This Natural Gas Managem I. <b>Operator:</b> _DJR Operat II. Type: ⊠ Original □ A If Other, please describe: _	ting, LLC	<u>Section</u> <u>F</u> nt due to □ 19.15.2	vith each Applica <b>1 – Plan D</b> Cffective May 25 OGRID: _37183 7.9.D(6)(a) NMA	tion for F <u>escrip</u> ,2021 8 .C □ 19.1	Permit to Drill ( <u><b>tion</b></u>	APD) for a new o <b>Date:</b> _01_/_19_	/_2022_
I. Operator: _DJR Operat II. Type: ⊠ Original □ A	ting, LLC	<u>Section</u> <u>F</u> nt due to □ 19.15.2	<u>n 1 – Plan D</u> Effective May 25 OGRID: _37183 7.9.D(6)(a) NMA	<u>escrip</u> , <u>2021</u> 8 .C □ 19.3	<u>tion</u>	<b>Date:</b> _01_/_19_	/_2022_
II. Type: ⊠ Original □ A	Amendme	<u>■</u> nt due to □ 19.15.2	2 <b>ffective May 25</b> OGRID: _37183 7.9.D(6)(a) NMA	, <b>2021</b> 8 .C □ 19.1			
II. Type: ⊠ Original □ A	Amendme	nt due to □ 19.15.2	7.9.D(6)(a) NMA	.C 🗆 19.3			
					15.27.9.D(6)(b)	NMAC 🗆 Other	r.
f Other, please describe: _							
<b>III. Well(s):</b> Provide the for be recompleted from a sing					or set of wells	proposed to be d	rilled or proposed to
Well Name	API	ULSTR	Footages	5	Anticipated Oil BBL/D	Anticipated Gas MCF/D	Anticipated Produced Water BBL/D
Gallo Canyon Unit 303H	TBD	M-26-23N-6W	890 FSL x 499	FWL	340	500	120
Gallo Canyon Unit 304H	TBD	M-26-23N-6W	862 FSL x 446	FWL	380	575	140
Gallo Canyon Unit 305H	TBD	M-26-23N-6W	852 FSL x 428		250	370	90
Gallo Canyon Unit 309H	TBD	M-26-23N-6W	881 FSL x 1944	4 FWL	425	630	150
IV. Central Delivery Poin	t Name:	_Chaco Processing	Plant			[See 19.15.27.9	9(D)(1) NMAC]
V. Anticipated Schedule: proposed to be recompleted						set of wells prop	posed to be drilled or
Well Name	API	Spud Date	TD Reached	С	ompletion	Initial Flow	First Production
		-	Date		encement Date	Back Date	Date
Gallo Canyon Unit 303H	TBD	04/08/2022	04/16/2022	08	8/28/2022	09/23/2022	10/23/2022
Gallo Canyon Unit 304H	TBD	04/16/2022	04/24/2022	09	9/01/2022	09/25/2022	10/23/2022
Gallo Canyon Unit 305H	TBD	04/24/2022	05/02/2022	09	9/05/2022	09/27/2022	10/23/2022
Gallo Canyon Unit 307H	TBD	05/02/2022	05/09/2022	09	9/09/2022	09/29/2022	10/23/2022
Gallo Canyon Unit 308H	TBD	05/09/2022	05/17/2022	09	9/13/2022	10/01/2022	10/23/2022
Gallo Canyon Unit 309H	TBD	05/17/2022	05/30/2022	09	9/17/2022	10/03/2022	10/23/2022
Gallo Canyon Unit 303H Gallo Canyon Unit 304H Gallo Canyon Unit 305H Gallo Canyon Unit 307H Gallo Canyon Unit 307H Gallo Canyon Unit 309H IV. Central Delivery Poin V. Anticipated Schedule: proposed to be recompleted Well Name Gallo Canyon Unit 303H Gallo Canyon Unit 304H Gallo Canyon Unit 305H Gallo Canyon Unit 307H Gallo Canyon Unit 307H	TBD TBD TBD TBD TBD TBD TBD t Name: Provide th from a s API TBD TBD TBD TBD TBD TBD	M-26-23N-6W M-26-23N-6W M-26-23N-6W M-26-23N-6W M-26-23N-6W M-26-23N-6W Chaco Processing the following inform ingle well pad or co Spud Date 04/08/2022 04/16/2022 04/24/2022 05/02/2022	890 FSL x 499           862 FSL x 446           852 FSL x 428           871 FSL x 464           843 FSL x 411           881 FSL x 1944           Plant           ation for each new nnected to a centre           TD Reached Date           04/16/2022           04/24/2022           05/02/2022           05/09/2022           05/17/2022	FWL FWL FWL FWL 4 FWL 4 FWL comm 08 09 09 09 09	Oil BBL/D 340 380 250 410 270 425 mpleted well or ry point. ompletion encement Date 8/28/2022 9/01/2022 9/05/2022 9/09/2022 9/13/2022	Gas MCF/D 500 575 370 610 400 630 [See 19.15.27.9 set of wells prop Set of wells prop 09/23/2022 09/25/2022 09/25/2022 09/27/2022 09/29/2022 10/01/2022	Produced Wate BBL/D 120 140 90 150 95 150 P(D)(1) NMAC] posed to be drilled bosed to be drilled Date 10/23/2022 10/23/2022 10/23/2022 10/23/2022

VI. Separation Equipment: 🖂 Attach a complete description of how Operator will size separation equipment to optimize gas capture.

**VII. Operational Practices:**  $\boxtimes$  Attach a complete description of the actions Operator will take to comply with the requirements of Subsection A through F of 19.15.27.8 NMAC.

