

**Air Pollution Control  
Title V Permit to Operate  
Statement of Basis for Permit No. V-FP-00001-2010.00**

**Northern Border Pipeline Company  
Compressor Station #2  
Fort Peck Indian Reservation  
Roosevelt County, MT**

**1. Facility Information**

a. Location

The Northern Border Pipeline Company Compressor Station #2 is located on the Fort Peck Indian Reservation, approximately 23 miles north-northeast of Wolf Point and 50 miles east of Glasgow, in the State of Montana. It is located in the NW1/4 of Section 30, T31N, R48E in Roosevelt County, Montana. The company's mailing address is:

Northern Border Pipeline Company  
13710 FNB Parkway  
Omaha, NE 68154

b. Contacts

**Responsible Official:**

Kenneth J. Leier, Director, Field Operations  
Northern Border Pipeline Company  
201 West North River Drive, Suite 505  
Spokane, WA 99201  
Phone: (509) 533-2831  
Fax: (509) 533-2825

**Tribal Contact:**

Deb Madison, Environmental Director  
Assiniboine & Sioux Tribes  
P.O. Box 1027  
Poplar, MT 59255  
Phone: (406) 768-5155 x399  
Fax: (406) 768-5606

**Facility Contact:**

Ruth Jensen, Environmental Specialist  
Northern Border Pipeline Company  
13710 FNB Parkway  
Omaha, NE 68154  
Phone: (402) 492-7465  
Fax: (402) 492-7485

c. Description of operations

Northern Border Pipeline Company's (Northern Border's) Compressor Station #2 (CS #2) is located on Northern Border's natural gas pipeline in Roosevelt County, Montana, approximately 23 miles north-northeast of Wolf Point and 50 miles east of Glasgow, on the Fort Peck Indian Reservation.

The facility was initially constructed in 1992 to provide additional capacity in the Northern Border pipeline, which runs from Port of Morgan, Montana, to Ventura, Iowa. The pipeline transports natural gas originating in Canada to the Midwest market.

Northern Border's CS #2 is a major source for NO<sub>x</sub> and CO with respect to Part 71 operating permit requirements. The primary sources for emissions are from the facility's 18,561 horsepower natural gas fired Cooper-Rolls turbine (EU-001) and a natural gas fired emergency generator (EU-002).

Pigging of the pipelines occurs approximately every 15 years. The last time was in September 2007 and pigging is not scheduled again until 2022. Typically, three pigging runs are done, one for the cleaning pig, one for the gauge tool and the last for the smart pig. The smart pig is used to detect pipeline defects, such as surface pitting, corrosion, cracks and weld defects. During the pigging event in 2007, less than two gallons of pipeline liquids (sludge) were generated from the three pigging runs. Approximately 54 Mscf of gas is vented from the pig receiver or the pig launcher. The total gas vented for 3 pig runs would be 324 Mscf or 66 pounds of VOC.

d. List of all units and emission-generating activities

In the renewal Part 71 operating permit application for CS #2, Northern Border provided the information shown in the following tables. Table 1 lists emission units and emission generating activities, including any air pollution control devices. Emission units identified as "insignificant" emitting units (IEUs) are listed separately in Table 2.

**Table 1 - Emission Units  
Northern Border Pipeline Company – CS #2**

<b>Emission Unit ID</b>	<b>Description</b>	<b>Control Equipment</b>
EU-001	Cooper- Rolls Coberra 2648S powered Compressor Turbine, 18,561 site-rated bhp, 184 MMBtu/hr maximum design heat input, natural gas fired:  Serial Nos.            38471                      Installed:            10/1992 38447                      Installed:            10/1992 38454                      Installed:            10/1992  Only 1 in operation at any 1 time	Operational Limit
EU-002	Caterpillar 3412 SITA 4-stroke rich burn emergency generator, 496 site-rated bhp, natural gas fired:  Serial No.                7DB00642            Installed:            10/1992	None

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 Northern Border in its Part 71 renewal permit application indicate that the emission units in Table 2, below, are insignificant emission units (IEUs). The application provided emission calculations for the lube oil tanks using TANKS 4.0 and for the hydronic boiler using AP-42 emission factors. This supporting data justifies the source’s claim that these units qualify as IEUs.

