



August 16, 2021

Mr. Ted Schooley
New Mexico Environment Department
Air Quality Bureau
525 Camino de los Marquez, Suite 1
Santa Fe, New Mexico, 87505-1816

Re: Title V Significant Modification – Permit Application
Harvest Four Corners, LLC – San Juan Gas Plant
Agency Interest No. 1177

Dear Mr. Schooley:

On behalf of Harvest Four Corners, LLC, Clara Vista Environmental is pleased to submit this application for a Title V Significant Modification to **Permit P124-R3** for the **San Juan Gas Plant**. This request for a Significant Permit Revision is made under section 20.2.70.404.C.(3)(b) of the New Mexico Administrative Code (NMAC). This significant modification will incorporate the revisions authorized in NSR Permits 0613-M13.

The format and content of the application are consistent with the Bureau's current policy regarding Title V Permit applications; it is a complete application package using the latest relevant Universal Application Forms.

If additional information is needed regarding this submittal, please feel free to please contact Ms. Monica Smith of HFC at (505)-632-4625.

Sincerely,

A handwritten signature in blue ink, appearing to read "Carlin Roney".

Carlin Roney, P.E.
Sr. Environmental Engineer
Clara Vista Environmental, LLC

Enclosures One application original hard copy, with electronic files on two CDs
One application hard copy

Mail Application To: New Mexico Environment Department Air Quality Bureau Permits Section 525 Camino de los Marquez, Suite 1 Santa Fe, New Mexico, 87505 Phone: (505) 476-4300 Fax: (505) 476-4375 www.env.nm.gov/aqb		For Department use only: AIRS No.:
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Universal Air Quality Permit Application

Use this application for NOI, NSR, or Title V sources.

Use this application for: the initial application, modifications, technical revisions, and renewals. For technical revisions, complete Sections, 1-A, 1-B, 2-E, 3, 9 and any other sections that are relevant to the requested action; coordination with the Air Quality Bureau permit staff prior to submittal is encouraged to clarify submittal requirements and to determine if more or less than these sections of the application are needed. Use this application for streamline permits as well. **See Section 1-I for submittal in Instructions for other permits.**

This application is submitted as (check all that apply): ☐ Request for a No Permit Required Determination (no fee)
☐ **Updating** an application currently under NMED review. Include this page and all pages that are being updated (no fee required).
 Construction Status: ☐ Not Constructed ☒ Existing Permitted (or NOI) Facility ☐ Existing Non-permitted (or NOI) Facility
 Minor Source: ☐ a NOI 20.2.73 NMAC ☐ 20.2.72 NMAC application or revision ☐ 20.2.72.300 NMAC Streamline application
 Title V Source: ☐ Title V (new) ☐ Title V renewal ☐ TV minor mod. ☒ TV significant mod. TV Acid Rain: ☐ New ☐ Renewal
 PSD Major Source: ☐ PSD major source (new) ☐ minor modification to a PSD source ☐ a PSD major modification

Acknowledgements:

- ☐ I acknowledge that a pre-application meeting is available to me upon request. ☒ Title V Operating, Title IV Acid Rain, and NPR applications have no fees.
- ☐ \$500 NSR application Filing Fee enclosed **OR** ☐ The full permit fee associated with 10 fee points (required w/ streamline applications).
- ☐ Check No.: [redacted] in the amount of [redacted]
- ☐ I acknowledge the required submittal format for the hard copy application is printed double sided 'head-to-toe', 2-hole punched (except the Sect. 2 landscape tables is printed 'head-to-head'), numbered tab separators. Incl. a copy of the check on a separate page.
- ☐ I acknowledge there is an annual fee for permits in addition to the permit review fee: www.env.nm.gov/air-quality/permit-fees-2/.
- ☐ This facility qualifies for the small business fee reduction per 20.2.75.11.C. NMAC. The full \$500.00 filing fee is included with this application and I understand the fee reduction will be calculated in the balance due invoice. The Small Business Certification Form has been previously submitted or is included with this application. (Small Business Environmental Assistance Program Information: www.env.nm.gov/air-quality/small-biz-eap-2/.)

Citation: Please provide the **low level citation** under which this application is being submitted: **20.2.70.404.C(3)(b) NMAC** (e.g. application for a new minor source would be 20.2.72.200.A NMAC, one example for a Technical Permit Revision is 20.2.72.219.B.1.b NMAC, a Title V acid rain application would be: 20.2.70.200.C NMAC)

Section 1 – Facility Information

Section 1-A: Company Information

		AI # if known (see 1 st 3 to 5 #s of permit IDEA ID No.): 1177	Updating Permit/NOI #: P124-R3
1	Facility Name: San Juan Gas Plant		Plant primary SIC Code (4 digits): 1321 Plant NAIC code (6 digits): 211112
a	Facility Street Address (If no facility street address, provide directions from a prominent landmark): 1001 Arizona Drive, Bloomfield, NM 87413		
2	Plant Operator Company Name: Harvest Four Corners, LLC	Phone/Fax: (505) 632-4600 / 505-632-4782	
a	Plant Operator Address: P.O. Box 217, Bloomfield, NM 87413		

b	Plant Operator's New Mexico Corporate ID or Tax ID:	
3	Plant Owner(s) name(s): Hilcorp Energy Company	Phone/Fax: (713) 289-2630
a	Plant Owner(s) Mailing Address(s): 1111 Travis Street, Houston, TX 77002	
4	Bill To (Company): Harvest Four Corners, LLC	Phone/Fax: (505) 632-4600 / 505-632-4782
a	Mailing Address: P.O. Box 217, Bloomfield, NM 87413	E-mail: msmith@harvestmidstream.com
5	<input type="checkbox"/> Preparer: <input checked="" type="checkbox"/> Consultant: Carlin Roney, Clara Vista Environmental	Phone/Fax: 281-460-4283
a	Mailing Address: 3431 Rayford Rd., Suite 200-135, Spring, TX 77386	E-mail: croney@clara-vista.com
6	Plant Operator Contact: Monica Smith, Environmental Specialist	Phone/Fax: (505) 632-4625 / (505)-632-4782
a	Address: 1755 Arroyo Drive, Bloomfield, NM 87413	E-mail: msmith@harvestmidstream.com
7	Air Permit Contact: Monica Smith	Title: Environmental Specialist
a	E-mail: msmith@harvestmidstream.com	Phone/Fax: (505) 632-4625 / (505)-632-4782
b	Mailing Address: 1755 Arroyo Drive, Bloomfield, NM 87413	
c	The designated Air permit Contact will receive all official correspondence (i.e. letters, permits) from the Air Quality Bureau.	

Section 1-B: Current Facility Status

1.a	Has this facility already been constructed? <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	1.b If yes to question 1.a, is it currently operating in New Mexico? <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
2	If yes to question 1.a, was the existing facility subject to a Notice of Intent (NOI) (20.2.73 NMAC) before submittal of this application? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	If yes to question 1.a, was the existing facility subject to a construction permit (20.2.72 NMAC) before submittal of this application? <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
3	Is the facility currently shut down? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	If yes, give month and year of shut down (MM/YY):
4	Was this facility constructed before 8/31/1972 and continuously operated since 1972? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	
5	If Yes to question 3, has this facility been modified (see 20.2.72.7.P NMAC) or the capacity increased since 8/31/1972? <input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A	
6	Does this facility have a Title V operating permit (20.2.70 NMAC)? <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	If yes, the permit No. is: P-124-R3
7	Has this facility been issued a No Permit Required (NPR)? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	If yes, the NPR No. is: N/A
8	Has this facility been issued a Notice of Intent (NOI)? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	If yes, the NOI No. is: N/A
9	Does this facility have a construction permit (20.2.72/20.2.74 NMAC)? <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	If yes, the permit No. is: 0613-M13
10	Is this facility registered under a General permit (GCP-1, GCP-2, etc.)? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	If yes, the register No. is: N/A

Section 1-C: Facility Input Capacity & Production Rate

1	What is the facility's maximum input capacity, specify units (reference here and list capacities in Section 20, if more room is required)			
a	Current	Hourly: 25 mmscf	Daily: 600 mmscf	Annually: 219 bscf
b	Proposed	Hourly: 25 mmscf	Daily: 600 mmscf	Annually: 219 bscf
2	What is the facility's maximum production rate, specify units (reference here and list capacities in Section 20, if more room is required)			
a	Current	Hourly: 25 mmscf	Daily: 600 mmscf	Annually: 219 bscf

b	Proposed	Hourly: 25 mmscf	Daily: 600 mmscf	Annually: 219 bscf
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Section 1-D: Facility Location Information

1	Section: 14	Range: 11W	Township: 29N	County: San Juan	Elevation (ft): 5600
2	UTM Zone: <input type="checkbox"/> 12 or <input checked="" type="checkbox"/> 13			Datum: <input checked="" type="checkbox"/> NAD 27 <input type="checkbox"/> NAD 83 <input type="checkbox"/> WGS 84	
a	UTM E (in meters, to nearest 10 meters): 235,114 m			UTM N (in meters, to nearest 10 meters): 4,069,292 m	
b	AND Latitude (deg., min., sec.): 36°43'57"			Longitude (deg., min., sec.): -107°57'59"	
3	Name and zip code of nearest New Mexico town: Bloomfield 87413				
4	Detailed Driving Instructions from nearest NM town (attach a road map if necessary): From E. Broadway Ave (Hwy 64) and N. 1st Street (Hwy 550) in Bloomfield, travel north for approx. 1.4 miles and turn right (east) on Arizona Dr. Travel east for approx. 0.5 miles. Facility is on right.				
5	The facility is in the city Bloomfield .				
6	Status of land at facility (check one): <input checked="" type="checkbox"/> Private <input type="checkbox"/> Indian/Pueblo <input type="checkbox"/> Federal BLM <input type="checkbox"/> Federal Forest Service <input type="checkbox"/> Other (specify)				
7	List all municipalities, Indian tribes, and counties within a ten (10) mile radius (20.2.72.203.B.2 NMAC) of the property on which the facility is proposed to be constructed or operated: Municipalities - Bloomfield, NM; Aztec, NM; Farmington, NM; Indian tribe - Navajo Nation; County - San Juan County				
8	20.2.72 NMAC applications only: Will the property on which the facility is proposed to be constructed or operated be closer than 50 km (31 miles) to other states, Bernalillo County, or a Class I area (see www.env.nm.gov/aqb/modeling/classIareas.html)? <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No (20.2.72.206.A.7 NMAC) If yes, list all with corresponding distances in kilometers: State of Colorado, 31 km.				
9	Name nearest Class I area: Mesa Verde National Park				
10	Shortest distance (in km) from facility boundary to the boundary of the nearest Class I area (to the nearest 10 meters): 63.70 km				
11	Distance (meters) from the perimeter of the Area of Operations (AO is defined as the plant site inclusive of all disturbed lands, including mining overburden removal areas) to nearest residence, school or occupied structure: 42.6 m				
12	Method(s) used to delineate the Restricted Area: "Restricted Area" is an area to which public entry is effectively precluded. Effective barriers include continuous fencing, continuous walls, or other continuous barriers approved by the Department, such as rugged physical terrain with steep grade that would require special equipment to traverse. If a large property is completely enclosed by fencing, a restricted area within the property may be identified with signage only. Public roads cannot be part of a Restricted Area.				
13	Does the owner/operator intend to operate this source as a portable stationary source as defined in 20.2.72.7.X NMAC? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No A portable stationary source is not a mobile source, such as an automobile, but a source that can be installed permanently at one location or that can be re-installed at various locations, such as a hot mix asphalt plant that is moved to different job sites.				
14	Will this facility operate in conjunction with other air regulated parties on the same property? <input checked="" type="checkbox"/> No <input type="checkbox"/> Yes If yes, what is the name and permit number (if known) of the other facility?				

Section 1-E: Proposed Operating Schedule (The 1-E.1 & 1-E.2 operating schedules may become conditions in the permit.)

1	Facility maximum operating ($\frac{\text{hours}}{\text{day}}$): 24	($\frac{\text{days}}{\text{week}}$): 7	($\frac{\text{weeks}}{\text{year}}$): 52	($\frac{\text{hours}}{\text{year}}$): 8760
2	Facility's maximum daily operating schedule (if less than 24 $\frac{\text{hours}}{\text{day}}$)? Start: N/A		<input type="checkbox"/> AM <input type="checkbox"/> PM	End: N/A <input type="checkbox"/> AM <input type="checkbox"/> PM
3	Month and year of anticipated start of construction: N/A			
4	Month and year of anticipated construction completion: N/A			
5	Month and year of anticipated startup of new or modified facility: N/A			
6	Will this facility operate at this site for more than one year? <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No			

Section 1-F: Other Facility Information

1	Are there any current Notice of Violations (NOV), compliance orders, or any other compliance or enforcement issues related to this facility? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No If yes, specify:		
a	If yes, NOV date or description of issue:	NOV Tracking No:	
b	Is this application in response to any issue listed in 1-F, 1 or 1a above? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No If Yes, provide the 1c & 1d info below:		
c	Document Title:	Date:	Requirement # (or page # and paragraph #):
d	Provide the required text to be inserted in this permit:		
2	Is air quality dispersion modeling or modeling waiver being submitted with this application? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No		
3	Does this facility require an "Air Toxics" permit under 20.2.72.400 NMAC & 20.2.72.502, Tables A and/or B? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No		
4	Will this facility be a source of federal Hazardous Air Pollutants (HAP)? <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No		
a	If Yes, what type of source? <input type="checkbox"/> Major (<input type="checkbox"/> ≥ 10 tpy of any single HAP OR <input type="checkbox"/> ≥ 25 tpy of any combination of HAPS) OR <input checked="" type="checkbox"/> Minor (<input type="checkbox"/> < 10 tpy of any single HAP AND <input checked="" type="checkbox"/> < 25 tpy of any combination of HAPS)		
5	Is any unit exempt under 20.2.72.202.B.3 NMAC? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No		
a	If yes, include the name of company providing commercial electric power to the facility: _____ Commercial power is purchased from a commercial utility company, which specifically does not include power generated on site for the sole purpose of the user.		

Section 1-G: Streamline Application

(This section applies to 20.2.72.300 NMAC Streamline applications only)

1	<input type="checkbox"/> I have filled out Section 18, "Addendum for Streamline Applications." <input checked="" type="checkbox"/> N/A (This is not a Streamline application.)
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Section 1-H: Current Title V Information - Required for all applications from TV Sources

(Title V-source required information for all applications submitted pursuant to 20.2.72 NMAC (Minor Construction Permits), or 20.2.74/20.2.79 NMAC (Major PSD/NNSR applications), and/or 20.2.70 NMAC (Title V))

1	Responsible Official (R.O.) (20.2.70.300.D.2 NMAC): Travis Jones		Phone: 713-289-2630
a	R.O. Title: EHS Manager, Harvest Midstream	R.O. e-mail: trjones@harvestmidstream.com	
b	R. O. Address: 1111 Travis Street, Houston, TX 77002		
2	Alternate Responsible Official (20.2.70.300.D.2 NMAC): TBD		Phone: TBD
a	A. R.O. Title: TBD	A. R.O. e-mail: TBD	
b	A. R. O. Address: TBD		
3	Company's Corporate or Partnership Relationship to any other Air Quality Permittee (List the names of any companies that have operating (20.2.70 NMAC) permits and with whom the applicant for this permit has a corporate or partnership relationship): N/A		
4	Name of Parent Company ("Parent Company" means the primary name of the organization that owns the company to be permitted wholly or in part.): Hilcorp Energy Company		
a	Address of Parent Company: 1111 Travis Street, Houston, TX 77002		
5	Names of Subsidiary Companies ("Subsidiary Companies" means organizations, branches, divisions or subsidiaries, which are owned, wholly or in part, by the company to be permitted.): N/A		
6	Telephone numbers & names of the owners' agents and site contacts familiar with plant operations: N/A		

7	<p>Affected Programs to include Other States, local air pollution control programs (i.e. Bernalillo) and Indian tribes:</p> <p>Will the property on which the facility is proposed to be constructed or operated be closer than 80 km (50 miles) from other states, local pollution control programs, and Indian tribes and pueblos (20.2.70.402.A.2 and 20.2.70.7.B)? If yes, state which ones and provide the distances in kilometers: Colorado 31 km; Southern Ute Indian Tribe, 31 km; Ute Mountain Indian Reservation 32.2 km; Navajo Nation 32.2 km; Jicarilla Apache Reservation 48.3 km</p>
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Section 1-I – Submittal Requirements

Each 20.2.73 NMAC (NOI), a 20.2.70 NMAC (Title V), a 20.2.72 NMAC (NSR minor source), or 20.2.74 NMAC (PSD) application package shall consist of the following:

Hard Copy Submittal Requirements:

- 1) One hard copy **original signed and notarized application package printed double sided 'head-to-toe' 2-hole punched** as we bind the document on top, not on the side; except Section 2 (landscape tables), which should be **head-to-head**. Please use **numbered tab separators** in the hard copy submittal(s) as this facilitates the review process. For NOI submittals only, hard copies of UA1, Tables 2A, 2D & 2F, Section 3 and the signed Certification Page are required. **Please include a copy of the check on a separate page.**
- 2) If the application is for a minor NSR, PSD, NNSR, or Title V application, include one working hard **copy** for Department use. This **copy** should be printed in book form, 3-hole punched, and **must be double sided**. Note that this is in addition to the head-to-toe 2-hole punched copy required in 1) above. Minor NSR Technical Permit revisions (20.2.72.219.B NMAC) only need to fill out Sections 1-A, 1-B, 3, and should fill out those portions of other Section(s) relevant to the technical permit revision. TV Minor Modifications need only fill out Sections 1-A, 1-B, 1-H, 3, and those portions of other Section(s) relevant to the minor modification. NMED may require additional portions of the application to be submitted, as needed.
- 3) The entire NOI or Permit application package, including the full modeling study, should be submitted electronically. Electronic files for applications for NOIs, any type of General Construction Permit (GCP), or technical revisions to NSRs must be submitted with compact disk (CD) or digital versatile disc (DVD). For these permit application submittals, **two CD** copies are required (in sleeves, not crystal cases, please), with additional CD copies as specified below. NOI applications require only a **single CD** submittal. Electronic files for other New Source Review (construction) permits/permit modifications or Title V permits/permit modifications can be submitted on CD/DVD or sent through AQB's secure file transfer service.

Electronic files sent by (check one):

☒ CD/DVD attached to paper application

☐ secure electronic transfer. Air Permit Contact Name _____

Email _____

Phone number _____

a. If the file transfer service is chosen by the applicant, after receipt of the application, the Bureau will email the applicant with instructions for submitting the electronic files through a secure file transfer service. Submission of the electronic files through the file transfer service needs to be completed within 3 business days after the invitation is received, so the applicant should ensure that the files are ready when sending the hard copy of the application. The applicant will not need a password to complete the transfer. **Do not use the file transfer service for NOIs, any type of GCP, or technical revisions to NSR permits.**

- 4) Optionally, the applicant may submit the files with the application on compact disk (CD) or digital versatile disc (DVD) following the instructions above and the instructions in 5 for applications subject to PSD review.
- 5) If **air dispersion modeling** is required by the application type, include the **NMED Modeling Waiver** and/or electronic air dispersion modeling report, input, and output files. The dispersion modeling **summary report only** should be submitted as hard copy(ies) unless otherwise indicated by the Bureau.
- 6) If the applicant submits the electronic files on CD and the application is subject to PSD review under 20.2.74 NMAC (PSD) or NNSR under 20.2.79 NMC include,
 - a. one additional CD copy for US EPA,
 - b. one additional CD copy for each federal land manager affected (NPS, USFS, FWS, USDI) and,
 - c. one additional CD copy for each affected regulatory agency other than the Air Quality Bureau.

If the application is submitted electronically through the secure file transfer service, these extra CDs do not need to be submitted.

Electronic Submittal Requirements [in addition to the required hard copy(ies)]:

- 1) All required electronic documents shall be submitted as 2 separate CDs or submitted through the AQB secure file transfer service. Submit a single PDF document of the entire application as submitted and the individual documents comprising the application.
- 2) The documents should also be submitted in Microsoft Office compatible file format (Word, Excel, etc.) allowing us to access the text and formulas in the documents (copy & paste). Any documents that cannot be submitted in a Microsoft Office compatible

format shall be saved as a PDF file from within the electronic document that created the file. If you are unable to provide Microsoft office compatible electronic files or internally generated PDF files of files (items that were not created electronically: i.e. brochures, maps, graphics, etc.), submit these items in hard copy format. We must be able to review the formulas and inputs that calculated the emissions.

- 3) It is preferred that this application form be submitted as 4 electronic files (**3 MSWord docs**: Universal Application section 1 [UA1], Universal Application section 3-19 [UA3], and Universal Application 4, the modeling report [UA4]) and **1 Excel file** of the tables (Universal Application section 2 [UA2]). Please include as many of the 3-19 Sections as practical in a single MS Word electronic document. Create separate electronic file(s) if a single file becomes too large or if portions must be saved in a file format other than MS Word.
- 4) The **electronic file names** shall be a maximum of 25 characters long (including spaces, if any). The format of the electronic Universal Application shall be in the format: "A-3423-FacilityName". The "A" distinguishes the file as an application submittal, as opposed to other documents the Department itself puts into the database. Thus, all electronic application submittals should begin with "A-". Modifications to existing facilities should use the **core permit number** (i.e. '3423') the Department assigned to the facility as the next 4 digits. Use 'XXXX' for new facility applications. The format of any separate electronic submittals (additional submittals such as non-Word attachments, re-submittals, application updates) and Section document shall be in the format: "A-3423-9-description", where "9" stands for the **section #** (in this case Section 9-Public Notice). Please refrain, as much as possible, from submitting any scanned documents as this file format is extremely large, which uses up too much storage capacity in our database. Please take the time to fill out the **header information** throughout all submittals as this will identify any loose pages, including the Application Date (date submitted) & Revision number (0 for original, 1, 2, etc.; which will help keep track of subsequent partial update(s) to the original submittal. Do not use special symbols (#, @, etc.) in file names. The footer information should not be modified by the applicant.

Table of Contents

Section 1:	General Facility Information
Section 2:	Tables
Section 3:	Application Summary
Section 4:	Process Flow Sheet
Section 5:	Plot Plan Drawn to Scale
Section 6:	All Calculations
Section 7:	Information Used to Determine Emissions
Section 8:	Map(s)
Section 9:	Proof of Public Notice
Section 10:	Written Description of the Routine Operations of the Facility
Section 11:	Source Determination
Section 12:	PSD Applicability Determination for All Sources & Special Requirements for a PSD Application
Section 13:	Discussion Demonstrating Compliance with Each Applicable State & Federal Regulation
Section 14:	Operational Plan to Mitigate Emissions
Section 15:	Alternative Operating Scenarios
Section 16:	Air Dispersion Modeling
Section 17:	Compliance Test History
Section 18:	Addendum for Streamline Applications (streamline applications only)
Section 19:	Requirements for the Title V (20.2.70 NMAC) Program (Title V applications only)
Section 20:	Other Relevant Information
Section 21:	Addendum for Landfill Applications
Section 22:	Certification Page

Table 2-A: Regulated Emission Sources

Unit and stack numbering must correspond throughout the application package. If applying for a NOI under 20.2.73 NMAC, equipment exemptions under 2.72.202 NMAC do not apply.

Unit Number ¹	Source Description	Make	Model #	Serial #	Manufact-urer's Rated Capacity ³ (Specify Units)	Requested Permitted Capacity ³ (Specify Units)	Date of Manufacture ²	Controlled by Unit #	Source Classification Code (SCC)	For Each Piece of Equipment, Check One	RICE Ignition Type (CI, SI, 4SLB, 4SRB, 2SLB) ⁴	Replacing Unit No.
							Date of Construction/Reconstruction ²	Emissions vented to Stack #				
1	Natural Gas Fired Turbine	Rolls Royce	Avon 1535	C-101*	23,800 hp	15,000 hp	1986	1	2E+07	<input checked="" type="checkbox"/> Existing (unchanged) <input type="checkbox"/> To be Removed <input type="checkbox"/> New/Additional <input type="checkbox"/> Replacement Unit <input type="checkbox"/> To Be Modified <input type="checkbox"/> To be Replaced	N/A	N/A
							1986	1				
2	Natural Gas Fired Turbine	Rolls Royce	Avon 1535	C-201*	23,800 hp	15,000 hp	1986	2	2E+07	<input checked="" type="checkbox"/> Existing (unchanged) <input type="checkbox"/> To be Removed <input type="checkbox"/> New/Additional <input type="checkbox"/> Replacement Unit <input type="checkbox"/> To Be Modified <input type="checkbox"/> To be Replaced	N/A	N/A
							1986	2				
3	Natural Gas Fired Turbine	Rolls Royce	Avon 1535	C-301*	23,800 hp	15,000 hp	1986	3	2E+07	<input checked="" type="checkbox"/> Existing (unchanged) <input type="checkbox"/> To be Removed <input type="checkbox"/> New/Additional <input type="checkbox"/> Replacement Unit <input type="checkbox"/> To Be Modified <input type="checkbox"/> To be Replaced	N/A	N/A
							1986	3				
4	Natural Gas Fired Turbine	Solar Centaur	T4501	G-1300A	4,500 hp	3,735 hp	1986	N/A	2E+07	<input checked="" type="checkbox"/> Existing (unchanged) <input type="checkbox"/> To be Removed <input type="checkbox"/> New/Additional <input type="checkbox"/> Replacement Unit <input type="checkbox"/> To Be Modified <input type="checkbox"/> To be Replaced	N/A	N/A
							1986	4				
5	Natural Gas Fired Turbine	Solar Centaur	T4501	G-1300B	4,500 hp	3,735 hp	1986	N/A	2E+07	<input checked="" type="checkbox"/> Existing (unchanged) <input type="checkbox"/> To be Removed <input type="checkbox"/> New/Additional <input type="checkbox"/> Replacement Unit <input type="checkbox"/> To Be Modified <input type="checkbox"/> To be Replaced	N/A	N/A
							1986	5				
6	Natural Gas Fired Turbine	Solar Centaur	T4501	G-1300C	4,500 hp	3,735 hp	1986	N/A	2E+07	<input checked="" type="checkbox"/> Existing (unchanged) <input type="checkbox"/> To be Removed <input type="checkbox"/> New/Additional <input type="checkbox"/> Replacement Unit <input type="checkbox"/> To Be Modified <input type="checkbox"/> To be Replaced	N/A	N/A
							1986	6				
7	Natural Gas Fired Turbine	Solar Centaur	T4501	G-1300D	4,500 hp	3,735 hp	1986	N/A	2E+07	<input checked="" type="checkbox"/> Existing (unchanged) <input type="checkbox"/> To be Removed <input type="checkbox"/> New/Additional <input type="checkbox"/> Replacement Unit <input type="checkbox"/> To Be Modified <input type="checkbox"/> To be Replaced	N/A	N/A
							1986	7				
8	Regeneration Heater	WILLBROS Downstream	N/A	621-014	14.55 MMBtu/hr	14.55 MMBtu/hr	2011	N/A	3.1E+07	<input checked="" type="checkbox"/> Existing (unchanged) <input type="checkbox"/> To be Removed <input type="checkbox"/> New/Additional <input type="checkbox"/> Replacement Unit <input type="checkbox"/> To Be Modified <input type="checkbox"/> To be Replaced	N/A	N/A
							2012	8				
9	Safety System Flare	John Zink	N/A	N/A	600 mmscfd	600 mmscfd	1986	N/A	3.1E+07	<input type="checkbox"/> Existing (unchanged) <input type="checkbox"/> To be Removed <input type="checkbox"/> New/Additional <input type="checkbox"/> Replacement Unit <input checked="" type="checkbox"/> To Be Modified <input type="checkbox"/> To be Replaced	N/A	N/A
							1986	9				
10	Diesel Generator	Caterpillar	G3412	9/12/2154	469 hp	469 hp	1986	N/A	2E+07	<input checked="" type="checkbox"/> Existing (unchanged) <input type="checkbox"/> To be Removed <input type="checkbox"/> New/Additional <input type="checkbox"/> Replacement Unit <input type="checkbox"/> To Be Modified <input type="checkbox"/> To be Replaced	N/A	N/A
							1986	10				
11	Firewater Pump	Caterpillar	G3406	6TB03248	343 hp	343 hp	1986	N/A	2E+07	<input checked="" type="checkbox"/> Existing (unchanged) <input type="checkbox"/> To be Removed <input type="checkbox"/> New/Additional <input type="checkbox"/> Replacement Unit <input type="checkbox"/> To Be Modified <input type="checkbox"/> To be Replaced	N/A	N/A
							1986	11				
12	Regeneration Heater	Broach	N/A	H-901	3.4 MMBtu/hr	3.4 MMBtu/hr	1986	N/A	3.1E+07	<input checked="" type="checkbox"/> Existing (unchanged) <input type="checkbox"/> To be Removed <input type="checkbox"/> New/Additional <input type="checkbox"/> Replacement Unit <input type="checkbox"/> To Be Modified <input type="checkbox"/> To be Replaced	N/A	N/A
							1986	12				
13	Regeneration Heater	WILLBROS Downstream	N/A	621-011	14.55 MMBtu/hr	14.55 MMBtu/hr	2011	N/A	3.1E+07	<input checked="" type="checkbox"/> Existing (unchanged) <input type="checkbox"/> To be Removed <input type="checkbox"/> New/Additional <input type="checkbox"/> Replacement Unit <input type="checkbox"/> To Be Modified <input type="checkbox"/> To be Replaced	N/A	N/A
							2011	13				
14	Fugitive Emissions	N/A	N/A	N/A	N/A	N/A	1986	N/A	3688801	<input checked="" type="checkbox"/> Existing (unchanged) <input type="checkbox"/> To be Removed <input type="checkbox"/> New/Additional <input type="checkbox"/> Replacement Unit <input type="checkbox"/> To Be Modified <input type="checkbox"/> To be Replaced	N/A	N/A
							1986	14				

¹ Unit numbers must correspond to unit numbers in the previous permit unless a complete cross reference table of all units in both permits is provided.² Specify dates required to determine regulatory applicability.³ To properly account for power conversion efficiencies, generator set rated capacity shall be reported as the rated capacity of the engine in horsepower, not the kilowatt capacity of the generator set.⁴ "4SLB" means four stroke lean burn engine, "4SRB" means four stroke rich burn engine, "2SLB" means two stroke lean burn engine, "CI" means compression ignition, and "SI" means spark ignition

Unit Number ¹	Source Description	Make	Model #	Serial #	Manufacturer's Rated Capacity ³ (Specify Units)	Requested Permitted Capacity ³ (Specify Units)	Date of Manufacture ²	Controlled by Unit #	Source Classification Code (SCC)	For Each Piece of Equipment, Check One	RICE Ignition Type (CI, SI, 4SLB, 4SRB, 2SLB) ⁴	Replacing Unit No.
							Date of Construction/Reconstruction ²	Emissions vented to Stack #				
15	Thermal Oxidizer	Callidus	N/A	N/A	12 MMBtu/hr	12 MMBtu/hr	1986	N/A	3.1E+07	<input type="checkbox"/> Existing (unchanged) <input type="checkbox"/> To be Removed <input type="checkbox"/> New/Additional <input type="checkbox"/> Replacement Unit <input checked="" type="checkbox"/> To Be Modified <input type="checkbox"/> To be Replaced	N/A	N/A
							1986	15				
16	Blowdown Flare	John Zink	N/A	N/A	6 mmcsfd	6 mmcsfd	2002	N/A	3.1E+07	<input type="checkbox"/> Existing (unchanged) <input type="checkbox"/> To be Removed <input type="checkbox"/> New/Additional <input type="checkbox"/> Replacement Unit <input checked="" type="checkbox"/> To Be Modified <input type="checkbox"/> To be Replaced	N/A	N/A
							2002	16				
SSM/M1	SSM & Malfunction Emissions	N/A	N/A	N/A	N/A	N/A	N/A	N/A	3.1E+07	<input checked="" type="checkbox"/> Existing (unchanged) <input type="checkbox"/> To be Removed <input type="checkbox"/> New/Additional <input type="checkbox"/> Replacement Unit <input type="checkbox"/> To Be Modified <input type="checkbox"/> To be Replaced	N/A	N/A
							N/A	N/A				
Amine Unit	Amine Unit Still Vent/Flash Tank	N/A	N/A	N/A	N/A	N/A	1986	15	3.1E+07	<input type="checkbox"/> Existing (unchanged) <input type="checkbox"/> To be Removed <input type="checkbox"/> New/Additional <input type="checkbox"/> Replacement Unit <input checked="" type="checkbox"/> To Be Modified <input type="checkbox"/> To be Replaced	N/A	N/A
							1986	15				
CT	Cooling Tower	N/A	N/A	N/A	N/A	N/A	1986	N/A	3.1E+07	<input type="checkbox"/> Existing (unchanged) <input type="checkbox"/> To be Removed <input type="checkbox"/> New/Additional <input type="checkbox"/> Replacement Unit <input type="checkbox"/> To Be Modified <input type="checkbox"/> To be Replaced	N/A	N/A
							1986	CT				

Table 2-B: Insignificant Activities¹ (20.2.70 NMAC) OR Exempted Equipment (20.2.72 NMAC)

All 20.2.70 NMAC (Title V) applications must list all Insignificant Activities in this table. All 20.2.72 NMAC applications must list Exempted Equipment in this table. If equipment listed on this table is exempt under 20.2.72.202.B.5, include emissions calculations and emissions totals for 202.B.5 "similar functions" units, operations, and activities in Section 6, Calculations. Equipment and activities exempted under 20.2.72.202 NMAC may not necessarily be Insignificant under 20.2.70 NMAC (and vice versa). Unit & stack numbering must be consistent throughout the application package. Per Exemptions Policy 02-012.00 (see http://www.env.nm.gov/aqb/permit/aqb_pol.html), 20.2.72.202.B NMAC Exemptions do not apply, but 20.2.72.202.A NMAC exemptions do apply to NOI facilities under 20.2.73 NMAC. List 20.2.72.301.D.4 NMAC Auxiliary Equipment for Streamline applications in Table 2-A. The List of Insignificant Activities (for TV) can be found online at <http://www.env.nm.gov/aqb/forms/InsignificantListTitleV.pdf>. TV sources may elect to enter both TV Insignificant Activities and Part 72 Exemptions on this form.

Unit Number	Source Description	Manufacturer	Model No.	Max Capacity	List Specific 20.2.72.202 NMAC Exemption (e.g. 20.2.72.202.B.5)	Date of Manufacture /Reconstruction ²	For Each Piece of Equipment, Check One
			Serial No.	Capacity Units	Insignificant Activity citation (e.g. IA List Item #1.a)	Date of Installation /Construction ²	
Saddle Tank	Diesel Fuel Tank	N/A	N/A	500	20.2.72.202.B.2	1986	<input checked="" type="checkbox"/> Existing (unchanged) <input type="checkbox"/> To be Removed <input type="checkbox"/> New/Additional <input type="checkbox"/> Replacement Unit <input type="checkbox"/> To Be Modified <input type="checkbox"/> To be Replaced
			N/A	gal	IA List Item #5	1986	
TK 1401	Methanol Tank	N/A	N/A	8400	20.2.72.202.B.5	1986	<input checked="" type="checkbox"/> Existing (unchanged) <input type="checkbox"/> To be Removed <input type="checkbox"/> New/Additional <input type="checkbox"/> Replacement Unit <input type="checkbox"/> To Be Modified <input type="checkbox"/> To be Replaced
			N/A	gal	IA List Item #1a	1986	
TK 1402	Used Oil Tank	N/A	N/A	21,000	20.2.72.202.B.2	1986	<input checked="" type="checkbox"/> Existing (unchanged) <input type="checkbox"/> To be Removed <input type="checkbox"/> New/Additional <input type="checkbox"/> Replacement Unit <input type="checkbox"/> To Be Modified <input type="checkbox"/> To be Replaced
			N/A	gal	IA List Item #5	1986	
	Misc. Small Vessels	N/A	N/A		20.2.72.202.B.5		<input checked="" type="checkbox"/> Existing (unchanged) <input type="checkbox"/> To be Removed <input type="checkbox"/> New/Additional <input type="checkbox"/> Replacement Unit <input type="checkbox"/> To Be Modified <input type="checkbox"/> To be Replaced
			N/A		IA List Item #1a		
							<input type="checkbox"/> Existing (unchanged) <input type="checkbox"/> To be Removed <input type="checkbox"/> New/Additional <input type="checkbox"/> Replacement Unit <input type="checkbox"/> To Be Modified <input type="checkbox"/> To be Replaced
							<input type="checkbox"/> Existing (unchanged) <input type="checkbox"/> To be Removed <input type="checkbox"/> New/Additional <input type="checkbox"/> Replacement Unit <input type="checkbox"/> To Be Modified <input type="checkbox"/> To be Replaced
							<input type="checkbox"/> Existing (unchanged) <input type="checkbox"/> To be Removed <input type="checkbox"/> New/Additional <input type="checkbox"/> Replacement Unit <input type="checkbox"/> To Be Modified <input type="checkbox"/> To be Replaced
							<input type="checkbox"/> Existing (unchanged) <input type="checkbox"/> To be Removed <input type="checkbox"/> New/Additional <input type="checkbox"/> Replacement Unit <input type="checkbox"/> To Be Modified <input type="checkbox"/> To be Replaced
							<input type="checkbox"/> Existing (unchanged) <input type="checkbox"/> To be Removed <input type="checkbox"/> New/Additional <input type="checkbox"/> Replacement Unit <input type="checkbox"/> To Be Modified <input type="checkbox"/> To be Replaced
							<input type="checkbox"/> Existing (unchanged) <input type="checkbox"/> To be Removed <input type="checkbox"/> New/Additional <input type="checkbox"/> Replacement Unit <input type="checkbox"/> To Be Modified <input type="checkbox"/> To be Replaced
							<input type="checkbox"/> Existing (unchanged) <input type="checkbox"/> To be Removed <input type="checkbox"/> New/Additional <input type="checkbox"/> Replacement Unit <input type="checkbox"/> To Be Modified <input type="checkbox"/> To be Replaced
							<input type="checkbox"/> Existing (unchanged) <input type="checkbox"/> To be Removed <input type="checkbox"/> New/Additional <input type="checkbox"/> Replacement Unit <input type="checkbox"/> To Be Modified <input type="checkbox"/> To be Replaced
							<input type="checkbox"/> Existing (unchanged) <input type="checkbox"/> To be Removed <input type="checkbox"/> New/Additional <input type="checkbox"/> Replacement Unit <input type="checkbox"/> To Be Modified <input type="checkbox"/> To be Replaced

¹ Insignificant activities exempted due to size or production rate are defined in 20.2.70.300.D.6, 20.2.70.7.Q NMAC, and the NMED/AQB List of Insignificant Activities, dated September 15, 2008. Emissions from these insignificant activities do not need to be reported, unless specifically requested.

² Specify date(s) required to determine regulatory applicability.

Unit and stack numbering must correspond throughout the application package. Only list control equipment for TAPs if the TAP's maximum uncontrolled emissions rate is over its respective threshold as listed in 20.2.72 NMAC, Subpart V, Tables A and B. In accordance with 20.2.72.203.A(3) and (8) NMAC, 20.2.70.300.D(5)(b) and (e) NMAC, and 20.2.73.200.B(7) NMAC, the permittee shall report all control devices and list each pollutant controlled by the control device regardless if the applicant takes credit for the reduction in emissions.

[illegible]

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Table 2-E: Requested Allowable Emissions

Unit & stack numbering must be consistent throughout the application package. Fill all cells in this table with the emission numbers or a "-" symbol. A "--" symbol indicates that emissions of this pollutant are not expected. Numbers shall be expressed to at least 2 decimal points (e.g. 0.41, 1.41, or 1.41E⁻⁴).

Unit No.	NOx		CO		VOC		SOx		PM ¹		PM10 ¹		PM2.5 ¹		H ₂ S		Lead	
	lb/hr	ton/yr	lb/hr	ton/yr	lb/hr	ton/yr	lb/hr	ton/yr	lb/hr	ton/yr	lb/hr	ton/yr	lb/hr	ton/yr	lb/hr	ton/yr	lb/hr	ton/yr
1	56.30	246.40	9.60	42.00	0.30	1.30	0.06	0.26	0.81	3.56	0.81	3.56	0.81	3.56	--	--	1.14E-04	5.00E-04
2	56.30	246.40	9.60	42.00	0.30	1.30	0.06	0.26	0.81	3.56	0.81	3.56	0.81	3.56	--	--	1.14E-04	5.00E-04
3	56.30	246.40	9.60	42.00	0.30	1.30	0.06	0.26	0.81	3.56	0.81	3.56	0.81	3.56	--	--	1.14E-04	5.00E-04
4	15.90	69.80	2.30	10.00	0.05	0.24	0.01	0.05	0.22	0.95	0.22	0.95	0.22	0.95	--	--	2.28E-05	1.00E-04
5	15.90	69.80	2.30	10.00	0.05	0.24	0.01	0.05	0.22	0.95	0.22	0.95	0.22	0.95	--	--	2.28E-05	1.00E-04
6	15.90	69.80	2.30	10.00	0.05	0.24	0.01	0.05	0.22	0.95	0.22	0.95	0.22	0.95	--	--	2.28E-05	1.00E-04
7	15.90	69.80	2.30	10.00	0.05	0.24	0.01	0.05	0.22	0.95	0.22	0.95	0.22	0.95	--	--	2.28E-05	1.00E-04
8	0.75	3.30	0.35	1.47	0.03	0.14	0.01	0.04	0.11	0.48	0.11	0.48	0.11	0.48	--	--	--	--
9	0.17	0.72	0.44	1.94	0.17	0.73	--	--	--	--	--	--	--	--	--	--	--	--
12	0.34	1.49	0.10	0.30	0.02	0.08	0.01	0.01	0.03	0.11	0.03	0.11	0.03	0.11	--	--	--	--
13	0.75	3.30	0.34	1.47	0.03	0.14	0.01	0.04	0.11	0.48	0.11	0.48	0.11	0.48	--	--	--	--
14	--	--	--	--	8.68	38.01	--	--	--	--	--	--	--	--	--	--	--	--
15	1.62	7.08	1.36	5.95	0.43	1.86	2.71	11.92	0.11	0.47	0.11	0.47	0.11	0.47	0.03	0.13	--	--
16	1.33	5.84	3.57	15.64	1.6	7.02	1.21	5.33	--	--	--	--	--	--	0.01	0.06	--	--
CT	--	--	--	--	--	--	--	--	0.36	1.58	0.15	0.64	0.02	0.10	--	--	--	--
SSM & Malfunction	259.84	10.00	45.50	10.00	--	10.00	--	--	--	--	--	--	--	--	--	--	--	--
Amine Unit	Emissions from the Amine Unit are routed to the thermal oxidizer (unit 15) or flare (unit 16). Controlled emissions are represented under unit 15 and unit 16.																	
Totals	497.30	1050.13	89.66	202.77	12.06	62.84	4.17	18.32	4.03	17.60	3.82	16.66	3.69	16.12	0.04	0.19	4.33E-04	1.90E-03

¹ **Condensable Particulate Matter:** Include condensable particulate matter emissions for PM10 and PM2.5 if the source is a combustion source. Do not include condensable particulate matter for PM unless PM is set equal to PM10 and PM2.5. Particulate matter (PM) is not subject to an ambient air quality standard, but it is a regulated air pollutant under PSD (20.2.74 NMAC) and Title V (20.2.70 NMAC).

