequately addressed. Further, EPA encourages and will work closely with all tribes wishing to develop TIPs for approval under the Tribal Authority Rule. EPA intends that its federal regulations created through a FIP will apply only in those situations in which a tribe does not have an approved TIP.

## **4. EPA Authority**

### a. General authority to issue part 71 permits

Title V of the CAA requires that EPA promulgate, administer, and enforce a federal operating permits program when a state does not submit an approvable program within the time frame set by title V or does not adequately administer and enforce its EPA-approved program. On July 1, 1996 (61 FR 34202), EPA adopted regulations codified at 40 CFR 71 setting forth the procedures and terms under which the Agency would administer a federal operating permits program. These regulations were updated on February 19, 1999 (64 FR 8247) to incorporate EPA's approach for issuing federal operating permits to stationary sources in Indian country.

As described in 40 CFR 71.4(a), EPA will implement a part 71 program in areas where a state, local, or tribal agency has not developed an approved part 70 program. Unlike states, Indian tribes are not required to develop operating permits programs, though EPA encourages tribes to do so. See, e.g., Indian Tribes: Air Quality Planning and Management (63 FR 7253, February 12, 1998) (also known as the "Tribal Authority Rule"). Therefore, within Indian country, EPA will administer and enforce a part 71 federal operating permits program for stationary sources until a tribe receives approval to administer their own operating permits programs.

## **5. Use of All Credible Evidence**

Determinations of deviations, continuous or intermittent compliance status, or violations of the permit are not limited to the testing or monitoring methods required by the underlying regulations or this permit; other credible evidence (including any evidence admissible under the Federal Rules of Evidence) must be considered by the source and EPA in such determinations.

## **6. Public Participation**

### **a. Public notice**

As described in 40 CFR 71.11(a)(5), all part 71 draft operating permits shall be publicly noticed and made available for public comment. The public notice of permit actions and public comment period is described in 40 CFR 71(d).

There was a 30-day public comment period for actions pertaining to a draft permit. Public notice was given for this draft permit by mailing a copy of the notice to the permit applicant, the affected state, tribal and local air pollution control agencies, the city and county executives, the state and federal land managers and the local emergency planning authorities which have jurisdiction over the area where the source is located. A copy of the notice was provided to all persons who have submitted a written request to be included on the mailing list. If you would like to be added to our mailing list to be informed of future actions on these or other Clean Air Act permits issued in Indian country, please send your name and address to the contact listed below:

Claudia Smith, Part 71 Lead  
U.S. Environmental Protection Agency, Region 8  
1595 Wynkoop Street (8P-AR)  
Denver, Colorado 80202-1129

Public notice was published in the Ute Bulletin and Vernal Express on September 15, 2010, giving opportunity for public comment on the draft permit and the opportunity to request a public hearing.

### **b. Opportunity for comment**

Members of the public were given an opportunity to review a copy of the draft permit prepared by EPA, the application, this Statement of Basis for the draft permit, and all supporting materials for the draft permit. Copies of these documents were available at:

Uintah County Clerk's Office  
147 East Main Street, Suite 2300  
Vernal, Utah 84078

and

Ute Indian Tribe  
Environmental Programs Office  
6358 East Highway 40  
Fort Duchesne, Utah 84026

and

US EPA Region 8  
Air Program Office  
1595 Wynkoop Street (8P-AR)  
Denver, Colorado 80202-1129

All documents were available for review at the U.S. EPA Region 8 office Monday through Friday from 8:00 a.m. to 4:00 p.m. (excluding Federal holidays).

Any interested person may have submitted written comments on the draft part 71 operating permit during the public comment period to the Part 71 Permit Contact at the address listed above. All comments were considered and answered by EPA in making the final decision on the permit. EPA keeps a record of the commenters and of the issues raised during the public participation process.

Anyone, including the applicant, who believes any condition of the draft permit is inappropriate should raise all reasonable ascertainable issues and submit all arguments supporting their position by the close of the public comment period. Any supporting materials submitted must be included in full and may not be incorporated by reference, unless the material has already been submitted as part of the administrative record in the same proceeding or consists of state or Federal statutes and regulations, EPA documents of general applicability, or other generally available reference material.

c. Opportunity to request a hearing

A person may submit a written request for a public hearing to the Part 71 Permit Contact, at the address listed above, by stating the nature of the issues to be raised at the public hearing. Based on the number of hearing requests received, EPA will hold a public hearing whenever it finds there is a significant degree of public interest in a draft operating permit. EPA will provide public notice of the public hearing. If a public hearing is held, any person may submit oral or written statements and data concerning the draft permit.

d. Appeal of permits

Within 30 days after the issuance of a final permit decision, any person who filed comments on the draft permit or participated in the public hearing may petition to the Environmental Appeals Board to review any condition of the permit decision. Any person who failed to file comments or participate in the public hearing may petition for administrative review, only if the changes from the draft to the final permit decision or other new grounds were not reasonably foreseeable during the public comment period. The 30-day period to appeal a permit begins with EPA's service of the notice of the final permit decision.

The petition to appeal a permit must include a statement of the reasons supporting the review, a demonstration that any issues were raised during the public comment period, a demonstration that it was impracticable to raise the objections within the public comment period, or that the grounds for such objections arose after such a period. When appropriate, the petition may include a showing that the condition in question is based on a finding of fact or conclusion of law

which is clearly erroneous; or, an exercise of discretion, or an important policy consideration that the Environmental Appeals Board should review.

The Environmental Appeals Board will issue an order either granting or denying the petition for review, within a reasonable time following the filing of the petition. Public notice of the grant of review will establish a briefing schedule for the appeal and state that any interested person may file an amicus brief. Notice of denial of review will be sent only to the permit applicant and to the person requesting the review. To the extent review is denied, the conditions of the final permit decision become final agency action.

A motion to reconsider a final order shall be filed within 10 days after the service of the final order. Every motion must set forth the matters claimed to have been erroneously decided and the nature of the alleged errors. Motions for reconsideration shall be directed to the Administrator rather than the Environmental Appeals Board. A motion for reconsideration shall not stay the effective date of the final order unless it is specifically ordered by the Board.

e. Petition to reopen a permit for cause

Any interested person may petition EPA to reopen a permit for cause, and EPA may commence a permit reopening on its own initiative. EPA will only revise, revoke and reissue, or terminate a permit for the reasons specified in 40 CFR 71.7(f) or 71.6(a)(6)(i). All requests must be in writing and must contain facts or reasons supporting the request. If EPA decides the request is not justified, it will send the requester a brief written response giving a reason for the decision. Denial of these requests is not subject to public notice, comment, or hearings. Denials can be informally appealed to the Environmental Appeals Board by a letter briefly setting forth the relevant facts.

f. Notice to affected states/tribes

As described in 40 CFR 71.11(d)(3)(i), public notice was given by mailing a copy of the notice to the air pollution control agencies of affected states, tribal and local air pollution control agencies that have jurisdiction over the area in which the source is located, the chief executives of the city and county where the source is located, any comprehensive regional land use planning agency and any state or Federal land manager whose lands may be affected by emissions from the source. The following entities were notified:

- State of Colorado, Department of Public Health and Environment
- State of Utah, Department of Environmental Quality
- State of Wyoming, Department of Environmental Quality
- Uintah County, County Clerk
- National Park Service, Air, Denver, CO
- U.S. Department of Agriculture, Forest Service, Rocky Mountain Region
- WildEarth Guardians
- Ute Indian Tribe