**Table 2 - Insignificant Emission Units  
Northern Border Pipeline Company – CS #2**

<b>Emission Unit Description</b>
(1) Hydronic Boiler (1,336 MMBtu/hr)
(2) Seal Gas Vents
(1) Lube Oil Tank (2,538 gallons)
Fugitive Emissions

e. Potential to emit

Under 40 CFR 52.21, PTE is defined as the maximum capacity of a stationary source to emit a pollutant under its physical and operational design. Any physical or operation 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 emission, is federally enforceable.

The PTE for CS #2 was reported by Northern Border in forms “PTE” and “EMISS” of the Part 71 renewal application. The table below shows the emission unit-specific PTE, as well as the total facility-wide PTE.

Emission Unit ID	Regulated Air Pollutants (in tpy) – Potential to Emit							
	NO <sub>x</sub>	VOC	SO <sub>2</sub>	PM <sub>10</sub>	CO	Lead	Total HAPs	CH <sub>2</sub> O
EU-001	244.4	8.76	5.30	11.2	114.0	0	1.02	0.57
EU-002	2.50	0.03	0.001	0.02	4.21	0	0.035	0.02
IEUs	0.58	0.04	0.003	0.04	0.49	0	0.011	0.00
<b>Total</b>	<b>247.48</b>	<b>8.83</b>	<b>5.31</b>	<b>11.26</b>	<b>118.70</b>	<b>0</b>	<b>1.07</b>	<b>0.59</b>

f. Facility History

The following facility history is based on information provided by Northern Border in its initial and renewal Part 71 applications and subsequent application updates received through March 2011.

*Ownership history*

CS #2, since its construction in 1992, has been owned by Northern Border. Northern Border is a general partnership currently owned by TC Pipelines, LB and ONEOK Partners L.P. TransCanada Northern Border, Inc., a subsidiary of TransCanada, currently serves as the operator of the pipeline and CS #2. Prior to April 2007, the pipeline was operated by ONEOK Partners GP, LLC (formerly known as Northern Plains Natural Gas Company, LLC).

*Construction history*

01-10-1991: EPA received notification from Northern Border of their plans to construct  
03-30-1992: Construction commenced  
10-02-1992: Operations commenced with a 496 hp Caterpillar 3412 SITA emergency generator (EU-002), a 1.336 MMBtu Hydronic Boiler and three (3) 18,561 hp Cooper-Rolls Coberra 2648S compressor engine turbines (only one is ever in use at a time) (EU-001)  
04-06-2000: Initial Part 71 permit issued  
03-09-2005: First renewal Part 71 application received  
06-04-2010: Updated first renewal Part 71 application received, entirely replacing 2005 submittal

## **2. Tribe Information**

### **a. Indian country**

Northern Border CS #2 is located within the exterior boundaries of the Fort Peck Indian Reservation.

### **b. The Reservation**

The Fort Peck Indian Reservation covers approximately 2,093,318 acres of rolling prairie land in northeastern Montana. The major portion of the reservation lies within the boundaries of Roosevelt County, with smaller segments in Daniels, Valley, and Sheridan counties. Rivers form natural boundaries on three sides of the reservation, with the Missouri as the southern border, Big Muddy Creek to the east, and Porcupine Creek to the west. The northern boundary runs parallel to and 25 miles south of the Canada-Montana border.

Poplar, MT is the headquarters for the Assiniboiné and Sioux Tribes.

### **c. Tribal government**

The Assiniboiné and Sioux Tribes of the Fort Peck Indian Reservation are federally recognized. See 75 FR 60810 (dated October 1, 2010). A common tribal governing body exercises authority over the reservation pursuant to a Constitution and Bylaws adopted by both the Assiniboiné and Sioux Tribes and approved by the Secretary of the Interior on November 30, 1960. Pursuant to this Constitution and Bylaws, all enrolled members of the two Tribes elect a single Tribal Chairman, Vice Chairman, Sergeant-at-Arms, and Tribal Executive Board, consisting of twelve members, at biennial elections.

### **d. Local air quality and attainment status**

Northeastern Montana, including the Fort Peck Reservation, either attains the national ambient air quality standard for all criteria pollutants or is “unclassified.” An area is unclassifiable when there is insufficient monitoring data. As of January 2011, the Assiniboiné and Sioux Tribes operate an air monitoring station to collect aerosol data for the Interagency Monitoring of Protected Visual Environments (IMPROVE) Program. The IMPROVE station is in central Roosevelt County on the Reservation. In addition, the Assiniboiné and Sioux Tribes operate a station for the National Atmospheric Deposition Program in the same vicinity.