Table 2-G: Stack Exit and Fugitive Emission Rates for Special Stacks

☒ I have elected to leave this table blank because this facility does not have any stacks/vents that split emissions from a single source or combine emissions from more than one source listed in table 2-A. Additionally, the emission rates of all stacks match the Requested allowable emission rates stated in Table 2-E.

Use this table to list stack emissions (requested allowable) from split and combined stacks. List Toxic Air Pollutants (TAPs) and Hazardous Air Pollutants (HAPs) in Table 2-I. List all fugitives that are associated with the normal, routine, and non-emergency operation of the facility. Unit and stack numbering must correspond throughout the application package. Refer to Table 2-E for instructions on use of the “-“ symbol and on significant figures.

[illegible]

Table 2-H: Stack Exit Conditions

Unit and stack numbering must correspond throughout the application package. Include the stack exit conditions for each unit that emits from a stack, including blowdown venting parameters and tank emissions. If the facility has multiple operating scenarios, complete a separate Table 2-H for each scenario and, for each, type scenario name here:

Stack Number	Serving Unit Number(s) from Table 2-A	Orientation (H=Horizontal V=Vertical)	Rain Caps (Yes or No)	Height Above Ground (ft)	Temp. (F)	Flow Rate		Moisture by Volume (%)	Velocity (ft/sec)	Inside Diameter (ft)
						(acfs)	(dscfs)			
1	1	V	No	56	750	--	13102		46.7	18.9
2	2	V	No	45	370	--	10218		35.2	10.5
2 Bypass	2	V	No	45	750	--	348		133.9	6.5
3	3	V	No	45	370	--	10218		35.2	10.5
3 Bypass	3	V	No	45	750	--	348		133.9	6.5
4	4	V	No	30.8	827	--	855.3		100.0	3.3
5	5	V	No	30.8	827	--	855.3		100.0	3.3
6	6	V	No	30.8	827	--	855.3		100.0	3.3
7	7	V	No	30.8	827	--	855.3		100.0	3.3
8	8	V	No	78.3	664	--	124.7		48.7	3.1
9	9	V	No	200	1832	--	37.23		65.6	0.9
12	12	V	No	15.3	550	--	25.3		14.3	1.5
13	13	V	No	78.3	664	--	124.7		48.7	3.1
14	14	N/A	N/A	Fugitives	N/A	--	N/A		N/A	N/A
15	15	V	No	40	1200	--	201.5		28.5	3.0
16	16	V	No	60	1832	--	34.6		65.6	0.8

Table 2-I: Stack Exit and Fugitive Emission Rates for HAPs and TAPs

In the table below, report the Potential to Emit for each HAP from each regulated emission unit listed in Table 2-A, only if the entire facility emits the HAP at a rate greater than or equal to one (1) ton per year. For each such emission unit, HAPs shall be reported to the nearest 0.1 tpy. Each facility-wide Individual HAP total and the facility-wide Total HAPs shall be the sum of all HAP sources calculated to the nearest 0.1 ton per year. Per 20.2.72.403.A.1 NMAC, facilities not exempt [see 20.2.72.402.C NMAC] from TAP permitting shall report each TAP that has an uncontrolled emission rate in excess of its pounds per hour screening level specified in 20.2.72.502 NMAC. TAPs shall be reported using one more significant figure than the number of significant figures shown in the pound per hour threshold corresponding to the substance. Use the HAP nomenclature as it appears in Section 112 (b) of the 1990 CAAA and the TAP nomenclature as it listed in 20.2.72.502 NMAC. Include tank-flashing emissions estimates of HAPs in this table. For each HAP or TAP listed, fill all cells in this table with the emission numbers or a "-" symbol. A "--" symbol indicates that emissions of this pollutant are not expected or the pollutant is emitted in a quantity less than the threshold amounts described above.

Stack No.	Unit No.(s)	Total HAPs		Acetaldehyde ☒ HAP or ☐ TAP		Formaldehyde ☒ HAP or ☐ TAP		n-Hexane ☒ HAP or ☐ TAP		Benzene ☒ HAP or ☐ TAP		Toluene ☒ HAP or ☐ TAP		Ethylbenzene ☒ HAP or ☐ TAP		Xylene ☒ HAP or ☐ TAP		Provide Pollutant Name Here HAP or ☐ TAP	
		lb/hr	ton/yr	lb/hr	ton/yr	lb/hr	ton/yr	lb/hr	ton/yr	lb/hr	ton/yr	lb/hr	ton/yr	lb/hr	ton/yr	lb/hr	ton/yr	lb/hr	ton/yr
1	1	0.2	1	0.1	0.4	0.1	0.4	--	--	--	--	--	--	--	--	--	--	--	--
2	2	0.2	1	0.1	0.4	0.1	0.4	--	--	--	--	--	--	--	--	--	--	--	--
3	3	0.2	1	0.1	0.4	0.1	0.4	--	--	--	--	--	--	--	--	--	--	--	--
4	4	0.3	1.5	0.1	0.6	0.1	0.6	--	0.1	--	--	--	--	--	--	--	--	--	--
5	5	0.3	1.5	0.1	0.6	0.1	0.6	--	0.1	--	--	--	--	--	--	--	--	--	--
6	6	0.3	1.5	0.1	0.6	0.1	0.6	--	0.1	--	--	--	--	--	--	--	--	--	--
7	7	0.3	1.5	0.1	0.6	0.1	0.6	--	0.1	--	--	--	--	--	--	--	--	--	--
8	8	--	0.1	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
9	9	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
12	12	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
13	13	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
14	14	0.3	1.2	--	--	--	--	--	0.8	--	--	--	--	--	--	--	--	--	--
15	15	0.11	0.49	--	--	--	--	--	--	0.07	0.32	0.03	0.15	--	--	0.01	0.02	--	--
16	16	0.05	0.21	--	--	--	--	--	--	0.03	0.14	0.01	0.06	--	--	0.01	0.01	--	--
CT	CT	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
SSM/M	SSM/M	--	1.35	--	--	--	--	--	1.21	--	--	--	--	--	--	--	--	--	--
Amine Unit	Amine Unit	Emissions from the Amine Unit are routed to the thermal oxidizer (unit 15) or flare (unit 16). Controlled emissions are represented under unit 15 and unit 16.																	
Totals:		2.26	12.35	0.70	3.60	0.70	3.60	0.00	2.41	0.10	0.46	0.04	0.21	0.00	0.00	0.02	0.03	0.00	0.00

Table 2-J: Fuel

Specify fuel characteristics and usage. Unit and stack numbering must correspond throughout the application package.

Unit No.	Fuel Type (low sulfur Diesel, ultra low sulfur diesel, Natural Gas, Coal, ...)	Fuel Source: purchased commercial, pipeline quality natural gas, residue gas, raw/field natural gas, process gas (e.g. SRU tail gas) or other	Specify Units				
			Lower Heating Value	Hourly Usage	Annual Usage	% Sulfur	% Ash
1	Pipeline Quality Natural Gas	Pipeline Quality Natural Gas	1000	123.2	1079.2	5 gr/100 scf max	Negligible
2	Pipeline Quality Natural Gas	Pipeline Quality Natural Gas	1000	123.2	1079.2	5 gr/100 scf max	Negligible
3	Pipeline Quality Natural Gas	Pipeline Quality Natural Gas	1000	123.2	1079.2	5 gr/100 scf max	Negligible
4	Pipeline Quality Natural Gas	Pipeline Quality Natural Gas	1000	32.9	288.2	5 gr/100 scf max	Negligible
5	Pipeline Quality Natural Gas	Pipeline Quality Natural Gas	1000	32.9	288.2	5 gr/100 scf max	Negligible
6	Pipeline Quality Natural Gas	Pipeline Quality Natural Gas	1000	32.9	288.2	5 gr/100 scf max	Negligible
7	Pipeline Quality Natural Gas	Pipeline Quality Natural Gas	1000	32.9	288.2	5 gr/100 scf max	Negligible
8	Pipeline Quality Natural Gas	Pipeline Quality Natural Gas	1000	16.2	141.9	5 gr/100 scf max	Negligible
9	Pipeline Quality Natural Gas	Pipeline Quality Natural Gas	1000	1.1	10.0	5 gr/100 scf max	Negligible
12	Pipeline Quality Natural Gas	Pipeline Quality Natural Gas	1000	3.4	29.8	5 gr/100 scf max	Negligible
13	Pipeline Quality Natural Gas	Pipeline Quality Natural Gas	1000	16.2	141.9	5 gr/100 scf max	Negligible
15	Pipeline Quality Natural Gas	Pipeline Quality Natural Gas	1000	12.0	105.1	5 gr/100 scf max	Negligible
16	Pipeline Quality Natural Gas	Pipeline Quality Natural Gas	1000	1.1	288.2	5 gr/100 scf max	Negligible

Table 2-K: Liquid Data for Tanks Listed in Table 2-L

For each tank, list the liquid(s) to be stored in each tank. If it is expected that a tank may store a variety of hydrocarbon liquids, enter "mixed hydrocarbons" in the Composition column for that tank and enter the corresponding data of the most volatile liquid to be stored in the tank. If tank is to be used for storage of different materials, list all the materials in the "All Calculations" attachment, run the newest version of TANKS on each, and use the material with the highest emission rate to determine maximum uncontrolled and requested allowable emissions rate. The permit will specify the most volatile category of liquids that may be stored in each tank. Include appropriate tank-flashing modeling input data. Use additional sheets if necessary. Unit and stack numbering must correspond throughout the application package.

[illegible]

Include appropriate tank-flashing modeling input data. Use an addendum to this table for unlisted data categories. Unit and stack numbering must correspond throughout the application package. Use additional sheets if necessary. See reference Table 2-L2. Note: 1.00 bbl = 10.159 M3 = 42.0 gal

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Table 2-L2: Liquid Storage Tank Data Codes Reference Table

Roof Type	Seal Type, Welded Tank Seal Type		Seal Type, Riveted Tank Seal Type		Roof, Shell Color	Paint Condition
FX: Fixed Roof	Mechanical Shoe Seal	Liquid-mounted resilient seal	Vapor-mounted resilient seal	Seal Type	WH: White	Good
IF: Internal Floating Roof	A: Primary only	A: Primary only	A: Primary only	A: Mechanical shoe, primary only	AS: Aluminum (specular)	Poor
EF: External Floating Roof	B: Shoe-mounted secondary	B: Weather shield	B: Weather shield	B: Shoe-mounted secondary	AD: Aluminum (diffuse)	
P: Pressure	C: Rim-mounted secondary	C: Rim-mounted secondary	C: Rim-mounted secondary	C: Rim-mounted secondary	LG: Light Gray	
Note: 1.00 bbl = 0.159 M ³ = 42.0 gal					MG: Medium Gray	
					BL: Black	
					OT: Other (specify)	

Note: $1.00 \text{ bbl} = 0.159 \text{ M}^3 = 42.0 \text{ gal}$

Table 2-M: Materials Processed and Produced (Use additional sheets as necessary.)

[illegible]

Enter Continuous Emissions Measurement (CEM) Data in this table. If CEM data will be used as part of a federally enforceable permit condition, or used to satisfy the requirements of a state or federal regulation, include a copy of the CEM's manufacturer specification sheet in the Information Used to Determine Emissions attachment. Unit and stack numbering must correspond throughout the application package. Use additional sheets if necessary.

[illegible]

Unit and stack numbering must correspond throughout the application package. Use additional sheets if necessary.

[illegible]

Table 2-P: Greenhouse Gas Emissions

Applications submitted under 20.2.70, 20.2.72, & 20.2.74 NMAC are required to complete this Table. Power plants, Title V major sources, and PSD major sources must report and calculate all GHG emissions for each unit. Applicants must report potential emission rates in short tons per year (see Section 6.a for assistance). Include GHG emissions during Startup, Shutdown, and Scheduled Maintenance in this table. For minor source facilities that are not power plants, are not Title V, or are not PSD, there are three options for reporting GHGs 1) report GHGs for each individual piece of equipment; 2) report all GHGs from a group of unit types, for example report all combustion source GHGs as a single unit and all venting GHG as a second separate unit; OR 3) check the following box ☐ By checking this box, the applicant acknowledges the total CO₂e emissions are less than 75,000 tons per year.

		CO ₂ ton/yr	N ₂ O ton/yr	CH ₄ ton/yr	SF ₆ ton/yr	PFC/HFC ton/yr ²									Total GHG Mass Basis ton/yr ⁴	Total CO ₂ e ton/yr ⁵
Unit No.	GWPs ¹	1	298	25	22,800	footnote 3										
1	mass GHG	62,990.45	0.12	1.19											62,991.76	
	CO ₂ e	62,990.45	35.46	29.75												63,055.66
2	mass GHG	62,990.45	0.12	1.19											62,991.76	
	CO ₂ e	62,990.45	35.46	29.75												63,055.66
3	mass GHG	62,990.45	0.12	1.19											62,991.76	
	CO ₂ e	62,990.45	35.46	29.75												63,055.66
4	mass GHG	16,821.31	0.03	0.32											16,821.66	
	CO ₂ e	16,821.31	9.45	7.93												16,838.69
5	mass GHG	16,821.31	0.03	0.32											16,821.66	
	CO ₂ e	16,821.31	9.45	7.93												16,838.69
6	mass GHG	16,821.31	0.03	0.32											16,821.66	
	CO ₂ e	16,821.31	9.45	7.93												16,838.69
7	mass GHG	16,821.31	0.03	0.32											16,821.66	
	CO ₂ e	16,821.31	9.45	7.93												16,838.69
8	mass GHG	7,439.21	0.01	0.14											7,439.36	
	CO ₂ e	7,439.21	4.17	3.50												7,446.88
9	mass GHG	692.43	0.00115	3.59											696.02	
	CO ₂ e	692.43	0.34	89.75												782.52
12	mass GHG	1,738.37	3.28E-03	0.03											1,738.40	
	CO ₂ e	1,738.37	0.98	0.82												1,740.17
13	mass GHG	7,439.21	0.01	0.14											7,439.36	
	CO ₂ e	7,439.21	4.17	3.50												7,446.88
14	mass GHG	8.87	--	166.37											175.24	
	CO ₂ e	8.87	--	4,159.25												4,168.12
15	mass GHG	6,135.43	0.01	0.12											6,135.56	
	CO ₂ e	6,135.43	3.46	2.90												6,141.79
16	mass GHG	5,686.55	8.17E-03	29.46											5,716.02	
	CO ₂ e	5,686.55	2.43	736.5												6,425.48
SSM/M	mass GHG	2.33	--	43.77											46.10	
	CO ₂ e	2.33	--	1,094.25												1,096.58
Total	mass GHG	285,398.99	0.52	248.47											285,647.98	
	CO ₂ e	285,398.99	159.73	6,211.44												291,770.16

¹ GWP (Global Warming Potential): Applicants must use the most current GWPs codified in Table A-1 of 40 CFR part 98. GWPs are subject to change, therefore, applicants need to check 40 CFR 98 to confirm GWP values.

² For HFCs or PFCs describe the specific HFC or PFC compound and use a separate column for each individual compound.

³ For each new compound, enter the appropriate GWP for each HFC or PFC compound from Table A-1 in 40 CFR 98.

⁴ Green house gas emissions on a mass basis is the ton per year green house gas emission before adjustment with its GWP.

⁵ CO₂e means Carbon Dioxide Equivalent and is calculated by multiplying the TPY mass emissions of the green house gas by its GWP.

Section 3

Application Summary

The **Application Summary** shall include a brief description of the facility and its process, the type of permit application, the applicable regulation (i.e. 20.2.72.200.A.X, or 20.2.73 NMAC) under which the application is being submitted, and any air quality permit numbers associated with this site. If this facility is to be collocated with another facility, provide details of the other facility including permit number(s). In case of a revision or modification to a facility, provide the lowest level regulatory citation (i.e. 20.2.72.219.B.1.d NMAC) under which the revision or modification is being requested. Also describe the proposed changes from the original permit, how the proposed modification will affect the facility's operations and emissions, de-bottlenecking impacts, and changes to the facility's major/minor status (both PSD & Title V).

The **Process Summary** shall include a brief description of the facility and its processes.

Startup, Shutdown, and Maintenance (SSM) routine or predictable emissions: Provide an overview of how SSM emissions are accounted for in this application. Refer to "Guidance for Submittal of Startup, Shutdown, Maintenance Emissions in Permit Applications (http://www.env.nm.gov/aqb/permit/app_form.html) for more detailed instructions on SSM emissions.

The San Juan Gas Plant is owned by Hilcorp Energy Company (Hilcorp) and operated by Harvest Four Corners, LLC (Harvest) and is located in San Juan County, New Mexico. The facility is currently authorized to operate under NSR Permit No. 0613-M13 and Title V Operating Permit No. P124-R3. San Juan Gas plant processes natural gas from two field natural gas streams (high and low pressure) which are delivered to the plant where hydrocarbon liquids are extracted via a cryogenic process. The resulting residue gas and hydrocarbon liquids are delivered, primarily via pipelines, to customers.

Harvest is submitting this application pursuant to 20.2.70.404.C.3.b NMAC to modify the Title V Permit P124-R3 by incorporating the revisions authorized in NSR Permits 0613-M13. Below is a discussion of the updates made in this NSR revision application.

NSR Permit 0613-M13 Revisions

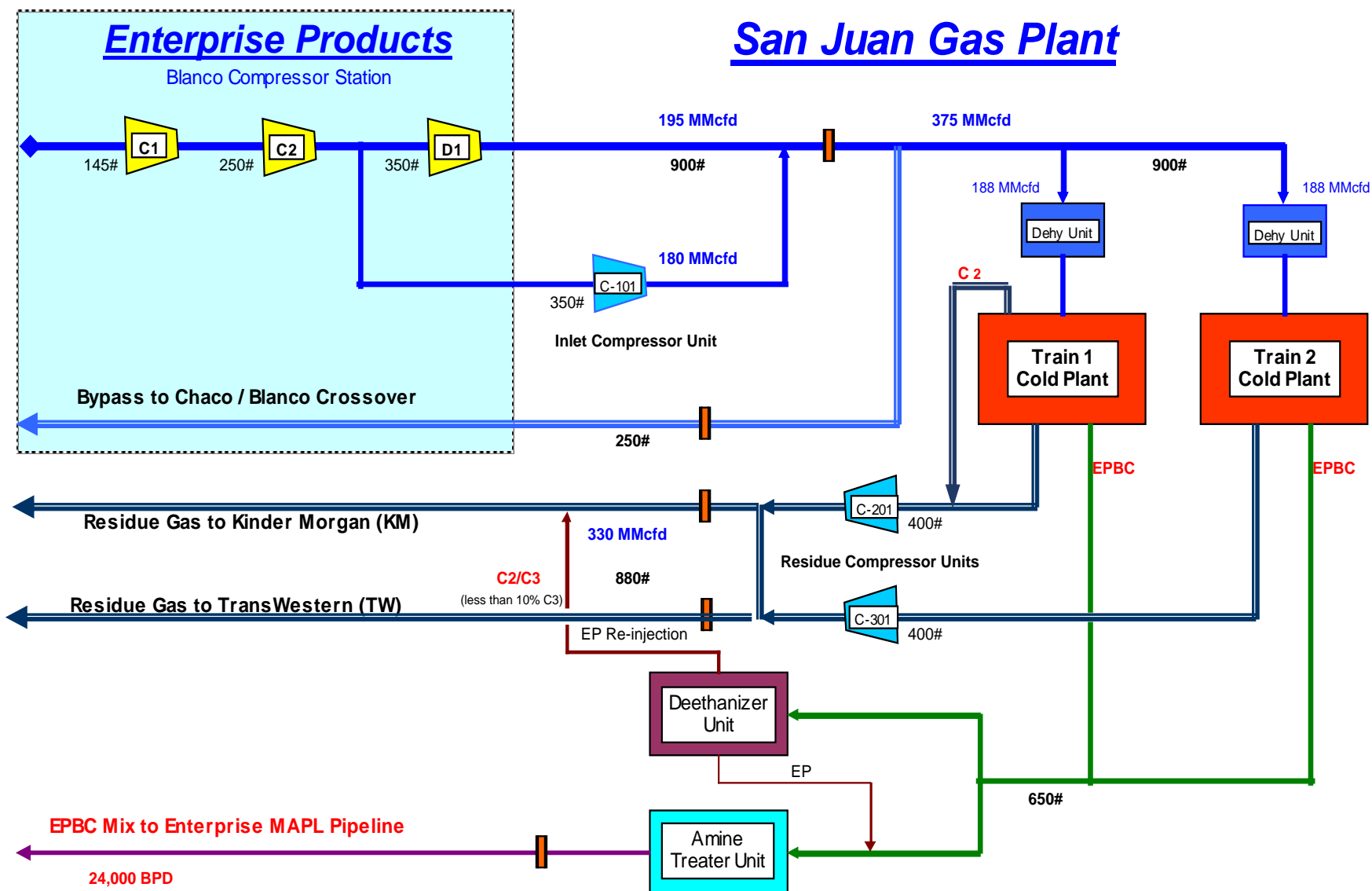
- Change the control of emissions from the amine unit so it can now vent to either the thermal oxidizer (Unit 15) or the flare system (Units 9 and 16). The amine unit was previously represented in NSR Permit 0613-M10-R2 as controlled by the thermal oxidizer and a backup chemical absorption bed.
- Authorize particulate emissions from the existing 3 cell cooling tower (Unit CT) that had previously been omitted from authorization in previous applications.
- Update for erroneous emission factors from the thermal oxidizer (Unit 15) that were submitted over 20 years ago by the previous owner, ConocoPhillips. The factors were updated to AP-42 factors as the original basis from the previous owner was not able to be located.
- Update NOx and CO hourly Startup, Shutdown and Maintenance (SSM) emissions that were erroneously included in the permit.
- Change the reporting requirements for A222 (Fugitives) from "The permittee shall comply with all applicable reporting requirements in NSPS Subpart KKK, 40 CFR 60.636 and 60.487, for the cryogenic NGL extraction unit and other affected equipment." to "The permittee shall report in accordance with Section B110." Harvest Four Corners, LLC requests to submit NSPS KKK semi-annual LDAR reports during the Title V semi-annual report and not as a separate report.

Section 4

Process Flow Sheet

A **process flow sheet** and/or block diagram indicating the individual equipment, all emission points and types of control applied to those points. The unit numbering system should be consistent throughout this application.

A process flow sheet is attached. There are no changes to the process flow sheets from previously submitted applications. Therefore, the same process flow sheet is attached.



Gas & Liquid Flow Diagram

Section 5

Plot Plan Drawn To Scale


A **plot plan drawn to scale** showing emissions points, roads, structures, tanks, and fences of property owned, leased, or under direct control of the applicant. This plot plan must clearly designate the restricted area as defined in UA1, Section 1-D.12. The unit numbering system should be consistent throughout this application.

A plot plan is attached. There are no changes to the plot plan from previously submitted applications. Therefore, the same plot plan is attached.



ITEM	EQUIPMENT DESCRIPTION	EQUIPMENT #	ITEM	EQUIPMENT DESCRIPTION	EQUIPMENT #
1	HOT OIL HEATERS (2)	WH-1101 A, B	46	EP PRODUCT TRIM COOLER	E-902
2	RESIDUE COMPRESSORS (2)	C-201/301	47	EP COMPRESSOR SUCTION SCRUBBER	V-904
3	INLET COMPRESSOR	C-101	48	EP PRODUCT COMPRESSORS (2)	C-901 A, B
4	LUBRICATING OIL SKIDS (6)		49	PBC COOLER	AC-901
5	RESIDUE COMPRESSOR SUCTION SCRUBBERS (2)	V-201/301	50	EP COMPRESSOR AFTERCOOLER	AC-902
6	LOW PRESSURE INLET GAS SEPARATOR	V-102	51	COOLING WATER CIRCULATING PUMPS (3)	P-1201 A,B,C
7	HOT OIL TRIM COOLER (00S)	AC-1101	52	WATER TREATING OX 1201 SODIUM HYPERCHLORIDE	P-1208 A, B
8	RESIDUE COMPRESSOR AFTERCOOLERS (3)	AC-100-201-301	53	ACID STORAGE TANK	V-1201
9	INLET COMPRESSOR AFTERCOOLER	AC-101	54	WATER TREATMENT CHEMICAL TANKS (2)	M-1201
10	HIGH PRESSURE INLET COOLER	E-101	55	DEMINERALIZED WATER PUMP	P-1407
11	HIGH PRESSURE INLET GAS SEPARATOR	V-101	56	DEMINERALIZED WATER STORAGE TANK (3)	TK-802
12	INLET COMPRESSOR TRIM COOLER	E-102	57	POWER GENERATORS (4)	G-1300 A,B,C,D
13	INLET COMPRESSORS DISCHARGE SCRUBBER	V-103	58	BACK UP GENERATOR	G-1301
14	RECYCLE COOLERS (2)	E-201/301	59	HSW-700 STORAGE TANK	TK-804A
15	HIGH PRESSURE FUEL GAS SCRUBBER	V-1404	60	WASTE LUBE OIL PUMP	P-1414
16	LOW PRESSURE FUEL GAS SCRUBBER	V-1405	61	INSTRUMENT AIR RECEIVER	V-1408
17	HOT OIL EXPANSION VESSEL	V-1101	62	UTILITY AIR RECEIVER	V-1407
18	HOT OIL PUMPS (3)	P-1101 ABC	63	INSTRUMENT AIR DRIER	M-1409
19	REGEN GAS HEATERS (2)	H-401/501	64	INSTRUMENT/UTILITY AIR COMPRESSOR (3)	M-1401 A,B,C
20A	INLET GAS DEHYD.-COOLERS	AC-401 (TRAIN #2 OF 2)	65	FLARE KNOCKOUT DRUM PUMP	P-1406
20B	INLET GAS DEHYD.-DEHYDRATORS (3)	V-401 (TRAIN #2 OF 2)	66	FLARE KNOCKOUT DRUM	V-1406
20C	INLET GAS DEHYD.-DUST FILTER	F-402 (TRAIN #2 OF 2)	67	EPBC PRODUCT SURGE TANKS (3)	V-902 A,B,C
20D	INLET GAS DEHYD.-FILTER SEPARATOR	F-401A (TRAIN #2 OF 2)	68	PROPANE STORAGE TANK	V-1007
20E	INLET GAS DEHYD.-REGEN COMPR. & OIL COOLER	C-401 (TRAIN #2 OF 2)	69	PBC PRODUCT SURGE TANKS (4)	V-903 A,B,C,D
20F	INLET GAS DEHYD.-REGEN SCRUBBER	V-402 (TRAIN #2 OF 2)	70	WASTEWATER STORAGE TANK	TK-1403
20G	INLET GAS COALESCER	F-401B (TRAIN #2 OF 2)	71	SLOP OIL STORAGE TANK	TK-1402
21	SULFA CHECK SYSTEM	TK-804	72	EPBC PRODUCT PIPELINE PUMPS (4) [DECOMMISSIONED]	
22	EPBC PRODUCT DEHYD. SKID	F-903/V-906 A,B/V-607	73	EPBC PRODUCT BOOSTER PUMPS (3)	P-902 A,B,C
23	EPBC PRODUCT DEHYD REGEN HEATER	H-901	74	EPBC PRODUCT PIPELINE PUMPS (3)	P-903 A,B,C
24			75		
25			76		
26	WASTEWATER & AMINE STORAGE TANK	TK-802	77	CLOSED DRAIN PUMP	P-906
27	AMINE STORAGE TANK	TK-801	78	GENERATOR LUBE OIL TANK	TK-1300
28	AMINE COOLER	AC-801	79	HSW-700 PUMP	P-808
29	AMINE MAKEUP PUMP	P-803	80	SKIM PIT SLOP OIL PUMP	P-1404
30	AMINE SUMP PUMPS (2)	P-805 A,B	81	COOLING TOWER	CT-1201
31	AMINE DRAIN TANK PUMP	P-804	82	PRODUCT METERING AREA & MAPCO MTR. AREA	
32	AMINE STILL REFLUX FANS	AC-802	83	TRUCK LOADING CONNECTIONS (PVL)	
33			84	TRUCK LOADING CONNECTIONS (FLAMMABLE LIQ.)	
34A	AMINE TREATING- CONTACTOR	T-801	85	GAS ANALYZER BUILDING (5)	
34B	AMINE TREATING- AMINE COALESCER	V-803	86	TURBINE MAKE-UP LUBE OIL TANK	TK-101
34C	AMINE TREATING- FLASH VESSEL	V-802	87	COLD DRAIN VESSEL	V-1403
34D	AMINE TREATING- COOL AMINE EXCHANGER	E-801	88	PROCESS WATER TANK	TK-1203
34E	AMINE TREATING- CIRCULATION PUMPS (3)	P-801 A,B,C	89		
34F	AMINE TREATING- SURGE VESSEL	V-804	90A	INLET GAS DEHYD.- COOLERS	AC-501 (TRAIN #1 OF 2)
34G	AMINE TREATING- SORCKO FILTER	F-802	90B	INLET GAS DEHYD.- DEHYDRATORS (3)	V-501 A,B,C (TRAIN #1 OF 2)
34H	AMINE TREATING- SHOCK FILTER	F-801	90C	INLET GAS DEHYD.- DUST FILTER	F-502 (TRAIN #1 OF 2)
34I	AMINE TREATING- HOT AMINE EXCHANGER	E-802	90D	INLET GAS DEHYD.- FILTER SEPARATOR	F-501A (TRAIN #1 OF 2)
34J	AMINE TREATING- STILL PLUS REBOILER	T-802 & E-803	90E	INLET GAS DEHYD.- REGEN COMPR. & OIL COOLER	C-501 (TRAIN #1 OF 2)
34K	AMINE TREATING- STILL REFLUX PUMPS (2)	P-802 A, B	90F	INLET GAS DEHYD.- REGEN SCRUBBER	V-502 (TRAIN #1 OF 2)
35A	REFRIGERANT COMPR.- LOW STAGE SUCT. SCRUB	V-1004	90G	INLET GAS COALESCER	F-501B (TRAIN #1 OF 2)
35B	REFRIGERANT COMPR.- ECONOMIZER	V-1004	91A	CRYO. TRAIN-GAS/GAS & COLD GAS/GAS EXCH.	E-701, E-702 (TRAIN #2 OF 2)
35C	REFRIGERANT COMPR.- COMPRESSORS (3)	C-1001 A,B,C	91B	CRYO. TRAIN-EXPANDER/COMPRESSOR	X-701 (TRAIN #2 OF 2)
36	REFRIGERANT CONDENSER	E-1001	91C	CRYO. TRAIN- DEMETHANIZER + COLD VENT	TK-701 (TRAIN #2 OF 2)
37	REFRIGERANT ACCUMULATOR	V-1001	91D	CRYO. TRAIN- DEMETH. UPPER SIDE REBOILER	E-705 (TRAIN #2 OF 2)
38	REFRIGERANT SUBCOOLER	E-1002	91E	CRYO. TRAIN- COLD SEPARATOR	V-701 (TRAIN #2 OF 2)
39A	CRYO. TRAIN 1- GAS/GAS & COLD/GAS EXCH.	E-601, E-602 (TRAIN 1 OF 2)	91F	CRYO. TRAIN- DEMETH. BOTTOMS PUMPS (3)	P-701 A,B,C (TRAIN #2 OF 2)
39B	CRYO. TRAIN 1- EXPANDER/COMPRESSOR	X-601 (TRAIN 1 OF 2)	91G	CRYO. TRAIN- DEMETH. & TRIM REBOILERS	E-703, E-706 (TRAIN #2 OF 2)
39C	CRYO. TRAIN 1- DEMETHANIZER + COLD VENT	T-601 (TRAIN 1 OF 2)	91H	CRYO. TRAIN- LOWER SIDE REBOILER	E-707 (TRAIN #2 OF 2)
39D	CRYO. TRAIN 1- DEMETH. UPPER SIDE REBOILER	E-605 (TRAIN 1 OF 2)	91I	CRYO. TRAIN- LOW STAGE REFRIG. RECLAIMER	V-1009 (TRAIN #2 OF 2)
39E	CRYO. TRAIN 1- COLD SEPARATOR	V-601 (TRAIN 1 OF 2)	91J	CRYO. TRAIN-GAS CHILLER	E-704 (TRAIN #2 OF 2)
39F	CRYO TRAIN 1- DEMETH. BOTTOMS PUMPS (3)	P-601 A,B,C (TRAIN 1 OF 2)	92	BACK UP GENERATOR DIESEL TANK	TK-1301
39G	CRYO TRAIN 1- DEMETH. & TRIM REBOILERS	E-603, E-606 (TRAIN 1 OF 2)	93	WATER TANK (UNISED)	TK-1202
39H	CRYO TRAIN 1- LOWER SIDE REBOILER	E-607 (TRAIN 1 OF 2)	94	FIRE WATER PUMP DIESEL TANK	TK-01
39I	CRYO TRAIN 1.- GAS CHILLER	V-1008 (TRAIN 1 OF 2)	95	THERMAL OXIDIZER	TK-860
39J	CRYO TRAIN 1.- GAS CHILLER	V-1008 (TRAIN 1 OF 2)	96	WASTE LUBE OIL TANK	TK-1402A
40	METHANOL INJECTION PUMP	P-1401	97	AMINE STILL REFLUX ACCUMULATOR	V-805
41	METHANOL STORAGE TANK	TK-1401	98	VAPOR RECOVERY COMPRESSOR	C-1411/C-1412
42	CLOSED DRAIN PUMP	P-1403	99	SKIMMER PIT- PROCESS WASTE PUMPS	P-1405 A,B
43	CLOSED DRAIN VESSEL	V-1402	100	36 INCH FLARE	M-1404
44A	DEETHANIZER- REBOILER	E-904	101	8 INCH FLARE	M-1412
44B	DEETHANIZER	T-901	102	EVAP COOLERS	M-101/M-201/M-301
44C	DEETHANIZER- SIDE REBOILER	E-905	103	DIESEL TANK	EQUIPMENT FUEL
44D	DEETHANIZER- REFLUX CONDENSER	E-901	104	FIRE WATER TANK	TK-100
44E	DEETHANIZER- REFLUX PUMPS (3)	P-901 A,B,C	105	FIRE WATER PUMP	P-100
44F	DEETHANIZER- REFLUX ACCUMULATOR	V-901	106	INLET GAS FILTER	F-101
44G	DEETHANIZER- HIGH STAGE REFRIG. RECLAIMER	V-1006	107	WASTE WATER PIPELINE PUMP	P-H2O
45	EP PRODUCT CHILLER	E-903	108	SPECIAL WASTE PIPELINE CONTAINMENT PAD	(NO EQUIPMENT NUMBER)
45A	EP METER SKID		109	WASTE LUBE TANK	TK-1414
45B	EP REINJECTION PUMP	P-970	110		

[illegible]



HARVEST

PIPELINE

San Juan Gas Plant

LAR

DESIGN:

LAR


CHECKED:

TAK

APPROVAL:

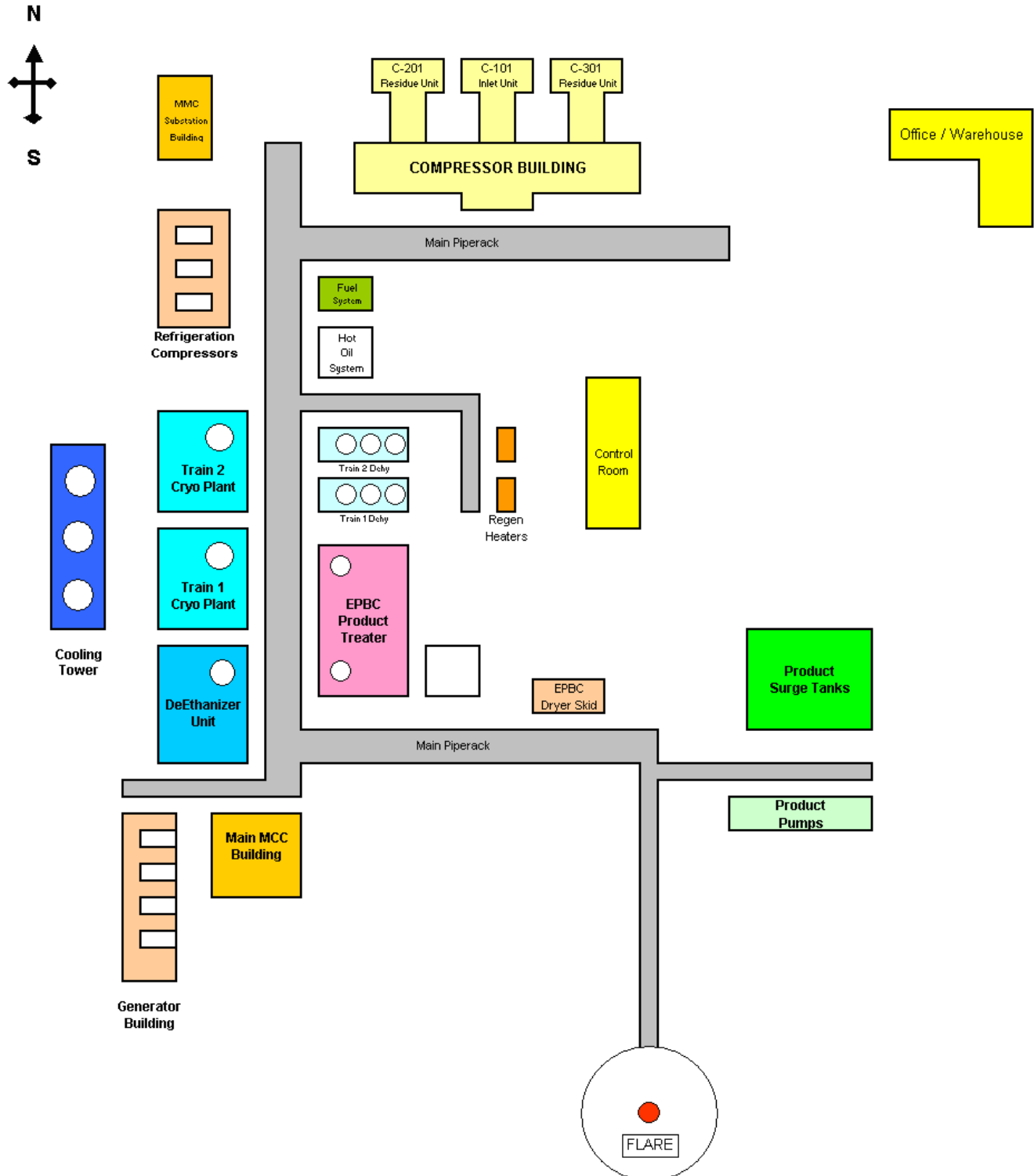
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	Issue Date: January 13, 2015	Revision No.: 3	Procedure Number:
	Document Owner:	Review Frequency: 5 Years	Page Number: B-2
Document Title:	Spill Prevention, Control, and Countermeasure Plan San Juan Gas Plant		

San Juan Gas Plant

Major Equipment Layout



Section 6

All Calculations

Show all calculations used to determine both the hourly and annual controlled and uncontrolled emission rates. All calculations shall be performed keeping a minimum of three significant figures. Document the source of each emission factor used (if an emission rate is carried forward and not revised, then a statement to that effect is required). If identical units are being permitted and will be subject to the same operating conditions, submit calculations for only one unit and a note specifying what other units to which the calculations apply. All formulas and calculations used to calculate emissions must be submitted. The "Calculations" tab in the UA2 has been provided to allow calculations to be linked to the emissions tables. Add additional "Calc" tabs as needed. If the UA2 or other spread sheets are used, all calculation spread sheet(s) shall be submitted electronically in Microsoft Excel compatible format so that formulas and input values can be checked. Format all spread sheets and calculations such that the reviewer can follow the logic and verify the input values. Define all variables. If calculation spread sheets are not used, provide the original formulas with defined variables. Additionally, provide subsequent formulas showing the input values for each variable in the formula. All calculations, including those calculations are imbedded in the Calc tab of the UA2 portion of the application, the printed Calc tab(s), should be submitted under this section.

Tank Flashing Calculations: The information provided to the AQB shall include a discussion of the method used to estimate tank-flashing emissions, relative thresholds (i.e., NOI, permit, or major source (NSPS, PSD or Title V)), accuracy of the model, the input and output from simulation models and software, all calculations, documentation of any assumptions used, descriptions of sampling methods and conditions, copies of any lab sample analysis. If Hysis is used, all relevant input parameters shall be reported, including separator pressure, gas throughput, and all other relevant parameters necessary for flashing calculation.

SSM Calculations: It is the applicant's responsibility to provide an estimate of SSM emissions or to provide justification for not doing so. In this Section, provide emissions calculations for Startup, Shutdown, and Routine Maintenance (SSM) emissions listed in the Section 2 SSM and/or Section 22 GHG Tables and the rational for why the others are reported as zero (or left blank in the SSM/GHG Tables). Refer to "Guidance for Submittal of Startup, Shutdown, Maintenance Emissions in Permit Applications (http://www.env.nm.gov/aqb/permit/app_form.html) for more detailed instructions on calculating SSM emissions. If SSM emissions are greater than those reported in the Section 2, Requested Allowables Table, modeling may be required to ensure compliance with the standards whether the application is NSR or Title V. Refer to the Modeling Section of this application for more guidance on modeling requirements.

Glycol Dehydrator Calculations: The information provided to the AQB shall include the manufacturer's maximum design recirculation rate for the glycol pump. If GRI-Glycalc is used, the full input summary report shall be included as well as a copy of the gas analysis that was used.

Road Calculations: Calculate fugitive particulate emissions and enter haul road fugitives in Tables 2-A, 2-D and 2-E for:

1. If you transport raw material, process material and/or product into or out of or within the facility and have PER emissions greater than 0.5 tpy.
2. If you transport raw material, process material and/or product into or out of the facility more frequently than one round trip per day.

Significant Figures:

- A. All emissions standards are deemed to have at least two significant figures, but not more than three significant figures.
- B. At least 5 significant figures shall be retained in all intermediate calculations.
- C. In calculating emissions to determine compliance with an emission standard, the following rounding off procedures shall be used:
 - (1) If the first digit to be discarded is less than the number 5, the last digit retained shall not be changed;
 - (2) If the first digit discarded is greater than the number 5, or if it is the number 5 followed by at least one digit other than the number zero, the last figure retained shall be increased by one unit; **and**
 - (3) If the first digit discarded is exactly the number 5, followed only by zeros, the last digit retained shall be rounded upward if it is an odd number, but no adjustment shall be made if it is an even number.
 - (4) The final result of the calculation shall be expressed in the units of the standard.

Control Devices: In accordance with 20.2.72.203.A(3) and (8) NMAC, 20.2.70.300.D(5)(b) and (e) NMAC, and 20.2.73.200.B(7) NMAC, the permittee shall report all control devices and list each pollutant controlled by the control device

regardless if the applicant takes credit for the reduction in emissions. The applicant can indicate in this section of the application if they chose to not take credit for the reduction in emission rates. For notices of intent submitted under 20.2.73 NMAC, only uncontrolled emission rates can be considered to determine applicability unless the state or federal Acts require the control. This information is necessary to determine if federally enforceable conditions are necessary for the control device, and/or if the control device produces its own regulated pollutants or increases emission rates of other pollutants.

Amine Vent (Unit: Amine Unit)

All emissions from this unit are calculated using ProMax.

Emissions from the Amine Unit are controlled by the Thermal Oxidizer in ethane recovery mode and by the Flare in ethane rejection mode. Controlled emissions are represented under Unit 15 (Thermal Oxidizer) and Unit 16 (Flare).

Thermal Oxidizer (Unit: 15)

When the facility is in ethane recovery mode, the amine unit vents to the thermal oxidizer (Unit: 15). NO_x, CO, VOC, PM, and SO₂ emissions are calculated using AP-42 factors for external natural gas combustion sources in Tables 1.4-1 and 1.4-2. As a conservative measure, it is assumed that TSP = PM₁₀ = PM_{2.5}. HAPs, VOC, and H₂S emissions are calculated using streams from ProMax. The ProMax gas analysis for the facility is attached in Section 7. Greenhouse gas emissions are estimated using 40 CFR Part 98 and emission factors from Tables C-1 and C-2 of Part 98.

Flare (Unit: 9 and 16)

Flare Pilot, Purge and Process Gas Streams

Emissions from the plant safety system flare (Unit 9) and from the blowdown flare (Unit 16) are calculated based on estimated design throughput rates. Pilot, purge and process gas emission rates for NO_x are based on emission factor taken from Texas Commission on Environmental Quality (TCEQ) January 2010 document "Technical Supplement 4: Flares" for air assisted or unassisted units combusting high-Btu waste streams (>1000 Btu/scf). CO & VOC emission factors are taken from AP-42, Table 13.5-1, 09-91.

There are no excess SSM emissions associated with operation of the flares. The flares do not require warm-up periods. Equipment is not turned on unless the flares are in operation and the flares are not shut down while equipment is in operation. No maintenance is conducted on the flare while they are in operation.

Flare Waste Gas

When the facility is in ethane rejection mode, the amine unit vents to the flare (Unit: 16). NO_x and CO emissions are calculated using AP-42 Table 13.5-1 emission factors. HAPs, VOC, and H₂S emissions are calculated using streams from ProMax. The ProMax gas analysis for the facility is attached in Section 7. The SO₂ composition is based on a 99% molar conversion of H₂S to SO₂. Emissions of greenhouse gases are calculated using methodology from 40 CFR Subpart 98.233(n).

Cooling Tower (Unit: CT)

The cooling tower water flow rate and drift loss data are provided by the manufacturer. The calculations were performed using a total dissolved solids (TDS) concentration of 1,995 ppm. Particle size distribution (PM, PM₁₀, PM_{2.5}) of the drift mass is based on information from the "Frisbie" paper equation.

Due to the nature of the source, it is estimated there are no startup or shutdown emissions associated with the cooling towers. No maintenance is conducted while the cooling towers are in operation.

NOTE: All the remaining calculations described below are unchanged from the previous application. Also, for simplicity of review, the Amine Unit, 9, 15, and CT emissions calculations worksheet in Section 6 and the supporting documentation in Section 7 have been moved to the front of these respective sections.

Turbines (Units: 1-7)

Emissions from the turbines are carried forward from the last construction permit application. No modifications are being made to the turbines or their operation.

The NOX, CO, VOC and SO2 emissions from the turbines are based on manufacturer's data as identified in the previous NSR application. Particulate emissions are calculated using the AP-42 emission factor from Table 3.1-2a. HAP emissions are calculated using GRI-HAPCalc 3.0. Emissions are calculated assuming each turbine operates at full site capacity for 8,760 hours per year.

The turbines at the plant start up with no load and a rich fuel mixture. As a result, emissions are minimized. Because the turbines take only minutes to reach operating temperature, emissions during startup are not expected to exceed the steady-state allowable limits. Similarly, emissions during shutdown do not exceed the steady-state allowable limits, because fuel and air flow cease within seconds of shutdown. Emissions due to scheduled maintenance are negligible as the turbines are not in operation during maintenance.

Regeneration Heaters (Units: 8, 12, and 13)

Emissions from the regeneration heaters are carried forward from the last construction permit application. No modifications are being made to the regeneration heaters or their operation.

The NOX, CO, VOC and SO2 emissions from the large regeneration heaters (Units 8 and 13) are based on manufacturer's data as identified in the previous NSR application and include a safety factor. Emissions of these same pollutants from the small heater (Unit 12), as well as particulate emissions from all three heaters, are calculated using AP-42 emission factors from Tables 1.4-1 and 1.4-2. HAP emissions are calculated using GRI-HAPCalc 3.0. Emissions are calculated assuming each turbine operates at full site capacity for 8,760 hours per year.

The heaters (uncontrolled) startup with less fuel input than during steady-state operation, so emissions are lower than during steady-state operation. During shutdown, the fuel supply stops quickly, but air flow may not, causing the continued formation of NOX. Even so, with no fuel, NOX formation should be less than during steady-state operation. Emissions due to scheduled maintenance are negligible as the units are not in operation.

Harvest Four Corners, LLC - San Juan Gas Plant
Amine Unit Emissions Calculations

Unit Number: Amine Unit

Description: Amine Unit Still Vent / Flash Tank

Ethane Recovery Mode (High Flow)

Emissions	VOC		Total HAP		Benzene		Toluene		Ethylbenzene		Hexane		Xylene		H ₂ S		CO ₂	CH ₄
	pph	tpy	pph	tpy	pph	tpy	pph	tpy	pph	tpy	pph	tpy	pph	tpy	pph	tpy	tpy	tpy
Uncontrolled	16.04	70.27	5.10	22.33	3.30	14.46	1.56	6.84	0.02	0.08	0.02	0.10	0.19	0.84	1.32	5.80	70,070.70	4.78

Ethane Rejection Mode (Low Flow)

Emissions	VOC		Total HAP		Benzene		Toluene		Ethylbenzene		Hexane		Xylene		H ₂ S		CO ₂	CH ₄
	pph	tpy	pph	tpy	pph	tpy	pph	tpy	pph	tpy	pph	tpy	pph	tpy	pph	tpy	tpy	tpy
Uncontrolled	14.83	64.94	2.42	10.58	1.59	6.98	0.73	3.21	0.01	0.02	0.02	0.10	0.06	0.27	0.65	2.86	727.18	0.02

Notes:

1. All emissions calculated using ProMax
2. Emissions from the Amine Unit are controlled by the Thermal Oxidizer (Unit 15) in ethane recovery mode and by the Flare (Unit 9) in ethane rejection mode.

Harvest Four Corners, LLC - San Juan Gas Plant
Thermal Oxidizer Emissions Calculations

Unit Number: 15
Description: Thermal oxidizer

Fuel Consumption

12.0 MMBtu/hr	Capacity	2011 NSR application (manufacturer's data plus 10% safety factor)
1,000 Btu/scf	Field gas heating value	Nominal heat content
12,000 scf/hr	Hourly fuel consumption	MMBtu/hr x 1,000,000 / Btu/scf
3,125 scfm	Maximum waste gas fuel flow capacity	2011 NSR application (design maximum)
0.5 Mole %	Methane/Ethane waste gas concentration	ProMax
938 scf/hr	Hourly waste gas consumption	scfm x (mole % / 100) x 60 min/hr
8,760 hr/yr	Annual operating time	Harvest Four Corners

Fuel Gas Emission Rates

Pollutants ^{2,3}	Emission Factors ^{1,4}	Controlled Emission Rates	
	lb/MMscf	pph ⁵	tpy ⁶
NO _x	100	1.50	6.57
CO	84	1.26	5.52
VOC	5.5	0.07	0.32
SO ₂	0.6	0.01	0.03
PM	7.6	0.10	0.44
PM ₁₀	7.6	0.10	0.44
PM _{2.5}	7.6	0.10	0.44

Notes:

¹ NO_x, CO, VOC, SO₂ and PM emission factors taken from AP-42, Tables 1.4-1, 1.4-2.² A safety factor of 25% is added to the NO_x & CO emission rates.³ A safety factor of 10% is added to the VOC, PM, and SO₂ emission rates.⁴ The sulfur content of the natural gas is 5 S gr/100 dscf.⁵ Hourly Emission Rates (pph) = lb/MMscf x (scf/hr / 1,000,000) x 1.25.⁶ Annual Emission Rates (tpy) = Hourly Emission Rates (pph) x hr/yr x (1 ton / 2,000 lb).**Amine Unit Waste Gas Stream (Ethane Recovery Mode)**

Pollutants ^{1,3}	Emission Factors ¹	Uncontrolled Emission Rates from Amine Unit ²		Control Efficiencies ⁶	Controlled Emission Rates	
	lb/MMscf	pph	tpy	%	pph ^{7,9,11}	tpy ^{8,10,12}
NO _x	100				0.12	0.51
CO	84				0.10	0.43
PM	7.6				0.01	0.03
PM ₁₀	7.6				0.01	0.03
PM _{2.5}	7.6				0.01	0.03
SO ₂ ^{4,5}					2.71	11.89
H ₂ S ⁴		1.32	5.80	98	0.03	0.13
VOC ⁴		16.04	70.27	98	0.35	1.55
Benzene ⁴		3.30	14.46	98	0.07	0.32
Toluene ⁴		1.56	6.84	98	0.03	0.15
Ethylbenzene ⁴		0.02	0.08	98	4.40E-04	1.76E-03
Hexane ⁴		0.02	0.10	98	4.40E-04	2.20E-03
Xylene ⁴		0.19	0.84	98	4.18E-03	0.02
Total HAPs ⁴		5.10	22.33	98	0.11	0.49

Notes:

¹ NO_x, CO and PM emission factors taken from AP-42, Tables 1.4-1, 1.4-2.² VOC, HAPs, and H₂S uncontrolled emissions from the amine unit (in Ethane Recovery Mode) calculated using ProMax.³ A safety factor of 25% is added to the NO_x & CO emission rates.⁴ A safety factor of 10% is added to the VOC, PM, SO₂, and H₂S emission rates.⁵ It is assumed 99% of the H₂S is converted to SO₂.⁶ The thermal oxidizer has a 98% control efficiency.⁷ Hourly NO_x & CO Emission Rates (pph) = lb/MMscf x (scf/hr / 1,000,000) x 1.25.⁸ Annual NO_x & CO Emission Rates (tpy) = Hourly Emission Rates (pph) x hr/yr x (1 ton / 2,000 lb).⁹ Controlled VOC & H₂S Emission Rate (pph) = Uncontrolled Emission Rate (pph) x (1 - (% / 100)).¹⁰ Controlled VOC & H₂S Emission Rate (tpy) = Uncontrolled Emission Rate (tpy) x (1 - (% / 100)).¹¹ Controlled SO₂ Emission Rate (pph) = Uncontrolled H₂S Emission Rate (pph) x (% / 100) x (32 lb S / 34 lb H₂S) x (64 lb SO₂ / 32 lb S).¹² Controlled SO₂ Emission Rate (tpy) = Controlled SO₂ Emission Rate (pph) x hr/yr x (1 ton / 2,000 lb).

Harvest Four Corners, LLC - San Juan Gas Plant
Thermal Oxidizer Emissions Calculations

Combined Emission Rates

Pollutants	Controlled Emission Rates	
	pph	tpy
NO _x	1.62	7.08
CO	1.36	5.95
PM	0.11	0.47
PM ₁₀	0.11	0.47
PM _{2.5}	0.11	0.47
SO ₂	2.71	11.92
H ₂ S	0.03	0.13
VOC	0.43	1.86
Benzene	0.07	0.32
Toluene	0.03	0.15
Ethylbenzene	4.40E-04	1.76E-03
Hexane	4.40E-04	2.20E-03
Xylene	4.18E-03	0.02
Total HAPs	0.11	0.49

Exhaust Parameters

1,200 °F	Exhaust temperature	2011 NSR application
28.50 fps	Stack exit velocity	2011 NSR application
3.0 ft	Stack exit diameter	2011 NSR application
12,087 acfm	Stack flowrate	$\text{fps} \times 3.1416 \times ((\text{ft} / 2) ^2) \times 60 \text{ sec/min}$
40.0 ft	Stack height	2011 NSR application

Harvest Four Corners, LLC - San Juan Gas Plant
Plant Flare Emissions Calculations

Emission Unit: 16
Description: Low Pressure Flare

Pilot Gas Stream

100 scf/hr	Pilot gas hour flowrate	Harvest Four Corners
1,050 Btu/scf	Heat content	Nominal heat content

Process Gas Stream

7970 scf/hr	Purge gas hour flowrate	Harvest Four Corners
1,050 Btu/scf	Heat content	Nominal heat content

Relief Valve Gas Stream

100 #	Valve count	Harvest Four Corners
0.0088 kg/hr/source	EPA emission factor (gas service)	1995 Protocol for Equipment Leak Emission Estimates, Table 2-4
1.94 pph	Uncontrolled mass hourly emission rate	kg/hr/source x 2.2 lb/kg x valve count
8.60 cf/lb	Volume	Nominal (propane)
16.65 cf/hr	Purge gas hourly flow rate	pph x cf/lb
2,517 Btu/scf	Heat content	Nominal heat content

Seal Leakage Gas Stream

950 scf/hr	Purge gas hour flowrate	Harvest Four Corners
1,050 Btu/scf	Heat content	Nominal heat content
23.6 cf/lb	Volume	Nominal (methane)
10 %	VOC content of gas stream	Harvest Four Corners
4.03 pph	Uncontrolled mass hourly emission rate	scf/hr x (% 100) / cf/lb

Combined Gas Stream (Pilot & Process)

8,070 scf/hr	Hourly flowrate	Sum of individual streams
1,050 Btu/scf	Heat content	Flow weighted average
8.47 MMBtu/hr	Hourly heat rate	scf/hr x Btu/scf x (1 MMBtu / 1,000,000 Btu)
8,760 hr/yr	Annual operating time	Harvest Four Corners
70.69 MMscf/yr	Annual flowrate	scf/hr x hr/yr x (1 MMscf / 1,000,000 scf)
74,228 MMBtu/yr	Annual heat rate	MMBtu/hr x hr/yr

Combined Gas Stream (pilot, process, relief valves & seal leaks)

9,037 scf/hr	Hourly flowrate	Sum of individual streams
1,053 Btu/scf	Heat content	Flow weighted average
9.51 MMBtu/hr	Hourly heat rate	scf/hr x Btu/scf x (1 MMBtu / 1,000,000 Btu)
8,760 hr/yr	Annual operating time	Harvest Four Corners
79.16 MMscf/yr	Annual flowrate	scf/hr x hr/yr x (1 MMscf / 1,000,000 scf)
83,333 MMBtu/yr	Annual heat rate	MMBtu/hr x hr/yr

Steady-State Emission Rates

Pollutants	Emission Factors ^{2,3}	Uncontrolled Emission Rates ¹	
	lb/MMBtu	pph ⁴	tpy ⁵
NO _x	0.138	1.31	5.75
CO	0.370	3.52	15.42

Notes:

¹ NO_x and CO emissions are calculated using data from the combined gas stream (pilot, process, relief valves & seal leaks).

² NO_x emission factor taken from Texas Commission on Environmental Quality (TCEQ) February 2012 document "Technical Supplement 4: Flares" for air assisted or unassisted units combusting high-Btu waste streams (>1000 Btu/scf).

³ CO emission factors taken from AP-42, Table 13.5-1, 09-91

⁴ Uncontrolled Emission Rates (pph) = lb/MMBtu x MMBtu/hr

⁵ Uncontrolled Emission Rates (tpy) = lb/MMBtu x MMBtu/yr x (1 ton/2,000 lb)

Harvest Four Corners, LLC - San Juan Gas Plant
Plant Flare Emissions Calculations

Steady-State Emission Rates (Continued)

Pollutants	Emission Factors ²	Uncontrolled Emission Rates ^{1,5}		Control Efficiencies ⁷	Controlled Emission Rates ^{1,5}	
	lb/MMBtu	pph	tpy ⁶	%	pph ^{3,8}	tpy ^{4,9}
VOC (pilot & process)	0.140	--	--	--	1.19	5.20
VOC (relief valves)	--	1.94	8.48	98	0.04	0.17
VOC (seal leaks)	--	4.03	17.63	98	0.08	0.35
Total		5.96	26.11		1.31	5.72

Notes:

¹ VOC (pilot & process) emission rates are calculated using the heat rates from only the pilot and process gas streams.² VOC (pilot & process) emission factor taken from AP-42, Table 13.5-1, 09-91.³ Controlled VOC (pilot & process) Emission Rates (pph) = lb/MMBtu x MMBtu/hr⁴ Controlled VOC (pilot & process) Emission Rates (tpy) = lb/MMBtu x MMBtu/yr x (1 ton/2,000 lb)⁵ VOC (relief valves & seal leaks) emission rates are calculated using the pph emission rates (calculated above) from the relief valve and seal leaks gas streams, respectively.⁶ Uncontrolled VOC (relief valves & seal leaks) Emission Rates (tpy) = pph x hr/yr x (1 ton/2,000 lb)⁷ Control efficiencies taken from Texas Commission on Environmental Quality (TCEQ) February 2012 document "Technical Supplement 4: Flares."⁸ Controlled VOC (relief valves & seal leaks) Emission Rates (pph) = Uncontrolled Emission Rates (pph) x (1-(% / 100))⁹ Controlled VOC (relief valves & seal leaks) Emission Rates (tpy) = Uncontrolled Emission Rates (tpy) x (1-(% / 100))**Amine Unit Waste Gas Stream (Ethane Rejection Mode)**

35 scfm	Maximum waste gas fuel flow capacity	ProMax
15.5 Mole %	Methane/Ethane waste gas concentration	ProMax
326 scf/hr	Waste gas flowrate	scfm x (mole % / 100) x 60 min/hr
433 Btu/scf	Waste gas heat content	ProMax
0.14 MMBtu/hr	Hourly heat rate	scf/hr x Btu/scf x (1 MMBtu / 1,000,000 Btu)
8,760 hr/yr	Annual operating time	Harvest Four Corners
2.85 MMscf/yr	Annual flowrate	scf/hr x hr/yr x (1 MMscf / 1,000,000 scf)
1,235 MMBtu/yr	Annual heat rate	MMBtu/hr x hr/yr

Waste Gas Stream Emission Rates

Pollutants	Emission Factors ¹	Uncontrolled Emission Rates from Amine Unit ²		Control Efficiencies ⁴	Controlled Emission Rates	
	lb/MMBtu	pph	tpy	%	pph ^{5,7,9}	tpy ^{6,8,10}
NO _x	0.138	0.02	0.09		0.02	0.09
CO	0.370	0.05	0.23		0.05	0.23
SO ₂ ³					1.21	5.33
H ₂ S		0.65	2.86	98	0.01	0.06
VOC		14.83	64.94	98	0.30	1.30
Benzene		1.59	6.98	98	0.03	0.14
Toluene		0.73	3.21	98	0.01	0.06
Ethylbenzene		0.01	0.02	98	2.00E-04	4.00E-04
Hexane		0.02	0.10	98	4.00E-04	2.00E-03
Xylene		0.06	0.27	98	1.20E-03	0.01
Total HAPs		2.42	10.58	98	0.05	0.21

Notes:

¹ NO_x & CO emission factor taken from Texas Commission on Environmental Quality (TCEQ) February 2012 document "Technical Supplement 4: Flares" for air assisted or unassisted units combusting high-Btu waste streams (>1000 Btu/scf).² VOC, HAPs, and H₂S uncontrolled emissions from the amine unit (in Ethane Rejection Mode) calculated using ProMax.³ It is assumed 99% of the H₂S is converted to SO₂.⁴ The flare has a 98% control efficiency.⁵ Hourly NO_x & CO Emission Rates (pph) = lb/MMBtu x (MMBtu/hr / 1,000,000).⁶ Annual NO_x & CO Emission Rates (tpy) = Hourly Emission Rates (pph) x hr/yr x (1 ton / 2,000 lb).⁷ Controlled VOC & H₂S Emission Rate (pph) = Uncontrolled Emission Rate (pph) x (1 - (% / 100)).⁸ Controlled VOC & H₂S Emission Rate (tpy) = Uncontrolled Emission Rate (tpy) x (1 - (% / 100)).⁹ Controlled SO₂ Emission Rate (pph) = Uncontrolled H₂S Emission Rate (pph) x (% / 100) x (32 lb S / 34 lb H₂S) x (64 lb SO₂ / 32 lb S).¹⁰ Controlled SO₂ Emission Rate (tpy) = Controlled SO₂ Emission Rate (pph) x hr/yr x (1 ton / 2,000 lb).

Harvest Four Corners, LLC - San Juan Gas Plant
Plant Flare Emissions Calculations

Combined Emission Rates

Pollutants	Controlled Emission Rates	
	pph	tpy
NO _x	1.33	5.84
CO	3.57	15.64
SO ₂	1.21	5.33
H ₂ S	0.01	0.06
VOC	1.60	7.02
Benzene	0.03	0.14
Toluene	0.01	0.06
Ethylbenzene	2.00E-04	4.00E-04
Hexane	4.00E-04	2.00E-03
Xylene	1.20E-03	5.40E-03
Total HAPs	0.05	0.21

Exhaust Parameters

1,832 °F
2.40 ft
65.62 fps
60 ft

Exhaust temperature
Effective stack diameter
Stack velocity
Stack height

NMAQB
Calculated per NMAQB guidelines
NMAQB
Harvest Four Corners

Flare Effective Diameter

16.04 lb/lb-mol
154.70 scfm
683,981 cal/sec
552,493 cal/sec
0.743 meters

Molecular weight
Flowrate
Gross heat release
Effective heat release (qn)
Effective stack diameter

Molecular weight of CH₄
scf/hr / 60 min/hr
scfm x Btu/scf x 252 cal/Btu / 60 sec/min
cal/sec x (1-(0.048 x (MW^{0.5})))
(0.000001 x cal/sec[qn])^{0.5}

Harvest Four Corners, LLC - San Juan Gas Plant

Cooling Tower Emissions Calculations

Emission Unit: CT
Description: Cooling Tower

COOLING TOWER SPECIFICATIONS:

Enter specifications into blue cells

Drift loss	0.0100%	Low Efficiency
Circulating water flow rate	11,520 gpm	
Total dissolved solids	1,995 ppm	
Density of TDS constituents	2.5 g/cc	Average density of common salts (CaCO ₃ , CaSO ₄ , CaCl ₂ , NaCl, Na ₂ SO ₄ , Na ₂ CO ₃)

Volume of a sphere $V = 4/3 \cdot \pi \cdot r^3$

Annual drift 576 lb H₂O/hr

PARTICULATE EMISSIONS:

Total Particulate Emissions	0.360 lbs/hr	1.575 ton/yr
PM ₁₀ Emissions	0.145 lbs/hr	0.635 ton/yr
PM _{2.5} Emissions	0.022 lbs/hr	0.097 ton/yr

Water Drop Size Distribution for Low Efficiency Drift Eliminators*

Based on a drift rate of 0.001%

Droplet		H ₂ O Drople		Solids		Emissions		
Dia.	% mass	% mass	Mass	Vol.	Dia.	PM	PM ₁₀	PM _{2.5}
(micron)		smaller	(g)	(cc)	(micron)	(lb/hr)	(lb/hr)	(lb/hr)
22	0.43	0.43	5.6E-09	4.4E-12	2.0			
29	1.49	1.92	1.3E-08	1.0E-11	2.7			1.9%
44	3.76	5.68	4.5E-08	3.6E-11	4.1			
58	2.09	7.77	1.0E-07	8.2E-11	5.4			
65	1.86	9.63	1.4E-07	1.1E-10	6.0			
87	1.56	11.19	3.4E-07	2.8E-10	8.1			
108	1.43	12.62	6.6E-07	5.3E-10	10.0		12.6%	
120	1.26	13.88	9.0E-07	7.2E-10	11.1			
132	1.09	14.97	1.2E-06	9.6E-10	12.2			
144	1.32	16.29	1.6E-06	1.2E-09	13.4			
174	5.81	22.1	2.8E-06	2.2E-09	16.1			
300	5.04	27.14	1.4E-05	1.1E-08	27.8			
450**	4.17	31.31	4.8E-05	3.8E-08	41.7	31.3%		
600	4.01	35.32	1.1E-04	9.0E-08	55.7			
750	4.00	39.32	2.2E-04	1.8E-07	69.6			
900	4.03	43.35	3.8E-04	3.0E-07	83.5			
1,050	4.57	47.92	6.1E-04	4.8E-07	97.4			
1,200	5.46	53.38	9.0E-04	7.2E-07	111.3			
1,350	6.80	60.18	1.3E-03	1.0E-06	125.2			
2,250	17.99	78.17	6.0E-03	4.8E-06	208.7			
2,400	21.83	100	7.2E-03	5.8E-06	222.6			

* EPA. 1979. *Effects of Pathogenic and Toxic Material Transport Via Cooling Device Drift - Vol. 1*
Technical Report. EPA-600/7-79-251a. November 1979.

** Maximum droplet size governed by atmospheric dispersion. Larger droplets fall to the ground before evaporating into a particle (EPA 1979).

Harvest Four Corners, LLC - San Juan Gas Plant

Cooling Tower Emissions Calculations

Emission Unit: CT
Description: Cooling Tower

Water Drop Size Distribution for High Efficiency Drift Eliminators*

Based on a drift rate of 0.0003%

Droplet		H ₂ O Droplet	Solids	Emissions		
Dia. (micron)	% mass smaller	Mass (g)	Vol. (cc)	Dia. (micron)	PM (lb/hr)	PM ₁₀ (lb/hr)
10	0	5.2E-10	4.2E-13	0.9		
20	0.196	4.2E-09	3.3E-12	1.9		
30	0.226	1.4E-08	1.1E-11	2.8		0.2%
40	0.514	3.4E-08	2.7E-11	3.7		
50	1.816	6.5E-08	5.2E-11	4.6		
60	5.702	1.1E-07	9.0E-11	5.6		
70	21.348	1.8E-07	1.4E-10	6.5		
90	49.812	3.8E-07	3.0E-10	8.3		
110	70.509	7.0E-07	5.6E-10	10.2	70.5%	
130	82.023	1.2E-06	9.2E-10	12.1		
150	88.012	1.8E-06	1.4E-09	13.9		
180	91.032	3.1E-06	2.4E-09	16.7		
210	92.468	4.8E-06	3.9E-09	19.5		
240	94.091	7.2E-06	5.8E-09	22.3		
270	94.689	1.0E-05	8.2E-09	25.0		
300	96.288	1.4E-05	1.1E-08	27.8		
350	97.011	2.2E-05	1.8E-08	32.5		
400	98.34	3.4E-05	2.7E-08	37.1		
450**	99.071	4.8E-05	3.8E-08	41.7	99.1%	
500	99.071	6.5E-05	5.2E-08	46.4		
600	100	1.1E-04	9.0E-08	55.7		

*Reisman, J. and G. Frisbie. 2002. "Calculating Realistic PM10 Emissions from Cooling Towers."

Environmental Progress & Sustainable Energy. American Institute of Chemical Engineers. Volume 21, Issue 2, pp. 127-130. July 2002.

**Maximum droplet size governed by atmospheric dispersion. Larger droplets fall to the ground before evaporating into a particle (EPA 1979).

EXAMPLE CALCULATIONS: Low Efficiency

Annual drift:

11,520 gal water	8.33 lb	60 min	0.010% (drift)	=	576 lb water drift
1 min	1 gal water	1 hr			hr

Total Particulate Emissions


576 lb water	1,995 lb PM	31.3% PM	=	0.360 lb PM	=	1.575 ton PM
hr	1E+6 lb water			hr		yr

PM₁₀ Emissions

576 lb water	1,995 lb PM	12.6% PM ₁₀	=	0.145 lb PM ₁₀	=	0.635 ton PM ₁₀
hr	1E+6 lb water			hr		yr

PM_{2.5} Emissions

576 lb water	1,995 lb PM	1.9% PM _{2.5}	=	0.022 lb PM _{2.5}	=	0.097 ton PM _{2.5}
hr	1E+6 lb water			hr		yr

New Mexico Environment Department Air Quality Bureau Modeling Section 1301 Siler Road, Building B Santa Fe, NM 87507-3113 Phone: (505) 476-4300 Fax: (505) 476-4375 www.nmenv.state.nm.us/aqb		For Department use only: Approved: <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No Date: 1/7/2011 Approved by: Eric Peters
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Air Dispersion Modeling Waiver Request Form

This form must be completed and submitted with all air dispersion modeling waiver requests.

If a permit is required, modeling is normally required for all pollutants, including state air toxics. In some cases, the demonstration that ambient air quality standards and PSD increments will not be violated can be satisfied with a discussion of previous modeling. The purpose of this form is to document and streamline requests to limit the new modeling that is submitted with an application. A waiver may be requested by e-mailing the completed form to the modeling manager, sufi.mustafa@state.nm.us. Permitting staff must approve the total emission rates during the permitting process for this waiver to be valid.

Contact and facility information:

Contact name	George Iwaszek (consultant on behalf of ConocoPhillips)
E-mail Address:	giwaszek@trinityconsultants.com
Phone	505-266-6611
Facility Name	ConocoPhillips San Juan Basin Gas Plant
Air Quality Permit Number(s)	P124 R1M1; NSR 0613 M6R4
AI Number (if known)	1177

ConocoPhillips is proposing to replace an existing gas fired heater with a unit that has the same or lower emissions for all criteria pollutants. In addition, pursuant to SSM guidance issued by the AQB in October 2010, ConocoPhillips proposes to add 10 tpy for CO and NOx emissions due to SSM/upset/malfunctions. SSM emissions are routed to the facility's flares. The proposed action will require a technical revision to the current NSR permit 0613-M6-R4 per 20.2.72.219.B(1)(d) NMAC; ConocoPhillips is requesting a modeling waiver for this action.

Section 1: Toxic air pollutants

Not applicable. Facility does not require toxics modeling pursuant to 20.2.72.502 NMAC.

Section 2: Pollutants with very low emission rates

Not applicable. The facility does not have very low PTE for any criteria pollutant.

Section 3: Pollutants that have previously been modeled at equal or higher emission rates

Table 3: List of previously modeled pollutants (facility-wide PTE)

Pollutant	Averaging period	Previously modeled emission rate (pounds/hour)	Proposed emission rate (pounds/hour)	Modeled minus proposed emissions (lb/hr)	Modeled percent of standard or increment
CO	1hr	43.2	45.5	-20.8	6
CO	8hr	43.2	45.5	-20.8	15
NOx	24hr	239.01	259.84	-20.8	65
NOx	annual	239.01	241.3	-2.3	18

Question	Yes	No
Was modeling performed within the past four years? Date of modeling report January 2003		X
Was AERMOD used to model the facility? ISC3 Prime		X
Did previous modeling predict concentrations less than 95% of each air quality standard and PSD increment?	X	
Were all averaging periods modeled that apply to the pollutants listed above? <i>1hr NO₂ was not required at the time of the last modeling.</i>		X
Were all applicable startup/shutdown/maintenance scenarios modeled?	X	
Did modeling include all sources within 1000 meters of the facility fence line that now exist? <i>Note: The facility is permitted under NSR 0613 M6R4 which includes El Paso's Blanco A plant, Enterprise's Blanco C and D plants, and ConocoPhillips SJ Basin Gas Plant (SJGP). The most recent modeling for SJGP was performed as "source only" per NMED AQB request in January 2003. However, previous dispersion modeling included surrounding sources and SO₂ modeling. The permit history for the combined facilities indicates that the NO_x reductions for turbine T-D01 at Blanco C/D were incorporated in the most recent NSR permit modification.</i>		X
Did modeling include background concentrations at least as high as current background concentrations?	X	
If a source is changing or being replaced, is the following equation true for all pollutants for which the waiver is requested? <div style="display: flex; justify-content: space-around;"> <div style="text-align: center;"> <u>EXISTING SOURCE</u> $\frac{[(g) \times (h1)] + [(v1)^2/2] + [(c) \times (T1)]}{q1}$ </div> <div style="text-align: center;"> <u>REPLACEMENT SOURCE</u> $\frac{[(g) \times (h2)] + [(v2)^2/2] + [(c) \times (T2)]}{q2}$ </div> </div> <p>Where g = gravitational constant = 32.2 ft/sec² h1 = existing stack height, feet v1 = exhaust velocity, existing source, feet per second c = specific heat of exhaust, 0.28 BTU/lb-degree F T1 = absolute temperature of exhaust, existing source = degree F + 460 q1 = emission rate, existing source, lbs/hour h2 = replacement stack height, feet v2 = exhaust velocity, replacement source, feet per second T2 = absolute temperature of exhaust, replacement source = degree F + 460 q2 = emission rate, replacement source, lbs/hour</p> <p style="text-align: center;">$q2/q1 = 1.087$</p>		X
Are all replacement stacks either the same direction as the replaced stack or vertical? <i>No change in stacks.</i>	X	

If you checked "no" for any of the questions; provide an explanation for why you think the previous modeling may still be valid anyway.

The proposed heater modification results in a small reduction to the emissions. The proposed addition of SSM results in a 9% increase in the 24-hour NO_x emission rate and 1% increase in the annual NO_x emission rate. Scaling these increases to the previous modeling suggests that the modeled results would be 71% and 18% of the 24-hr and annual NO_x standards, respectively.

Section 4: Discussions of scaled emission rates and scaled concentrations

Not applicable.

Appendix 1: Stack Height Release Correction Factor (adapted from 20.2.72.502 NMAC)

Release Height in Meters	Correction Factor
0 to 9.9	1
10 to 19.9	5
20 to 29.9	19
30 to 39.9	41
40 to 49.9	71
50 to 59.9	108
60 to 69.9	152
70 to 79.9	202
80 to 89.9	255
90 to 99.9	317
100 to 109.9	378
110 to 119.9	451
120 to 129.9	533
130 to 139.9	617
140 to 149.9	690
150 to 159.9	781
160 to 169.9	837
170 to 179.9	902
180 to 189.9	1002
190 to 199.9	1066
200 or greater	1161

Appendix 2. Very small emission rate modeling waiver requirements

Type of emissions	Modeling is waived if emissions of a pollutant for the entire facility (including haul roads) are below the amount:
Point source	0.1 lb/hr of H ₂ S or reduced sulfur, 1.0 lb/hr for other pollutants
Fugitive sources	0.01 lb/hr of H ₂ S or reduced sulfur, 0.1 lb/hr for other pollutants

All the remaining calculations described below are unchanged from the previous application

Harvest Four Corners, LLC - San Juan Gas Plant Turbine Exhaust Emissions Calculations

Unit Number: 1-3
Description: Rolls Royce Avon 1535 Gas Turbines

Note: The data on this worksheet applies to each individual emissions unit identified above.

Horsepower

5,600 ft above MSL	Elevation	
23,800 hp	Nameplate hp	Mfg. data
15,000 hp	Site-rated hp	2011 NSR application

Fuel Consumption

123.2 MMBtu/hr	Hourly fuel consumption	2011 NSR application
1,000 Btu/scf	Field gas heating value	Nominal heat content
123,200 scf/hr	Hourly fuel consumption	MMBtu/hr x 1,000,000 / Btu/scf
8,760 hr/yr	Annual operating time	Harvest Four Corners
1,079,232 MMBtu/yr	Annual fuel consumption	MMBtu/hr x hr/yr
1,079.23 MMscf/yr	Annual fuel consumption	scf/hr x hr/yr / 1,000,000

Steady-State Emission Rates

Pollutants ^{1,2}	Uncontrolled Emission Rates		Control Efficiencies ⁴	Controlled Emission Rates	
	pph ³	tpy ³	%	pph ⁵	tpy ⁵
NO _x	56.30	246.59	--	--	--
CO	90.00	394.20	95	9.60	42.00
VOC	10.00	43.80	85	3.00E-01	1.30
SO ₂	6.00E-02	2.60E-01	--	--	--

Notes:

¹ Uncontrolled NO_x & SO₂ emission rates (pph & tpy) are taken from the 2011 NSR application, as permitted.

² Uncontrolled CO & VOC emission rates (pph & tpy) are taken from the manufacturer's data as identified in the 2011 NSR application.

³ Uncontrolled CO & VOC Emission Rates (tpy) = Uncontrolled CO & VOC Emission Rates (pph) x hr/yr (1 ton / 2,000 lb)

⁴ CO & VOC catalyst control efficiencies are taken from the 2011 NSR application.

⁵ Controlled CO & VOC emission rates (pph & tpy) are taken from the 2011 NSR application, as permitted.

Pollutants	Emission Factors ¹	Uncontrolled Emission Rates	
	lb/MMBtu	pph ²	tpy ³
TSP	6.60E-03	0.81	3.56
PM ₁₀	6.60E-03	0.81	3.56
PM _{2.5}	6.60E-03	0.81	3.56

Notes:

¹ Emission factors taken from AP-42, Table 3.1-2a.

² Uncontrolled Emission Rates (pph) = lb/MMBtu x MMBtu/hr

³ Uncontrolled Emission Rates (tpy) = Uncontrolled Emission Rates (pph) x hr/yr x (1 ton / 2,000 lb)

Exhaust Parameters

370 °F	Exhaust temperature (Unit 2 & 3)	2011 NSR application
750 °F	Exhaust temperature (Units 1, 2 Bypass & 3 Bypass)	2011 NSR application
46.70 fps	Stack exit velocity (Unit 1)	2011 NSR application
35.20 fps	Stack exit velocity (Unit 2 & 3)	2011 NSR application
133.90 fps	Stack exit velocity (Unit 2 Bypass & 3 Bypass)	2011 NSR application
18.90 ft	Stack exit diameter (Unit 1)	2011 NSR application
10.50 ft	Stack exit diameter (Unit 2 & 3)	2011 NSR application
6.50 ft	Stack exit diameter (Unit 2 Bypass & 3 Bypass)	2011 NSR application
786,109 cfm	Stack flowrate (Unit 1)	fps x 3.1416 x ((ft / 2) ^2) * 60 sec/min
182,879 cfm	Stack flowrate (Unit 2 & 3)	fps x 3.1416 x ((ft / 2) ^2) * 60 sec/min
266,593 cfm	Stack flowrate (Unit 2 Bypass & 3 Bypass)	fps x 3.1416 x ((ft / 2) ^2) * 60 sec/min
56 ft	Stack height (Unit 1)	2011 NSR application
45 ft	Stack height (Unit 2 & 3)	2011 NSR application

Harvest Four Corners, LLC - San Juan Gas Plant Turbine Exhaust Emissions Calculations

Unit Number: 4-7
Description: Solar Centaur T-4501 Gas Turbines

Note: The data on this worksheet applies to each individual emissions unit identified above.

Horsepower

5,600 ft above MSL	Elevation	
4,500 hp	Nameplate hp	Mfg. data
3,735 hp	Site-rated hp	2011 NSR application

Fuel Consumption

32.9 MMBtu/hr	Hourly fuel consumption	2011 NSR application
1,000 Btu/scf	Field gas heating value	Nominal heat content
32,900 scf/hr	Hourly fuel consumption	MMBtu/hr x 1,000,000 / Btu/scf
8,760 hr/yr	Annual operating time	Harvest Four Corners
288,204 MMBtu/yr	Annual fuel consumption	MMBtu/hr x hr/yr
288.20 MMscf/yr	Annual fuel consumption	scf/hr x hr/yr / 1,000,000

Steady-State Emission Rates

Pollutants	Uncontrolled Emission Rates	
	pph ¹	tpy ¹
NO _x	15.90	69.80
CO	2.30	10.00
VOC	0.05	0.24
SO ₂	0.01	0.05

Notes:

¹ Uncontrolled emission rates (pph & tpy) are taken from the 2011 NSR application, as permitted.

Pollutants	Emission Factors ¹	Uncontrolled Emission Rates	
	lb/MMBtu	pph ²	tpy ³
TSP	6.60E-03	0.22	0.95
PM ₁₀	6.60E-03	0.22	0.95
PM _{2.5}	6.60E-03	0.22	0.95

Notes:

¹ Emission factors taken from AP-42, Table 3.1-2a.

² Uncontrolled Emission Rates (pph) = lb/MMBtu x MMBtu/hr

³ Uncontrolled Emission Rates (tpy) = Uncontrolled Emission Rates (pph) x hr/yr x (1 ton / 2,000 lb)

Exhaust Parameters

827 °F	Exhaust temperature	2011 NSR application
100.00 fps	Stack exit velocity	2011 NSR application
3.30 ft	Stack exit diameter	2011 NSR application
51,318 cfm	Stack flowrate	fps x 3.1416 x ((ft / 2) ^2) * 60 sec/min
30.8 ft	Stack height	2011 NSR application

Harvest Four Corners, LLC - San Juan Gas Plant Heater Exhaust Emissions Calculations

Unit Number: 8 & 13
Description: WILLBROS/INSERV Mole Sieve Regeneration Heaters

Note: The data on this worksheet applies to each individual emissions unit identified above.

Fuel Consumption

14.55 MMBtu/hr	Capacity	2011 NSR application
1,000 Btu/scf	Field gas heating value	Nominal heat content
14,550 scf/hr	Hourly fuel consumption	MMBtu/hr x 1,000,000 / Btu/scf
8,760 hr/yr	Annual operating time	Harvest Four Corners
127,458 MMBtu/yr	Annual fuel consumption	MMBtu/hr x hr/yr
127.46 MMscf/yr	Annual fuel consumption	scf/hr x hr/yr / 1,000,000

Steady-State Emission Rates

Pollutants	Emission Factors ¹	Uncontrolled Emission Rates ²	
	lb/MMBtu	pph ³	tpy ⁴
NO _x	0.045	0.75	3.30
CO	0.020	0.33	1.47

Notes:

¹ Emission factors taken from the 2011 NSR application

² A safety factor of 15% is added to the emission rates

³ Uncontrolled Emission Rates (pph) = lb/MMBtu x MMBtu/hr x 1.15

⁴ Uncontrolled Emission Rates (tpy) = Uncontrolled Emission Rates (pph) x hr/yr x (1 ton / 2,000 lb)

Pollutants	Uncontrolled Emission Rates ²	
	pph ¹	tpy ²
VOC	0.03	0.14
SO ₂	0.01	0.04

Notes:

¹ VOC & SO₂ emission rates (pph) are taken from the 2011 NSR application, as permitted.