## **3. Facility Requirements**

### **a. Review of Federal Regulations**

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 Northern Border 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 are required by the CAA to obtain an air pollution permit before commencing construction. A major stationary source is any source type belonging to a list of 28 source categories which emits or has the potential to emit 100 tpy or more of any pollutant subject to regulation 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.

CS #2 does not belong to any of the 28 source categories. Therefore, the potential to emit threshold for determining PSD applicability for this source is 250 tpy. In the renewal Part 71 applications, Northern Border indicated that the potential emissions of any pollutant regulated under the CAA [not including pollutants listed under Section 112] were below the major source PSD thresholds; therefore, this facility was not required to obtain a PSD permit for initial construction. In addition, and according to Northern Border, no past modifications to the facility were subject to PSD permitting.

## **Establishment of Synthetic Minor Limits**

### *EPA Authority to Create PTE Restrictions in Part 71 Permits*

In consultation with Office of General Counsel at EPA Headquarters, as well as with EPA Regions 9 and 10, the EPA Region 8 office determined that authority exists under the CAA and 40 CFR 71 to create a restriction on potential to emit through issuance of a Part 71 permit. The specific citations of authority are:

CAA Section 304(f)(4): provides that the term “emission limitation, standard of performance or emission standard” includes any other standard, limitation, or schedule established under any permit issued pursuant to Title V ... , any permit term or condition, and any requirement to obtain a permit as a condition of operations.

40 CFR 71.6(b): provides that all terms and conditions in a Part 71 permit, including any provisions designed to limit a source’s potential to emit, are enforceable by the Administrator and citizens under the Act.

40 CFR 71.7(e)(1)(i)(A)(4)(i): provides that a permit modification that seeks to establish a federally enforceable emissions cap assumed to avoid classification as a modification under any provision of Title I of the CAA (which includes PSD), and for which there is no underlying applicable requirement, does not qualify as a minor permit modification. Under 40 CFR 71.7(e)(3)(i), it is therefore a significant permit modification, which, according to 40 CFR 71.7(e)(3)(ii), must meet all the requirements that would apply to initial permit issuance or permit renewal.

### *Applicable PTE Guidance*

National EPA guidance on PTE states that air pollution control equipment can be credited as restricting PTE only if federally enforceable requirements are in place requiring the use of such air pollution control equipment. The primary applicable guidance for establishing PTE limits is a memo titled, “Guidance on Limiting Potential to Emit in New Source Permitting,” (NSR) dated June 13, 1989, to EPA Regional Offices, from Terrell F. Hunt, Associate Enforcement Counsel, Air Enforcement Division, Office of

Enforcement and Compliance Monitoring (OECA), and from John Seitz, Director, Stationary Source Compliance Division, Office of Air Quality Planning & Standards (OAQPS). The 1989 guidance identifies the following as essential components of a restriction on PTE:

1. An emission limitation, in terms of mass of emissions allowed per unit of time, and
2. A production or operational limitation (which can include requirements for the use of in-place air pollution control equipment).

The 1989 guidance explains that restrictions on PTE must be enforceable as a practical matter. This means there must also be adequate monitoring, reporting, and recordkeeping requirements. The 1989 memo also explains that an emission limitation alone, expressed as a long-term rolling average (e.g., a rolling 12-month total) should not be relied upon as the basis for a PTE limit, with the exception of sources that are VOC surface coating operations, and where no add-on emission control equipment is employed at those sources, and where operating and production parameters are not readily limited due to the wide variety of coatings and products and due to the unpredictable nature of the operation.

A later memo to the EPA Regional Offices, dated January 25, 1995, from Kathie Stein, Director, Air Enforcement Division, OECA, titled “Guidance on Enforceability Requirements for Limiting Potential to Emit through SIP and Section 112 Rules and General Permits,” says the averaging time for the emission limitation must readily allow for determination of compliance: “EPA policy expresses a preference toward short term limits, generally daily but not to exceed one month.”