² Uncontrolled Emission Rates (tpy) = Uncontrolled Emission Rates (pph) x hr/yr x (1 ton / 2,000 lb)

Pollutants	Emission Factors ¹	Uncontrolled Emission Rates	
	lb/MMscf	pph ²	tpy ³
TSP	7.6	0.11	0.48
PM ₁₀	7.6	0.11	0.48
PM _{2.5}	7.6	0.11	0.48

Notes:

¹ Emission factors taken from AP-42, Table 1.4-2, 07/98.

² Uncontrolled Emission Rates (pph) = lb/MMscf x (scf/hr / 1,000,000)

³ Uncontrolled Emission Rates (tpy) = Uncontrolled Emission Rates (pph) x hr/yr x (1 ton / 2,000 lb)

Exhaust Parameters

664 °F	Exhaust temperature	2011 NSR application
48.70 fps	Stack exit velocity	2011 NSR application
3.08 ft	Stack exit diameter	2011 NSR application
21,771 acfm	Stack flowrate	fps x 3.1416 x ((ft / 2) ^2) * 60 sec/min
78.3 ft	Stack height	2011 NSR application

Harvest Four Corners, LLC - San Juan Gas Plant
Plant Flare Emissions Calculations

Emission Unit: 9
Description: High Pressure Flare

Pilot Gas Stream

150 scf/hr	Pilot gas hour flowrate	Harvest Four Corners
1,050 Btu/scf	Heat content	Nominal heat content

Purge Gas Stream

990 scf/hr	Purge gas hour flowrate	Harvest Four Corners
1,050 Btu/scf	Heat content	Nominal heat content

Combined Gas Stream

1,140 scf/hr	Hourly flowrate	Sum of pilot gas & purge gas streams
1,050 Btu/scf	Heat content	Flow weighted average
1.20 MMBtu/hr	Hourly heat rate	scf/hr x Btu/scf x (1 MMBtu / 1,000,000 Btu)
8,760 hr/yr	Annual operating time	Harvest Four Corners
9.99 MMscf/yr	Annual flowrate	scf/hr x hr/yr x (1 MMscf / 1,000,000 scf)
10,486 MMBtu/yr	Annual heat rate	MMBtu/hr x hr/yr

Steady-State Emission Rates

Pollutants	Emission Factors ^{1,2}	Controlled Emission Rates	
	lb/MMBtu	pph ³	tpy ⁴
NO _x	0.138	0.17	0.72
CO	0.370	0.44	1.94
VOC	0.140	0.17	0.73

Notes:

¹ NO_x emission factor taken from Texas Commission on Environmental Quality (TCEQ) February 2012 document "Technical Supplement 4: Flares" for air assisted or unassisted units combusting high-Btu waste streams (>1000 Btu/scf).

² CO & VOC emission factors taken from AP-42, Table 13.5-1, 09-91

³ Hourly Emission Rates (pph) = lb/MMBtu x MMBtu/hr

⁴ Annual Emission Rates (tpy) = lb/MMBtu x MMBtu/yr x (1 ton/2,000 lb)

Exhaust Parameters

1,832 °F	Exhaust temperature	NMAQB
0.85 ft	Effective stack diameter	Calculated per NMAQB guidelines
65.62 fps	Stack velocity	NMAQB
200 ft	Stack height	Harvest Four Corners

Flare Effective Diameter

16.04 lb/lb-mol	Molecular weight	Molecular weight of CH ₄
19.00 scfm	Flowrate	scf/hr / 60 min/hr
83,790 cal/sec	Gross heat release	scfm x Btu/scf x 252 cal/Btu / 60 sec/min
67,682 cal/sec	Effective heat release (qn)	cal/sec x (1-(0.048 x (MW ^{0.5})))
0.26 meters	Effective stack diameter	(0.000001 x cal/sec[qn]) ^{0.5}

Harvest Four Corners, LLC - San Juan Gas Plant Heater Exhaust Emissions Calculations

Unit Number: 12
Description: Broach Mole Seive Regeneration Heater

Note: The data on this worksheet applies to each individual emissions unit identified above.

Fuel Consumption

3.40 MMBtu/hr	Capacity	2011 NSR application
1,000 Btu/scf	Field gas heating value	Nominal heat content
3,400 scf/hr	Hourly fuel consumption	MMBtu/hr x 1,000,000 / Btu/scf
8,760 hr/yr	Annual operating time	Harvest Four Corners
29,784 MMBtu/yr	Annual fuel consumption	MMBtu/hr x hr/yr
29.78 MMscf/yr	Annual fuel consumption	scf/hr x hr/yr / 1,000,000

Steady-State Emission Rates

Pollutants	Emission Factors ¹	Uncontrolled Emission Rates	
	lb/MMscf	pph ²	tpy ³
NO _x	100	0.34	1.49
VOC	5.5	0.02	0.08
TSP	7.6	0.03	0.11
PM ₁₀	7.6	0.03	0.11
PM _{2.5}	7.6	0.03	0.11

Notes:

¹ Emission factors taken from AP-42, Tables 1.4-1 & 1.4-2, 07/98.

² Uncontrolled Emission Rates (pph) = lb/MMscf x (scf/hr / 1,000,000)

³ Uncontrolled Emission Rates (tpy) = Uncontrolled Emission Rates (pph) x hr/yr x (1 ton / 2,000 lb)

Pollutants	Uncontrolled Emission Rates ¹	
	pph	tpy
CO	0.10	0.30
SO ₂	0.01	0.01

Notes:

¹ Emission rates (pph & tpy) are taken from the 2011 NSR application, as permitted.

Exhaust Parameters

550 °F	Exhaust temperature	2011 NSR application
14.30 fps	Stack exit velocity	2011 NSR application
1.50 ft	Stack exit diameter	2011 NSR application
1,516 acfm	Stack flowrate	fps x 3.1416 x ((ft / 2) ^2) * 60 sec/min
15.3 ft	Stack height	2011 NSR application

Harvest Four Corners, LLC - San Juan Gas Plant
Equipment Leaks Emissions Calculations

Unit Number: 14
Description: Equipment Leaks

Steady-State Emission Rates

Equipment ^{3,4}	Number of Components ¹ # of sources	Emission Factors ⁵ kg/hr/source	VOC Content ⁶ %	Uncontrolled VOC Emission Rates		Control Efficiency ⁹ %	Controlled VOC Emission Rates	
				pph ⁷	tpy ⁸		pph ¹⁰	tpy ¹¹
Valves (inlet gas)	2135	4.50E-03	5	1.06	4.63	67	0.35	1.53
Valves (natural gas liquids)	2135	2.50E-03	100	11.74	51.43	61	4.58	20.06
Valves (residue gas)	0	4.50E-03	1	0.00	0.00	67	0.00	0.00
Connectors (inlet gas)	0	2.00E-04	5	0.00	0.00	0	0.00	0.00
Connectors (natural gas liquids)	0	2.10E-04	100	0.00	0.00	0	0.00	0.00
Connectors (residue gas)	0	2.00E-04	1	0.00	0.00	0	0.00	0.00
Pump Seals (inlet gas)	22	2.40E-03	5	0.01	0.03	0	0.01	0.03
Pump Seals (natural gas liquids)	22	1.30E-02	100	0.63	2.76	45	0.35	1.52
Pump Seals (residue gas)	0	2.40E-03	1	0.00	0.00	0	0.00	0.00
Flanges (inlet gas) ²	2135	3.90E-04	5	0.09	0.40	0	0.09	0.40
Flanges (natural gas liquids) ²	4269	1.10E-04	100	1.03	4.52	0	1.03	4.52
Flanges (residue gas) ²	2135	3.90E-04	1	0.02	0.08	0	0.02	0.08
Open Lines (inlet gas)	0	2.00E-03	5	0.00	0.00	0	0.00	0.00
Open Lines (natural gas liquids)	0	1.40E-03	100	0.00	0.00	0	0.00	0.00
Open Lines (residue gas)	0	2.00E-03	1	0.00	0.00	0	0.00	0.00
Other (inlet gas)	66	8.80E-03	5	0.06	0.28	0	0.06	0.28
Other (natural gas liquids)	132	7.50E-03	100	2.18	9.54	0	2.18	9.54
Other (residue gas)	66	8.80E-03	1	0.01	0.06	0	0.01	0.06
Total				16.83	73.72		8.68	38.01

Notes:

¹ Number of fittings provided by Harvest Four Corners.² Number of flanges assumed to be two times the valve count.³ Fittings assumed to be 50% gas and 50% light liquids.⁴ Gas fittings assumed to be 50% inlet gas and 50% residue gas.⁵ Emission factors taken from the EPA "1995 Protocol for Equipment Leak Emission Estimates", Table 2-4, Oil and Gas Production Operations Average Emission Factors (kg/hr/source).⁶ The VOC content is estimated.⁷ Uncontrolled VOC Emission Rates (pph) = Uncontrolled Emission Rates (tpy) x 2,000 lb/ton / 8,760 hr/yr⁸ Uncontrolled VOC Emission Rates (tpy) = kg/hr/source x 2.2 lb/kg x # of sources x (% / 100) x 8,760 hr/yr x (1 ton / 2,000 lb).⁹ Control efficiencies taken from the EPA "1995 Protocol for Equipment Leak Emission Estimates", Table 5-2, Control Effectiveness For An LDAR Program At A SOCMI Process Unit. Quarterly monitoring 10,000 ppmv leak definition is assumed.¹⁰ Controlled VOC Emission Rates (pph) = Uncontrolled Emission Rates (pph) x (1-(% / 100)).¹¹ Controlled VOC Emission Rates (tpy) = Uncontrolled Emission Rates (tpy) x (1-(% / 100)).

Pollutants	Weight Percent ¹ %	Controlled HAP Emission Rates	
		pph ²	tpy ³
Benzene	0.0756	6.56E-03	0.03
Ethylbenzene	0.0000	0.00	0.00
n-Hexane	0.4143	0.04	0.16
Toluene	0.1196	0.01	0.05
Xylenes	0.0306	2.66E-03	0.01

Notes:

¹ Weight percents calculated from San Juan Gas Plant gas analysis sampled 09/01/2016.² Controlled HAP Emission Rates (pph) = Controlled VOC Emission Rate (pph) x (% / 100).³ Controlled HAP Emission Rates (tpy) = Controlled VOC Emission Rate (tpy) x (% / 100).

Section 6.a

Green House Gas Emissions

(Submitting under 20.2.70, 20.2.72 20.2.74 NMAC)

Title V (20.2.70 NMAC), Minor NSR (20.2.72 NMAC), and PSD (20.2.74 NMAC) applicants must estimate and report greenhouse gas (GHG) emissions to verify the emission rates reported in the public notice, determine applicability to 40 CFR 60 Subparts, and to evaluate Prevention of Significant Deterioration (PSD) applicability. GHG emissions that are subject to air permit regulations consist of the sum of an aggregate group of these six greenhouse gases: carbon dioxide (CO₂), nitrous oxide (N₂O), methane (CH₄), hydrofluorocarbons (HFCs), perfluorocarbons (PFCs), and sulfur hexafluoride (SF₆).

Calculating GHG Emissions:

1. Calculate the ton per year (tpy) GHG mass emissions and GHG CO₂e emissions from your facility.
2. GHG mass emissions are the sum of the total annual tons of greenhouse gases without adjusting with the global warming potentials (GWPs). GHG CO₂e emissions are the sum of the mass emissions of each individual GHG multiplied by its GWP found in Table A-1 in 40 CFR 98 Mandatory Greenhouse Gas Reporting.
3. Emissions from routine or predictable start up, shut down, and maintenance must be included.
4. Report GHG mass and GHG CO₂e emissions in Table 2-P of this application. Emissions are reported in **short** tons per year and represent each emission unit's Potential to Emit (PTE).
5. All Title V major sources, PSD major sources, and all power plants, whether major or not, must calculate and report GHG mass and CO₂e emissions for each unit in Table 2-P.
6. For minor source facilities that are not power plants, are not Title V, and are not PSD there are three options for reporting GHGs in Table 2-P: 1) report GHGs for each individual piece of equipment; 2) report all GHGs from a group of unit types, for example report all combustion source GHGs as a single unit and all venting GHGs as a second separate unit; 3) or check the following ☐ By checking this box, the applicant acknowledges the total CO₂e emissions are less than 75,000 tons per year.

Sources for Calculating GHG Emissions:

- Manufacturer's Data
- AP-42 Compilation of Air Pollutant Emission Factors at <http://www.epa.gov/ttn/chief/ap42/index.html>
- EPA's Internet emission factor database WebFIRE at <http://cfpub.epa.gov/webfire/>
- 40 CFR 98 Mandatory Green House Gas Reporting except that tons should be reported in short tons rather than in metric tons for the purpose of PSD applicability.
- API Compendium of Greenhouse Gas Emissions Methodologies for the Oil and Natural Gas Industry. August 2009 or most recent version.
- Sources listed on EPA's NSR Resources for Estimating GHG Emissions at <http://www.epa.gov/nsr/clean-air-act-permitting-greenhouse-gases>:

Global Warming Potentials (GWP):

Applicants must use the Global Warming Potentials codified in Table A-1 of the most recent version of 40 CFR 98 Mandatory Greenhouse Gas Reporting. The GWP for a particular GHG is the ratio of heat trapped by one unit mass of the GHG to that of one unit mass of CO₂ over a specified time period.

"Greenhouse gas" for the purpose of air permit regulations is defined as the aggregate group of the following six gases: carbon dioxide, nitrous oxide, methane, hydrofluorocarbons, perfluorocarbons, and sulfur hexafluoride. **(20.2.70.7 NMAC, 20.2.74.7 NMAC)**. You may also find GHGs defined in 40 CFR 86.1818-12(a).

Metric to Short Ton Conversion:

Short tons for GHGs and other regulated pollutants are the standard unit of measure for PSD and title V permitting programs. 40 CFR 98 Mandatory Greenhouse Reporting requires metric tons.

1 metric ton = 1.10231 short tons (per Table A-2 to Subpart A of Part 98 – Units of Measure Conversions)

**Harvest Four Corners, LLC - San Juan Gas Plant
Green House Gas Emissions Data and Calculations**

Sources	Facility Total Emissions				
	CO2 tpy	CH4 tpy	N2O tpy	GHG tpy	CO2e tpy
Turbine Exhaust	256,256.62	4.83	4.83E-01	256,261.94	256,521.28
Centrifugal Compressor Venting	1.96	36.71	--	38.67	919.76
Heater & Oxidizer Exhaust	22,752.23	4.29E-01	4.29E-02	22,752.71	22,775.73
Flares	5,594.23	28.98	9.32E-03	5,623.22	6,321.54
Equipment Leaks	8.87	166.37	--	175.24	4,168.03
SSM and Malfunctions	2.33	43.77			
Total	284,613.92	237.32	5.35E-01	284,851.77	290,706.35

Turbine Exhaust Emissions

Unit Numbers	Description	Emission Factors ¹			Emission Rates ²		
		CO2 kg/MMBtu	CH4 kg/MMBtu	N2O kg/MMBtu	CO2 tpy	CH4 tpy	N2O tpy
1	1535 Turbine	53.06	1.00E-03	1.00E-04	62,990.45	1.19	1.19E-01
2	1535 Turbine	53.06	1.00E-03	1.00E-04	62,990.45	1.19	1.19E-01
3	1535 Turbine	53.06	1.00E-03	1.00E-04	62,990.45	1.19	1.19E-01
4	Centaur T-4501 Turbine	53.06	1.00E-03	1.00E-04	16,821.31	3.17E-01	3.17E-02
5	Centaur T-4501 Turbine	53.06	1.00E-03	1.00E-04	16,821.31	3.17E-01	3.17E-02
6	Centaur T-4501 Turbine	53.06	1.00E-03	1.00E-04	16,821.31	3.17E-01	3.17E-02
7	Centaur T-4501 Turbine	53.06	1.00E-03	1.00E-04	16,821.31	3.17E-01	3.17E-02
Total					256,256.62	4.83	4.83E-01

Notes:

¹ The emissions factors are taken from 40 CFR 98, Subpart C, Tables C-1 & C-2.

² Emission Rates (tpy) = kg/MMBtu x 2.2 lb/kg x MMBtu/yr / 2,000 lb/ton.

Unit Numbers	Description	Fuel Types ¹	Operating Times ¹ hr/yr	Design Heat Rates ² MMBtu/hr	Fuel Usages ³
					MMBtu/yr
1	1535 Turbine	Nat. Gas	8,760	123.20	1,079,232
2	1535 Turbine	Nat. Gas	8,760	123.20	1,079,232
3	1535 Turbine	Nat. Gas	8,760	123.20	1,079,232
4	Centaur T-4501 Turbine	Nat. Gas	8,760	32.90	288,204
5	Centaur T-4501 Turbine	Nat. Gas	8,760	32.90	288,204
6	Centaur T-4501 Turbine	Nat. Gas	8,760	32.90	288,204
7	Centaur T-4501 Turbine	Nat. Gas	8,760	32.90	288,204

Notes:

¹ The fuel types and operating times are provided by Harvest Four Corners

² The design heat rates are taken from 2011 NSR application.

³ Fuel Usages (MMBtu/yr) = Design Heat Rates (MMBtu/hr) x hr/yr.

**Harvest Four Corners, LLC - San Juan Gas Plant
Green House Gas Emissions Data and Calculations**

Centrifugal Compressor Venting Emissions

Unit Numbers	Description	Emission Rates ^{1,2}	
		CO2 tpy ³	CH4 tpy ⁴
1	Wet Seal	5.95E-01	11.16
1	Blowdown Valve	--	--
1	Isolation Valve	--	--
2	Wet Seal	5.95E-01	11.16
2	Blowdown Valve	--	--
2	Isolation Valve	--	--
3	Wet Seal	5.95E-01	11.16
3	Blowdown Valve	--	--
3	Isolation Valve	--	--
4	Wet Seal	--	--
4	Blowdown Valve	0.00E+00	0.00
4	Isolation Valve	8.57E-02	1.61
5	Wet Seal	--	--
5	Blowdown Valve	0.00E+00	0.00
5	Isolation Valve	8.57E-02	1.61
Total		1.96	36.71

Notes:

¹ A combination of equations W-22 & W-36 (Subpart W) is used to calculate centrifugal compressor emissions.

² As the NMED requires CO2 & CH4 emissions rather than CO2e emissions, it is not necessary to include the global warming potential from equation W-36.

³ CO2 Emission Rates (tpy) = scf/hr x hr/yr x (CO2 Mole Percent (%) / 100) x CO2 Density (kg/scf) x (2,204.6 lb/tonne / 2,000 lb/ton) / 1,000 kg/tonne

⁴ CH4 Emission Rates (tpy) = scf/hr x hr/yr x (CH4 Mole Percent (%) / 100) x CH4 Density (kg/scf) x (2,204.6 lb/tonne / 2,000 lb/ton) / 1,000 kg/tonne

Unit Numbers ^{4,5}	Description ^{1,2}	Gas Emissions ³ scf/hr	Operating Times ⁶ hr/yr	CO2 Mole Percents ⁷ %	CH4 Mole Percents ⁷ %	CO2 Density ⁸ kg/scf	CH4 Density ⁸ kg/scf
1	Wet Seal	70.81	8760	1.65	85.04	0.0526	0.0192
1	Blowdown Valve	0.64	0	1.65	85.04	0.0526	0.0192
1	Isolation Valve	10.21	0	1.65	85.04	0.0526	0.0192
2	Wet Seal	70.81	8760	1.65	85.04	0.0526	0.0192
2	Blowdown Valve	0.64	0	1.65	85.04	0.0526	0.0192
2	Isolation Valve	10.21	0	1.65	85.04	0.0526	0.0192
3	Wet Seal	70.81	8760	1.65	85.04	0.0526	0.0192
3	Blowdown Valve	0.64	0	1.65	85.04	0.0526	0.0192
3	Isolation Valve	10.21	0	1.65	85.04	0.0526	0.0192
4	Wet Seal	70.81	0	1.65	85.04	0.0526	0.0192
4	Blowdown Valve	0.64	0	1.65	85.04	0.0526	0.0192
4	Isolation Valve	10.21	8760	1.65	85.04	0.0526	0.0192
5	Wet Seal	70.81	0	1.65	85.04	0.0526	0.0192
5	Blowdown Valve	0.64	0	1.65	85.04	0.0526	0.0192
5	Isolation Valve	10.21	8760	1.65	85.04	0.0526	0.0192

Notes:

¹ Operating mode - includes blowdown valve leakage (wet and dry seal) and the oil degassing vents (wet seal).

² Non-operating depressurized mode - includes isolation valve leakage (wet & dry seal) through open blowdown vents (without blind flanges).

³ Emission factors are the three year rolling average of measurements taken by Harvest Four Corners.

⁴ Units 1-3 blowdown valve and isolation valve leakage are sent to the flare.

⁵ Units 4 & 5 do not have wet seals.

⁶ The operating times are estimated so as to identify the highest GHG emission rates.

⁷ The facility CO2 and CH4 contents are taken from the facility inlet gas composition.

⁸ The CO2 & CH4 densities (kg/scf) are taken from Subpart W, Paragraph 98.233(v).

**Harvest Four Corners, LLC - San Juan Gas Plant
Green House Gas Emissions Data and Calculations**

Heater & Oxidizer Exhaust Emissions

Unit Numbers	Description	Emission Factors ¹			Emission Rates ²		
		CO2 kg/MMBtu	CH4 kg/MMBtu	N2O kg/MMBtu	CO2 tpy	CH4 tpy	N2O tpy
8	Regeneration Heater	53.06	1.00E-03	1.00E-04	7,439.21	1.40E-01	1.40E-02
12	Regeneration Heater	53.06	1.00E-03	1.00E-04	1,738.37	3.28E-02	3.28E-03
13	Regeneration Heater	53.06	1.00E-03	1.00E-04	7,439.21	1.40E-01	1.40E-02
15	Thermal Oxidizer	53.06	1.00E-03	1.00E-04	6,135.43	1.16E-01	1.16E-02
	Total				22,752.23	4.29E-01	4.29E-02

Notes:

¹ The emissions factors are taken from 40 CFR 98, Subpart C, Tables C-1 & C-2.

² Emission Rates (tpy) = kg/MMBtu x 2.2 lb/kg x MMBtu/yr / 2,000 lb/ton.

Unit Numbers	Description	Fuel Types ¹	Operating Times ¹ hr/yr	Design Heat Rates ² MMBtu/hr	Fuel Usages ³
					MMBtu/yr
8	Regeneration Heater	Nat. Gas	8,760	123.20	127,458
12	Regeneration Heater	Nat. Gas	8,760	123.20	29,784
13	Regeneration Heater	Nat. Gas	8,760	32.90	127,458
15	Thermal Oxidizer	Nat. Gas	8,760	32.90	105,120

Notes:

¹ The fuel types and operating times are provided by Harvest Four Corners

² The design heat rates are taken from 2011 NSR application.

³ Fuel Usages (MMBtu/yr) = Design Heat Rates (MMBtu/hr) x hr/yr.

**Harvest Four Corners, LLC - San Juan Gas Plant
Green House Gas Emissions Data and Calculations**

Facility Flare Emissions

Unit Numbers	Description	N2O Emission Factor kg/MMBtu	Emission Rates ²		
			CO2 tpy	CH4 tpy	N2O tpy
9	High Pressure Flare	1.00E-04	692.43	3.59	1.15E-03
16	Low Pressure Flare	1.00E-04	5,686.55	29.46	8.17E-03
	Total		6,378.99	33.05	9.32E-03

Notes:

¹ The N2O emission factor is obtained from Subpart W (Paragraph 98.233(z)(2)(vi)).

² CO2 Emission Rates (tpy) = (Noncombustion CO2 Emissions (MMscf/yr) + Combustion CO2 Emissions (MMscf/yr)) x 1,000,000 scf/MMscf x 0.0526 kg/cu ft x 2.2 lb/kg / 2,000 lb/ton.

³ CH4 Emission Rates (tpy) = Noncombustion CH4 Emissions (MMscf/yr) x 1,000,000 scf/MMscf x 0.0192 kg/cu ft x 2.2 lb/kg / 2,000 lb/ton.

⁴ N2O Emission Rates (tpy) = kg/MMBtu x 2.2 lb/kg x MMBtu/yr / 2,000 lb/ton.

Unit Numbers	Description	Facility Flare Through- put ¹ MMscf/yr	HHV Heat Content Btu/scf	Flare Through- put ² MMBtu/hr	Control Efficiency ³ %	Non- combustion CO2 Emissions ⁴ MMscf/yr	Combustion CO2 Emissions ^{5,6} MMscf/yr	Non- combustion CH4 Emissions ⁷ MMscf/yr
9	High Pressure Flare	9.99	1050	10,486	98	0.16	11.80	0.17
16	Low Pressure Flare	82.01	1050	74,228	98	1.35	96.93	1.39

Notes:

¹ The facility flare throughput and heat content is calculated (see individual flare calculation sheets).

² Flare Throughput (MMBtu/yr) = MMscf/yr x 1,000,000 scf/MMscf x Btu/scf / 1,000,000 Btu/MMBtu

³ The control efficiency is the default value identified by Subpart W (Paragraph 98.233(n)(4)).

⁴ Noncombustion CO2 Emissions (MMscf/yr) = MMscf/yr x (CO2 Content (mole %) / 100).

⁵ Combustion CO2 Emissions (MMscf/yr) = [(Control Efficiency (%) / 100) x MMscf/yr x (CH4 Content (mole %) / 100) x 1]
+ [(Control Efficiency (%) / 100) x MMscf/yr x (Ethane Content (mole %) / 100) x 2]
+ [(Control Efficiency (%) / 100) x MMscf/yr x (Propane Content (mole %) / 100) x 3]
+ [(Control Efficiency (%) / 100) x MMscf/yr x (Butane Content (mole %) / 100) x 4]
+ [(Control Efficiency (%) / 100) x MMscf/yr x (Pentane+ Content (mole %) / 100) x 5]

⁶ The numbers 1-5 in the above equation represent the number of carbon atoms found in methane through pentane, respectively.

⁷ Noncombustion CH4 Emissions (MMscf/yr) = MMscf/yr x (1 - (Control Efficiency (%) / 100)) x (CH4 Content (mole %) / 100)

Unit Numbers	Description	CO2 Content ¹ mole %	CH4 Content ¹ mole %	Ethane Content ¹ mole %	Propane Content ¹ mole %	Butane Content ¹ mole %	Pentane+ Content ¹ mole %
9	High Pressure Flare	1.65	85.04	7.37	3.16	1.44	1.11
16	Low Pressure Flare	1.65	85.04	7.37	3.16	1.44	1.11

Notes:

¹ The facility flare mole % is obtained from the facility inlet gas analysis.

Harvest Four Corners, LLC - San Juan Gas Plant Green House Gas Emissions Data and Calculations

Equipment Leaks Emissions

Description	Emission Rates ⁴		
	VOC ¹ tpy	CO ₂ ² tpy	CH ₄ ³ tpy
Valves, connectors, seals, flanges, etc.	38.01	8.87	166.37

Notes:

¹ The VOC emission rate is taken from the equipment leaks emissions calculations worksheet.

² CO₂ Emission Rates (tpy) = VOC Emission Rate (tpy) x CO₂ Weight Percent of Total (%) / VOC Weight Percent of Total (%).

³ CH₄ Emission Rates (tpy) = VOC Emission Rate (tpy) x CH₄ Weight Percent of Total (%) / VOC Weight Percent of Total (%).

⁴ CO₂, CH₄ & VOC weight percent of totals obtained from gas stream composition calculations.

SSM and Malfunction Emissions

Description	Emission Rates ⁴		
	VOC ¹ tpy	CO ₂ ² tpy	CH ₄ ³ tpy
Valves, connectors, seals, flanges, etc.	10.00	2.33	43.77

Notes:

¹ The VOC emission rate is taken from the current Title V permit.

² CO₂ Emission Rates (tpy) = VOC Emission Rate (tpy) x CO₂ Weight Percent of Total (%) / VOC Weight Percent of Total (%).

³ CH₄ Emission Rates (tpy) = VOC Emission Rate (tpy) x CH₄ Weight Percent of Total (%) / VOC Weight Percent of Total (%).

⁴ CO₂, CH₄ & VOC weight percent of totals obtained from gas stream composition calculations.

Gas Stream Composition

Components	Mole Percents ¹ %	Molecular Weights lb/lb-mole	Component Weights ² lb/lb-mole	Weight Percent of Total ³ %	Emission Factors ⁴ lb/scf
Carbon Dioxide	1.6534	44.01	0.73	3.6819	0.0019
Nitrogen	0.2179	28.01	0.06	0.3088	0.0002
Methane	85.0411	16.04	13.64	69.0202	0.0360
Ethane	7.3744	30.07	2.22	11.2203	0.0058
Propane	3.1599	44.09	1.39	7.0495	0.0037
IsoButane	0.5963	58.12	0.35	1.7536	0.0009
Normal Butane	0.8422	58.12	0.49	2.4768	0.0013
IsoPentane	0.3098	72.15	0.22	1.1310	0.0006
Normal Pentane	0.2226	72.15	0.16	0.8127	0.0004
C6+	0.4369	86.18	0.38	1.9052	0.0010
Benzene	0.0191	78.11	0.01	0.0755	0.0000
Ethylbenzene	0.0000	106.17	0.00	0.0000	0.0000
n-Hexane	0.0950	86.17	0.08	0.4142	0.0002
Toluene	0.0257	92.14	0.02	0.1198	0.0001
Xylenes	0.0057	106.17	0.01	0.0306	0.0000
Total	100.0000		19.76	100.0000	0.0521
VOC			3.12	15.7688	0.0082

Notes:

¹ Gas stream composition obtained from San Juan Gas Plant gas analysis dated 08/01/2016.

² Component Weights (lb/lb-mole) = [Mole Percents (%) / 100] x Molecular Weights (lb/lb-mole)

³ Weight Percent of Total (%) = 100 x Component Weights (lb/lb-mole) / Total Component Weight (lb/lb-mole)

⁴ Emission Factors (lb/scf) = [Mole Percents (%) / 100] x Molecular Weights (lb/lb-mole) / 379.4 scf/lb-mole

Section 7

Information Used To Determine Emissions

Information Used to Determine Emissions shall include the following:

- ☒ If manufacturer data are used, include specifications for emissions units and control equipment, including control efficiencies specifications and sufficient engineering data for verification of control equipment operation, including design drawings, test reports, and design parameters that affect normal operation.
 - ☐ If test data are used, include a copy of the complete test report. If the test data are for an emissions unit other than the one being permitted, the emission units must be identical. Test data may not be used if any difference in operating conditions of the unit being permitted and the unit represented in the test report significantly effect emission rates.
 - ☒ If the most current copy of AP-42 is used, reference the section and date located at the bottom of the page. Include a copy of the page containing the emissions factors, and clearly mark the factors used in the calculations.
 - ☐ If an older version of AP-42 is used, include a complete copy of the section.
 - ☒ If an EPA document or other material is referenced, include a complete copy.
 - ☒ Fuel specifications sheet.
 - ☒ If computer models are used to estimate emissions, include an input summary (if available) and a detailed report, and a disk containing the input file(s) used to run the model. For tank-flashing emissions, include a discussion of the method used to estimate tank-flashing emissions, relative thresholds (i.e., permit or major source (NSPS, PSD or Title V)), accuracy of the model, the input and output from simulation models and software, all calculations, documentation of any assumptions used, descriptions of sampling methods and conditions, copies of any lab sample analysis.
-

Amine Vent (Unit: Amine Unit)

- Promax

Thermal Oxidizer (Unit: 15)

- AP-42 Tables 1.4-1 and 1.4-2
- ProMax streams for HAP, VOC, and H₂S
- 40 CFR Part 98 methodology

Flares (Units: 9 & 16)

- Emission factors from TCEQ document “Technical Supplement 4: Flares” for air assisted or unassisted units combusting high-Btu waste streams (>1000 Btu/scf), February 2012.
- ProMax streams for HAP, VOC, and H₂S
- 40 CFR Part 98 methodology

Cooling Tower (Unit: CT)

- Manufacturer data

Turbines (Units: 1-7)

- AP-42 Tables 3.1-2a
- GRI-HAPCalc 3.01
- 40 CFR Part 98 methodology

Heaters (Units: 8, 12, & 13)

- AP-42 Tables 1.4-1 and 1.4-2
- GRI-HAPCalc 3.01
- 40 CFR Part 98 methodology

Fugitives (Unit: 14)

- Tables 2-4 and 5-2 of the EPA Protocol for Equipment Leak Emission Estimates, November 1995
- Inlet gas and liquid analysis for San Juan Gas Plant dated 09/01/2016

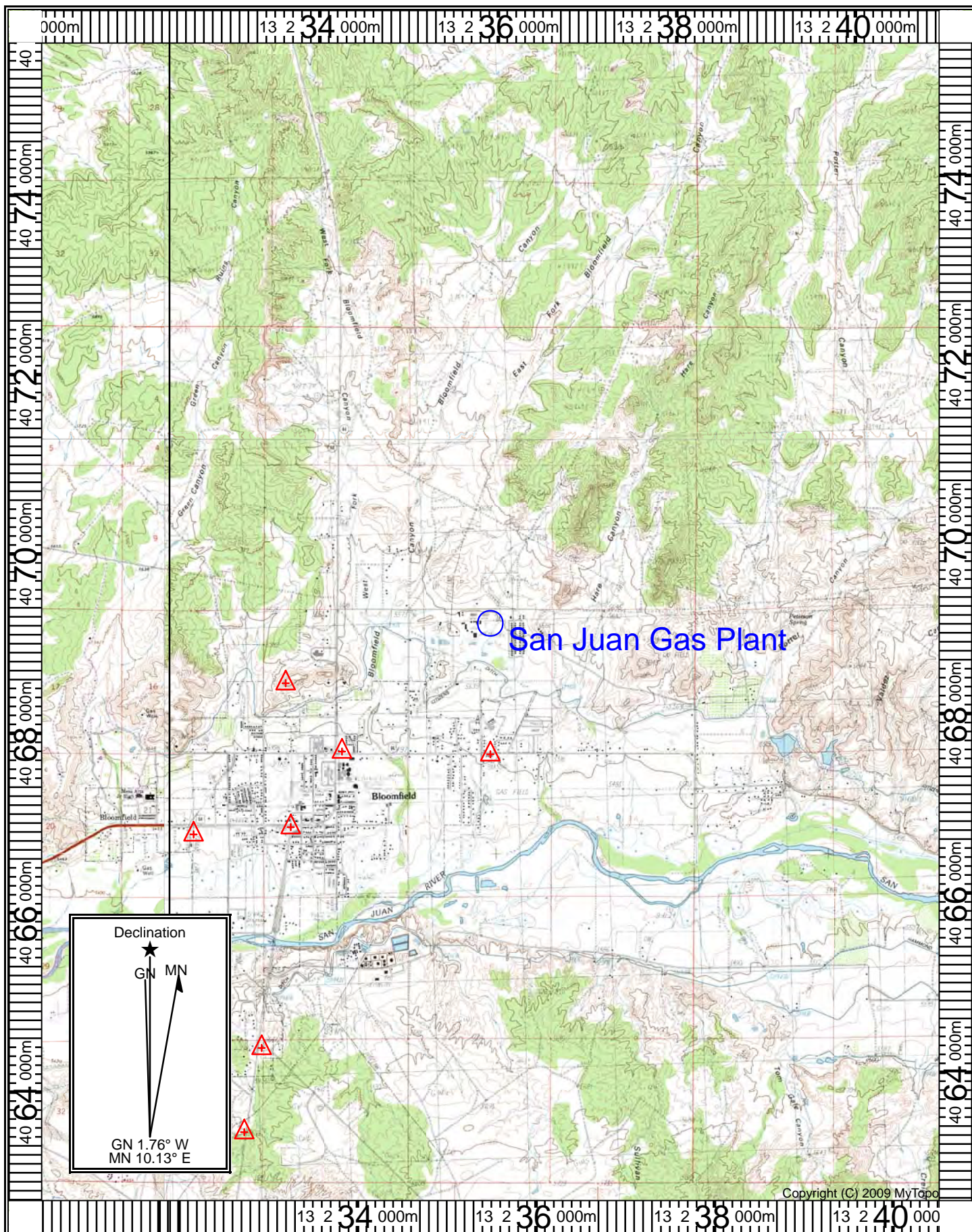
Section 8

Map(s)

A map such as a 7.5 minute topographic quadrangle showing the exact location of the source. The map shall also include the following:

The UTM or Longitudinal coordinate system on both axes	An indicator showing which direction is north
A minimum radius around the plant of 0.8km (0.5 miles)	Access and haul roads
Topographic features of the area	Facility property boundaries
The name of the map	The area which will be restricted to public access
A graphical scale	

A map can be found on the next page.



Map Name: BLOOMFIELD
 Print Date: 06/13/12

Scale: 1 inch = 4,761 ft.
 Map Center: 13 0235699 E 4069190 N

Horizontal Datum: WGS84

map brought forward from previous application

Section 9

Proof of Public Notice

(for NSR applications submitting under 20.2.72 or 20.2.74 NMAC)

(This proof is required by: 20.2.72.203.A.14 NMAC “Documentary Proof of applicant’s public notice”)

☐ **I have read the AQB “Guidelines for Public Notification for Air Quality Permit Applications”**

This document provides detailed instructions about public notice requirements for various permitting actions. It also provides public notice examples and certification forms. Material mistakes in the public notice will require a re-notice before issuance of the permit.

Unless otherwise allowed elsewhere in this document, the following items document proof of the applicant’s Public Notification. Please include this page in your proof of public notice submittal with checkmarks indicating which documents are being submitted with the application.

New Permit and **Significant Permit Revision** public notices must include all items in this list.

Technical Revision public notices require only items 1, 5, 9, and 10.

Per the Guidelines for Public Notification document mentioned above, include:

1. ☐ A copy of the certified letter receipts with post marks (20.2.72.203.B NMAC)
 2. ☐ A list of the places where the public notice has been posted in at least four publicly accessible and conspicuous places, including the proposed or existing facility entrance. (e.g: post office, library, grocery, etc.)
 3. ☐ A copy of the property tax record (20.2.72.203.B NMAC).
 4. ☐ A sample of the letters sent to the owners of record.
 5. ☐ A sample of the letters sent to counties, municipalities, and Indian tribes.
 6. ☐ A sample of the public notice posted and a verification of the local postings.
 7. ☐ A table of the noticed citizens, counties, municipalities and tribes and to whom the notices were sent in each group.
 8. ☐ A copy of the public service announcement (PSA) sent to a local radio station and documentary proof of submittal.
 9. ☐ A copy of the classified or legal ad including the page header (date and newspaper title) or its affidavit of publication stating the ad date, and a copy of the ad. When appropriate, this ad shall be printed in both English and Spanish.
 10. ☐ A copy of the display ad including the page header (date and newspaper title) or its affidavit of publication stating the ad date, and a copy of the ad. When appropriate, this ad shall be printed in both English and Spanish.
 11. ☐ A map with a graphic scale showing the facility boundary and the surrounding area in which owners of record were notified by mail. This is necessary for verification that the correct facility boundary was used in determining distance for notifying land owners of record.
-

Not Applicable for a Title V application

Section 10

Written Description of the Routine Operations of the Facility

A written description of the routine operations of the facility. Include a description of how each piece of equipment will be operated, how controls will be used, and the fate of both the products and waste generated. For modifications and/or revisions, explain how the changes will affect the existing process. In a separate paragraph describe the major process bottlenecks that limit production. The purpose of this description is to provide sufficient information about plant operations for the permit writer to determine appropriate emission sources.

In operation, a 15,000 horsepower (hp) inlet compression turbine (Unit 1) boosts the low-pressure inlet gas stream pressure. This compressed gas combines with the high-pressure inlet gas stream and is routed to an inlet separator for removal of free liquids. Gas from the inlet separator is split into two streams (for processing in two parallel trains) and is dehydrated by molecular sieve dehydration beds (two beds per train) to remove water prior to cryogenic processing. In each train, one dehydration bed is in service while the other is being regenerated. For regeneration, a slipstream of gas is taken from the inlet separator, compressed by a regeneration compressor, and then heated by regeneration heaters (Units 8 and 13). The heated gas passes through the wet dehydration bed to remove the water. The gas stream is then re-injected into the inlet stream.

The dehydrated gas is then refrigerated in the cryogenic plants to approximately -100 °F by a series of heat exchangers using a propane refrigeration system. Free liquids are then removed in the high-pressure cold separator. Condensed liquids are fed to the demethanizer; pressurized vapors are fed to the turboexpander where a near isentropic expansion reduces pressure and temperature and delivers shaft work to the recompressor for partial recompression of residue gas, recovering some of the energy expended in compressing the gas.

In the demethanizer in each train, ethane, propane, butane, and condensate (EPBC) are liquefied. EPBC is transferred to either the deethanizer or to a pipeline for delivery to customers for further processing and fractionation. The cold methane residue stream off the demethanizer is warmed through a series of heat exchangers (which cool gas streams for processing) prior to recompression by one of two 15,000 hp residue compressors (Units 2 & 3) and delivery to customers by pipeline. Note that the inlet and residue compressors, Units 1, 2, & 3, have Engelhard oxidation catalytic converters which reduce CO emissions. In the deethanizer process, the ethane/propane (EP) stream recovered from the deethanizer tower may be condensed and combined with the EPBC product stream from the cryogenic plants or compressed and injected into the residue gas stream. The deethanizer bottoms, a propane-butane-condensate (PBC) blend, are routed via pipeline to customers or sent to temporary pressurized storage.

Before shipping, the EPBC is routed to an amine contactor for CO₂ removal. Vent gas from amine system regeneration (CO₂ and H₂S) is routed to a sulfur removal system (Thermal Oxidizer, Unit 15) or to the flare system. CO₂ and the remaining H₂S (approximately <10 ppm or less) removed from the EPBC via the amine contactor are released to the atmosphere after being controlled by either the thermal oxidizer or the backup flare system. After CO₂ removal, the EPBC is routed through a desiccant system to remove any remaining entrained water. A natural gas fired heater (Unit 12) is used to regenerate the desiccant.

All liquid hydrocarbon product storage is pressurized. Several atmospheric tanks containing liquids with a vapor pressure less than ten millimeters of mercury (mmHg) are insignificant, as are the few atmospheric storage tanks which emit less than one ton per year (tpy).

Electricity used at the San Juan Gas Plant is generated by four natural gas fired (using only pipeline quality sweet natural gas), 3735 hp Solar Centaur turbines (Units 4, 5, 6, and 7).

In the event of an emergency or for maintenance, some or all of the facility piping may be blown down for safety reasons. In addition, the shutdown of turbines involves the purging of gas contained within the equipment. With the exception of the six PSVs, all blowdown and emergency shutdown emissions are routed to a staged flare system, consisting of two flares (Units 9 and 16). Non-routine emissions from the Demethanizers are vented to the atmosphere.

Section 11

Source Determination

Source submitting under 20.2.70, 20.2.72, 20.2.73, and 20.2.74 NMAC

Sources applying for a construction permit, PSD permit, or operating permit shall evaluate surrounding and/or associated sources (including those sources directly connected to this source for business reasons) and complete this section. Responses to the following questions shall be consistent with the Air Quality Bureau's permitting guidance, Single Source Determination Guidance, which may be found on the Applications Page in the Permitting Section of the Air Quality Bureau website.

Typically, buildings, structures, installations, or facilities that have the same SIC code, that are under common ownership or control, and that are contiguous or adjacent constitute a single stationary source for 20.2.70, 20.2.72, 20.2.73, and 20.2.74 NMAC applicability purposes. Submission of your analysis of these factors in support of the responses below is optional, unless requested by NMED.

A. Identify the emission sources evaluated in this section (list and describe):

B. Apply the 3 criteria for determining a single source:

SIC Code: Surrounding or associated sources belong to the same 2-digit industrial grouping (2-digit SIC code) as this facility, OR surrounding or associated sources that belong to different 2-digit SIC codes are support facilities for this source.

☐ Yes ☒ No

Common Ownership or Control: Surrounding or associated sources are under common ownership or control as this source.

☒ Yes ☐ No

Contiguous or Adjacent: Surrounding or associated sources are contiguous or adjacent with this source.

☒ Yes ☐ No

C. Make a determination:

- ☐ The source, as described in this application, constitutes the entire source for 20.2.70, 20.2.72, 20.2.73, or 20.2.74 NMAC applicability purposes. If in "A" above you evaluated only the source that is the subject of this application, all "YES" boxes should be checked. If in "A" above you evaluated other sources as well, you must check **AT LEAST ONE** of the boxes "NO" to conclude that the source, as described in the application, is the entire source for 20.2.70, 20.2.72, 20.2.73, and 20.2.74 NMAC applicability purposes.
- ☒ The source, as described in this application, **does not** constitute the entire source for 20.2.70, 20.2.72, 20.2.73, or 20.2.74 NMAC applicability purposes (A permit may be issued for a portion of a source). The entire source consists of the following facilities or emissions sources (list and describe):

San Juan Gas Plant, Blanco A Compressor Station, and Blanco C&D Compressor Station are located on contiguous and/or adjacent properties. San Juan Gas Plant is owned and operated by Harvest Four Corners, LLC and belongs to the Standard Industrial Classification (SIC) Major Group 13 (Oil & Gas Extraction). Blanco A Compressor Station is

owned and operated by El Paso Natural Gas Company and belongs to SIC Major Group 49. The Blanco C&D Compressor Station is owned by Enterprise Field Services, LLC and operated by Enterprise Products Operating, LLC and belongs to SIC Major Group 13 (Oil & Gas Extraction).

The plants are separate facilities for Title V permitting purposes. Common control of the three plants was established in 1984 through the issuance of a common NSR permit.

Section 12

Section 12.A

PSD Applicability Determination for All Sources

(Submitting under 20.2.72, 20.2.74 NMAC)

A PSD applicability determination for all sources. For sources applying for a significant permit revision, apply the applicable requirements of 20.2.74.AG and 20.2.74.200 NMAC and to determine whether this facility is a major or minor PSD source, and whether this modification is a major or a minor PSD modification. It may be helpful to refer to the procedures for Determining the Net Emissions Change at a Source as specified by Table A-5 (Page A.45) of the EPA New Source Review Workshop Manual to determine if the revision is subject to PSD review.

A. This facility is:

- ☐ a minor PSD source before and after this modification (if so, delete C and D below).
- ☐ a major PSD source before this modification. This modification will make this a PSD minor source.
- ☐ an existing PSD Major Source that has never had a major modification requiring a BACT analysis.
- ☐ an existing PSD Major Source that has had a major modification requiring a BACT analysis
- ☐ a new PSD Major Source after this modification.

B. This facility **[is or is not]** one of the listed 20.2.74.501 Table I – PSD Source Categories. The “project” emissions for this modification are **[significant or not significant]**. **[Discuss why.]** The “project” emissions listed below **[do or do not]** only result from changes described in this permit application, thus no emissions from other **[revisions or modifications, past or future]** to this facility. Also, specifically discuss whether this project results in “de-bottlenecking”, or other associated emissions resulting in higher emissions. The project emissions (before netting) for this project are as follows [see Table 2 in 20.2.74.502 NMAC for a complete list of significance levels]:

- a. NOx: **XX.X** TPY
- b. CO: **XX.X** TPY
- c. VOC: **XX.X** TPY
- d. SOx: **XX.X** TPY
- e. PM: **XX.X** TPY
- f. PM10: **XX.X** TPY
- g. PM2.5: **XX.X** TPY
- h. Fluorides: **XX.X** TPY
- i. Lead: **XX.X** TPY
- j. Sulfur compounds (listed in Table 2): **XX.X** TPY
- k. GHG: **XX.X** TPY

C. Netting **[is required, and analysis is attached to this document.] OR [is not required (project is not significant)] OR [Applicant is submitting a PSD Major Modification and chooses not to net.]**

D. BACT is **[not required for this modification, as this application is a minor modification.] OR [required, as this application is a major modification. List pollutants subject to BACT review and provide a full top down BACT determination.]**

E. If this is an existing PSD major source, or any facility with emissions greater than 250 TPY (or 100 TPY for 20.2.74.501 Table 1 – PSD Source Categories), determine whether any permit modifications are related, or could be considered a single project with this action, and provide an explanation for your determination whether a PSD modification is triggered.

Not Applicable for a Title V application

Section 13

Determination of State & Federal Air Quality Regulations

This section lists each state and federal air quality regulation that may apply to your facility and/or equipment that are stationary sources of regulated air pollutants.

Not all state and federal air quality regulations are included in this list. Go to the Code of Federal Regulations (CFR) or to the Air Quality Bureau's regulation page to see the full set of air quality regulations.

Required Information for Specific Equipment:

For regulations that apply to specific source types, in the 'Justification' column **provide any information needed to determine if the regulation does or does not apply. For example**, to determine if emissions standards at 40 CFR 60, Subpart IIII apply to your three identical stationary engines, we need to know the construction date as defined in that regulation; the manufacturer date; the date of reconstruction or modification, if any; if they are or are not fire pump engines; if they are or are not emergency engines as defined in that regulation; their site ratings; and the cylinder displacement.

Required Information for Regulations that Apply to the Entire Facility:

See instructions in the 'Justification' column for the information that is needed to determine if an 'Entire Facility' type of regulation applies (e.g. 20.2.70 or 20.2.73 NMAC).

Regulatory Citations for Regulations That Do Not, but Could Apply:

If there is a state or federal air quality regulation that does not apply, but you have a piece of equipment in a source category for which a regulation has been promulgated, you must **provide the low level regulatory citation showing why your piece of equipment is not subject to or exempt from the regulation. For example** if you have a stationary internal combustion engine that is not subject to 40 CFR 63, Subpart ZZZZ because it is an existing 2 stroke lean burn stationary RICE with a site rating of more than 500 brake HP located at a major source of HAP emissions, your citation would be 40 CFR 63.6590(b)(3)(i). **We don't want a discussion of every non-applicable regulation, but if it is possible a regulation could apply, explain why it does not. For example**, if your facility is a power plant, you do not need to include a citation to show that 40 CFR 60, Subpart OOO does not apply to your non-existent rock crusher.

Regulatory Citations for Emission Standards:

For each unit that is subject to an emission standard in a source specific regulation, such as 40 CFR 60, Subpart OOO or 40 CFR 63, Subpart HH, include the low level regulatory citation of that emission standard. Emission standards can be numerical emission limits, work practice standards, or other requirements such as maintenance. **Here are examples:** a glycol dehydrator is subject to the general standards at 63.764C(1)(i) through (iii); an engine is subject to 63.6601, Tables 2a and 2b; a crusher is subject to 60.672(b), Table 3 and all transfer points are subject to 60.672(e)(1)

Federally Enforceable Conditions:

All federal regulations are federally enforceable. All Air Quality Bureau State regulations are federally enforceable except for the following: affirmative defense portions at 20.2.7.6.B, 20.2.7.110(B)(15), 20.2.7.11 through 20.2.7.113, 20.2.7.115, and 20.2.7.116; 20.2.37; 20.2.42; 20.2.43; 20.2.62; 20.2.63; 20.2.86; 20.2.89; and 20.2.90 NMAC. Federally enforceable means that EPA can enforce the regulation as well as the Air Quality Bureau and federally enforceable regulations can count toward determining a facility's potential to emit (PTE) for the Title V, PSD, and nonattainment permit regulations.

INCLUDE ANY OTHER INFORMATION NEEDED TO COMPLETE AN APPLICABILITY DETERMINATION OR THAT IS RELEVANT TO YOUR FACILITY'S NOTICE OF INTENT OR PERMIT.

EPA Applicability Determination Index for 40 CFR 60, 61, 63, etc: <http://cfpub.epa.gov/adi/>

To save paper and to standardize the application format, delete this sentence, and begin your submittal for this attachment on this page.

Example of a Table for STATE REGULATIONS:

STATE REGU- LATIONS CITATION	Title	Applies? Enter Yes or No	Unit(s) or Facility	JUSTIFICATION: (You may delete instructions or statements that do not apply in the justification column to shorten the document.)
20.2.1 NMAC	General Provisions	Yes	Facility	General Provisions apply to Notice of Intent, Construction, and Title V permit applications.
20.2.3 NMAC	Ambient Air Quality Standards NMAAQs	Yes	Facility	If subject, this would normally apply to the entire facility. 20.2.3 NMAC is a State Implementation Plan (SIP) approved regulation that limits the maximum allowable concentration of, Sulfur Compounds, Carbon Monoxide and Nitrogen Dioxide. Title V applications, see exemption at 20.2.3.9 NMAC The TSP NM ambient air quality standard was repealed by the EIB effective November 30, 2018.
20.2.7 NMAC	Excess Emissions	Yes	Facility	If subject, this would normally apply to the entire facility. If your entire facility or individual pieces of equipment are subject to emissions limits in a permit or numerical emissions standards in a federal or state regulation, this applies. This would not apply to Notices of Intent since these are not permits.
20.2.23 NMAC	Fugitive Dust Control	No for permitted facilities, possible for NOIs	Facility	This regulation is not applicable because the facility is not a fugitive dust source.
20.2.33 NMAC	Gas Burning Equipment - Nitrogen Dioxide	No		This regulation is not applicable because the heat input to external gas burning equipment at the plant does not exceed the trigger level (one million MMBtu/year) established by this regulation.
20.2.34 NMAC	Oil Burning Equipment: NO ₂	No		This regulation is not applicable because the plant does not burn oil.
20.2.35 NMAC	Natural Gas Processing Plant – Sulfur	No		This regulation is not applicable because sulfur emissions from the plant are below the applicability thresholds established in the regulation.
20.2.37 and 20.2.36 NMAC	Petroleum Processing Facilities and Petroleum Refineries	N/A	N/A	These regulations were repealed by the Environmental Improvement Board. If you had equipment subject to 20.2.37 NMAC before the repeal, your combustion emission sources are now subject to 20.2.61 NMAC.
20.2.38 NMAC	Hydrocarbon Storage Facility	No		This regulation is not applicable because the plant does not store hydrocarbons containing hydrogen sulfide, nor is there a tank battery storing hydrocarbon liquids with a capacity greater than or equal to 65,000 gallons.
20.2.39 NMAC	Sulfur Recovery Plant - Sulfur	No		This regulation is not applicable because the plant is not equipped with a sulfur recovery plant.
20.2.61.109 NMAC	Smoke & Visible Emissions	Yes	1-13, 15, 16	This regulation that limits opacity to 20% applies to Stationary Combustion Equipment, such as engines, boilers, heaters, and flares unless your equipment is subject to another state regulation that limits particulate matter such as 20.2.19 NMAC (see 20.2.61.109 NMAC). If equipment at your facility was subject to the repealed regulation 20.2.37 NMAC it is now subject to 20.2.61 NMAC.
20.2.70 NMAC	Operating Permits	Yes	Facility	This regulation is applicable because the plant is a major source of NO ₂ and CO emissions.
20.2.71 NMAC	Operating Permit Fees	Yes	Facility	Yes, this facility is subject to 20.2.70 NMAC and is in turn subject to 20.2.71 NMAC
20.2.72 NMAC	Construction Permits	Yes	Facility	This facility is subject to 20.2.72 NMAC and NSR Permit number: 0613-M13
20.2.73 NMAC	NOI & Emissions Inventory Requirements	Yes	Facility	Emissions Inventory Reporting per 20.2.73.300 NMAC applies. All Title V major sources meet the applicability requirements of 20.2.73.300 NMAC.

<u>STATE REGU- LATIONS</u> CITATION	Title	Applies? Enter Yes or No	Unit(s) or Facility	JUSTIFICATION: (You may delete instructions or statements that do not apply in the justification column to shorten the document.)
20.2.74 NMAC	Permits – Prevention of Significant Deterioration (PSD)	Yes	Facility	This regulation is applicable because the facility is PSD major as defined by: (2) Any stationary source not listed in Table 1 of this Part (20.2.74.501 NMAC) and which emits or has the potential to emit two hundred fifty (250) tons per year or more of any regulated pollutant.
20.2.75 NMAC	Construction Permit Fees	Yes	Facility	This regulation is applicable because the plant is subject to 20.2.72 NMAC and it establishes the fee schedule associated with the filing of construction permits.
20.2.77 NMAC	New Source Performance	Yes	1-9, 13, 14 & 16	This is a stationary source which is subject to the requirements of 40 CFR Part 60.
20.2.78 NMAC	Emission Standards for HAPS	No		This facility emits hazardous air pollutants which are subject to the requirements of 40 CFR Part 61. However, it is a minor source, and as such, there are no affected facilities.
20.2.79 NMAC	Permits – Nonattainment Areas	No		This regulation is not applicable because the plant is neither located in nor has a significant impact on a non attainment area.
20.2.80 NMAC	Stack Heights	Yes	Facility	20.2.80 NMAC, Stack Heights, establishes guidelines for the selection of an appropriate stack height for the purposes of atmospheric dispersion modeling. Atmospheric dispersion modeling was previously provided in support of the facility's construction permit. An air dispersion modeling is being submitted for this NSR Permit revision application under 20.2.72 NMAC.
20.2.82 NMAC	MACT Standards for source categories of HAPS	Yes	10 & 11	This regulation is applicable because it adopts by reference the federal MACT standards for source categories codified in 40 CFR 63. The plant is subject to 40 CFR 63 Subparts A, ZZZZ as applicable.

Example of a Table for Applicable FEDERAL REGULATIONS (Note: This is not an exhaustive list):

<u>FEDERAL REGU- LATIONS</u> CITATION	Title	Applies? Enter Yes or No	Unit(s) or Facility	JUSTIFICATION:
40 CFR 50	NAAQS	Yes	Facility	Defined as applicable at 20.2.70.7.E.11, Any national ambient air quality standard.
NSPS 40 CFR 60, Subpart A	General Provisions	Yes	1-9, 13, 14 & 16	This regulation applies because 40 CFR 60, Subparts Dc, GG, & KKK apply.

<u>FEDERAL REGU- LATIONS CITATION</u>	Title	Applies? Enter Yes or No	Unit(s) or Facility	JUSTIFICATION:
NSPS 40 CFR60.40a, Subpart Da	Subpart Da, Performance Standards for Electric Utility Steam Generating Units	No		Not applicable as there are no electric utility steam generating units at this facility (§60.40a(a)).
NSPS 40 CFR60.40b Subpart Db	Electric Utility Steam Generating Units	No		Not applicable as there are no steam generating units at this facility with a heat input capacity greater than 100 MMBtu/hr (§60.40b(a)).
40 CFR 60.40c, Subpart Dc	Standards of Performance for Small Industrial- Commercial- Institutional Steam Generating Units	Yes	8, 13	Units 8 and 13 have a heat input greater than the 10 MMBtu/hr threshold and were constructed in 2011, after the June 9, 1989 applicability data (§60.40c(a)). Since these units combust only natural gas, there are no applicable standards, monitoring or reporting requirements. Records of fuel use are maintained in accordance with §60.48c(g)(1) and (2).
NSPS 40 CFR 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 July 23, 1984	No		Not applicable as the capacity of the tanks used for petroleum liquids at the facility are less than 151,412 liters (40,000 gallons) (§60.110a(a)).
NSPS 40 CFR 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	No		Not applicable as the only tank with a capacity greater than or equal to 75 cubic meters (19,813 gallons), Unit 29, stores used oil which has a true vapor pressure of less than 15 kPa (§60.110b(b)).
NSPS 40 CFR 60.330 Subpart GG	Stationary Gas Turbines	Yes	1-7	Units 1-7 have a heat input greater than the 10 MMBtu/hr threshold and were installed in 1986, after the October 3, 1977 applicability date (§60.330(a)).
NSPS 40 CFR 60, Subpart KKK	Leaks of VOC from Onshore Gas Plants	Yes	9, 14 & 16	This regulation is applicable because portions of the gas plant are in wet gas or VOC service and were constructed after January 20, 1984 and before August 23, 2011 (§60.630(a)).

<u>FEDERAL REGU- LATIONS</u> CITATION	Title	Applies? Enter Yes or No	Unit(s) or Facility	JUSTIFICATION:
NSPS 40 CFR Part 60 Subpart LLL	Standards of Performance for Onshore Natural Gas Processing: SO ₂ Emissions	No		This regulation is not applicable because although the plant is a natural gas processing plant as defined by the subpart, the facility has a design capacity less than 2 long tons per day of H ₂ S (§60.640(b)).
NSPS 40 CFR Part 60 Subpart OOOO	Standards of Performance for Crude Oil and Natural Gas Production, Transmission, and Distribution for which construction, modification or reconstruction commenced after August 23, 2011 and before September 18, 2015	No		This regulation is not applicable because the plant does not have equipment covered under the regulation that was constructed, modified or reconstructed after August 23, 2011 and before September 18, 2015 (§60.5365).
NSPS 40 CFR Part 60 Subpart OOOOa	Standards of Performance for Crude Oil and Natural Gas Facilities for which Construction, Modification or Reconstruction Commenced After September 18, 2015	No		This regulation is not applicable because the plant does not have equipment covered under the regulation that was constructed, modified or reconstructed after September 18, 2015 (§60.5365(a)).
NSPS 40 CFR 60 Subpart IIII	Standards of performance for Stationary Compression Ignition Internal Combustion Engines	No		This regulation is not applicable because the diesel-fired emergency generator engine (Unit 10) and firewater pump (Unit 11) commenced construction prior to July 11, 2005 (§60.4200(a)(2)).
NSPS 40 CFR Part 60 Subpart JJJJ	Standards of Performance for Stationary Spark Ignition Internal Combustion Engines	No		This regulation is not applicable because the facility does not utilize spark ignition internal combustion engines (§60.4230(a)).
NSPS 40 CFR 60 Subpart TTTT	Standards of Performance for Greenhouse Gas Emissions for Electric Generating Units	No		This regulation is not applicable because the plant does not have electric generating units (§60.5509(a)).
NSPS 40 CFR 60 Subpart UUUU	Emissions Guidelines for Greenhouse Gas Emissions and Compliance Times for Electric Utility Generating Units	No		This regulation is not applicable because the plant does not have electric generating units (§60.5710a).

<u>FEDERAL REGU- LATIONS CITATION</u>	Title	Applies? Enter Yes or No	Unit(s) or Facility	JUSTIFICATION:
NSPS 40 CFR 60, Subparts WWW, Cc, and Cf	Standards of performance for Municipal Solid Waste (MSW) Landfills	No		These regulations are not applicable because the plant is not a municipal solid waste (MSW) landfill.
NESHAP 40 CFR 61 Subpart A	General Provisions	No		These regulations do not apply because the plant is not a stationary source type under 40 CFR 61.
NESHAP 40 CFR 61 Subpart E	National Emission Standards for Mercury	No		This regulation does not apply because the plant does not process mercury ore to recover mercury, use mercury chlor-alkali cells to produce chlorine gas and alkali metal hydroxide, and incinerate or dry wastewater treatment plant sludge
NESHAP 40 CFR 61 Subpart V	National Emission Standards for Equipment Leaks (Fugitive Emission Sources)	No		This regulation does not as the potentially applicable sources are not intended to operate in volatile hazardous air pollutant (VHAP) service as defined by the Part (§61.01(a)).
MACT 40 CFR 63, Subpart A	General Provisions	Yes	10 & 11	This regulation applies because 40 CFR 63, Subpart ZZZZ applies.
MACT 40 CFR 63.760 Subpart HH	Oil and Natural Gas Production Facilities	No		This regulation is not applicable because the facility is an area source of HAP and has no affected sources (triethylene glycol dehydrators) (§63.760(b)(2)).
MACT 40 CFR 63 Subpart HHH		No		This regulation does not apply as the plant is not a natural gas transmission and storage facility as defined by the subpart (§63.1270(a)).
MACT 40 CFR 63 Subpart DDDDD	National Emission Standards for Hazardous Air Pollutants for Major Industrial, Commercial, and Institutional Boilers & Process Heaters	No		This regulation does not apply as the plant is not a major source of HAP (§63.7480).
MACT 40 CFR 63 Subpart UUUUU	National Emission Standards for Hazardous Air Pollutants Coal & Oil Fire Electric Utility Steam Generating Unit	No		This regulation does not apply as the plant does not have electric generating units (§63.9980).
MACT 40 CFR 63 Subpart ZZZZ	National Emissions Standards for Hazardous Air Pollutants for Stationary Reciprocating Internal Combustion Engines (RICE MACT)	Yes	10 & 11	This regulation applies because the plant is an area HAP source equipped with existing stationary RICE (§63.6590(a)(iii)) . These units are subject to the emergency stationary RICE provisions of ZZZZ ((§63.6603(a) and Table 2d, paragraphs 4 and 5).

<u>FEDERAL REGU- LATIONS CITATION</u>	Title	Applies? Enter Yes or No	Unit(s) or Facility	JUSTIFICATION:
40 CFR 64	Compliance Assurance Monitoring	Yes	1-3	This regulation applies because the facility operates affected sources. Uncontrolled CO emissions from each of Units 1-3 are major in and of themselves.
40 CFR 68	Chemical Accident Prevention	Yes	Facility	The facility is an affected facility. An RMP is maintained as required.
Title IV – Acid Rain 40 CFR 72	Acid Rain	No		This regulation does not apply as the facility is not an acid rain source
Title IV – Acid Rain 40 CFR 73	Sulfur Dioxide Allowance Emissions	No		This regulation does not apply as the facility is not an acid rain source.
Title IV-Acid Rain 40 CFR 75	Continuous Emissions Monitoring	No		This regulation does not apply as the facility is not an acid rain source.
Title IV – Acid Rain 40 CFR 76	Acid Rain Nitrogen Oxides Emission Reduction Program	No		This regulation does not apply as the facility is not an acid rain source.
Title VI – 40 CFR 82	Protection of Stratospheric Ozone	No	N/A	This regulation is not applicable because the plant does not produce, manufacture, transform, destroy, import, or export ozone-depleting substances; does not maintain or service motor vehicle air conditioning units or refrigeration equipment; and does not sell, distribute, or offer for sale or distribution any product that contains ozone-depleting substances.

Section 14

Operational Plan to Mitigate Emissions

(Submitting under 20.2.70, 20.2.72, 20.2.74 NMAC)

- ☒ **Title V Sources** (20.2.70 NMAC): By checking this box and certifying this application the permittee certifies that it has developed an Operational Plan to Mitigate Emissions During Startups, Shutdowns, and Emergencies defining the measures to be taken to mitigate source emissions during startups, shutdowns, and emergencies as required by 20.2.70.300.D.5(f) and (g) NMAC. This plan shall be kept on site to be made available to the Department upon request. This plan should not be submitted with this application.
- ☒ **NSR** (20.2.72 NMAC), **PSD** (20.2.74 NMAC) & **Nonattainment** (20.2.79 NMAC) **Sources:** By checking this box and certifying this application the permittee certifies that it has developed an Operational Plan to Mitigate Source Emissions During Malfunction, Startup, or Shutdown defining the measures to be taken to mitigate source emissions during malfunction, startup, or shutdown as required by 20.2.72.203.A.5 NMAC. This plan shall be kept on site to be made available to the Department upon request. This plan should not be submitted with this application.
- ☒ **Title V** (20.2.70 NMAC), **NSR** (20.2.72 NMAC), **PSD** (20.2.74 NMAC) & **Nonattainment** (20.2.79 NMAC) **Sources:** By checking this box and certifying this application the permittee certifies that it has established and implemented a Plan to Minimize Emissions During Routine or Predictable Startup, Shutdown, and Scheduled Maintenance through work practice standards and good air pollution control practices as required by 20.2.7.14.A and B NMAC. This plan shall be kept on site or at the nearest field office to be made available to the Department upon request. This plan should not be submitted with this application.
-

Startup and shutdown procedures are performed according to guidelines, which dictate proper procedural sequence to minimize emissions from the facility during such activities.

Equipment located at the plant is equipped with various safety devices that aid in preventing excess emissions to the atmosphere in the event of an operational emergency. In the event of a malfunction, startup, shutdown, or scheduled maintenance in which emission rates from the facility exceed permitted allowables, Harvest will notify the AQB in accordance with 20.2.7 NMAC and the equipment responsible for the exceedance will be repaired as soon as possible.

Section 15

Alternative Operating Scenarios

(Submitting under 20.2.70, 20.2.72, 20.2.74 NMAC)

Alternative Operating Scenarios: Provide all information required by the department to define alternative operating scenarios. This includes process, material and product changes; facility emissions information; air pollution control equipment requirements; any applicable requirements; monitoring, recordkeeping, and reporting requirements; and compliance certification requirements. Please ensure applicable Tables in this application are clearly marked to show alternative operating scenario.

Construction Scenarios: When a permit is modified authorizing new construction to an existing facility, NMED includes a condition to clearly address which permit condition(s) (from the previous permit and the new permit) govern during the interval between the date of issuance of the modification permit and the completion of construction of the modification(s). There are many possible variables that need to be addressed such as: Is simultaneous operation of the old and new units permitted and, if so for example, for how long and under what restraints? In general, these types of requirements will be addressed in Section A100 of the permit, but additional requirements may be added elsewhere. Look in A100 of our NSR and/or TV permit template for sample language dealing with these requirements. Find these permit templates at: https://www.env.nm.gov/aqb/permit/aqb_pol.html. Compliance with standards must be maintained during construction, which should not usually be a problem unless simultaneous operation of old and new equipment is requested.

In this section, under the bolded title “Construction Scenarios”, specify any information necessary to write these conditions, such as: conservative-realistic estimated time for completion of construction of the various units, whether simultaneous operation of old and new units is being requested (and, if so, modeled), whether the old units will be removed or decommissioned, any PSD ramifications, any temporary limits requested during phased construction, whether any increase in emissions is being requested as SSM emissions or will instead be handled as a separate Construction Scenario (with corresponding emission limits and conditions, etc).

There are no alternative operating scenarios at the San Juan Gas Plant, as Harvest understands the term.

Section 16

Air Dispersion Modeling

- 1) Minor Source Construction (20.2.72 NMAC) and Prevention of Significant Deterioration (PSD) (20.2.74 NMAC) ambient impact analysis (modeling): Provide an ambient impact analysis as required at 20.2.72.203.A(4) and/or 20.2.74.303 NMAC and as outlined in the Air Quality Bureau's Dispersion Modeling Guidelines found on the Planning Section's modeling website. If air dispersion modeling has been waived for one or more pollutants, attach the AQB Modeling Section modeling waiver approval documentation.
- 2) SSM Modeling: Applicants must conduct dispersion modeling for the total short term emissions during routine or predictable startup, shutdown, or maintenance (SSM) using realistic worst case scenarios following guidance from the Air Quality Bureau's dispersion modeling section. Refer to "Guidance for Submittal of Startup, Shutdown, Maintenance Emissions in Permit Applications (http://www.env.nm.gov/aqb/permit/app_form.html) for more detailed instructions on SSM emissions modeling requirements.
- 3) Title V (20.2.70 NMAC) ambient impact analysis: Title V applications must specify the construction permit and/or Title V Permit number(s) for which air quality dispersion modeling was last approved. Facilities that have only a Title V permit, such as landfills and air curtain incinerators, are subject to the same modeling required for preconstruction permits required by 20.2.72 and 20.2.74 NMAC.

What is the purpose of this application?	Enter an X for each purpose that applies
New PSD major source or PSD major modification (20.2.74 NMAC). See #1 above.	
New Minor Source or significant permit revision under 20.2.72 NMAC (20.2.72.219.D NMAC). See #1 above. Note: Neither modeling nor a modeling waiver is required for VOC emissions.	
Reporting existing pollutants that were not previously reported.	
Reporting existing pollutants where the ambient impact is being addressed for the first time.	
Title V application (new, renewal, significant, or minor modification. 20.2.70 NMAC). See #3 above.	
Relocation (20.2.72.202.B.4 or 72.202.D.3.c NMAC)	
Minor Source Technical Permit Revision 20.2.72.219.B.1.d.vi NMAC for like-kind unit replacements.	
Other: i.e. SSM modeling. See #2 above.	
This application does not require modeling since this is a No Permit Required (NPR) application.	
This application does not require modeling since this is a Notice of Intent (NOI) application (20.2.73 NMAC).	
This application does not require modeling according to 20.2.70.7.E(11), 20.2.72.203.A(4), 20.2.74.303, 20.2.79.109.D NMAC and in accordance with the Air Quality Bureau's Modeling Guidelines.	

Check each box that applies:

- ☐ See attached, approved modeling **waiver for all** pollutants from the facility.
- ☐ See attached, approved modeling **waiver for some** pollutants from the facility.
- ☐ Attached in Universal Application Form 4 (UA4) is a **modeling report for all** pollutants from the facility.
- ☐ Attached in UA4 is a **modeling report for some** pollutants from the facility.
- ☒ No modeling is required.

Modeling submitted March 2021 in connection with the changes proposed in NSR permit 0613-M13 application demonstrated compliance with NAAQS and NMAAQS.

Section 17

Compliance Test History

(Submitting under 20.2.70, 20.2.72, 20.2.74 NMAC)

To show compliance with existing NSR permits conditions, you must submit a compliance test history. The table below provides an example.

To save paper and to standardize the application format, delete this sentence and the samples in the Compliance Test History Table, and begin your submittal for this attachment on this page.

Compliance Test History Table **(Modify this sample table to suit your facility)**

Unit No.	Test Description	Test Date
1 - 7	Tested in accordance with EPA test methods for NOx and CO as required by Title V permit P124-R2.	June 8 & 9, 2021

Section 18

Addendum for Streamline Applications

Do not print this section unless this is a streamline application.

Streamline Applications do not require a complete application. Submit Sections 1-A, 1-B, 1-D, 1-F, 1-G, 2-A, 2-C thru L, Sections 3 thru 8, Section 13, Section 18, Section 22, and Section 23 (Certification). Other sections may be required at the discretion of the Department. 20.2.72.202 NMAC Exemptions do not apply to Streamline sources. 20.2.72.219 NMAC revisions and modifications do not apply to Streamline sources, thus 20.2.72.219 type actions require a complete new application submittal. Please do not print sections of a streamline application that are not required.

Not Applicable for a Title V application

Section 19

Requirements for Title V Program

Do not print this section unless this is a Title V application.

Who Must Use this Attachment:

- * Any major source as defined in 20.2.70 NMAC.
 - * Any source, including an area source, subject to a standard or other requirement promulgated under Section 111 - Standards of Performance for New Stationary Sources, or Section 112 Hazardous Air Pollutants, of the 1990 federal Clean Air Act ("federal Act"). Non-major sources subject to Sections 111 or 112 of the federal Act are exempt from the obligation to obtain an 20.2.70 NMAC operating permit until such time that the EPA Administrator completes rulemakings that require such sources to obtain operating permits. In addition, sources that would be required to obtain an operating permit solely because they are subject to regulations or requirements under Section 112(r) of the federal Act are exempt from the requirement to obtain an Operating Permit.
 - * Any Acid Rain source as defined under title IV of the federal Act. The Acid Rain program has additional forms. See <http://www.env.nm.gov/aqb/index.html>. Sources that are subject to both the Title V and Acid Rain regulations are encouraged to submit both applications simultaneously.
 - * Any source in a source category designated by the EPA Administrator ("Administrator"), in whole or in part, by regulation, after notice and comment.
-

To save paper and to standardize the application format, delete this sentence, and begin your submittal for this item here.

19.1 - 40 CFR 64, Compliance Assurance Monitoring (CAM) (20.2.70.300.D.10.e NMAC)

Any source subject to 40CFR, Part 64 (Compliance Assurance Monitoring) must submit all the information required by section 64.7 with the operating permit application. The applicant must prepare a separate section of the application package for this purpose; if the information is already listed elsewhere in the application package, make reference to that location. Facilities not subject to Part 64 are invited to submit periodic monitoring protocols with the application to help the AQB to comply with 20.2.70 NMAC. Sources subject to 40 CFR Part 64, must submit a statement indicating your source's compliance status with any enhanced monitoring and compliance certification requirements of the federal Act.

Facility units 1 – 3 are subject to CAM. The CAM plan of record is attached in this section.

19.2 - Compliance Status (20.2.70.300.D.10.a & 10.b NMAC)

Describe the facility's compliance status with each applicable requirement at the time this permit application is submitted. This statement should include descriptions of or references to all methods used for determining compliance. This statement should include descriptions of monitoring, recordkeeping and reporting requirements and test methods used to determine compliance with all applicable requirements. Refer to Section 2, Tables 2-N and 2-O of the Application Form as necessary. (20.2.70.300.D.11 NMAC) For facilities with existing Title V permits, refer to most recent Compliance Certification for existing requirements. Address new requirements such as CAM, here, including steps being taken to achieve compliance.

The plant is in compliance with all applicable requirements affecting the facility. A copy of Part 1 (Permit Requirements Certification Table) of the 2020 annual compliance certification is provided in Section 20, Other Relevant Information. It identifies all the requirements of the current Title V operating permit and the methods and data used to determine compliance. It is assumed that compliance with the Title V operating permit ensures compliance with the construction permit and New Mexico regulations.

19.3 - Continued Compliance (20.2.70.300.D.10.c NMAC)

Provide a statement that your facility will continue to be in compliance with requirements for which it is in compliance at the time of permit application. This statement must also include a commitment to comply with other applicable requirements as they come into effect during the permit term. This compliance must occur in a timely manner or be consistent with such schedule expressly required by the applicable requirement.

The plant will continue to be in compliance with applicable requirements for which it is in compliance at the time of this permit application. In addition, the plant will, in a timely manner or consistent with such schedule expressly required by the applicable requirement, comply with other applicable requirements as they come into effect during the permit term.

19.4 - Schedule for Submission of Compliance (20.2.70.300.D.10.d NMAC)

You must provide a proposed schedule for submission to the department of compliance certifications during the permit term. This certification must be submitted annually unless the applicable requirement or the department specifies a more frequent period. A sample form for these certifications will be attached to the permit.

The submittal of compliance certifications during the five-year term of the operating permit will occur annually.

19.5 - Stratospheric Ozone and Climate Protection

In addition to completing the four (4) questions below, you must submit a statement indicating your source's compliance status with requirements of Title VI, Section 608 (National Recycling and Emissions Reduction Program) and Section 609 (Servicing of Motor Vehicle Air Conditioners).

1. Does your facility have any air conditioners or refrigeration equipment that uses CFCs, HCFCs or other ozone-depleting substances? ☐ Yes ☒ No
 2. Does any air conditioner(s) or any piece(s) of refrigeration equipment contain a refrigeration charge greater than 50 lbs? ☐ Yes ☒ No
(If the answer is yes, describe the type of equipment and how many units are at the facility.)
 3. Do your facility personnel maintain, service, repair, or dispose of any motor vehicle air conditioners (MVACs) or appliances ("appliance" and "MVAC" as defined at 82. 152)? ☐ Yes ☒ No
 4. Cite and describe which Title VI requirements are applicable to your facility (i.e. 40 CFR Part 82, Subpart A through G.)
-

The facility does not produce, manufacture, transform, destroy, import, or export any stratospheric ozone-depleting substances (CFCs, HCFCs); does not maintain or service motor vehicle air conditioning units or refrigeration equipment; and does not sell, distribute, or offer for sale any product that may contain stratospheric ozone-depleting substances.

Harvest shall continue to maintain compliance with the conditions stipulated in 40 CFR 82, Subparts A-G of the Stratospheric Ozone Protection Program (Title VI of the Clean Air Act Amendments).

19.6 - Compliance Plan and Schedule

Applications for sources, which are not in compliance with all applicable requirements at the time the permit application is submitted to the department, must include a proposed compliance plan as part of the permit application package. This plan shall include the information requested below:

A. Description of Compliance Status: (20.2.70.300.D.11.a NMAC)

A narrative description of your facility's compliance status with respect to all applicable requirements (as defined in 20.2.70 NMAC) at the time this permit application is submitted to the department.

B. Compliance plan: (20.2.70.300.D.11.B NMAC)

A narrative description of the means by which your facility will achieve compliance with applicable requirements with which it is not in compliance at the time you submit your permit application package.

C. Compliance schedule: (20.2.70.300D.11.c NMAC)

A schedule of remedial measures that you plan to take, including an enforceable sequence of actions with milestones, which will lead to compliance with all applicable requirements for your source. This schedule of compliance must be at least as stringent as that contained in any consent decree or administrative order to which your source is subject. The obligations of any consent decree or administrative order are not in any way diminished by the schedule of compliance.

D. Schedule of Certified Progress Reports: (20.2.70.300.D.11.d NMAC)

A proposed schedule for submission to the department of certified progress reports must also be included in the compliance schedule. The proposed schedule must call for these reports to be submitted at least every six (6) months.

E. Acid Rain Sources: (20.2.70.300.D.11.e NMAC)

If your source is an acid rain source as defined by EPA, the following applies to you. For the portion of your acid rain source subject to the acid rain provisions of title IV of the federal Act, the compliance plan must also include any additional requirements under the acid rain provisions of title IV of the federal Act. Some requirements of title IV regarding the schedule and methods the source will use to achieve compliance with the acid rain emissions limitations may supersede the requirements of title V and 20.2.70 NMAC. You will need to consult with the Air Quality Bureau permitting staff concerning how to properly meet this requirement.

NOTE: The Acid Rain program has additional forms. See <http://www.env.nm.gov/aqb/index.html>. Sources that are subject to both the Title V and Acid Rain regulations are **encouraged** to submit both applications **simultaneously**.

The plant is in compliance with all applicable requirements; consequently, a compliance plan, a compliance schedule, and a schedule of certified progress reports is not required.

The plant is not equipped with any acid rain sources; consequently, compliance with the acid rain provisions is not required as a part of this permit application.

19.7 - 112(r) Risk Management Plan (RMP)

Any major sources subject to section 112(r) of the Clean Air Act must list all substances that cause the source to be subject to section 112(r) in the application. The permittee must state when the RMP was submitted to and approved by EPA.

San Juan Gas Plant has stationary sources that have more than a threshold quantity of a regulated substance in a process, as determined under §68.115. A Risk Management Plan was submitted to and accepted by the US EPA on June 9, 2014.

19.8 - Distance to Other States, Bernalillo, Indian Tribes and Pueblos

Will the property on which the facility is proposed to be constructed or operated be closer than 80 km (50 miles) from other states, local pollution control programs, and Indian tribes and pueblos (20.2.70.402.A.2 and 20.2.70.7.B NMAC)?

(If the answer is yes, state which apply and provide the distances.)

26

The plant is located within 80 kilometers of the following:

Colorado, 31 km;

Southern Ute Indian Tribe, 31 km;

Navajo Nation, 32.2 km;

Ute Mountain Reservation, 32.2 km;

Jicarilla Apache Reservation, 48.3 km.

19.9 - Responsible Official

Provide the Responsible Official as defined in 20.2.70.7.AD NMAC:

The Responsible Official for the San Juan Gas Plant is Travis Jones, EHS Manager of Harvest Midstream.

Harvest Four Corners, LLC/San Juan Gas Plant

CAM Plan for Turbine Units 1, 2, & 3

I. Background

A. Emissions Unit

Description:	Rolls-Royce Avon Stationary Gas Turbine
Identification:	1, 2, & 3
Facility:	San Juan Gas Plant (SJGP)

B. Applicable Regulation, Emission Limit, and Pre-CAM Monitoring Requirements

Regulation:	Emission limits, monitoring, recordkeeping and reporting requirements created in NSR Permit 0613 et seq. to establish federally enforceable recognition of emission control on engine.
Emission Limits:	CO: 9.6 lb/hr, 42.0 tpy

C. Control Technology, Capture System, Bypass, PTE

Controls:	Oxidation catalytic converter
Capture System:	N/A
Bypass:	N/A
Potential pre-control device emissions:	CO: 90 lb/hr (based on mfg data)
Potential post-control device emissions:	CO: 9.6 lb/hr (as permitted)

II. Monitoring Approach

The key elements of the monitoring approach are presented in the attached table.

III. Response to Excursion

- Excursions of the inlet temperature to the catalyst, pressure measured at the inlet of the catalyst, or CO levels during emission testing, will trigger an inspection, corrective action, and reporting. Maintenance personnel will inspect the compressors and catalyst within 24 hours and make needed repairs as soon as practicable.
- QIP Threshold: Any two excursions of CO levels during consecutive emission tests, regardless of whether inlet temperature to the catalyst is within the specification of this plan, shall trigger a Quality Improvement Plan (QIP).

Monitoring Approach: San Juan Gas Plant Units 1 – 3

	Indicator No. 1	Indicator No. 2	Indicator No. 3
I. Indicator	Temperature of exhaust gas into catalyst.	Pressure at the inlet to the catalyst.	CO measurement.
Measurement Approach	Exhaust gas temperature is monitored continuously.	Pressure at inlet to the catalyst bed is measured continuously.	CO is measured using 40 CFR 60 Appendix A reference methods, or a portable analyzer, in accordance with permit conditions.
II. Indicator Range	Temperature at the inlet of the catalyst shall not exceed 1280°F.	The pressure shall not exceed 10" H2O pressure as measured at the exhaust of the turbine.	CO above 9.6 lb/hr
III. Performance Criteria	Temperature is measured at the inlet of the catalyst by a thermocouple.	Pressure is measured by a pressure switch between the exhaust of the turbine and the inlet to the catalyst.	Gases are measured at the exhaust of the catalyst under normal operating conditions.
A. Data Representativeness			
B. QA/QC practices and Criteria	Thermocouple is inherently accurate due to the nature of the device. Malfunction is indicated by failure.	Pressure measuring device(s) calibrated during scheduled maintenance.	As stated in monitoring protocols
C. Monitoring Frequency	Temperature is monitored continuously.	Pressure is monitored continuously.	Annual, or as required by permit, testing to verify compliance with permitted emission limits.
D. Data Collection Procedures	Temperature data monitored continuously. Temperature in excess of indicator range triggers automatic shutdown.	Pressure data monitored continuously. Pressure exceeding specification of indicator range triggers automatic shutdown.	As specified in monitoring protocols.
E. Averaging Period	Continuous monitoring	Continuous monitoring.	Each test shall consist of at least three (3) valid test runs. Emission results shall be the arithmetic average of all valid test runs.