#### *Components of an Enforceable PTE Restriction*

1. Emission Limit Requirements: Can be a pollutant specific facility-wide emission limit or a unit specific emission limit;
2. Work Practice and Operational Requirements, such as:
  - (i) A requirement to equip specific emission unit controls, and specifying the emission reduction efficiency;
  - (ii) A fuel restriction requirement; and/or
  - (iii) Operating parameter restriction (temperature, pressure, throughput, equipment size, etc...);
3. Testing Requirements;
4. Monitoring Requirements;
5. Record Keeping Requirements;
6. Reporting Requirements.

The use of the Part 71 permit as a means to create these limits, however, is limited to those instances where an operating source is already required to obtain a Part 71 permit by virtue of its PTE or due to other triggers as outlined in §71.3; or where the operating source already holds a Part 71 permit. EPA Region 8 does not have the authority to issue Part 71 permits to minor sources, unless it is a minor operating source that is required to obtain a permit pursuant to §71.3.

The Part 71 program is not a preconstruction permitting program to be used in place of NSR permitting. The Part 71 permit is an operating permit and an application is due within 12 months of starting up a Title V facility.

EPA Region 8 does not knowingly issue synthetic minor limits (i.e., limits on potential to emit to avoid major source status) to sources who wish to avoid applicable requirements that have already been triggered (such as NSR or the Once-In-Always-In MACT standards). EPA Region 8 also will not knowingly issue synthetic minor limits to sources who wish to avoid applicable requirements for which there are non-compliance concerns.

Creation of synthetic minor limits in Part 71 permits is a temporary, gap-filling measure for those sources operating in Indian country that do not have the ability to obtain these synthetic minor limits through other programs, such as exists in state jurisdictions. According to §49.151(c)(1)(ii)(C), if an existing synthetic minor source was established under a permit pursuant to Part 71, the reviewing authority has the discretion to require the facility to submit a permit application for a synthetic minor source permit by **September 4, 2012**, or at the same time that the source applies to renew the Part 71 permit, or to allow the source to continue to maintain synthetic minor status through the Part 71 permit.

EPA Region 8, as the reviewing authority, requires that the facility submit an application for a synthetic minor permit to transfer the Part 71 synthetic minor limits by September 4, 2012.

#### *Development of PTE Restrictions and Associated Requirements in the Renewal Operating Permit*

In response to Northern Border's application request to limit the size of the impeller of emission unit EU-001 to 28.5 inches and the horsepower output (as measured by the torquemeter) to 18,561 horsepower except during surge conditions and other malfunctions, EPA has established enforceable operating limitations for CS #2 that are applicable to turbine EU-001.

#### 1. Operational requirements

- (i) The applicant shall operate only one of the following three turbines at any one time at this site as EU-001:

Cooper-Rolls, Coberra 2648S, Serial Number 38471

Cooper-Rolls, Coberra 2648S, Serial Number 38447

Cooper-Rolls, Coberra 2648S, Serial Number 38454

- (ii) The Cooper-Rolls Coberra 2648S compressor engine unit EU-001, with serial numbers 38471, 38454, or 38447, shall each have an impeller diameter of no more than 28.5 inches and a horsepower output (as measured by the torquemeter) of no more than 18,561 horsepower except during surge conditions or other malfunctions.



- (iii) The horsepower surge conditions and other malfunctions of EU-001 shall be limited to no more than 96 hours per calendar year.

## 2. Testing Requirements

The permittee shall perform the required emissions testing of 40 CFR Part 60, Subpart GG.

## 3. Monitoring and Recordkeeping Requirements

- (i) In addition to the standard monitoring and recordkeeping requirements of Part 71 and Subpart GG, the permittee shall comply with the following monitoring and recordkeeping requirements.
- (ii) The permittee shall maintain records of the daily maximum horsepower by using the Supervisory Control and Data Acquisition (SCADA) system, and corresponding NO<sub>x</sub>, CO and SO<sub>2</sub> emissions.
- (iii) The permittee shall maintain records of the number of hours and the horsepower that EU-001 operates under surge conditions or other malfunctions when the horsepower exceeds 18,561.

## **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. As explained below, Northern Border is subject to NSPS Subpart GG for engine unit EU-001; therefore, the General Provisions of Part 60 apply.