Section 20

Other Relevant Information

Other relevant information. Use this attachment to clarify any part in the application that you think needs explaining. Reference the section, table, column, and/or field. Include any additional text, tables, calculations or clarifying information.

Additionally, the applicant may propose specific permit language for AQB consideration. In the case of a revision to an existing permit, the applicant should provide the old language and the new language in track changes format to highlight the proposed changes. If proposing language for a new facility or language for a new unit, submit the proposed operating condition(s), along with the associated monitoring, recordkeeping, and reporting conditions. In either case, please limit the proposed language to the affected portion of the permit.

Part 1 - Permit Requirements Certification Table

Annual Compliance Certification Data for Title V Permit No. P124-R3									
1. Provide Method(s) or other information or other facts used to determine the compliance status in the “Methods:” row beneath each permit condition	2. What is the frequency of data collection used to determine compliance?	3. Was this facility in compliance with this requirement during the reporting period?	4. Were there any deviations associated with this requirement during the reporting period?						
FACILITY SPECIFIC REQUIREMENTS <u>A101 Permit Duration (expiration)</u> A. The term of this permit is five (5) years. It will expire five years from the date of issuance. Application for renewal of this permit is due twelve (12) months prior to the date of expiration. (20.2.70.300.B.2 and 302.B NMAC)	<input checked="" type="checkbox"/> Continuous <input type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No						
Methods: This permit, P124-R3, was issued on October 9, 2018. The application for renewal was due on 02/11/17 and was submitted on 02/06/2017. Permit P124-R2 expires on October 9, 2023.									
<u>A101 Permit Duration (expiration)</u> B. If a timely and complete application for a permit renewal is submitted, consistent with 20.2.70.300 NMAC, but the Department has failed to issue or disapprove the renewal permit before the end of the term of the previous permit, then the permit shall not expire and all the terms and conditions of the permit shall remain in effect until the renewal permit has been issued or disapproved. (20.2.70.400.D NMAC)	<input checked="" type="checkbox"/> Continuous <input type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No						
Methods: The renewal application was submitted on 02/06/2017, 12 months prior to expiration date of 02/11/2018 for P124-R2.									
<u>A102 Facility: Description</u> B. This facility is located approximately 2 miles northeast of Bloomfield, New Mexico in San Juan County. (20.2.70.302.A(7) NMAC)	<input checked="" type="checkbox"/> Continuous <input type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No						
Methods: There have been no changes to the facility description during this reporting period.									
<u>A103 Facility: Applicable Regulations</u> A. The permittee shall comply with all applicable sections of the requirements listed in Table 103.A	<input checked="" type="checkbox"/> Continuous <input type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No						
Methods: San Juan Gas Plant is in compliance with all applicable sections of the requirements listed in Table 103A and no modification to the facility have been made to affect this table.									
Table 103.A: Applicable Requirements <table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th style="width: 50%; padding: 5px;">Applicable Requirements</th> <th style="width: 20%; padding: 5px;">Federally Enforceable</th> <th style="width: 30%; padding: 5px;">Unit No.</th> </tr> </thead> <tbody> <tr> <td style="padding: 5px;">NSR Permit No: 0613-M10, M10R1&R2 (Per 20.2.72 NMAC)</td> <td style="text-align: center; padding: 5px;">X</td> <td style="padding: 5px;">Entire Facility</td> </tr> </tbody> </table>				Applicable Requirements	Federally Enforceable	Unit No.	NSR Permit No: 0613-M10, M10R1&R2 (Per 20.2.72 NMAC)	X	Entire Facility
Applicable Requirements	Federally Enforceable	Unit No.							
NSR Permit No: 0613-M10, M10R1&R2 (Per 20.2.72 NMAC)	X	Entire Facility							

1. Provide Method(s) or other information or other facts used to determine the compliance status in the "Methods:" row beneath each permit condition	2. What is the frequency of data collection used to determine compliance?	3. Was this facility in compliance with this requirement during the reporting period?	4. Were there any deviations associated with this requirement during the reporting period?
20.2.1 NMAC General Provisions	X	Entire Facility	
20.2.7 NMAC Excess Emissions	X	Entire Facility	
20.2.61 NMAC Smoke and Visible Emissions	X	1-13, 15, 16	
20.2.70 NMAC Operating Permits	X	Entire Facility	
20.2.71 NMAC Operating Permit Emission Fees	X	Entire Facility	
20.2.72 NMAC Construction Permit	X	Entire Facility	
20.2.73 NMAC Notice of Intent and Emissions Inventory Requirements	X	Entire Facility	
20.2.74 NMAC Permits – Prevention of Significant Deterioration (PSD)	X	Entire Facility	
20.2.77 NMAC New Source Performance	X	Units subject to 40 CFR 60	
20.2.82 NMAC MACT Standards for Source Categories of HAPS	X	Units subject to 40 CFR 63	
40 CFR 50 National Ambient Air Quality Standards	X	Entire Facility	
40 CFR 60, Subpart A, General Provisions	X	Units subject to 40 CFR 60	
40 CFR 60.18, Subpart A, General Provisions, Smokeless Flares	X	9 and 16	
40 CFR 60.48c(g)(1)&(2), Subpart Dc	X	8 and 13	
40 CFR 60.330(b), Subpart GG, Stationary Gas Turbines	X	1 to 7	
40 CFR 60.630, Subpart KKK, Equipment Leaks of VOC from Onshore Natural Gas Processing Plants	X	9, 14 & 16	
40 CFR 60.640(b), Subpart LLL, Standards of Performance for Onshore Natural Gas Processing: SO2 Emissions	X	Amine Unit	
40 CFR 63, Subpart A, General Provisions	X	Units subject to 40 CFR 63	
40 CFR 63, Subpart ZZZZ	X	10 & 11	
40 CFR 64 Compliance Assurance Monitoring	X	1 to 3	
40 CFR 68 Chemical Accident Prevention	X	Entire Facility	

1. Provide Method(s) or other information or other facts used to determine the compliance status in the "Methods:" row beneath each permit condition					2. What is the frequency of data collection used to determine compliance?	3. Was this facility in compliance with this requirement during the reporting period?	4. Were there any deviations associated with this requirement during the reporting period?
Settlement Agreement for Compliance Order AQCA 01-26 issued 6/24/2002					X	Entire Facility	
<u>A103 Facility: Applicable Regulations</u> C. Compliance with the terms and conditions of this permit regarding source emissions and operation demonstrate compliance with national ambient air quality standards specified at 40 CFR 50, which were applicable at the time air dispersion modeling was performed for the facility's NSR Permits 0613 dated 1984, for SO2 NSR 0613-M4, dated April 16, 1998.					<input checked="" type="checkbox"/> Continuous <input type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: There were no changes or alterations regarding source emissions during this reporting period.							
<u>A104 Facility: Regulated Sources</u> A. Table 104.A lists the emission units authorized for this facility. Emission units identified as insignificant or trivial activities (as defined in 20.2.70.7 NMAC) and/or equipment not regulated pursuant to the Act are not included.					<input checked="" type="checkbox"/> Continuous <input type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: The emissions units in Table 104.A are the correct units in service at the San Juan Gas Plant.							
Table 104.A: Regulated Sources List							
Unit No.	Source Description	Make	Model	Serial No.	Construction/ Reconstruction Date	Manufacture Date	Manufacturer Rated Capacity /Permitted Capacity
Amine Unit	Amine Unit Still Vent/Flash Tank						
1*	Natural Gas Turbine, Slot C-101	Rolls Royce	Avon 1535	37901 or 38392 or 38391 or 38389	1985 1986 1986 1986	1985 1986 1986 1986	23800/15000 hp
2*	Natural Gas Turbine, Slot C-201	Rolls Royce	Avon 1535	37901 or 38392 or 38391 or 38389	1985 1986 1986 1986	1985 1986 1986 1986	23800/15000 hp

1. Provide Method(s) or other information or other facts used to determine the compliance status in the "Methods:" row beneath each permit condition					2. What is the frequency of data collection used to determine compliance?	3. Was this facility in compliance with this requirement during the reporting period?	4. Were there any deviations associated with this requirement during the reporting period?
3*	Natural Gas Turbine, Slot C-301	Rolls Royce	Avon 1535	37901 or 38392 or 38391 or 38389	1985 1986 1986 1986	1985 1986 1986 1986	23800/15000 hp
4	Natural Gas Turbine	Solar Centaur	T4501	G-1300 A	1986	1986	4500/3735 hp
5	Natural Gas Turbine	Solar Centaur	T4501	G-1300 B	1986	1986	4500/3735 hp
6	Natural Gas Turbine	Solar Centaur	T4501	G-1300 C	1986	1986	4500/3735 hp
7	Natural Gas Turbine	Solar Centaur	T4501	G-1300 D	1986	1986	4500/3735 hp
8	Regeneration Heater	WILLBROS	Downstream	621-014	2012	2011	14.55 MMBtu/hr
9	Flare	John Zink		N/A	1986	1986	600 MM SCF/d, 200 ft tall
10	Diesel Generator	Caterpillar	G3412	9/12/2154	1986	1986	469 hp
11	Firewater Pump	Caterpillar	G3406	6TB03248	1986	1986	343 hp
12	Regeneration Heater	Broach		H-901	1986	1986	3.4 MMBtu/h
13	Regeneration Heater	WILLBROS Downstream		621-011	2011	2011	14.55 MMBtu/hr
14	Fugitives**	N/A		N/A	1986	1986	N/A
15	Thermal Oxidizer-Sulfur	Callidus		Not reported	1998	1986	12 MMBtu/h
16	Flare	John Zink		Not reported	2002	2002	6 MM SCF/d
SSM/M1	SSM and Malfunction emission	N/A		N/A	N/A		N/A
<p>* Emission Units 1 – 3, the Avon turbines, individually may have any one of four uniquely identified turbines installed. Up to three turbines will operate at any time; the fourth turbine will be held in maintenance reserve.</p> <p>** Valves, Pump seals, Compressor seals, Pressure relief valves, Connectors, and Open ended lines.</p>					<p><input checked="" type="checkbox"/> Continuous <input checked="" type="checkbox"/> Yes <input type="checkbox"/> Yes</p> <p><input type="checkbox"/> Intermittent <input type="checkbox"/> No <input checked="" type="checkbox"/> No</p>		

1. Provide Method(s) or other information or other facts used to determine the compliance status in the "Methods:" row beneath each permit condition	2. What is the frequency of data collection used to determine compliance?	3. Was this facility in compliance with this requirement during the reporting period?	4. Were there any deviations associated with this requirement during the reporting period?
Methods: The control equipment in Table 105.A is correct and in service during the reporting period. Also in service during low volume events is the chemical absorption bed for removal of H2S from the waste gas stream as represented in the Title V application. This is due to inefficiencies of the Thermal Oxidizer during low volume events. Note, this alternative operating removes sulfur from waste gas stream as apposed to converting to SO2 as done by the Thermal Oxidizer.			

Table 105.A: Control Equipment List:

Control Equipment Unit No.	Control Description	Pollutant being controlled	Control for Unit No. ¹
1	Catalytic Oxidation	CO & VOC	1
2	Catalytic Oxidation	CO & VOC	2
3	Catalytic Oxidation	CO & VOC	3
15	Thermal Oxidizer	H ₂ S & VOC	Amine treater, still vent and flash tank
Amine Unit	Chemical absorption Bed	H ₂ S & VOC	Amine Unit

1 Control for unit number refers to a unit number from the Regulated Equipment List

A106 Facility: Allowable Emissions

A. The following Section lists the emission units, and their allowable emission limits.

(40 CFR 50; 40 CFR 60, Subparts A GG, & KKK, 40 CFR 63, Subparts A & ZZZZ, Paragraphs 1, 7, and 8 of 20.2.70.302.A NMAC and NSR Permit 0613M10).

Methods: San Juan Gas Plant is in compliance with this permit condition, table 106A (table A205A of NSR 0613M8). Annual stack tests demonstrate compliance with emission limits for EU1, 2 and 3.

☒ Continuous
☐ Intermittent

☒ Yes
☐ No

☐ Yes
☒ No

Table 106.A: Allowable Emissions

Unit No.	NO _x (pph)	¹ NO _x (tpy)	CO (pph)	CO (tpy)	VOC (pph)	VOC (tpy)	SO ₂ (pph)	SO ₂ (tpy)	TSP (pph)	TSP (tpy)	PM ₁₀ (pph)	PM ₁₀ (tpy)	PM _{2.5} (pph)	PM _{2.5} (tpy)	H2S (pph)	H2S (tpy)
Amine Unit Still Vent / Flash Tank	-	-	0	0	0	0	0	0	-	-	-	-	-	-	-	-
001	56.3	246.4	9.6	42.0	0.3	1.3	⁵ <	<	<	3.6	<	3.6	<	3.6		
002	56.3	246.4	9.6	42.0	0.3	1.3	<	<	<	3.6	<	3.6	<	3.6		

1. Provide Method(s) or other information or other facts used to determine the compliance status in the "Methods:" row beneath each permit condition											2. What is the frequency of data collection used to determine compliance?		3. Was this facility in compliance with this requirement during the reporting period?		4. Were there any deviations associated with this requirement during the reporting period?	
003	56.3	246.4	9.6	42.0	0.3	1.3	<	<	<	3.6	<	3.6	<	3.6		
004	15.9	69.8	2.3	10.0	<	<	<	<	<	1.0	<	1.0	<	1.0		
005	15.9	69.8	2.3	10.0	<	<	<	<	<	1.0	<	1.0	<	1.0		
006	15.9	69.8	2.3	10.0	<	<	<	<	<	1.0	<	1.0	<	1.0		
007	15.9	69.8	2.3	10	<	<	<	<	<	1.0	<	1.0	<	1.0		
008	<	3.3	<	1.5	<	<	<	<	<	<	<	<	<	<		
009 ⁴	0.2	0.8	0.5	1.9	0.2	0.74	-	-	-	-	-	-	-	-		
012	<	1.5	<	<	<	<	<	<	<	<	<	<	<	<		
013	<	3.3	<	1.5	<	<	<	<	<	<	<	<	<	<		
014	-	-	-	-	*	38.01	-	-	-	-	-	-	-	-		
015	2.2	9.8	0.47	2.1	0.1	0.45	5.5	24.4	0.24	1.03	0.24	1.03	0.24	1.03	0.03	0.13
016	1.31	5.75	3.52	15.42	1.31	5.72	-	-	-	-	-	-	-	-		
Rotating Spare ²	(56.3)	(246.4)	(9.6)	(42.0)	(0.3)	(1.3)	<	<		(3.56)		(3.56)		(3.56)		
<p>1 Nitrogen dioxide emissions include all oxides of nitrogen expressed as NO₂.</p> <p>2 The emissions from this unit are not included in total allowables since it can only operate in place for either Units 1, 2 or 3.</p> <p>3 Title V annual fee assessments are based on the sum of allowable tons per year emission limits in Sections A106 and A107.</p> <p>4 Compliance with emergency flare emission limits is demonstrated by limiting combustion to pilot and/or purge gas only.</p> <p>5 To report excess emissions for sources with no pound per hour and/or ton per year emission limits, see condition B110.E.</p> <p>"-" indicates the application represented emissions are not expected for this pollutant.</p> <p>"<" indicates that the application represented the uncontrolled mass emission rates are less than 1.0 pph or 1.0 tpy for this emissions unit and this air pollutant. The Department determined that allowable mass emission limits were not required for this unit and this pollutant.</p> <p>"*" indicates hourly emission limits are not appropriate for this operating situation.</p>																
A106 Facility: Allowable Emissions B. NO _x emissions from any of the Rolls Royce turbines (Units 1-3) shall not exceed 150 ppmv at 15 percent oxygen on a dry basis. (40 CFR 60 Subpart GG)											<input checked="" type="checkbox"/> Continuous <input type="checkbox"/> Intermittent		<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No		<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	
Methods: San Juan Gas Plant is in compliance with this permit condition.																
A106 Facility: Allowable Emissions C. NO _x emissions from any of the Solar Mars turbines (Units 4-7) shall not exceed 150 ppmv at 15 percent oxygen on a dry basis. (40 CFR 60 Subpart GG)											<input checked="" type="checkbox"/> Continuous <input type="checkbox"/> Intermittent		<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No		<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	
Methods: San Juan Gas Plant is in compliance with this permit condition.																

<p><i>1. Provide Method(s) or other information or other facts used to determine the compliance status in the "Methods:" row beneath each permit condition</i></p>	<p>2. What is the frequency of data collection used to determine compliance?</p>	<p>3. Was this facility in compliance with this requirement during the reporting period?</p>	<p>4. Were there any deviations associated with this requirement during the reporting period?</p>																						
<p><u>A107 Facility: Allowable Startup, Shutdown, & Maintenance (SSM) and Malfunction Emissions</u> A. The maximum allowable SSM and Malfunction emission limits for this facility are listed in Table 107.A and were relied upon by the Department to determine compliance with applicable regulations.</p>	<p><input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent</p>	<p><input checked="" type="checkbox"/> Yes <input type="checkbox"/> No</p>	<p><input checked="" type="checkbox"/> Yes <input type="checkbox"/> No</p>																						
<p>Methods: SSM&M reports are submitted with semi-annual reports and the 12-month rolling total has not exceeded permit limits from table 107A.</p>																									
<p>Table 107.A: Allowable SSM and Malfunction Units, Activities, and Emission Limits</p> <table border="1" style="width: 100%; border-collapse: collapse; margin: 0 auto;"> <thead> <tr> <th style="width: 10%;">Unit No.</th> <th style="width: 10%;">NO_x (pph)</th> <th style="width: 10%;">NO_x (tpy)</th> <th style="width: 10%;">CO (pph)</th> <th style="width: 10%;">CO (tpy)</th> <th style="width: 10%;">VOC (pph)</th> <th style="width: 10%;">VOC (tpy)</th> <th style="width: 10%;">SO₂ (pph)</th> <th style="width: 10%;">SO₂ (tpy)</th> <th style="width: 10%;">H₂S (pph)</th> <th style="width: 10%;">H₂S (tpy)</th> </tr> </thead> <tbody> <tr> <td style="text-align: center;">SSM/M1</td> <td style="text-align: center;">20.8</td> <td style="text-align: center;">10.0</td> <td style="text-align: center;">20.8</td> <td style="text-align: center;">10.0</td> <td style="text-align: center;">20.8</td> <td style="text-align: center;">10.0</td> <td style="text-align: center;">0</td> <td style="text-align: center;">0</td> <td style="text-align: center;">0</td> <td style="text-align: center;">0</td> </tr> </tbody> </table> <p>1. This authorization does not include VOC combustion emissions.</p> <p>2. To report excess emissions for sources with no pound per hour and/or ton per year emission limits, see condition B110.E.</p>				Unit No.	NO _x (pph)	NO _x (tpy)	CO (pph)	CO (tpy)	VOC (pph)	VOC (tpy)	SO ₂ (pph)	SO ₂ (tpy)	H ₂ S (pph)	H ₂ S (tpy)	SSM/M1	20.8	10.0	20.8	10.0	20.8	10.0	0	0	0	0
Unit No.	NO _x (pph)	NO _x (tpy)	CO (pph)	CO (tpy)	VOC (pph)	VOC (tpy)	SO ₂ (pph)	SO ₂ (tpy)	H ₂ S (pph)	H ₂ S (tpy)															
SSM/M1	20.8	10.0	20.8	10.0	20.8	10.0	0	0	0	0															
<p><u>A107 Facility: Allowable Startup, Shutdown, & Maintenance (SSM) and Malfunction Emissions</u> B. The authorization of emission limits for startup, shutdown, maintenance, and malfunction does not supersede the requirements to minimize emissions according to Conditions B101.C and B107.A.</p>	<p><input checked="" type="checkbox"/> Continuous <input type="checkbox"/> Intermittent</p>	<p><input checked="" type="checkbox"/> Yes <input type="checkbox"/> No</p>	<p><input type="checkbox"/> Yes <input checked="" type="checkbox"/> No</p>																						
<p>Methods: The facility complies with this permit condition by routing all emissions through the closed vent system control device.</p>																									
<p><u>A107 Facility: Allowable Startup, Shutdown, & Maintenance (SSM) and Malfunction Emissions</u> C. SSM and Malfunction Flaring (Units 9 and 16) Requirement: (1) Compliance Method The permittee shall not exceed the pound per hour (pph) or ton per year (tpy) SSM/M1 emission limits in Table A107.A and shall demonstrate compliance with these limits by calculating and summarizing these emission rates as required in recordkeeping. (2) Emissions included in Permit Limit and/or Reported as Excess Emissions (a) All emissions due to routine or predictable startup, shutdown, and/or maintenance (SSM) must be included under and shall not exceed the SSM emission limits in this permit. For emissions due to malfunctions (M1), the permittee has the option to report these malfunction emissions as excess emissions under 20.2.7.110.A(2) NMAC or include the emissions under the Table 107.A limits. (b) Once emissions from a malfunction event are submitted in the final report (due no later than ten days after the end of the excess emissions event) per 20.2.7.110.A(2) NMAC, the event is considered an excess emission and cannot</p>	<p><input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent</p>	<p><input type="checkbox"/> Yes <input checked="" type="checkbox"/> No</p>	<p><input checked="" type="checkbox"/> Yes <input type="checkbox"/> No</p>																						

1. Provide Method(s) or other information or other facts used to determine the compliance status <i>in the "Methods:" row beneath each permit condition</i>	2. What is the frequency of data collection used to determine compliance?	3. Was this facility in compliance with this requirement during the reporting period?	4. Were there any deviations associated with this requirement during the reporting period?
<p>be applied toward the SSM/M1 limits in this permit.</p> <p>(3) Emissions Exceeding the Permit Limit</p> <p>If the monthly rolling 12-month total of SSM/M1 emissions exceed any emission limit in Table 107.A, the permittee shall report the emissions as excess emissions in accordance with 20.2.7.110 NMAC.</p> <p>(4) Emissions Due to Preventable Events</p> <p>Emissions that are due entirely or in part to poor maintenance, careless operation, or any other preventable equipment breakdown shall not be included under the emission limits in Table 107.A. These emissions shall be reported as excess emissions in accordance with 20.2.7.110 NMAC.</p>			
<p>Methods: The facility is in compliance with the requirements of this condition.</p>			
<p>Monitoring:</p> <p>(1) A gas flowmeter and flow totalizer, equipped with a chart recorder or data logger (electronic storage), shall be installed in each flare line to measure and record the total standard cubic feet (scf) of gas sent to the flare during each hour and each month.</p> <p>(2) The permittee shall measure the H₂S concentration, the total sulfur concentration, the VOC concentration, and the heating value (Btu/scf) of the gas sent to each flare for combustion. H₂S shall be measured at least quarterly using a stain tube of the appropriate size range or an inline H₂S monitor; or measured annually with a gas analysis. The total sulfur concentration, VOC concentration, and heating value (Btu/scf) of the natural gas sent to the flare shall be measured at least once annually with a gas analysis that measures total sulfur.</p> <p>(3) The flow meter, totalizer, and if used, the inline monitor shall be operated, calibrated, and maintained as specified by the manufacturer or equivalent and as necessary to ensure correct and accurate readings.</p>	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
<p>Methods: The facility monitors H₂S concentration, total sulfur concentration, VOC concentration, and heating value during SSM&M events to flare by reporting in semi-annual reports.</p>			
<p>Recordkeeping:</p> <p>(1) Compliance Method</p> <p>(a) Any malfunction emissions that have been reported in a final excess emissions report per 20.2.7.110.A(2) NMAC, shall be excluded from the monthly rolling 12-month total emissions.</p> <p>(2) Emissions included Under Permit Limit or Reported as Excess Emissions</p> <p>(a) The permittee shall record whether emissions are included under the SSM/M1 emission limits in Table 107.A or if the event is included in a final excess emissions report per 20.2.7.110.A(2) NMAC.</p> <p>(3) Condition B109 Records</p>	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No

1. Provide Method(s) or other information or other facts used to determine the compliance status <i>in the "Methods:" row beneath each permit condition</i>	2. What is the frequency of data collection used to determine compliance?	3. Was this facility in compliance with this requirement during the reporting period?	4. Were there any deviations associated with this requirement during the reporting period?
<p>The permittee shall keep records in accordance with Condition B109 of this permit except for the following:</p> <p>(a) The following records shall be kept:</p> <ul style="list-style-type: none"> • stain tube and/or inline H₂S measurements • annual gas analyses • hourly and monthly flowmeter and flow totalizer measurements of gas sent to each flare <p>(b) Each month, the permittee shall record and summarize in a table format the following.</p> <ul style="list-style-type: none"> • H₂S and the total sulfur concentration • percent VOC concentration • gas heating value (Btu/scf) • the maximum hourly gas flow rate (scf/hr) that occurred during the month • the hourly gas flow rate (scf/hr) for any hours that exceeded any pph emission limit during the month • the total month's scf of gas sent to the flare • during the first 12-months of monitoring, the cumulative total of gas sent to the flare (scf/yr) • after the first 12-months of monitoring, the monthly rolling 12-month total of gas sent to the flare (scf/yr) <p>(c) Each month, the permittee shall record all routine and predictable startups, shutdowns, and scheduled maintenance events and shall also meet the recordkeeping requirements in General Condition B109 of this permit, except the requirement to record the start and end times of SSM events shall not apply.</p> <p>(d) Records of flowmeter, totalizer, and inline monitor certifications, calibrations, breakdowns, reasons for the breakdown, and corrective actions taken shall be maintained.</p> <p>(e) Each month to demonstrate compliance with emission limits, the permittee shall calculate and summarize the maximum pph emission rate, any pph emission rate exceeding the permitted limits, and the ton per year emission rates of NO_x, CO, VOC, SO₂, and H₂S using the following information:</p> <ul style="list-style-type: none"> • the H₂S concentration, total sulfur concentration, VOC concentration, and the gas heating value (MMBtu/scf) from the most recent H₂S measurements and gas analyses • the emission factors used to calculate NO_x and CO • the maximum hourly gas flow rate (scf/hr) • the hourly gas flow rate (scf/hr) for any hours that exceeded any pph emission limit during the month • during the first 12 months of monitoring, the cumulative total of gas sent to the flare after the first 12-months of monitoring, the monthly rolling 12-month total of gas sent to the flare (scf/yr) 			
<p>Methods: The facility keeps records of SSM&M events to the flare and demonstrates compliance with this permit condition by reporting in semi-annual reports.</p>			
<p>Reporting: The permittee shall report in accordance with Section B110.</p>			

1. Provide Method(s) or other information or other facts used to determine the compliance status in the "Methods:" row beneath each permit condition	2. What is the frequency of data collection used to determine compliance?	3. Was this facility in compliance with this requirement during the reporting period?	4. Were there any deviations associated with this requirement during the reporting period?
Methods: Reporting requirements of condition A 107 are submitted in accordance with Section B110 and per schedule in condition A109.	<input checked="" type="checkbox"/> Continuous <input type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
<u>A108 Facility: Hours of Operation</u>			
A. This facility is authorized for continuous operation. Monitoring, recordkeeping, and reporting are not required to demonstrate compliance with continuous hours of operation.			
<u>A109 Facility: Reporting Schedules</u> A. A Semi-Annual Report of monitoring activities is due within 45 days following the end of every 6-month reporting period. The 6-month reporting periods start on March 1 st and September 1 st of each year. Methods: Semi-annual reports of monitoring activities have been submitted as required by condition A109A. Reports were submitted on 05/31/2018 (USPS 9114 9999 4423 8958 8760 72) and 12/12/2018 (USPS 9114 9999 4423 8958 8762 32).	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
<u>A109 Facility: Reporting Schedules</u> B. The Annual Compliance Certification Report is due within 30 days of the end of every 12-month reporting period. The 12-month reporting period starts on March 1 st of each year. Methods: Annual Compliance Certification report(s) have been submitted as required by condition A109.B to NMED on 05/30/2018 (USPS 9114 9999 4423 8958 8760 89).	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
<u>A109 Facility: Reporting Schedules</u> C. Any report required by this permit to be sent to the Department shall, at the same time, be sent to the other parties to the NSR permit. (NSR Permit 0613-M7, Condition A208) Enterprise Field Services, LLC and Enterprise Products Operating, LLC Attn: Graham Bacon PO Box 4324 Houston, TX 77210-4324 El Paso Natural Gas Attn: Richard Duarte 5151 East Broadway, Suite 1680 Tucson, AZ 85711 Harvest Pipeline Company, LLC Attn: Matt Henderson	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No

1. Provide Method(s) or other information or other facts used to determine the compliance status in the "Methods:" row beneath each permit condition	2. What is the frequency of data collection used to determine compliance?	3. Was this facility in compliance with this requirement during the reporting period?	4. Were there any deviations associated with this requirement during the reporting period?
PO Box 217 Bloomfield, NM 87413			
Methods: Reports required by this permit were sent to the parties listed as per A109C.			
<u>A110 Facility: Fuel and Fuel Sulfur Requirements</u> A. Fuel and Fuel Sulfur Requirements (Units 1-9, 12, 13, 15, 16) Requirement: All combustion emission units shall combust only natural gas containing no more than 5.0 grains of total sulfur per 100 dry standard cubic feet.	<input checked="" type="checkbox"/> Continuous <input type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: Facility demonstrates compliance with fuel sulfur requirements by including Tariff Agreements in the semi-annual report as allowed by the recordkeeping portion of permit condition A110A.			
Monitoring: None. Compliance is demonstrated through records.	<input checked="" type="checkbox"/> Continuous	<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> Yes
Methods: None	<input type="checkbox"/> Intermittent	<input type="checkbox"/> No	<input checked="" type="checkbox"/> No
Recordkeeping: The permittee shall demonstrate compliance with the natural gas or fuel oil limit on total sulfur content by maintaining records of a current, valid purchase contract, tariff sheet or transportation contract for the gaseous or liquid fuel, or fuel gas analysis, specifying the allowable limit or less. If fuel gas analysis is used, the analysis shall not be older than one year.	<input checked="" type="checkbox"/> Continuous <input type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: Facility demonstrates compliance with fuel sulfur requirements by including Tariff Agreements in the semi-annual report as allowed by the recordkeeping portion of permit condition A110A.			
Reporting: The permittee shall report in accordance with Section B110.	<input checked="" type="checkbox"/> Continuous	<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> Yes
Methods: Facility demonstrates compliance with fuel sulfur requirements by including Tariff Agreements in the semi-annual report as allowed by the recordkeeping portion of permit condition A110A. Reports are submitted in accordance with condition A109 schedule.	<input type="checkbox"/> Intermittent	<input type="checkbox"/> No	<input checked="" type="checkbox"/> No
<u>A111 Facility: 20.2.61 NMAC Opacity</u> A. 20.2.61 NMAC Opacity Requirements (Units 1-9, 12, 13, 15, 16) Requirement: Visible emissions from all stationary combustion emission stacks shall not equal or exceed an opacity of 20 percent in accordance with the requirements at 20.2.61.109 NMAC.	<input checked="" type="checkbox"/> Continuous <input type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: Facility demonstrates compliance with opacity requirements by reporting in semi-annual compliance reports.			
Monitoring: (1) Use of natural gas fuel constitutes compliance with 20.2.61 NMAC unless opacity equals or exceeds 20% averaged over a 10-minute period. When any visible emissions are observed during operation other than during startup mode, opacity shall be measured over a 10-minute period, in accordance with the procedures at 40 CFR 60, Appendix A,	<input checked="" type="checkbox"/> Continuous <input type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No

1. Provide Method(s) or other information or other facts used to determine the compliance status in the "Methods:" row beneath each permit condition	2. What is the frequency of data collection used to determine compliance?	3. Was this facility in compliance with this requirement during the reporting period?	4. Were there any deviations associated with this requirement during the reporting period?
<p>Reference Method 9 (EPA Method 9) as required by 20.2.61.114 NMAC, or the operator will be allowed to shut down the equipment to perform maintenance/repair to eliminate the visible emissions. Following completion of equipment maintenance/repair, the operator shall conduct visible emission observations following startup in accordance with the following procedures:</p> <p>(a) Visible emissions observations shall be conducted over a 10-minute period during operation after completion of startup mode in accordance with the procedures at 40 CFR 60, Appendix A, Reference Method 22 (EPA Method 22). If no visible emissions are observed, no further action is required.</p> <p>(b) If any visible emissions are observed during completion of the EPA Method 22 observation, subsequent opacity observations shall be conducted over a 10-minute period, in accordance with the procedures at EPA Method 9 as required by 20.2.61.114 NMAC.</p> <p>For the purposes of this condition, <i>Startup mode</i> is defined as the startup period that is described in the facility's startup plan.</p>			
<p>Methods: Facility demonstrates compliance with opacity monitoring requirements by reporting in semi-annual compliance reports.</p>			
<p>Recordkeeping:</p> <p>(1) If any visible emissions observations were conducted, the permittee shall keep records in accordance with the requirements of Section B109 and as follows:</p> <p>(a) For any visible emissions observations conducted in accordance with EPA Method 22, record the information on the form referenced in EPA Method 22, Section 11.2.</p> <p>(b) For any opacity observations conducted in accordance with the requirements of EPA Method 9, record the information on the form referenced in EPA Method 9, Sections 2.2 and 2.4.</p>	<input checked="" type="checkbox"/> Continuous <input type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
<p>Methods: Facility demonstrates compliance with visible emissions observations by keeping records according to Section B109 and by reporting in semi-annual compliance reports.</p>			
<p>Reporting: The permittee shall report in accordance with Section B110.</p>	<input checked="" type="checkbox"/> Continuous	<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> Yes
<p>Methods: Reporting requirements of condition A 111 are submitted in accordance with Section B110 and per schedule in condition A109.</p>	<input type="checkbox"/> Intermittent	<input type="checkbox"/> No	<input checked="" type="checkbox"/> No
<p>A111 Facility: 20.2.61 NMAC Opacity</p> <p>B. 20.2.61 NMAC Opacity Requirements (Units 10 and 11)</p> <p>Requirement: Visible emissions from all emission stacks of all compression ignition engines shall not equal or exceed an opacity of 20 percent in accordance with the requirements at 20.2.61.109 NMAC.</p>	<input checked="" type="checkbox"/> Continuous <input type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
<p>Methods: Facility demonstrates compliance with opacity requirements by reporting in semi-annual compliance reports.</p>			

1. Provide Method(s) or other information or other facts used to determine the compliance status in the "Methods:" row beneath each permit condition	2. What is the frequency of data collection used to determine compliance?	3. Was this facility in compliance with this requirement during the reporting period?	4. Were there any deviations associated with this requirement during the reporting period?
<p>Monitoring:</p> <p>(1) For emergency, standby, or limited use compression ignition engines that operate on a limited basis, the permittee shall, at least once during any year that the unit is operated and no less frequently than once every 5 years regardless of unit operation, measure opacity during steady state operation on each Unit for a minimum of 10 minutes in accordance with the procedures of 40 CFR 60, Appendix A, Method 9. The permittee shall also measure opacity on a Unit's emissions stack anytime when visible emissions are observed during steady state operation.</p> <p>For the purposes of this condition, <i>Startup mode</i> is defined as the startup period that is described in the facility's startup plan.</p> <p>Methods: Facility demonstrates compliance with opacity monitoring requirements by reporting in semi-annual compliance reports..</p>	<input checked="" type="checkbox"/> Continuous <input type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
<p>Recordkeeping:</p> <p>(1) If any visible emissions observations were conducted, the permittee shall keep records in accordance with the requirements of Section B109 and as follows:</p> <p>(2) For any visible emissions observations conducted in accordance with EPA Method 22, record the information on the form referenced in EPA Method 22, Section 11.2.</p> <p>(3) For any opacity observations conducted in accordance with the requirements of EPA Method 9, record the information on the form referenced in EPA Method 9, Sections 2.2 and 2.4.</p> <p>(4) For each emergency, black start, and limited use compression ignition engine, the permittee shall also record the number of operating hours per year of each Unit and the reason for operating the unit.</p> <p>Methods: Facility demonstrates compliance with visible emissions observations by keeping records according to Section B109 and by reporting in semi-annual compliance reports.</p>	<input checked="" type="checkbox"/> Continuous <input type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
<p>Reporting: The permittee shall report in accordance with Section B110.</p> <p>Methods: Reporting requirements of condition A 111 are submitted in accordance with Section B110 and per schedule in condition A109.</p>	<input checked="" type="checkbox"/> Continuous <input type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
<p>EQUIPMENT SPECIFIC REQUIREMENTS</p> <p>OIL AND GAS INDUSTRY</p> <p>A201 Engines</p> <p>A. Maintenance and Repair Monitoring (Units 10 and 11)</p> <p>Requirement: Units 10 and 11 shall be properly maintained and repaired.</p> <p>Methods: Maintenance and repair records are maintained at the facility.</p>	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No

1. Provide Method(s) or other information or other facts used to determine the compliance status in the "Methods:" row beneath each permit condition	2. What is the frequency of data collection used to determine compliance?	3. Was this facility in compliance with this requirement during the reporting period?	4. Were there any deviations associated with this requirement during the reporting period?
Monitoring: Maintenance and repair shall meet the minimum manufacturer's or permittee's recommended maintenance schedule. Activities that involve maintenance, adjustment, replacement, or repair of functional components with the potential to affect the operation of an emission unit shall be documented as they occur for the following events: (1) Routine maintenance that takes a unit out of service for more than two hours during any twenty-four-hour period. (2) Unscheduled repairs that require a unit to be taken out of service for more than two hours in any twenty-four-hour period.	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: Maintenance and repair records are maintained at the facility.			
Recordkeeping: The permittee shall maintain records in accordance with Section B109, including records of maintenance and repairs activities and a copy of the manufacturer's or permittee's recommended maintenance schedule.	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: Maintenance and repair records are maintained at the facility and in accordance with General Condition B109 of the permit.			
Reporting: The permittee shall report in accordance with Section B110.	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: Reporting requirements of condition A201 are submitted in accordance with Section B110 per the schedule in condition A109.			
A201 Engines B. 40 CFR 63, Subpart ZZZZ (Units 10 and 11) Requirement: The units are subject to 40 CFR 63, Subpart ZZZZ and the permittee shall comply with all applicable requirements of Subpart A and Subpart ZZZZ (63.6603(a), 63.6640(f), and Table 2d, paragraphs 4 and 5).	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: The facility was in compliance with Subpart A and Subpart ZZZZ during the reporting period.			
Monitoring: The permittee shall comply with all applicable monitoring requirements of 40 CFR 63, Subpart A and Subpart ZZZZ.	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: Monitoring was conducted in accordance with Subpart A and Subpart ZZZZ and are submitted in the semi-annual report.			
Recordkeeping: The permittee shall comply with all applicable recordkeeping requirements of 40 CFR 63, Subpart A and Subpart ZZZZ, including but not limited to 63.6655 and 63.10.	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: Records are maintained at the facility in accordance with General Conditions B109 of the permit.			
Reporting: The permittee shall comply with all applicable reporting requirements of 40 CFR 63, Subpart A and ZZZZ, including but not limited to 63.6645, 63.6650, 63.9, and 63.10.	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: Reporting requirements of A201B are submitted in the semi-annual report and in accordance with condition			

1. Provide Method(s) or other information or other facts used to determine the compliance status in the "Methods:" row beneath each permit condition	2. What is the frequency of data collection used to determine compliance?	3. Was this facility in compliance with this requirement during the reporting period?	4. Were there any deviations associated with this requirement during the reporting period?
B110 per the schedule in condition A109.			
<u>A204 Heaters/Boilers</u> A. Operational Inspection (For Heaters, Units 8, 12, and 13) (NSR 0613M10, Condition A217.A) Requirement: Compliance with the allowable emission limits in Table 106.A shall be demonstrated by performing periodic inspections to ensure proper operations. Methods: Periodic inspection are performed to ensure proper operations and are recorded and kept at the facility.	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Monitoring: The permittee shall conduct operational annual operational inspections to determine that the heaters are operating properly. The operational inspections shall include operational checks for indications of insufficient excess air, or too much excess combustion air. These operational checks shall include observation of common physical indications of improper combustion, including indications specified by the heater manufacturer, and indications based on operational experience with these units. Methods: Operational inspections were conducted during the month of May in 2018 and were included in the corresponding semi-annual report.	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Recordkeeping: The permittee shall maintain records of the operational inspections, describing the results of all operational inspections noting chronologically any adjustments needed to bring the heaters into compliance. The permittee shall maintain records in accordance with Section B109. Methods: Inspection records are maintained at the facility and in accordance with General Condition B109 of the permit.	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Reporting: The permittee shall report in accordance with Section B110. Methods: Reporting requirements of condition A204 are submitted in accordance with Section B110 per the schedule in condition A109.	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
<u>A204 Heaters/Boilers</u> B. 40 CFR 60, Subpart Dc (Units 8 and 13) Requirement: The units are subject to 40 CFR 60, Subpart Dc because each unit has a heat greater than the 10 MMBtu/hr threshold and were constructed in 2011, after the June 9, 1989 applicability date (60.40.c(a)) and shall comply with both the notification requirements in Subpart A and with the specific requirements of Subpart Dc. Methods: The facility was in compliance with this the requirements of this condition during the reporting period.	<input checked="" type="checkbox"/> Continuous <input type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Monitoring: The permittee shall comply with the monitoring requirements of 40 CFR 60, Section 60.46c and 60.47c. Methods: Monitoring is conducted in accordance with the requirements of of this condition and are submitted in the semi-annual report.	<input checked="" type="checkbox"/> Continuous <input type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Recordkeeping: The permittee shall comply with the recordkeeping requirements of 40 CFR 60, Section 60.48c and			

1. Provide Method(s) or other information or other facts used to determine the compliance status in the "Methods:" row beneath each permit condition	2. What is the frequency of data collection used to determine compliance?	3. Was this facility in compliance with this requirement during the reporting period?	4. Were there any deviations associated with this requirement during the reporting period?
specifically, 60.48c(g)(1) & (2).	<input checked="" type="checkbox"/> Continuous	<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> Yes
Methods: Records of fuel combusted are maintained at the facility in accordance with General Condition B109 of the permit.	<input type="checkbox"/> Intermittent	<input type="checkbox"/> No	<input checked="" type="checkbox"/> No
Reporting: The permittee shall comply with the reporting requirements of 40 CFR 60, Section 60.48c.	<input type="checkbox"/> Continuous	<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> Yes
Methods: Reporting requirement of condition A204B are submitted in the semi-annual report and in accordance with condition B110 per the schedule in condition A109.	<input checked="" type="checkbox"/> Intermittent	<input type="checkbox"/> No	<input checked="" type="checkbox"/> No
A205 Turbines A. Maintenance and Repair Monitoring (Units 1-7) Requirement: Compliance with the allowable emission limits in Table 106.A shall be demonstrated by properly maintaining and repairing the units.	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: The facility maintained compliance with the allowable emission limits by properly maintaining and repairing the units during the reporting period.			
Monitoring: Maintenance and repair shall meet the minimum manufacturer's or permittee's recommended maintenance schedule. Activities that involve maintenance, adjustment, replacement, or repair of functional components with the potential to affect the operation of an emission unit shall be documented as they occur for the following events: (1) Routine maintenance that takes a unit out of service for more than two hours during any twenty-four-hour period. (2) Unscheduled repairs that require a unit to be taken out of service for more than two hours in any twenty-four-hour period.	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: Maintenance and repair records are maintained at the facility.			
Recordkeeping: The permittee shall maintain records, including dates, and maintenance activities conducted in accordance with Section B109. The permittee shall also maintain a copy of the manufacturer's or permittee's recommended maintenance schedule.	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: Maintenance and repair records are maintained at the facility and in accordance with General Condition B109 of the permit.			
Reporting: The permittee shall report in accordance with Section B110.	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: Reporting requirements of condition A201 are submitted in accordance with Section B110 per the schedule in condition A109.			
A205 Turbines B. Periodic Emissions Tests, Units 1-7 (NSR 0613M10, Condition A218.A and revised) Requirement: Compliance with the allowable emission limits in Table 106.A shall be demonstrated by conducting	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No

1. Provide Method(s) or other information or other facts used to determine the compliance status in the "Methods:" row beneath each permit condition	2. What is the frequency of data collection used to determine compliance?	3. Was this facility in compliance with this requirement during the reporting period?	4. Were there any deviations associated with this requirement during the reporting period?
periodic emission tests during the monitoring period.			
Methods: Periodic testing completed in April of 2019 demonstrating emission compliance with allowable permit limit.			
<p>Monitoring: The permittee shall test using a portable analyzer or EPA Reference Methods subject to the requirements and limitations of Section B108, General Monitoring Requirements. Emission testing is required for NOx and CO, and shall be carried out as described below.</p> <p>Test results that demonstrate compliance with the CO emission limits shall also be considered to demonstrate compliance with the VOC emission limits. (Units 1-3)</p> <p>(1) The testing shall be conducted as follows:</p> <ul style="list-style-type: none"> (a) Testing frequency shall be once per year. (b) The monitoring period is defined as a calendar year beginning with the month and day shown in Section A109, Facility: Reporting Schedules. (c) When a turbine uniquely identified by serial number is installed, the permittee shall submit a notification within 30 days of installation and perform testing within 180 days of installation. <p>(2) The tests shall continue based on the existing testing schedule.</p> <p>(3) All subsequent testing shall occur in each succeeding monitoring period. No two monitoring events shall occur closer together in time than 25% of a monitoring period.</p> <p>(4) The permittee shall follow the General Testing Procedures of Section B111.</p> <p>(5) Performance testing required by 40 CFR 60, Subpart GG or 40 CFR 60, Subpart KKKK may be used to satisfy these periodic testing requirements if they meet the requirements of this condition and are completed during the specified monitoring period.</p>	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
<p>Methods: (1.a) Testing was conducted on April 23-24, 2019 in accordance with the reporting schedule</p> <p>(2) Testing was based on the existing testing schedule.</p> <p>(3) No testing occurred closer than 25% of previous testing in the reporting period, previous testing was in April 2018.</p> <p>(4) All testing was conducted following the General Testing Procedures of Section B111 and protocols submitted 30 days prior to testing</p> <p>(5) There were no 40 CFR 60, Subpart GG or 40 CFR 60, Subpart KKKK Performance tests during this monitoring period.</p>			
<p>Recordkeeping:</p> <p>(1) The permittee shall maintain periodic emissions test records for each turbine uniquely identified by the serial number in accordance with Section B109, B110 and B111. The permittee shall also record the results of the periodic emissions</p>	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No

1. Provide Method(s) or other information or other facts used to determine the compliance status in the "Methods:" row beneath each permit condition	2. What is the frequency of data collection used to determine compliance?	3. Was this facility in compliance with this requirement during the reporting period?	4. Were there any deviations associated with this requirement during the reporting period?
tests, including the turbine's fuel flow rate and horsepower at the time of the test, and the type of fuel fired (natural gas, field gas, etc.). (2) The permittee shall also keep records of all raw data used to determine exhaust gas flow and of all calculations used to determine flow rates and mass emissions rates.			
Methods: Records of periodic emissions tests are maintained at the facility in accordance with General Condition B109 of the permit.			
Reporting: The permittee shall submit reports in accordance with Section B110.	<input type="checkbox"/> Continuous	<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> Yes
Methods: Periodic testing reporting requirements of condition A205A. are submitted in semi-annual report and in accordance with condition B110 per the schedule in condition A109.	<input checked="" type="checkbox"/> Intermittent	<input type="checkbox"/> No	<input checked="" type="checkbox"/> No
<u>A205 Turbines</u> C. 40 CFR 60, Subpart GG, Units 1-7 (NSR 0613M10, Condition A218.B) Requirement: The units are subject to 40 CFR 60, Subpart GG and the permittee shall comply with the applicable requirements of 40 CFR 60.330 through 60.335, Subpart A and Subpart GG.	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: Facility demonstrates compliance with fuel sulfur requirements by including Tariff Agreement in the semi-annual report.			
Monitoring: The permittee shall comply with the monitoring and testing requirements of 40 CFR 60.334 and 60.335.	<input type="checkbox"/> Continuous	<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> Yes
Methods: Facility demonstrates compliance with fuel sulfur requirements by including Tariff Agreement in the semi-annual report.	<input checked="" type="checkbox"/> Intermittent	<input type="checkbox"/> No	<input checked="" type="checkbox"/> No
Recordkeeping: The permittee shall comply with the recordkeeping requirements of 40 CFR 60.334 and 40 CFR 60.7.	<input type="checkbox"/> Continuous	<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> Yes
Methods: Records are maintained at the facility in accordance with General Condition B109 of the permit.	<input checked="" type="checkbox"/> Intermittent	<input type="checkbox"/> No	<input checked="" type="checkbox"/> No
Reporting: The permittee shall comply with the reporting requirements of 40 CFR 60.7.	<input type="checkbox"/> Continuous	<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> Yes
Methods: Facility demonstrates compliance with fuel sulfur requirements by including Tariff Agreement in the semi-annual report per the schedule in condition A109.	<input checked="" type="checkbox"/> Intermittent	<input type="checkbox"/> No	<input checked="" type="checkbox"/> No
<u>A205 Turbines</u> D. Facility CAM Requirements per 40 CFR 64 – Section A210 CAM Plan for Units 1-3 Requirement: Compliance Assurance Monitoring (CAM) contained in 40 CFR 64 applies to the Units 1-3, Rolls Royce, Avon 1535 Natural Gas Turbines. The permittee shall meet the requirements of the Provisions in Subparts 64.3(a) and (b); 64.7(d)(2); and 64.8, if applicable.	<input checked="" type="checkbox"/> Continuous <input type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: The facility was in compliance with the requirements of this condition during the reporting period. There were			

1. Provide Method(s) or other information or other facts used to determine the compliance status in the "Methods:" row beneath each permit condition	2. What is the frequency of data collection used to determine compliance?	3. Was this facility in compliance with this requirement during the reporting period?	4. Were there any deviations associated with this requirement during the reporting period?
no excursions during this reporting cycle.			
<p>Monitoring: The permittee shall monitor the following indicators according to the approved CAM Plan in Section A210 and pursuant to 40 CFR 64.3(a) and (b): differential pressure across the catalyst and the temperature of the gas at the catalyst inlet of emission unit number 1-3. The permittee shall continue the monitoring pursuant to 40 CFR 64, Subpart 7.</p> <p>The permittee shall comply with the measurement approach, performance criteria, and defined excursion for each indicator range or condition that is described in the approved CAM Plan in Section A210 (40 CFR 64.6(c)).</p> <p>The frequency of data collection shall be at least once every 24 hours per 40 CFR 64.3(b)(4)(i) and (iii). The permittee shall respond to any excursion of indicator range or condition in accordance with the CAM Plan and 40 CFR 64.7(d).</p>	<input checked="" type="checkbox"/> Continuous <input type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: Monitoring is conducted in accordance with the CAM plan and are submitted in the semi-annual report.			
Recordkeeping: The permittee shall comply with the recordkeeping requirements pursuant to 40 CFR 64.9(b).	<input checked="" type="checkbox"/> Continuous	<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> Yes
Methods: Records are maintained at the facility in accordance with General Condition B109.B of the permit.	<input type="checkbox"/> Intermittent	<input type="checkbox"/> No	<input checked="" type="checkbox"/> No
<p>Reporting: The permittee shall meet the reporting requirements in 40 CFR 64.9(a) and in Section B110.</p> <p>Pursuant to 40 CFR 64.7(e), the permittee shall document and promptly notify the Department's Permit Section, and modify the permit as necessary, of the need for improved monitoring or the need to modify existing indicator ranges or designated conditions pursuant to 40 CFR 64.7(e).</p>	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: Reporting requirement of condition A205C are submitted in the semi-annual report and in accordance with condition B110 per the schedule in condition A109.			
<p>A206 Flares</p> <p>A. Flare Testing Requirements, 40 CFR 60, Subpart KKK and 20.2.61 NMAC (Units 9 & 16)</p> <p>Requirement:</p> <p>Compliance with the visible emissions, flare gas heating value and exit velocity requirements at 40 CFR §60.18 shall be demonstrated by conducting a performance test as specified in the Monitoring section below.</p> <p>Compliance with the testing requirements in this condition demonstrates compliance with the opacity limits required in 20.2.61 NMAC.</p>	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: A performance test was conducted on Unit 9 on March 21, 2000			
<p>Monitoring: The permittee shall conduct a performance test on the flare in accordance with the requirements at 40 CFR §60.485, and the requirements at 40 CFR 60, Subpart A, §60.8 (performance tests) and 60.18 (general control device requirements).</p>	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: A performance test was conducted on Unit 9 on March 21, 2000			

1. Provide Method(s) or other information or other facts used to determine the compliance status in the "Methods:" row beneath each permit condition	2. What is the frequency of data collection used to determine compliance?	3. Was this facility in compliance with this requirement during the reporting period?	4. Were there any deviations associated with this requirement during the reporting period?
Recordkeeping: The permittee shall maintain records of the flare(s) performance test results in accordance with the requirements at Section B109.	<input type="checkbox"/> Continuous	<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> Yes
Methods: A copy of the performance test is maintained at the facility.	<input checked="" type="checkbox"/> Intermittent	<input type="checkbox"/> No	<input checked="" type="checkbox"/> No
Reporting: The permittee shall report in accordance with the requirements at 40 CFR §60.487 and Sections B110 and B111.	<input type="checkbox"/> Continuous	<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> Yes
Methods: Reporting requirements for this condition have been conducted in accordance with Section B110 and B111.	<input checked="" type="checkbox"/> Intermittent	<input type="checkbox"/> No	<input checked="" type="checkbox"/> No
A206 Flares B. Flare Operating Requirements, 40 CFR 60, Subpart KKK and 20.2.61 NMAC(Units 9 & 16) Requirement: Flares(s) shall comply with the operational requirements (including but not limited to flame presence and no visible emissions) specified by the general control device requirements at 40 CFR §60.18. Compliance with the operating requirements at 40 CFR §60.18 demonstrates compliance with the opacity limits required by 20.2.61 NMAC.	<input checked="" type="checkbox"/> Continuous <input type="checkbox"/> Intermittent	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
Methods: The facility has periods of visible emissions which exceeded a total of 5 minutes during any two consecutive hours.			
Monitoring: The permittee shall monitor flare operation in accordance with the applicable requirements at 40 CFR §60.18.	<input checked="" type="checkbox"/> Continuous	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> Yes
Methods: The facility has periods of visible emissions which exceeded a total of 5 minutes during any two consecutive hours.	<input type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> No	<input type="checkbox"/> No
Recordkeeping: The permittee shall maintain records of flare operation in accordance with the applicable requirements at 40 CFR §60.18 and 60.486 and with the requirements of Section B109.	<input checked="" type="checkbox"/> Continuous	<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> Yes
Methods: Records are maintained at the facility in accordance with General Condition B109 of the permit.	<input type="checkbox"/> Intermittent	<input type="checkbox"/> No	<input checked="" type="checkbox"/> No
Reporting: The permittee shall report in accordance with the requirements of Section B110.	<input type="checkbox"/> Continuous	<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> Yes
Methods: Reporting requirements for this condition have been conducted in accordance with Section B110 and per the schedule in condition A109.	<input checked="" type="checkbox"/> Intermittent	<input type="checkbox"/> No	<input checked="" type="checkbox"/> No
A206 Flares C. Operation (Units 9 and 16) Requirement: (1) Units 9 and 16 are a staged flare system. All vent and relief flows to the staged flare system up to a rate of 6MMscf/d, including all flows subject to 40 CFR 60.18, shall be vented to Unit 16. (2) Any flow to the staged flare system which exceeds a rate of 6 MMscf/d, including any flow exceeding a rate of 6 MMscf/d during an emergency event, and all flows during maintenance on Unit 16 and related staging valves shall be	<input checked="" type="checkbox"/> Continuous <input type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No

1. Provide Method(s) or other information or other facts used to determine the compliance status <i>in the "Methods:" row beneath each permit condition</i>	2. What is the frequency of data collection used to determine compliance?	3. Was this facility in compliance with this requirement during the reporting period?	4. Were there any deviations associated with this requirement during the reporting period?
vented to Unit 9. (3) During such maintenance on Unit 16 and related staging valves, the Permittee shall not manually vent to the staged flare system.			
Methods: The staged flare system was operated in accordance with the requirements of this permit condition during the reporting period.			
Monitoring: (1) A gas flowmeter and flow totalizer, equipped with a chart recorder or data logger (electronic storage), shall be installed in each flare line to measure and record the total standard cubic feet (scf) of gas sent to the flare during each hour and each month. (2) The flow meter, totalizer, and if used, the inline monitor shall be operated, calibrated, and maintained as specified by the manufacturer or equivalent and as necessary to ensure correct and accurate readings.	<input checked="" type="checkbox"/> Continuous <input type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: The flare gas flow is monitored each hour and each month and a summary is reported on semi-annual reports in accordance with this condition. The flow meter and totalizer are operated, calibrated, and maintained as specified by the manufacturer.			
Recordkeeping: (1) In the event that San Juan Basin Gas Plant (SJGP) vents to Unit 9 any flow during maintenance on the flare and related staging valves, or any flow which exceeds 6 mmscfd, SJGP shall record information in a log within 15 days of the commencement of such venting, describing the cause, duration, approximate volume, and probable composition of the flow, the occurrence of visible emissions exceeding 5 minutes during any 2 consecutive hours as determined by the methods specified in 40 CFR 60.18(f), and action(s) taken to reroute the flow from Unit 16 or the facility to Unit 9. The log shall be available for inspection by any Air Quality Bureau inspector upon request. (2) The permittee shall keep records of flow rates to Units 9 and 16 in comparison to the staged operations	<input checked="" type="checkbox"/> Continuous <input type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: (1) The facility records any occurrence in which the flow to the flare exceeds 6 mmscfd describing the cause, duration and approximate volume. These records will be available in the event of an inspection by the NM AQB. (2) The facility records the flow rates to Units 9 and 16.			
Reporting: The permittee shall report in accordance with Section B110.	<input checked="" type="checkbox"/> Continuous	<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> Yes
Methods: Flare operation requirements of condition A206 are submitted in semi-annual report and in accordance with condition B110 per the schedule in condition A109.	<input type="checkbox"/> Intermittent	<input type="checkbox"/> No	<input checked="" type="checkbox"/> No
A207 Thermal Oxidizer A. Thermal Oxidizer Control Efficiency (Unit 15) (NSR 0613M7, Condition A220.A and revised)	<input checked="" type="checkbox"/> Continuous	<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> Yes

1. Provide Method(s) or other information or other facts used to determine the compliance status <i>in the "Methods:" row beneath each permit condition</i>	2. What is the frequency of data collection used to determine compliance?	3. Was this facility in compliance with this requirement during the reporting period?	4. Were there any deviations associated with this requirement during the reporting period?
Requirement: (1) Compliance with the allowable emission limits in Table 106.A shall be demonstrated by maintaining a flame anytime gas is routed to the thermal oxidizer and maintaining a combustion temperature that achieves a destruction efficiency at or above 95% for VOCs, and monitoring unit downtime or malfunction. Per the manufacturer's Technical Manual, there are no controls to allow for adjustment of the airflow within the stack, therefore temperature is used as the indicator for the estimated destruction efficiency. (2) The permittee shall install, operate, and maintain a temperature-sensing device to measure continuously the combustion zone temperature of the thermal oxidizer. This unit shall be operated at no less than 1200 degrees Fahrenheit on a daily average.	<input type="checkbox"/> Intermittent	<input type="checkbox"/> No	<input checked="" type="checkbox"/> No
Methods: Temperature sensing device is installed, operated, and maintained in accordance with this condition.			
Monitoring: (1) The permittee shall determine a combustion temperature that achieves the required destruction efficiency from periodic emissions testing performed in accordance with A206.D and monitor the combustion temperature of the Thermal Oxidizer continuously and record the average temperature for each 24-hour period. Compliance with this condition is defined as temperatures within +/- 5% of the combustion temperature during the emissions test. (2) The permittee shall monitor the combustion zone temperature at least once per hour. (3) Each year, the permittee shall provide the Department with a summary of the average daily temperature of the thermal oxidizer's (unit 15) combustion zone for the previous calendar year beginning with the month and day shown in Section A208, Facility: Reporting Schedules.	<input checked="" type="checkbox"/> Continuous <input type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: Combustion zone temperature is monitored once per hour and a summary of average daily temperature is reported on semi annual reports in accordance with this condition.			
Recordkeeping: (1) The records of the combustion zone temperatures for the thermal oxidizer shall be maintained per B109. (2) The records shall include, for each day of the previous calendar year, the average daily combustion zone temperature. (3) The permittee shall maintain records including the date of each recorded average temperature corresponding to each 24-hour period of operation, detail any deficiencies in operation identified, and record any corrective actions taken to restore the control device to operation.	<input checked="" type="checkbox"/> Continuous <input type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: Records are maintained at the facility in accordance with General Condition B109 of the permit.			
Reporting: The permittee shall report in accordance with Section B110.	<input type="checkbox"/> Continuous	<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> Yes
Methods: Reporting requirements for this conditon have been assembled in accordance with Section B110 per the schedule			

1. Provide Method(s) or other information or other facts used to determine the compliance status in the "Methods:" row beneath each permit condition	2. What is the frequency of data collection used to determine compliance?	3. Was this facility in compliance with this requirement during the reporting period?	4. Were there any deviations associated with this requirement during the reporting period?
in condition A109.	<input checked="" type="checkbox"/> Intermittent	<input type="checkbox"/> No	<input checked="" type="checkbox"/> No
<u>A207 Thermal Oxidizer</u> B. Process Control Thermal Oxidizer Periodic Emissions Testing (Unit 15) Requirement: Compliance with the allowable emission limits in Table 106.A shall be demonstrated by completing periodic emission tests and calculating the destruction efficiency of the thermal oxidizer during the monitoring period. (20.2.70.302.A(1) NMAC)	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: Periodic testing completed in October 2018 demonstrating compliance with allowable emission limits and calculation of the destruction efficiency.			
Monitoring: The permittee shall test using EPA Reference Method 25a subject to the requirements and limitations of Section B108, General Monitoring Requirements. Emission testing is required for un-specified VOCs pre-control and post-TO (stack). Periodic emissions testing shall be carried out as described below. Test results for destruction efficiency shall be based on the measured quantities of pre-control and post-control VOCs. Operation of the thermal oxidizer must take place with a combustion temperature which achieves a destruction efficiency equal to or greater than 95%. The test results shall be used to determine the combustion temperature that achieves this destruction efficiency (1) The testing shall be conducted as follows: a. The first test shall take place within 180 days of permit issuance and thereafter; b. Testing frequency shall be once per Title V Permit renewal period (every 5 years). c. The monitoring period is defined as the Title V Permit renewal period. (2) All subsequent monitoring shall occur in each succeeding monitoring period. No two monitoring events shall occur closer together in time than 25% of a monitoring period. (3) The permittee shall follow the General Testing Procedures of Section B111.	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: (1) The testing was conducted in October 2018 in accordance with the testing frequency. (2) No testing occurred closer than 25% of previous testing in the reporting period. (3) All testing was conducted following the General Testing Procedures of Section B111.			
Recordkeeping: The permittee shall maintain records in accordance with Section B109, B110, and B111.	<input type="checkbox"/> Continuous	<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> Yes
Methods: Records of periodic emissions tests are maintained at the facility in accordance with General Condition B109, B110, and B111 of the permit.	<input checked="" type="checkbox"/> Intermittent	<input type="checkbox"/> No	<input checked="" type="checkbox"/> No

1. Provide Method(s) or other information or other facts used to determine the compliance status in the "Methods:" row beneath each permit condition	2. What is the frequency of data collection used to determine compliance?	3. Was this facility in compliance with this requirement during the reporting period?	4. Were there any deviations associated with this requirement during the reporting period?
Reporting: The permittee shall report in accordance with Section B109, B110, and B111.	<input type="checkbox"/> Continuous	<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> Yes
Methods: Periodic testing reporting requirements of condition A207B. are submitted in semi-annual report and in accordance with condition B110 per the schedule in condition A109.	<input checked="" type="checkbox"/> Intermittent	<input type="checkbox"/> No	<input checked="" type="checkbox"/> No
<p><u>A208 Amine Unit</u></p> <p>A. Extended Liquids Analysis (Amine Unit)</p> <p>Requirement:</p> <p>(1) To demonstrate compliance with the allowable SO₂ (H₂S), VOC emission limits in Table 106.A, the permittee shall conduct the following analyses:</p> <p>(a) Verification sampling and analysis will be conducted biannually (every two years) on flash tank and/or regenerator still vent emissions.</p> <p>(2) Every two years, the extended gas analysis will include sampling and analysis for H₂S. The value presented will be a numerical value, or if less than the laboratory method detectable limit, the minimum detection limit will be reported.</p> <p>(3) The Amine Unit is currently not subject to 40 CFR 64, CAM since the uncontrolled VOCs from the unit are less than 100 tpy. However, since the estimated VOCs of 98.8 tpy are so close to the trigger level, the permit shall perform the following:</p> <p>(a) At least annually, pull a liquid sample at the inlet to the amine unit for extended analysis and record operating hours and parameters necessary to model amine unit emissions.</p> <p>(b) If the plant operating mode changes during the year, pull a liquid sample at the inlet to the amine unit for extended analysis, record operating parameters and operating hours in the new operating mode.</p> <p>(c) Within 30 days of the end of the calendar year, using all applicable operating scenario data from the previous year, calculate uncontrolled (pre-thermal oxidizer) and controlled amine unit emissions.</p> <p>(d) If the estimated VOCs are determined to be equal to or greater than 100 tpy, then the permittee shall prepare a CAM Plan and submit to the Department within 30 days.</p>	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: The facility conducted extended liquid analysis for the Amine Unit in compliance with this condition and are included in the semi-annual report.			
<p>Monitoring: The permittee shall conduct an annual extended liquids analysis of the inlet gas.</p> <p>(1) Confirmation testing on amine emission points (e.g., flash tank, regenerator still vent) will be performed biannually (every two years).</p> <p>(2) The permittee shall also meet the monitoring requirements in Condition A206.A to demonstrate compliance with this condition</p>	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No

1. Provide Method(s) or other information or other facts used to determine the compliance status in the "Methods:" row beneath each permit condition	2. What is the frequency of data collection used to determine compliance?	3. Was this facility in compliance with this requirement during the reporting period?	4. Were there any deviations associated with this requirement during the reporting period?
Methods: The facility has demonstrated compliance with this condition by including the extended liquids analysis in the semi-annual report.			
Recordkeeping: Records shall be kept of the following: (1) Liquids analysis H2S, VOC content of the inlet gas. (2) An annual calculation of the average hourly and total annual emissions for [H2S, VOC] based on the most recent annual extended liquids analysis will be performed using, but not limited to AmineCalc, HYSYS, or ProMax. (3) All parameters that were used as inputs to the model or calculations [i.e.; AmineCalc, HYSYS, or ProMax]. (4) Verification sampling and analysis on flash tank and/or regenerator still vent emissions.	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: Records are maintained at the facility in accordance with General Condition B109 of the permit.			
Reporting: The permittee shall report in accordance with Section B110.	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: Reporting requirements of condition A208A are submitted in the semi-annual report and in accordance with condition B110 per the schedule in condition A109.			
A208 Amine Unit B. Sweetening Unit Inspection (Amine Unit) Requirement: To demonstrate compliance with the allowable H2S and VOC emission limits in Table 106.A, the amine sweetening unit is a closed system where emissions shall be (1) still vent emissions shall be routed to a control device, condenser, and Thermal Oxidizer (2) the flash tank vent shall be routed to a control device, VRU.	<input checked="" type="checkbox"/> Continuous <input type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: The amine sweetening unit vented to the Thermal Oxidizer or a control device during the reporting period.			
Monitoring: The permittee shall inspect the amine treatment unit and the control equipment semi-annually to ensure it is operating as initially designed or in accordance with the manufacturer's recommended procedures.	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: Semi-annual inspections are performed per manufacturer's recommended procedures.			
Recordkeeping: The permittee shall record the name of the person conducting the inspection and the results of all equipment and control device inspections chronologically, noting any maintenance or repairs needed to bring the amine treatment unit into compliance. The permittee shall maintain a copy of the manufacturer's maintenance recommendations.	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: Inspection records are maintained at the facility and in accordance with General Condition B109 of the permit.			
Reporting: The permittee shall report in accordance with Section B110.	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Methods: Reporting requirements of condition A208 are submitted in accordance with Section B110 per the schedule in			

1. Provide Method(s) or other information or other facts used to determine the compliance status in the "Methods:" row beneath each permit condition	2. What is the frequency of data collection used to determine compliance?	3. Was this facility in compliance with this requirement during the reporting period?	4. Were there any deviations associated with this requirement during the reporting period?
condition A109.	<input checked="" type="checkbox"/> Intermittent	<input type="checkbox"/> No	<input checked="" type="checkbox"/> No
A208 Amine Unit C. 40 CFR 60, Subpart LLL (Unit 15, Amine Unit)* Requirement: The unit is subject to 40 CFR 60, Subpart LLL, if the sweetening unit source followed by a sulfur recovery unit is constructed, modified, or reconstructed after the applicability date in 40 CFR 60.640, and the design capacity is less than 2 long tons per day (LT/D) of hydrogen sulfide. The permittee shall comply with the notification requirements in Subpart A and the specific Subpart LLL requirements, including, but not limited to, those listed below. *Facilities constructed, modified, or reconstructed after January 20, 1984 and on or before August 23, 2011. Methods: The facility maintains compliance with this requirements by keeping an analysis to demonstrate that the design capacity is less than 2 long tons per day (LT/D) of hydrogen sulfide.	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Monitoring: The permittee shall maintain records as described below to demonstrate facility is exempt from monitoring.	<input type="checkbox"/> Continuous	<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> Yes
Methods: The facility maintains an analysis to demonstrate that the facility is exempt from monitoring.	<input checked="" type="checkbox"/> Intermittent	<input type="checkbox"/> No	<input checked="" type="checkbox"/> No
Recordkeeping: The permittee shall generate and maintain the records required to demonstrate compliance with the general standard exemptions found in 40 CFR 60.647(c).	<input type="checkbox"/> Continuous	<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> Yes
Methods: An analysis to demonstrate compliance with the exemption requirements are maintained at the facility and in accordance with General Condition B109 of the permit.	<input checked="" type="checkbox"/> Intermittent	<input type="checkbox"/> No	<input checked="" type="checkbox"/> No
Reporting: The permittee shall meet all applicable reporting in 40 CFR 60, Subpart A and in Section B110.	<input type="checkbox"/> Continuous	<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> Yes
Methods: Reporting requirements of condition A208 are submitted in accordance with Section B110 per the schedule in condition A109.	<input checked="" type="checkbox"/> Intermittent	<input type="checkbox"/> No	<input checked="" type="checkbox"/> No
A209 Fugitives A. 40 CFR 60, Subpart KKK (Units 9, 14, and 16) (NSR 0613M7, Condition A222.A and revised) Requirement: The cryogenic NGL extraction unit and all equipment, including compressors, in wet gas service or VOC service are subject to 40 CFR 60, Subpart KKK and shall comply with both the notification requirements in Subpart A and with the specific requirements of Subpart KKK, Standards of Performance for Equipment Leaks of VOC from Onshore Natural Gas Processing Plants, as specified at 40 CFR 60.632.	<input type="checkbox"/> Continuous <input checked="" type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
Methods: The LDAR Semi-Annual reports are submitted separately in February and July for the preceeding six months. The facility is in compliance with this condition.			
Monitoring: The unit(s) shall comply with the standards as specified in 40 CFR 60.633.	<input type="checkbox"/> Continuous	<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> Yes
Methods: Monitoring is conducted in accordance with the applicable requirements.			

1. Provide Method(s) or other information or other facts used to determine the compliance status in the "Methods:" row beneath each permit condition	2. What is the frequency of data collection used to determine compliance?	3. Was this facility in compliance with this requirement during the reporting period?	4. Were there any deviations associated with this requirement during the reporting period?
	<input checked="" type="checkbox"/> Intermittent	<input type="checkbox"/> No	<input checked="" type="checkbox"/> No
Recordkeeping: The permittee shall comply with all applicable recordkeeping requirements in NSPS Subpart KKK, 40 CFR 60.635 and 60.486, for the cryogenic NGL extraction unit and other affected equipment.	<input checked="" type="checkbox"/> Continuous	<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> Yes
Methods: Records are maintained at the facility in accordance with NSPS Subpart KKK, 40 CFR 60.635.	<input type="checkbox"/> Intermittent	<input type="checkbox"/> No	<input checked="" type="checkbox"/> No
Reporting: The permittee shall comply with all applicable reporting requirements in NSPS Subpart KKK, 40 CFR 60.636 and 60.487, for the cryogenic NGL extraction unit and other affected equipment.	<input type="checkbox"/> Continuous	<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> Yes
Methods: The LDAR Semi-Annual reports are submitted separately in February and July for the preceding six months.	<input checked="" type="checkbox"/> Intermittent	<input type="checkbox"/> No	<input checked="" type="checkbox"/> No
<p><u>A210 Compliance Assurance Maintenance (CAM) Plan</u></p> <p style="text-align: center;">Harvest Pipeline/San Juan Basin Gas Plant</p> <p style="text-align: center;">CAM Plan for Turbine Units 1, 2, & 3</p> <p>I. <u>Background</u></p> <p>A. <u>Emissions Unit</u></p> <p style="margin-left: 40px;">Description: Rolls-Royce Avon Stationary Gas Turbine Identification: 1, 2, & 3 Facility: San Juan Basin Gas Plant (SJBGP)</p> <p>B. <u>Applicable Regulation, Emission Limit, and Pre-CAM Monitoring Requirements</u></p> <p style="margin-left: 40px;">Regulation: Emission limits, monitoring, recordkeeping and reporting requirements created in NSR Permit 0613 et seq. to establish federally enforceable recognition of emission control on engine. Emission limits: CO: 9.6 lb/hr 42.0 tpy</p> <p>C. <u>Control Technology, Capture System, Bypass, PTE</u></p> <p style="margin-left: 40px;">Controls: Oxidation catalytic converter. Capture System: N/A Bypass: N/A Potential pre-control device emissions: CO: 90 lb/hr (based on mfg data) Potential post-control device emissions: CO: 9.6 lb/hr (as permitted)</p> <p>II. <u>Monitoring Approach</u></p>	<input checked="" type="checkbox"/> Continuous <input type="checkbox"/> Intermittent	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No

<p>1. Provide Method(s) or other information or other facts used to determine the compliance status in the "Methods:" row beneath each permit condition</p>	<p>2. What is the frequency of data collection used to determine compliance?</p>	<p>3. Was this facility in compliance with this requirement during the reporting period?</p>	<p>4. Were there any deviations associated with this requirement during the reporting period?</p>												
<p>The key elements of the monitoring approach are presented in the attached table.</p> <p>III. Response to Excursion</p> <p>A. Excursions of the inlet temperature to the catalyst, pressure measured at the inlet of the catalyst, or CO levels during emission testing, will trigger an inspection, corrective action, and reporting. Maintenance personnel will inspect the compressors and catalyst within 24 hours and make needed repairs as soon as practicable.</p> <p>(1) The differential pressure is monitored using pressure gauges located at the inlet of the catalyst bed and the exhaust of the turbine. These gauges are components of the differential pressure switch system. The pressure measured at the exhaust outlet is subtracted from the pressure measured at the inlet to the catalyst bed. When the calculated pressure differential exceeds 10" an alarm is indicated in the control system and the above actions are implemented. 10" was chosen as the alarm point to allow for a margin of protection for the catalyst bed. A shutdown of the unit occurs automatically when the differential pressure exceeds 15" to protect the catalyst bed.</p> <p>B. <u>QIP Threshold: Any two excursions of CO levels during consecutive emission tests, regardless of whether inlet temperature to the catalyst is within the specification of this plan, shall trigger a Quality Improvement Plan (QIP).</u></p>															
<p>Methods: Monitoring is conducted in accordance with the CAM plan and are submitted in the semi-annual report.</p>															
<p align="center">Monitoring Approach: San Juan Basin Gas Plant Units 1—3</p> <table border="1"> <tr> <th></th> <th>Indicator No. 1</th> <th>Indicator No. 2</th> <th>Indicator No. 3</th> </tr> <tr> <td>I. Indicator</td> <td>Temperature of exhaust gas into catalyst.</td> <td>Pressure at the inlet to the catalyst.</td> <td>CO measurement.</td> </tr> <tr> <td>Measurement Approach</td> <td>Exhaust gas temperature is monitored continuously.</td> <td>Pressure at inlet to the catalyst bed is measured continuously.</td> <td>CO is measured using 40 CFR 60 Appendix A reference methods, or a portable analyzer, in accordance with permit conditions.</td> </tr> </table>					Indicator No. 1	Indicator No. 2	Indicator No. 3	I. Indicator	Temperature of exhaust gas into catalyst.	Pressure at the inlet to the catalyst.	CO measurement.	Measurement Approach	Exhaust gas temperature is monitored continuously.	Pressure at inlet to the catalyst bed is measured continuously.	CO is measured using 40 CFR 60 Appendix A reference methods, or a portable analyzer, in accordance with permit conditions.
	Indicator No. 1	Indicator No. 2	Indicator No. 3												
I. Indicator	Temperature of exhaust gas into catalyst.	Pressure at the inlet to the catalyst.	CO measurement.												
Measurement Approach	Exhaust gas temperature is monitored continuously.	Pressure at inlet to the catalyst bed is measured continuously.	CO is measured using 40 CFR 60 Appendix A reference methods, or a portable analyzer, in accordance with permit conditions.												

1. Provide Method(s) or other information or other facts used to determine the compliance status in the “Methods:” row beneath each permit condition			2. What is the frequency of data collection used to determine compliance?	3. Was this facility in compliance with this requirement during the reporting period?	4. Were there any deviations associated with this requirement during the reporting period?
II. Indicator Range	Temperature at the inlet of the catalyst shall not exceed 1280°F.	The pressure shall not exceed 10” H2O pressure as measured at the exhaust of the turbine.	CO above 9.6 lb/hr		
III. Performance Criteria A. Data Representativeness ^a B. QA/QC Practices and Criteria C. Monitoring Frequency D. Data Collection Procedures E. Averaging Period	Temperature is measured at the inlet of the catalyst by a thermocouple.	Pressure is measured by a pressure switch between the exhaust of the turbine and the inlet to the catalyst.	Gases are measured at the exhaust of the catalyst under normal operating conditions.		
	Thermocouple is inherently accurate due to the nature of the device. Malfunction is indicated by failure.	Pressure measuring device(s) calibrated during scheduled maintenance.	As stated in monitoring protocols.		
	Temperature is monitored continuously.	Pressure is monitored continuously.	Annual, or as required by permit, testing to verify compliance with permitted emission limits.		
	Temperature data monitored continuously. Temperature in excess of indicator range triggers automatic shutdown.	Pressure data monitored continuously. Pressure exceeding specification of indicator range triggers automatic shutdown.	As specified in monitoring protocols.		
	continuous monitoring	continuous monitoring	Each test shall consist of at least three (3) valid test runs. Emission results shall be the arithmetic average of all valid test runs.		