40 CFR Part 60, Subpart Db: Standards of Performance for Small Industrial-Commercial-Institutional Steam Generating Units. This rule applies to steam generating units with a maximum design heat capacity greater than 100 MMBtu/hr that were constructed, reconstructed, or modified after June 9, 1989. According to Northern Border, the hydronic boiler located at the facility has a heat input capacity of 1.336 MMBtu/hr, therefore, Subpart Db would 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 input capacity of 100 MMBtu/hr or less, but greater than or equal to 10 MMBtu/hr. According to Northern Border, the hydronic boiler located at the facility has a heat input capacity of 1.336 MMBtu/hr, therefore, Subpart Dc would not apply.

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 Northern Border, there are no tanks at this site greater than 40,000 gallons or that were constructed before May 19, 1978. Therefore, Subpart K would not apply.

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 Northern Border, there are no tanks at this site greater than 40,000 gallons. Therefore, Subpart Ka would not apply.

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 (~19,800 gallons). According to Northern Border, the facility has no tanks greater than or equal to 75 cubic meters that store volatile organic liquids. Therefore, Subpart Kb would not apply.

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 the information provided by Northern Border, each turbine was constructed after October 3, 1977 and has a maximum design heat input of 184 MMBtu/hr; therefore, unit EU-001 is subject to NSPS Subpart GG.

40 CFR Part 60, Subpart KKK: Standards of Performance for Equipment Leaks of VOC from Onshore Natural Gas Processing Plants. This rule applies to compressors and other equipment at onshore natural gas processing facilities. As defined in this Subpart, a natural gas processing plant is any processing site engaged in the extraction of natural gas liquids from field gas, fractionation of mixed natural gas liquids (NGLs) to natural gas products, or both. Natural gas liquids are defined as the hydrocarbons, such as ethane, propane, butane, and pentane that are extracted from field gas. According to Northern Border, CS #2 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 Subpart would 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 Northern Border, CS #2 does not perform sweetening or sulfur recovery at the facility. Therefore, this Subpart would not apply.

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 requirements 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)).

Northern Border provided the following information:

Unit	Serial Number	Unit Description	Fuel	BHP	Manufacture Date	Commence Construction Date	Subpart JJJJ Trigger Date – Manufactured on or after
EU-002	7DB00642	Caterpillar 3412 SITA Emergency Generator	NG	496	Before 10/1992	Before 06/12/2006	01/01/2009

According to the information provided by Northern Border, EU-002 was manufactured prior to the manufacture trigger date; therefore, the requirements in Subpart JJJJ would not apply to EU-002.

40 CFR Part 60, Subpart KKKK: Standards of Performance for Stationary Gas 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. According to Northern Border, the gas turbine (EU-001) located at the facility has not been constructed, modified or reconstructed after February 18, 2005; therefore, Subpart KKKK 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 to the specific Subparts of Part 63. As explained below CS #2 is subject to 40 CFR Part 63, 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. According to Northern Border, CS #2 is a transmission facility and not a production facility; therefore, Subpart HH does not apply.

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 Northern Border, CS #2 is an area source of HAP emissions; therefore, this Subpart does not apply.

40 CFR Part 63, Subpart YYYY: National Emission Standards for Hazardous Air Pollutants for Stationary Combustion Turbines. This Subpart establishes national emission limitations and operating limitations for HAP emissions from stationary combustion turbines located at major sources of HAP emissions, and requirements to demonstrate initial and continuous compliance with the emission and operating limitations. According to Northern Border, the facility is an area source of HAP emissions; therefore, this Subpart would 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.

*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>	≥ 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>	≤ 500 hp	New	On or After 6/12/2006
CI ICE - All <sup>2</sup>	≥ 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>	≤ 500 hp	New	On or After 6/12/2006
CI ICE - All <sup>2</sup>	≤ 500 hp	Existing	Before 6/12/2006

1. All includes emergency ICE, limited use ICE, ICE that burn land 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 CS #2

Northern Border provided the following information:

Unit	Serial Number	Unit Description	Fuel	BHP	Commenced Construction Reconstruction or Modification Date	Subpart ZZZZ Requirements
EU-002	7DB00642	Caterpillar 3412 SITA Emergency Generator	Natural Gas	496	10/1992	Subject (Existing)

According to the information provided in Northern Border's application, engine unit EU-002 is an existing emergency SI engine (installed before June 12, 2006) with a horsepower  $\leq 500$  located at an area source of HAP emissions; therefore, it is subject to the requirements of MACT ZZZZ and shall comply by October 19, 2013.