PART 1 B General Conditions

<p>1. Have these General Conditions been met during this reporting period?</p> <p><u><i>If the section Heading is marked as N/A no remarks are required.</i></u></p> <p><u><i>Check only one box per subject heading.</i></u></p> <p><u><i>Explain answers in remarks row under subject heading.</i></u></p>	<p>2. Was this facility in compliance with this requirement during the reporting period?</p>
<p><u>B100 Introduction</u></p> <p>A. N/A</p>	<p><input type="checkbox"/> Yes</p> <p><input type="checkbox"/> No</p> <p><input type="checkbox"/> N/A</p> <p>Explain Below</p>
<p>REMARKS:</p>	
<p><u>B101 Legal</u></p> <p>A. Permit Terms and Conditions (20.2.70 sections 7, 201.B, 300, 301.B, 302, 405 NMAC)</p> <p>(1) The permittee shall abide by all terms and conditions of this permit, except as allowed under Section 502(b)(10) of the Federal Act, and 20.2.70.302.H.1 NMAC. Any permit noncompliance is grounds for enforcement action, and significant or repetitious noncompliance may result in termination of this permit. Additionally, noncompliance with federally enforceable conditions of this permit constitutes a violation of the Federal Act. (20.2.70.302.A.2.a NMAC)</p> <p>(2) Emissions trading within a facility (20.2.70.302.H.2 NMAC)</p> <p style="margin-left: 20px;">(a) The Department shall, if an applicant requests it, issue permits that contain terms and conditions allowing for the trading of emissions increases and decreases in the permitted facility solely for the purpose of complying with a federally enforceable emissions cap that is established in the permit in addition to any applicable requirements. Such terms and conditions shall include all terms and conditions required under 20.2.70.302 NMAC to determine compliance. If applicable requirements apply to the requested emissions trading, permit conditions shall be issued only to the extent that the applicable requirements provide for trading such increases and decreases without a case-by-case approval.</p> <p style="margin-left: 20px;">(b) The applicant shall include in the application proposed replicable procedures and permit terms that ensure the emissions trades are quantifiable and enforceable. The Department shall not include in the emissions trading provisions any emissions units for which emissions are not quantifiable or for which there are no replicable procedures to enforce the emissions trades. The permit shall require compliance with all applicable requirements.</p> <p>(3) It shall not be a defense for the permittee in an enforcement action to claim that it would have been necessary to halt or reduce the permitted activity in order to maintain compliance with the conditions of this permit. (20.2.70.302.A.2.b NMAC)</p>	<p><input checked="" type="checkbox"/> Yes</p> <p><input type="checkbox"/> No</p> <p><input type="checkbox"/> N/A</p> <p>Explain Below</p>

PART 1 B General Conditions

- (4) If the Department determines that cause exists to modify, reopen and revise, revoke and reissue, or terminate this permit, this shall be done in accordance with 20.2.70.405 NMAC. (20.2.70.302.A.2.c NMAC)
- (5) The permittee shall furnish any information the Department requests in writing to determine if cause exists for reopening and revising, revoking and reissuing, or terminating the permit, or to determine compliance with the permit. This information shall be furnished within the time period specified by the Department. Additionally, the permittee shall furnish, upon request by the Department, copies of records required by the permit to be maintained by the permittee. (20.2.70.302.A.2.f NMAC)
- (6) A request by the permittee that this permit be modified, revoked and reissued, or terminated, or a notification by the permittee of planned changes or anticipated noncompliance, shall not stay any conditions of this permit. (20.2.70.302.A.2.d NMAC)
- (7) This permit does not convey property rights of any sort, or any exclusive privilege. (20.2.70.302.A.2.e NMAC)
- (8) In the case where an applicant or permittee has submitted information to the Department under a claim of confidentiality, the Department may also require the applicant or permittee to submit a copy of such information directly to the Administrator of the EPA. (20.2.70.301.B NMAC)
- (9) The issuance of this permit, or the filing or approval of a compliance plan, does not relieve the permittee from civil or criminal liability for failure to comply with the state or Federal Acts, or any applicable state or federal regulation or law. (20.2.70.302.A.6 NMAC and the New Mexico Air Quality Control Act NMSA 1978, Chapter 74, Article 2)
- (10) If any part of this permit is challenged or held invalid, the remainder of the permit terms and conditions are not affected and the permittee shall continue to abide by them. (20.2.70.302.A.1.d NMAC)
- (11) A responsible official (as defined in 20.2.70.7.AE NMAC) shall certify the accuracy, truth and completeness of every report and compliance certification submitted to the Department as required by this permit. These certifications shall be part of each document. (20.2.70.300.E NMAC)
- (12) Revocation or termination of this permit by the Department terminates the permittee's right to operate this facility. (20.2.70.201.B NMAC)
- (13) The permittee shall continue to comply with all applicable requirements. For applicable requirements that will become effective during the term of the permit, the permittee shall meet such requirements on a timely basis. (Sections 300.D.10.c and 302.G.3 of 20.2.70 NMAC)

B. Permit Shield (20.2.70.302.J NMAC)

- (1) Compliance with the conditions of this permit shall be deemed to be compliance with any applicable requirements existing as of the date of permit issuance and identified in Table 103.A. The requirements in Table 103.A are applicable to this facility with specific requirements identified for individual emission units.
- (2) The Department has determined that the requirements in Table 103.B as identified in the permit application are not applicable to this source, or they do not impose any conditions in this permit.
- (3) This permit shield does not extend to administrative amendments (Subsection A of 20.2.70.404 NMAC), to minor permit modifications (Subsection B of 20.2.70.404 NMAC), to changes made under Section 502(b)(10), changes under Paragraph 1 of subsection H of 20.2.70.302 of the Federal Act, or to permit terms for which notice has been given to reopen or revoke all or part under 20.2.70.405 and 20.2.70.302J(6).
- (4) This permit shall, for purposes of the permit shield, identify any requirement specifically identified in the permit application or significant permit modification that the department has determined is not applicable to the source, and state the basis for any such determination. (20.2.70.302.A.1.f NMAC)

PART 1 B General Conditions

<p>C. The owner or operator of a source having an excess emission shall, to the extent practicable, operate the source, including associated air pollution control equipment, in a manner consistent with good air pollutant control practices for minimizing emissions. (20.2.7.109 NMAC). The establishment of allowable malfunction emission limits does not supersede this requirement.</p>	
<p>REMARKS:</p> <p>The San Juan Basin Gas Plant is in compliance with the Legal section B101 A(1-13) and B(1-4) of this permit. There have been no deviations from these conditions during this reporting period.</p>	
<p><u>B102 Authority</u></p> <p>A. This permit is issued pursuant to the federal Clean Air Act ("Federal Act"), the New Mexico Air Quality Control Act ("State Act") and regulations adopted pursuant to the State and Federal Acts, including Title 20, New Mexico Administrative Code, Chapter 2, Part 70 (20.2.70 NMAC) - Operating Permits.</p> <p>B. This permit authorizes the operation of this facility. This permit is valid only for the named permittee, owner, and operator. A permit modification is required to change any of those entities.</p> <p>C. The Department specifies with this permit, terms and conditions upon the operation of this facility to assure compliance with all applicable requirements, as defined in 20.2.70 NMAC at the time this permit is issued. (20.2.70.302.A.1 NMAC)</p> <p>D. Pursuant to the New Mexico Air Quality Control Act NMSA 1978, Chapter 74, Article 2, all terms and conditions in this permit, including any provisions designed to limit this facility's potential to emit, are enforceable by the Department. All terms and conditions are enforceable by the Administrator of the United States Environmental Protection Agency ("EPA") and citizens under the Federal Act, unless the term or condition is specifically designated in this permit as not being enforceable under the Federal Act. (20.2.70.302.A.5 NMAC)</p> <p>E. The Department is the Administrator for 40 CFR Parts 60, 61, and 63 pursuant to the Modification and Exceptions of Section 10 of 20.2.77 NMAC (NSPS), 20.2.78 NMAC (NESHAP), and 20.2.82 NMAC (MACT).</p>	<p><input checked="" type="checkbox"/> Yes</p> <p><input type="checkbox"/> No</p> <p><input type="checkbox"/> N/A</p> <p>Explain Below</p>
<p>REMARKS:</p> <p>The San Juan Basin Gas Plant is in compliance with this Authority condition. A permit modification was submitted on August 30, 2017 (USPS 7015 0640 0005 8540 1721) notifying the Bureau of the change of ownership from ConocoPhillips Company to Harvest Pipeline Company.</p>	
<p><u>B103 Annual Fee</u></p> <p>The permittee shall pay Title V fees to the Department consistent with the fee schedule in 20.2.71 NMAC - Operating Permit Emission Fees. The fees will be assessed and invoiced separately from this permit. (20.2.70.302.A.1.e NMAC)</p>	<p><input checked="" type="checkbox"/> Yes</p> <p><input type="checkbox"/> No</p> <p><input type="checkbox"/> N/A</p>

PART 1 B General Conditions

	Explain Below
REMARKS: The 2018 annual fees were submitted in May of 2018 (USPS 9114 9999 4423 8958 8760 41).	
<u>B104 Appeal Procedures</u> (20.2.70.403.A NMAC) A. Any person who participated in a permitting action before the Department and who is adversely affected by such permitting action, may file a petition for a hearing before the Environmental Improvement Board ("board"). The petition shall be made in writing to the board within thirty (30) days from the date notice is given of the Department's action and shall specify the portions of the permitting action to which the petitioner objects, certify that a copy of the petition has been mailed or hand-delivered, and attach a copy of the permitting action for which review is sought. Unless a timely request for a hearing is made, the decision of the Department shall be final. The petition shall be copied simultaneously to the Department upon receipt of the appeal notice. If the petitioner is not the applicant or permittee, the petitioner shall mail or hand-deliver a copy of the petition to the applicant or permittee. The Department shall certify the administrative record to the board. Petitions for a hearing shall be sent to: <div style="margin-left: 40px;"> For Mailing: Administrator, New Mexico Environmental Improvement Board P.O. Box 5469 Santa Fe, NM 87502-5469 For Hand Delivery: Administrator, New Mexico Environmental Improvement Board 1190 St. Francis Drive, Harold Runnels Bldg. Santa Fe, New Mexico 87505 </div>	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A Explain Below
REMARKS: The San Juan Basin Gas Plant is not aware of any petitions for a hearing during this reporting period and is in compliance with this condition.	
<u>B105 Submittal of Reports and Certifications</u> A. Stack Test Protocols and Stack Test Reports shall be submitted electronically to Stacktest.AQB@state.nm.us or as directed by the Department. B. Excess Emission Reports shall be submitted as directed by the Department. (20.2.7.110 NMAC) C. Compliance Certification Reports, Semi-Annual monitoring reports, compliance schedule progress reports, and any other compliance status information required by this permit shall be certified by the responsible official and submitted to the mailing address below, or as directed by the Department	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A Explain Below

PART 1 B General Conditions

<p>Manager, Compliance and Enforcement Section New Mexico Environment Department Air Quality Bureau 525 Camino de los Marquez, Suite 1 Santa Fe, NM 87505-1816</p> <p>D. Compliance Certification Reports shall also be submitted to the Administrator at the address below (20.2.70.302.E.3 NMAC):</p> <p>Chief, Air Enforcement Section US EPA Region-6, 6EN-A 1445 Ross Avenue, Suite 1200 Dallas, TX 75202-2733</p>	
<p>REMARKS:</p> <p>A)The stack test protocols and reports have been submitted to stacktest.aqb@state.nm.us (B) Excess Emission Reports have been submitted using the NMED Excess Emission Reporting System website (C) All other compliance reports are submitted via hard copy and certified by the responsible official (D) A copy of the Compliance Certification are submitted to US EPA Region 6.</p>	
<p><u>B106 NSPS and/or MACT Startup, Shutdown, and Malfunction Operations</u></p> <p>A. If a facility is subject to a NSPS standard in 40 CFR 60, each owner or operator that installs and operates a continuous monitoring device required by a NSPS regulation shall comply with the excess emissions reporting requirements in accordance with 40 CFR 60.7(c).</p> <p>B. If a facility is subject to a NSPS standard in 40 CFR 60, then in accordance with 40 CFR 60.8(c), operations during periods of startup, shutdown, and malfunction shall not constitute representative conditions for the purpose of a performance test nor shall emissions in excess of the level of the applicable emission limit during periods of startup, shutdown, and malfunction be considered a violation of the applicable emission limit unless otherwise specified in the applicable standard.</p> <p>C. If a facility is subject to a MACT standard in 40 CFR 63, then the facility is subject to the requirement for a Startup, Shutdown and Malfunction Plan (SSM) under 40 CFR 63.6(e)(3), unless specifically exempted in the applicable subpart. (20.2.70.302.A.1 and A.4 NMAC)</p>	<p><input checked="" type="checkbox"/> Yes</p> <p><input type="checkbox"/> No</p> <p><input type="checkbox"/> N/A</p> <p>Explain Below</p>
<p>REMARKS:</p> <p>The San Juan Basin Gas Plant is in compliance with this condition. Records are available on site for the conditions and submitted in the Semi-Annual Reports as required.</p>	
<p><u>B107 Startup, Shutdown, and Maintenance Operations</u></p> <p>A. The establishment of permitted startup, shutdown, and maintenance (SSM) emission limits does not supersede the requirements of 20.2.7.14.A NMAC. Except for operations or equipment subject to Condition B106, the permittee shall establish and implement a plan to minimize emissions during routine or predictable start up, shut down, and scheduled maintenance (SSM work practice plan) and shall operate in accordance with the procedures set forth in</p>	<p><input checked="" type="checkbox"/> Yes</p> <p><input type="checkbox"/> No</p> <p><input type="checkbox"/> N/A</p>

PART 1 B General Conditions

the plan. (20.2.7.14.A NMAC)	Explain Below
<p>REMARKS:</p> <p>The San Juan Basin Gas Plant is in compliance with this condition. Records are available on site for the applicable conditions and submitted in the Semi-Annual Reports. SSM/M plan indicates that emissions will be routed to the closed vent control device whenever possible.</p>	
<p><u>B108 General Monitoring Requirements</u> (20.2.70. 302.A and C NMAC)</p> <p>A. These requirements do not supersede or relax requirements of federal regulations.</p> <p>B. The following monitoring and/or testing requirements shall be used to determine compliance with applicable requirements and emission limits. Any sampling, whether by portable analyzer or EPA reference method, that measures an emission rate over the applicable averaging period greater than an emission limit in this permit constitutes noncompliance with this permit. The Department may require, at its discretion, additional tests pursuant to EPA Reference Methods at any time, including when sampling by portable analyzer measures an emission rate greater than an emission limit in this permit; but such requirement shall not be construed as a determination that the sampling by portable analyzer does not establish noncompliance with this permit and shall not stay enforcement of such noncompliance based on the sampling by portable analyzer.</p> <p>C. If the emission unit is shutdown at the time when periodic monitoring is due to be completed, the permittee is not required to restart the unit for the sole purpose of conducting the monitoring. Using electronic or written mail, the permittee shall notify the Department's Compliance and Enforcement Section of a delay in emission tests prior to the deadline for completing the tests. Upon recommencing operation, the permittee shall submit pre-test notification(s) to the Department's Compliance and Enforcement Section and shall complete the monitoring.</p> <p>D. The requirement for monitoring during any monitoring period is based on the percentage of time that the unit has operated. However, to invoke monitoring period exemptions at B108.D(2), hours of operation shall be monitored and recorded.</p> <p style="padding-left: 20px;">(1) If the emission unit has operated for more than 25% of a monitoring period, then the permittee shall conduct monitoring during that period.</p> <p style="padding-left: 20px;">(2) If the emission unit has operated for 25% or less of a monitoring period then the monitoring is not required. After two successive periods without monitoring, the permittee shall conduct monitoring during the next period regardless of the time operated during that period, except that for any monitoring period in which a unit has operated for less than 10% of the monitoring period, the period will not be considered as one of the two successive periods.</p> <p style="padding-left: 20px;">(3) If invoking the monitoring period exemption in B108.D(2), the actual operating time of a unit shall not exceed the monitoring period required by this permit before the required monitoring is performed. For example, if the monitoring period is annual, the operating hours of the unit shall not exceed 8760 hours before monitoring is conducted. Regardless of the time that a unit actually operates, a minimum of one of each type of monitoring activity shall be conducted during the five year term of this permit.</p> <p>E. For all periodic monitoring events, except when a federal or state regulation is more stringent, three test runs shall be conducted at 90% or greater of the unit's capacity as stated in this permit, or in the permit application if not in the permit, and at additional loads when requested by the Department. If the</p>	<p><input checked="" type="checkbox"/> Yes</p> <p><input type="checkbox"/> No</p> <p><input type="checkbox"/> N/A</p> <p>Explain Below</p>

PART 1 B General Conditions

90% capacity cannot be achieved, the monitoring will be conducted at the maximum achievable load under prevailing operating conditions except when a federal or state regulation requires more restrictive test conditions. The load and the parameters used to calculate it shall be recorded to document operating conditions and shall be included with the monitoring report.

- F. When requested by the Department, the permittee shall provide schedules of testing and monitoring activities. Compliance tests from previous NSR and Title V permits may be re-imposed if it is deemed necessary by the Department to determine whether the source is in compliance with applicable regulations or permit conditions.
- G. If monitoring is new or is in addition to monitoring imposed by an existing applicable requirement, it shall become effective 120 days after the date of permit issuance. For emission units that have not commenced operation, the associated new or additional monitoring shall not apply until 120 days after the units commence operation. All pre-existing monitoring requirements incorporated in this permit shall continue to apply from the date of permit issuance. All monitoring periods, unless stated otherwise in the specific permit condition or federal requirement, shall commence at the beginning of the 12 month reporting period as defined at condition A109.B.
- H. Unless otherwise indicated by Specific Conditions or regulatory requirements, all instrumentation used to measure parameters including but not limited to flow, temperature, pressure and chemical composition, or used to continuously monitor emission rates and/or other process operating parameters, shall be subject to the following requirements:
 - (1) The owner or operator shall install, calibrate, operate and maintain monitoring instrumentation (monitor) according to the manufacturer's procedures and specifications and the following requirements.
 - (a) The monitor shall be located in a position that provides a representative measurement of the parameter that is being monitored.
 - (b) At a minimum, the monitor shall complete one cycle of operation (sampling, analyzing, and data recording) for each successive 15-minute period.
 - (c) At a minimum, the monitor shall be spanned to measure the normal range +/- 5% of the parameter that is being monitored.
 - (d) At least semi-annually, perform a visual inspection of all components of the monitor for physical and operational integrity and all electrical connections for oxidation and galvanic corrosion.
 - (e) Recalibrate the monitor in accordance with the manufacturer's procedures and specifications at the frequency specified by the manufacturer, or every two years, whichever is less.
 - (2) Except for malfunctions, associated repairs, and required quality assurance or control activities (including calibration checks and required zero and span adjustments), the permittee shall operate and maintain all monitoring equipment at all times that the emissions unit or the associated process is operating.
 - (3) The monitor shall measure data for a minimum of 90 percent of the time that the emissions unit or the associated process is in operation, based on a calendar monthly average.
 - (4) The owner or operator shall maintain records in accordance with Section B109 to demonstrate compliance with the requirements in B108H (1)-(3) above, as applicable.

The permittee is not required to report a deviation for any monitoring or testing in a Specific Condition if the deviation was authorized in this General Condition B108.

REMARKS:

PART 1 B General Conditions

Monitoring required by conditions B108 A-H are completed as required and records are available for review at the facility. The San Juan Basin Gas Plant is in compliance with this condition

B109 General Recordkeeping Requirements

(20.2.70.302.D NMAC)

A. The permittee shall maintain records to assure and verify compliance with the terms and conditions of this permit and any applicable requirements that become effective during the term of this permit. The minimum information to be included in these records is (20.2.70.302.D.1 NMAC):

(1) Records required for testing and sampling:

- (a) equipment identification (include make, model and serial number for all tested equipment and emission controls)
- (b) date(s) and time(s) of sampling or measurements
- (c) date(s) analyses were performed
- (d) the qualified entity that performed the analyses
- (e) analytical or test methods used
- (f) results of analyses or tests
- (g) operating conditions existing at the time of sampling or measurement

(2) Records required for equipment inspections and/or maintenance required by this permit:

- (a) equipment identification number (including make, model and serial number)
- (b) date(s) and time(s) of inspection, maintenance, and/or repair
- (c) date(s) any subsequent analyses were performed (if applicable)
- (d) name of the person or qualified entity conducting the inspection, maintenance, and/or repair
- (e) copy of the equipment manufacturer's or the owner or operator's maintenance or repair recommendations (if required to demonstrate compliance with a permit condition)
- (f) description of maintenance or repair activities conducted
- (g) all results of any required parameter readings
- (h) a description of the physical condition of the equipment as found during any required inspection
- (i) results of required equipment inspections including a description of any condition which required adjustment to bring the equipment back into compliance and a description of the required adjustments

B. The permittee shall keep records of all monitoring data, equipment calibration, maintenance, and inspections, Data Acquisition and Handling System

☒ **Yes**

☐ **No**

☐ **N/A**

Explain
Below

PART 1 B General Conditions

<p>C.</p> <p>D.</p> <p>E.</p>	<p>(DAHS) if used, reports, and other supporting information required by this permit for at least five (5) years from the time the data was gathered or the reports written. Each record shall clearly identify the emissions unit and/or monitoring equipment, and the date the data was gathered. (20.2.70.302.D.2 NMAC)</p> <p>If the permittee has applied and received approval for an alternative operating scenario, then the permittee shall maintain a log at the facility, which documents, contemporaneously with any change from one operating scenario to another, the scenario under which the facility is operating. (20.2.70.302.A.3 NMAC)</p> <p>The permittee shall keep a record describing off permit changes made at this source that result in emissions of a regulated air pollutant subject to an applicable requirement, but not otherwise regulated under this permit, and the emissions resulting from those changes. (20.2.70.302.I.2 NMAC)</p> <p>Unless otherwise indicated by Specific Conditions, the permittee shall keep the following records for malfunction emissions and routine and predictable emissions during startup, shutdown, and scheduled maintenance (SSM):</p> <ol style="list-style-type: none"> (1) The owner or operator of a source subject to a permit, shall establish and implement a plan to minimize emissions during routine or predictable startup, shutdown, and scheduled maintenance through work practice standards and good air pollution control practices. This requirement shall not apply to any affected facility defined in and subject to an emissions standard and an equivalent plan under 40 CFR Part 60 (NSPS), 40 CFR Part 63 (MACT), or an equivalent plan under 20.2.72 NMAC - Construction Permits, 20.2.70 NMAC - Operating Permits, 20.2.74 NMAC - Permits - Prevention of Significant Deterioration (PSD), or 20.2.79 NMAC - Permits - Nonattainment Areas. (20.2.7.14.A NMAC) The permittee shall keep records of all sources subject to the plan to minimize emissions during routine or predictable SSM and shall record if the source is subject to an alternative plan and therefore, not subject to the plan requirements under 20.2.7.14.A NMAC. (2) If the facility has allowable SSM emission limits in this permit, the permittee shall record all SSM events, including the date, the start time, the end time, a description of the event, and a description of the cause of the event. This record also shall include a copy of the manufacturer's, or equivalent, documentation showing that any maintenance qualified as scheduled. Scheduled maintenance is an activity that occurs at an established frequency pursuant to a written protocol published by the manufacturer or other reliable source. The authorization of allowable SSM emissions does not supersede any applicable federal or state standard. The most stringent requirement applies. (3) If the facility has allowable malfunction emission limits in this permit, the permittee shall record all malfunction events to be applied against these limits. The permittee shall also include the date, the start time, the end time, and a description of the event. Malfunction means any sudden and unavoidable failure of air pollution control equipment or process equipment beyond the control of the owner or operator, including malfunction during startup or shutdown. A failure that is caused entirely or in part by poor maintenance, careless operation, or any other preventable equipment breakdown shall not be considered a malfunction. (20.2.7.7.E NMAC) The authorization of allowable malfunction emissions does not supersede any applicable federal or state standard. The most stringent requirement applies. This authorization only allows the permittee to avoid submitting reports under 20.2.7 NMAC for total annual emissions that are below the authorized malfunction emission limit. (4) The owner or operator of a source shall meet the operational plan defining the measures to be taken to mitigate source emissions during malfunction, startup or shutdown. (20.2.72.203.A(5) NMAC)
<p>REMARKS:</p> <p>Recordkeeping required by conditions B109 A-E are completed as required and records are available for review at the facility. The San Juan Basin Gas Plant is in compliance with this condition.</p>	

PART 1 B General Conditions

<p><u>B110 General Reporting Requirements</u> (20.2.70.302.E NMAC)</p> <p>C. Reports of required monitoring activities for this facility shall be submitted to the Department on the schedule in section A109. Monitoring and recordkeeping requirements that are not required by a NSPS or MACT shall be maintained on-site or (for unmanned sites) at the nearest company office, and summarized in the semi-annual reports, unless alternative reporting requirements are specified in the equipment specific requirements section of this permit.</p> <p>D. Reports shall clearly identify the subject equipment showing the emission unit ID number according to this operating permit. In addition, all instances of deviations from permit requirements, including those that occur during emergencies, shall be clearly identified in the reports required by section A109. (20.2.70.302.E.1 NMAC)</p> <p>E. The permittee shall submit reports of all deviations from permit requirements, including those attributable to upset conditions as defined in the permit, the probable cause of such deviations, and any corrective actions or preventive measures taken. These reports shall be submitted as follows:</p> <p style="margin-left: 20px;">(1) Deviations resulting in excess emissions as defined in 20.2.7.7 NMAC (including those classified as emergencies as defined in section B114.A) shall be reported in accordance with the timelines specified by 20.2.7.110 NMAC and in the semi-annual reports required in section A109. (20.2.70.302.E.2 NMAC)</p> <p style="margin-left: 20px;">(2) All other deviations shall be reported in the semi-annual reports required in section A109. (20.2.70.302.E.2 NMAC).</p> <p>F. The permittee shall submit reports of excess emissions in accordance with 20.2.7.110.A NMAC.</p> <p>G. Allowable Emission Limits for Excess Emissions Reporting for Flares and Other Regulated Sources with No Pound per Hour (pph) and/or Ton per Year (tpy) Emission Limits.</p> <p style="margin-left: 20px;">(1) When a flare has no allowable pph and/or tpy emission limits in Sections A106 and/or A107, the authorized allowable emissions include only the combustion of pilot and/or purge gas. Compliance is demonstrated by limiting the gas stream to the flare to only pilot and/or purge gas.</p> <p style="margin-left: 20px;">(2) For excess emissions reporting as required by 20.2.7 NMAC, the allowable emission limits are 1.0 pph and 1.0 tpy for each regulated air pollutant (except for H2S) emitted by that source as follows:</p> <p style="margin-left: 40px;">(a) For flares, when there are no allowable emission limits in Sections A106 and/or A107.</p> <p style="margin-left: 40px;">(b) For regulated sources with emission limits in Sections A106 or A107 represented by the less than sign (“<”).</p> <p style="margin-left: 40px;">(c) For regulated sources that normally would not emit any regulated air pollutants, including but not limited to vents, pressure relief devices, connectors, etc.</p> <p style="margin-left: 20px;">(3) For excess emissions reporting as required by 20.2.7 NMAC for H2S, the allowable limits are 0.1 pph and 0.44 tpy for each applicable scenario addressed in paragraph (2) above.</p>	<input checked="checked" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A Explain Below
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PART 1 B General Conditions

<p>H. Results of emission tests and monitoring for each pollutant (except opacity) shall be reported in pounds per hour (unless otherwise specified) and tons per year. Opacity shall be reported in percent. The number of significant figures corresponding to the full accuracy inherent in the testing instrument or Method test used to obtain the data shall be used to calculate and report test results in accordance with 20.2.1.116.B and C NMAC. Upon request by the Department, CEMS and other tabular data shall be submitted in editable, MS Excel format.</p> <p>I. At such time as new units are installed as authorized by the applicable NSR Permit, the permittee shall fulfill the notification requirements in the NSR permit.</p> <p>J. Periodic Emissions Test Reporting: The permittee shall report semi-annually a summary of the test results.</p> <p>K. The permittee shall submit an emissions inventory report for this facility in accordance with the schedule in subparagraph (5), provided one or more of the following criteria is met in subparagraphs (1) to (4): (20.2.73 NMAC)</p> <ul style="list-style-type: none"> (1) The facility emits, or has the potential to emit, 5 tons per year or more of lead or lead compounds, or 100 tons per year or more of PM10, PM2.5, sulfur oxides, nitrogen oxides, carbon monoxide, or volatile organic compounds. (2) The facility is defined as a major source of hazardous air pollutants under 20.2.70 NMAC (Operating Permits). (3) The facility is located in an ozone nonattainment area and which emits, or has the potential to emit, 25 tons per year or more of nitrogen oxides or volatile organic compounds. (4) Upon request by the department. (5) The permittee shall submit the emissions inventory report by April 1 of each year, unless a different deadline is specified by the current operating permit. <p>L. Emissions trading within a facility (20.2.70.302.H.2 NMAC)</p> <ul style="list-style-type: none"> (1) For each such change, the permittee shall provide written notification to the department and the administrator at least seven (7) days in advance of the proposed changes. Such notification shall state when the change will occur and shall describe the changes in emissions that will result and how these increases and decreases in emissions will comply with the terms and conditions of the permit. (2) The permittee and department shall attach each such notice to their copy of the relevant permit. 	
<p>REMARKS:</p> <p>Reports were submitted for the applicable conditions. Records are available at the facility for review and have been submitted in summary with the Semi-Annual Reports. The annual emission inventory for 2019 was submitted on 03/24/2020. The San Juan Basin Gas Plant is in compliance with this condition.</p>	
<p><u>B111 General Testing Requirements</u></p> <p>Unless otherwise indicated by Specific Conditions or regulatory requirements, the permittee shall conduct testing in accordance with the requirements in Sections B111A, B, C, D and E, as applicable.</p>	<input checked="checked" type="checkbox"/> Yes <input type="checkbox"/> No

PART 1 B General Conditions

<p>A. Initial Compliance Tests</p> <p>The permittee shall conduct initial compliance tests in accordance with the following requirements:</p> <ol style="list-style-type: none"> (1) Initial compliance test requirements from previous permits (if any) are still in effect, unless the tests have been satisfactorily completed. Compliance tests may be re-imposed if it is deemed necessary by the Department to determine whether the source is in compliance with applicable regulations or permit conditions. (20.2.72 NMAC Sections 210.C and 213) (2) Initial compliance tests shall be conducted within sixty (60) days after the unit(s) achieve the maximum normal production rate. If the maximum normal production rate does not occur within one hundred twenty (120) days of source startup, then the tests must be conducted no later than one hundred eighty (180) days after initial startup of the source. (3) The default time period for each test run shall be at least 60 minutes and each performance test shall consist of three separate runs using the applicable test method. For the purpose of determining compliance with an applicable emission limit, the arithmetic mean of results of the three runs shall apply. In the event that a sample is accidentally lost or conditions occur in which one of the three runs must be discontinued because of forced shutdown, failure of an irreplaceable portion of the sample train, extreme meteorological conditions, or other circumstances, beyond the owner or operator's control, compliance may, upon the Department approval, be determined using the arithmetic mean of the results of the two other runs. (4) Testing of emissions shall be conducted with the emissions unit operating at 90 to 100 percent of the maximum operating rate allowed by the permit. If it is not possible to test at that rate, the source may test at a lower operating rate (5) Testing performed at less than 90 percent of permitted capacity will limit emission unit operation to 110 percent of the tested capacity until a new test is conducted. (6) If conditions change such that unit operation above 110 percent of tested capacity is possible, the source must submit a protocol to the Department within 30 days of such change to conduct a new emissions test. <p>B. EPA Reference Method Tests</p> <p>The test methods in Section B111.B(1) shall be used for all initial compliance tests and all Relative Accuracy Test Audits (RATAs), and shall be used if a permittee chooses to use EPA test methods for periodic monitoring. Test methods that are not listed in Section B111.B(1) may be used in accordance with the requirements at Section B111.B(2).</p> <ol style="list-style-type: none"> (1) All compliance tests required by this permit shall be conducted in accordance with the requirements of CFR Title 40, Part 60, Subpart A, General Provisions, and the following EPA Reference Methods as specified by CFR Title 40, Part 60, Appendix A: <ol style="list-style-type: none"> (a) Methods 1 through 4 for stack gas flowrate (b) Method 5 for particulate matter (PM) (TSP) (c) Method 6C for SO₂ (d) Method 7E for NO_x (test results shall be expressed as nitrogen dioxide (NO₂) using a molecular weight of 46 lb/lb-mol in all calculations (each ppm of NO/NO₂ is equivalent to 1.194 x 10⁻⁷ lb/SCF) (e) Method 9 for visual determination of opacity 	<input type="checkbox"/> N/A Explain Below
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PART 1 B General Conditions

- (f) Method 10 for CO
 - (g) Method 19 for particulate, sulfur dioxide and nitrogen oxides emission rates. In addition, Method 19 may be used in lieu of Methods 1-4 for stack gas flowrate. The permittee shall provide a contemporaneous fuel gas analysis (preferably on the day of the test, but no earlier than three months prior to the test date) and a recent fuel flow meter calibration certificate (within the most recent quarter) with the final test report.
 - (h) Method 7E or 20 for Turbines per §60.335 or §60.4400
 - (i) Method 22 for visual determination of fugitive emissions from material sources and smoke emissions from flares
 - (j) Method 25A for VOC reduction efficiency
 - (k) Method 29 for Metals
 - (l) Method 30B for Mercury from Coal-Fired Combustion Sources Using Carbon Sorbent Traps
 - (m) Method 201A for filterable PM₁₀ and PM_{2.5}
 - (n) Method 202 for condensable PM
 - (o) Method 320 for organic Hazardous Air Pollutants (HAPs)
- (2) Permittees may propose test method(s) that are not listed in Section B111.B(1). These methods may be used if prior approval is received from the Department.

C. Periodic Monitoring and Portable Analyzer Requirements for the Determination of Nitrogen Oxides, Carbon Monoxide, and Oxygen Concentrations in Emissions from Reciprocating Engines, Combustion Turbines, Boilers, and Process Heaters

Periodic emissions tests (periodic monitoring) shall be conducted in accordance with the following requirements:

- (1) Periodic emissions tests may be conducted in accordance with EPA Reference Methods or by utilizing a portable analyzer. Periodic monitoring utilizing a portable analyzer shall be conducted in accordance with the requirements of the current version of ASTM D 6522. However, if a facility has met a previously approved Department criterion for portable analyzers, the analyzer may be operated in accordance with that criterion until it is replaced.
- (2) The default time period for each test run shall be **at least** 20 minutes.
Each performance test shall consist of three separate runs. The arithmetic mean of results of the three runs shall be used to determine compliance with the applicable emission limit.
- (3) Testing of emissions shall be conducted in accordance with the requirements at Section B108.E.
- (4) During emissions tests, pollutant and diluent concentration shall be monitored and recorded. Fuel flow rate shall be monitored and recorded if stack gas flow rate is determined utilizing Reference Method 19. This information shall be included with the test report furnished to the Department.
- (5) Stack gas flow rate shall be calculated in accordance with Reference Method 19 utilizing fuel flow rate (scf) determined by a dedicated fuel flow meter and fuel heating value (Btu/scf). The permittee shall provide a contemporaneous fuel gas analysis (preferably on the day of the test, but no

PART 1 B General Conditions

<p>earlier than three months prior to the test date) and a recent fuel flow meter calibration certificate (within the most recent quarter) with the final test report. Alternatively, stack gas flow rate may be determined by using EPA Reference Methods 1-4.</p> <p>(6) The permittee shall submit a notification and protocol for periodic emissions tests upon the request of the Department.</p> <p>D. Initial Compliance Test and RATA Procedures</p> <p>Permittees required to conduct initial compliance tests and/or RATAs shall comply with the following requirements:</p> <ol style="list-style-type: none"> (1) The permittee shall submit a notification and test protocol to the Department's Program Manager, Compliance and Enforcement Section, at least thirty (30) days before the test date and allow a representative of the Department to be present at the test. Proposals to use test method(s) that are not listed in Section B111.B(1) (if applicable) shall be included in this notification. (2) Contents of test notifications, protocols and test reports shall conform to the format specified by the Department's Universal Test Notification, Protocol and Report Form and Instructions. Current forms and instructions are posted to NMED's Air Quality web site under Compliance and Enforcement Testing. (3) The permittee shall provide (a) sampling ports adequate for the test methods applicable to the facility, (b) safe sampling platforms, (c) safe access to sampling platforms and (d) utilities for sampling and testing equipment. (4) Where necessary to prevent cyclonic flow in the stack, flow straighteners shall be installed <p>E. General Compliance Test Procedures</p> <p>The following requirements shall apply to all initial compliance and periodic emissions tests and all RATAs:</p> <ol style="list-style-type: none"> (1) Equipment shall be tested in the "as found" condition. Equipment may not be adjusted or tuned prior to any test for the purpose of lowering emissions, and then returned to previous settings or operating conditions after the test is complete. (2) The stack shall be of sufficient height and diameter and the sample ports shall be located so that a representative test of the emissions can be performed in accordance with the requirements of EPA Reference Method 1 or the current version of ASTM D 6522, as applicable. (3) Test reports shall be submitted to the Department no later than 30 days after completion of the test. 	
<p>REMARKS:</p> <p>Testing was conducted in accordance with the conditions listed above. Summary of results are included in the appropriate semiannual report. The San Juan Basin Gas Plant is in compliance with this condition.</p>	
<p><u>B112 Compliance</u></p> <p>A. The Department shall be given the right to enter the facility at all reasonable times to verify the terms and conditions of this permit. Required records shall be organized by date and subject matter and shall at all times be readily available for inspection. The permittee, upon verbal or written request from an authorized representative of the Department who appears at the facility, shall immediately produce for inspection or copying any records required to be maintained at the facility. Upon written request at other times, the permittee shall deliver to the Department paper or electronic copies of any and all</p>	<div style="display: flex; flex-direction: column; align-items: center;"> <div><input checked="" type="checkbox"/> Yes</div> <div><input type="checkbox"/> No</div> <div><input type="checkbox"/> N/A</div> <div>Explain</div> </div>

PART 1 B General Conditions

<p>required records maintained on site or at an off-site location. Requested records shall be copied and delivered at the permittee's expense within three business days from receipt of request unless the Department allows additional time. Required records may include records required by permit and other information necessary to demonstrate compliance with terms and conditions of this permit. (NMSA 1978, Section 74-2-13)</p> <p>B. A copy of the most recent permit(s) issued by the Department shall be kept at the permitted facility or (for unmanned sites) at the nearest company office and shall be made available to Department personnel for inspection upon request. (20.2.70.302.G.3 NMAC)</p> <p>C. Emissions limits associated with the energy input of a Unit, i.e. lb/MMBtu, shall apply at all times unless stated otherwise in a Specific Condition of this permit. The averaging time for each emissions limit, including those based on energy input of a Unit (i.e. lb/MMBtu) is one (1) hour unless stated otherwise in a Specific Condition of this permit or in the applicable requirement that establishes the limit. (20.2.70.302.A.1 and G.3 NMAC)</p> <p>D. The permittee shall submit compliance certification reports certifying the compliance status of this facility with respect to all permit terms and conditions, including applicable requirements. These reports shall be made on the pre-populated Compliance Certification Report Form that is provided to the permittee by the Department, and shall be submitted to the Department and to EPA at least every 12 months. For the most current form, please contact the Compliance Reports Group at: submittals.aqb@state.nm.us. For additional reporting guidance see https://www.env.nm.gov/air-quality/compliance-submittal-forms/. (20.2.70.302.E.3 NMAC)</p> <p>E. The permittee shall allow representatives of the Department, upon presentation of credentials and other documents as may be required by law, to do the following (20.2.70.302.G.1 NMAC):</p> <ol style="list-style-type: none"> (1) enter the permittee's premises where a source or emission unit is located, or where records that are required by this permit to be maintained are kept; (2) have access to and copy, at reasonable times, any records that are required by this permit to be maintained; (3) inspect any facilities, equipment (including monitoring and air pollution control equipment), work practices or operations regulated or required under this permit; and (4) sample or monitor any substances or parameters for the purpose of assuring compliance with this permit or applicable requirements or as otherwise authorized by the Federal Act. 	Below
<p>REMARKS:</p> <p>Required documentation is available for review at the facility and were reviewed during the Bureau's facility inspection. Required submittals have been delivered in accordance with this condition including the appropriate forms. The San Juan Basin Gas Plant is in compliance with this condition.</p>	
<p><u>B113 Permit Reopening and Revocation</u></p> <p>A. This permit will be reopened and revised when any one of the following conditions occurs, and may be revoked and reissued when A(3) or A(4) occurs. (20.2.70.405.A.1 NMAC)</p> <ol style="list-style-type: none"> (1) Additional applicable requirements under the Federal Act become applicable to a major source three (3) or more years before the expiration date 	<div style="display: flex; flex-direction: column; align-items: center;"> <div style="display: flex; justify-content: space-between; width: 100%;"> <input type="checkbox"/> Yes <input type="checkbox"/> No </div> <div style="display: flex; justify-content: space-between; width: 100%;"> <input checked="" type="checkbox"/> N/A Explain </div> </div>

PART 1 B General Conditions

<p>of this permit. If the effective date of the requirement is later than the expiration date of this permit, then the permit is not required to be reopened unless the original permit or any of its terms and conditions has been extended due to the Department's failure to take timely action on a request by the permittee to renew this permit.</p> <p>(2) Additional requirements, including excess emissions requirements, become applicable to this source under Title IV of the Federal Act (the acid rain program). Upon approval by the Administrator, excess emissions offset plans will be incorporated into this permit.</p> <p>(3) The Department or the Administrator determines that the permit contains a material mistake or that inaccurate statements were made in establishing the terms and conditions of the permit.</p> <p>(4) The Department or the Administrator determines that the permit must be revised or revoked and reissued to assure compliance with an applicable requirement.</p> <p>Proceedings to reopen or revoke this permit shall affect only those parts of this permit for which cause to reopen or revoke exists. Emissions units for which permit conditions have been revoked shall not be operated until new permit conditions have been issued for them. (20.2.70.405.A.2 NMAC)</p>	Below
<p>REMARKS:</p> <p>The San Juan Basin Gas Plant is unaware of any Reopening or Revocation proceedings currently being reviewed.</p>	
<p><u>B114 Emergencies</u> (20.2.70.304 NMAC)</p> <p>A. An "emergency" means any situation arising from sudden and reasonably unforeseeable events beyond the control of the permittee, including acts of God, which situation requires immediate corrective action to restore normal operation, and that causes the source to exceed a technology-based emission limitation under the permit due to unavoidable increases in emissions attributable to the emergency. An emergency shall not include noncompliance to the extent caused by improperly designed equipment, lack of preventive maintenance, or careless or improper operation.</p> <p>B. An emergency constitutes an affirmative defense to an action brought for noncompliance with technology-based emission limitations contained in this permit if the permittee has demonstrated through properly signed, contemporaneous operating logs, or other relevant evidence that:</p> <p style="margin-left: 20px;">(1) An emergency occurred and that the permittee can identify the cause(s) of the emergency;</p> <p style="margin-left: 20px;">(2) This facility was at the time being properly operated;</p> <p style="margin-left: 20px;">(3) During the period of the emergency the permittee took all reasonable steps to minimize levels of emissions that exceeded the emission standards or other requirements in this permit; and</p> <p style="margin-left: 20px;">(4) The permittee submitted notice of the emergency to the Department within 2 working days of the time when emission limitations were exceeded due to the emergency. This notice fulfills the requirement of 20.2.70.302.E.2 NMAC. This notice must contain a description of the emergency, any steps taken to mitigate emissions, and corrective actions taken.</p> <p>C. In any enforcement proceeding, the permittee seeking to establish the occurrence of an emergency has the burden of proof.</p>	<p><input checked="" type="checkbox"/> Yes</p> <p><input type="checkbox"/> No</p> <p><input type="checkbox"/> N/A</p> <p>Explain Below</p>

PART 1 B General Conditions

D. This provision is in addition to any emergency or upset provision contained in any applicable requirement.	
REMARKS: The San Juan Basin Gas Plant did not experience any emergencies during this reporting period but understands the conditions listed above and will follow in the event of an emergency.	
<u>B115 Stratospheric Ozone</u> (20.2.70.302.A.1 NMAC) A. If this facility is subject to 40 CFR 82, Subpart F, the permittee shall comply with the following standards for recycling and emissions reductions: <ul style="list-style-type: none"> (1) Persons opening appliances for maintenance, service, repair, or disposal must comply with the required practices, except for motor vehicle air conditioners (MVAC) and MVAC-like appliances. (40 CFR 82.156) (2) Equipment used during the maintenance, service, repair, or disposal of appliances must comply with the standards for recycling and recovery equipment. (40 CFR 82.158) (3) Persons performing maintenance, service, repair, or disposal of appliances must be certified by an approved technician certification program. (40 CFR 82.161) 	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A Explain Below
REMARKS: Only approved service companies are used to conduct the operations listed in this condition. The San Juan Basin Gas Plant is in compliance with this condition.	
<u>B116 Acid Rain Sources</u> (20.2.70.302.A.9 NMAC) A. If this facility is subject to the federal acid rain program under 40 CFR 72, this section applies. B. Where an applicable requirement of the Federal Act is more stringent than an applicable requirement of regulations promulgated under Title IV of the Federal Act, both provisions are incorporated into this permit and are federally enforceable. C. Emissions exceeding any allowances held by the permittee under Title IV of the Federal Act or the regulations promulgated thereunder are prohibited. D. No modification of this permit is required for increases in emissions that are authorized by allowances acquired pursuant to the acid rain program, provided that such increases do not require a permit modification under any other applicable requirement.	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A Explain Below

PART 1 B General Conditions

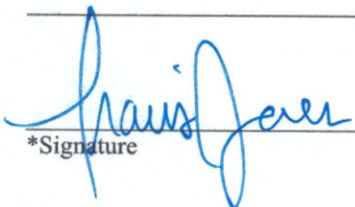
<p>E. The permittee may not use allowances as a defense to noncompliance with any other applicable requirement.</p> <p>F. No limit is placed on the number of allowances held by the acid rain source. Any such allowance shall be accounted for according to the procedures established in regulations promulgated under Title IV of the Federal Act.</p> <p>The acid rain permit is an enclosure of this operating permit.</p>	
<p>REMARKS:</p> <p>The San Juan Basin Gas Plant is not subject to the federal acid rain program under 40 CFR 72 as listed in the permit application.</p>	
<p><u>B117 Risk Management Plan</u> (20.2.70.302.A.1 NMAC)</p> <p>A. If this facility is subject to the federal risk management program under 40 CFR 68, this section applies.</p> <p>B. The owner or operator shall certify annually that they have developed and implemented a RMP and are in compliance with 40 CFR 68.</p> <p>C. If the owner or operator of the facility has not developed and submitted a risk management plan according to 40 CFR 68.150, the owner or operator shall provide a compliance schedule for the development and implementation of the plan. The plan shall describe, in detail, procedures for assessing the accidental release hazard, preventing accidental releases, and developing an emergency response plan to an accidental release. The plan shall be submitted in a method and format to a central point as specified by EPA prior to the date specified in 40 CFR 68.150.b.</p>	<p><input checked="" type="checkbox"/> Yes</p> <p><input type="checkbox"/> No</p> <p><input type="checkbox"/> N/A</p> <p>Explain Below</p>
<p>REMARKS:</p> <p>The facility maintains a current Risk Management Plan and has been submitted in accordance to EPA specifications. The San Juan Basin Gas Plant is in compliance with this condition</p>	

Section 22: Certification

Company Name: Harvest Four Corners, LLC

I, Travis Jones, hereby certify that the information and data submitted in this application are true and as accurate as possible, to the best of my knowledge and professional expertise and experience.

Signed this 11 day of August, 2021, upon my oath or affirmation, before a notary of the State of


*Signature

8/11/2021
Date

Travis Jones
Printed Name

EHS Manager
Title

Scribed and sworn before me on this 11 day of August, 2021.

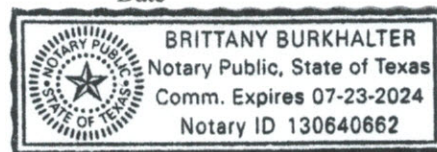
My authorization as a notary of the State of Texas expires on the

23 day of July, 2024.


Notary's Signature

8/11/2021
Date

Brittany Burkhalter
Notary's Printed Name



*For Title V applications, the signature must be of the Responsible Official as defined in 20.2.70.7.AE NMAC.