40 CFR Part 63, Subpart JJJJJ: National Emission Standards for Hazardous Air Pollutants for Industrial, Commercial, and Institutional Boilers at Area Sources. This rule establishes national emission limitations and operating limitations for HAPs emitted from industrial, commercial, and institutional boilers that are fueled by solid fossil fuel, biomass, or liquid fuel and that are located at, or are part of, an area source of HAPs.

According to Northern Border, CS #2 operates a 1.336 MMBtu/hr natural gas-fired industrial boiler (EU-001); therefore, it meets the definition of 'gas-fired boiler' in the rule and is not subject to Subpart JJJJJ.

## 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% of the amount, in tons per year, required for a source to be classified as a major source.

CS #2 is a major source for NO<sub>x</sub> and CO. Unit EU-001 has pre-controlled emissions that equal or exceed 100% of major NO<sub>x</sub> and CO thresholds, but does not use a control device to achieve compliance; therefore, it is not considered a PSEU. Also, the turbine engine is subject to 40 CFR Part 60, subpart GG and thus meets the exemption criteria of §64.2(b)(1).

Although emergency generator EU-002 is subject to the October 19, 2013 compliance date of 40 CFR Part 63, subpart ZZZZ, the unit does not have pre-controlled emissions that equal or exceed 100% of major source thresholds. Therefore, not only does the unit meet the exemption requirement of §64.2(b)(1), it also is not a PSEU potentially subject to this rule.

### **Chemical Accident Prevention Program**

40 CFR Part 68: Chemical Accident Prevention Provisions. Based on Northern Border’s application, CS #2 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, CS #2 is not subject to the requirement to develop and submit a risk management plan. However, Northern Border 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 in its application, Northern Border does not currently use air conditioning units at CS #2. However, should Northern Border perform any maintenance, service, repair, or disposal of any equipment containing chlorofluorocarbons (CFCs), or contract with someone to do this work, Northern Border 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 Northern Border, there are no halon fire extinguishers at CS #2. However, should Northern Border 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, Northern Border 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 §307(d)(1)(V), 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.

#### **b. Conclusion**

Since CS #2 is located in Indian country, the State of Montana's implementation plan does not apply to this source. In addition, no Tribal Implementation Plan (TIP) has been submitted and approved for the Assiniboine and Sioux Tribes, and EPA has not promulgated a Federal Implementation Plan (FIP) for the area of jurisdiction governing the Fort Peck Indian Reservation. Therefore, CS #2 is not subject to any implementation plan.

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, the EPA published the rule titled "Review of New Sources and Modifications in Indian country" on July 1, 2011. Initiated by and in response to tribal input, the rule addresses a significant regulatory gap by developing NSR rules for Indian country, which establish a preconstruction permitting program for minor stationary sources of air pollution throughout Indian country and major stationary sources located in areas in Indian country not meeting national clean air standards. The purpose of the NSR program is to protect public health and the environment, even as new industrial facilities are built and existing facilities expand. The rule requires new and existing synthetic minor sources currently operating under federal operating permits for sources in Indian country (regulated at 40 CFR Part 71), as well as sources proposing minor modifications at existing major sources, to submit applications to the region starting August 30, 2011. True minor sources that are looking to construct or modify will have to apply by March 1, 2013.

This program 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 by providing notification of EPA's intent to issue the draft permit 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. Notification was provided to all persons who have submitted a written request to be included on the mailing list. Additionally, the general public in the affected community



was notified by an advertisement in the local newspaper. If you would like to be added to our mailing list to be informed of future actions on these or other CAA permits issued in Indian country, please send your name and address to the contact listed below:

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 Herald News as detailed in the cover letter of this permit package, 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:

Roosevelt County Clerk's Office  
400 2<sup>nd</sup> Avenue South  
Wolf Point, Montana 59201

and

Assiniboine & Sioux Indian Tribe Environmental Programs Office  
603 Court Avenue  
Poplar, Montana 59255

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. No comments were received during the public comment period.

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 notifying 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 Montana, Department of Environmental Quality  
State of North Dakota, Department of Health  
Assiniboine & Sioux Tribes Environmental Programs Office  
Roosevelt County, County Clerk  
National Park Service, Air, Denver, CO  
U.S. Department of Agriculture, Forest Service, Rocky Mountain Region  
WildEarth Guardians