VIII. Best Management Practices: 🛛 Attach a complete description of Operator's best management practices to minimize venting during active and planned maintenance.

# Section 2 – Enhanced Plan EFFECTIVE APRIL 1, 2022

Beginning April 1, 2022, an operator that is not in compliance with its statewide natural gas capture requirement for the applicable reporting area must complete this section.

□ Operator certifies that it is not required to complete this section because Operator is in compliance with its statewide natural gas capture requirement for the applicable reporting area.

#### IX. Anticipated Natural Gas Production:

Well	API	Anticipated Average Natural Gas Rate MCF/D	Anticipated Volume of Natural Gas for the First Year MCF

#### X. Natural Gas Gathering System (NGGS):

Operator	System	ULSTR of Tie-in	Anticipated Gathering Start Date	Available Maximum Daily Capacity of System Segment Tie-in

**XI. Map.**  $\Box$  Attach an accurate and legible map depicting the location of the well(s), the anticipated pipeline route(s) connecting the production operations to the existing or planned interconnect of the natural gas gathering system(s), and the maximum daily capacity of the segment or portion of the natural gas gathering system(s) to which the well(s) will be connected.

**XII. Line Capacity.** The natural gas gathering system  $\Box$  will  $\Box$  will not have capacity to gather 100% of the anticipated natural gas production volume from the well prior to the date of first production.

**XIII.** Line Pressure. Operator  $\Box$  does  $\Box$  does not anticipate that its existing well(s) connected to the same segment, or portion, of the natural gas gathering system(s) described above will continue to meet anticipated increases in line pressure caused by the new well(s).

□ Attach Operator's plan to manage production in response to the increased line pressure.

**XIV. Confidentiality:**  $\Box$  Operator asserts confidentiality pursuant to Section 71-2-8 NMSA 1978 for the information provided in Section 2 as provided in Paragraph (2) of Subsection D of 19.15.27.9 NMAC, and attaches a full description of the specific information for which confidentiality is asserted and the basis for such assertion.

# <u>Section 3 - Certifications</u> <u>Effective May 25, 2021</u>

Operator certifies that, after reasonable inquiry and based on the available information at the time of submittal:

 $\boxtimes$  Operator will be able to connect the well(s) to a natural gas gathering system in the general area with sufficient capacity to transport one hundred percent of the anticipated volume of natural gas produced from the well(s) commencing on the date of first production, taking into account the current and anticipated volumes of produced natural gas from other wells connected to the pipeline gathering system; or

 $\Box$  Operator will not be able to connect to a natural gas gathering system in the general area with sufficient capacity to transport one hundred percent of the anticipated volume of natural gas produced from the well(s) commencing on the date of first production, taking into account the current and anticipated volumes of produced natural gas from other wells connected to the pipeline gathering system. *If Operator checks this box, Operator will select one of the following:* 

**Well Shut-In.**  $\Box$  Operator will shut-in and not produce the well until it submits the certification required by Paragraph (4) of Subsection D of 19.15.27.9 NMAC; or

**Venting and Flaring Plan.**  $\Box$  Operator has attached a venting and flaring plan that evaluates and selects one or more of the potential alternative beneficial uses for the natural gas until a natural gas gathering system is available, including:

- (a) power generation on lease;
- (b) power generation for grid;
- (c) compression on lease;
- (d) liquids removal on lease;
- (e) reinjection for underground storage;
- (f) reinjection for temporary storage;
- (g) reinjection for enhanced oil recovery;
- (h) fuel cell production; and
- (i) other alternative beneficial uses approved by the division.

# Section 4 - Notices

1. If, at any time after Operator submits this Natural Gas Management Plan and before the well is spud:

(a) Operator becomes aware that the natural gas gathering system it planned to connect the well(s) to has become unavailable or will not have capacity to transport one hundred percent of the production from the well(s), no later than 20 days after becoming aware of such information, Operator shall submit for OCD's approval a new or revised venting and flaring plan containing the information specified in Paragraph (5) of Subsection D of 19.15.27.9 NMAC; or

(b) Operator becomes aware that it has, cumulatively for the year, become out of compliance with its baseline natural gas capture rate or natural gas capture requirement, no later than 20 days after becoming aware of such information, Operator shall submit for OCD's approval a new or revised Natural Gas Management Plan for each well it plans to spud during the next 90 days containing the information specified in Paragraph (2) of Subsection D of 19.15.27.9 NMAC, and shall file an update for each Natural Gas Management Plan until Operator is back in compliance with its baseline natural gas capture rate or natural gas capture requirement.

2. OCD may deny or conditionally approve an APD if Operator does not make a certification, fails to submit an adequate venting and flaring plan which includes alternative beneficial uses for the anticipated volume of natural gas produced, or if OCD determines that Operator will not have adequate natural gas takeaway capacity at the time a well will be spud.

I certify that, after reasonable inquiry, the statements in and attached to this Natural Gas Management Plan are true and correct to the best of my knowledge and acknowledge that a false statement may be subject to civil and criminal penalties under the Oil and Gas Act.

Signature: Shaw-Marie Ford
Printed Name: Shaw-Marie Ford
Title: Regulatory Specialist
E-mail Address: sford@djrllc.com
Date: 01/19/2022
Phone: 505-716-3297
OIL CONSERVATION DIVISION (Only applicable when submitted as a standalone form)
Approved By:
Title:
Title:
Title: Approval Date:
Title: Approval Date:
Title: Approval Date:



## DJR OPERATING, LLC. OGRID NO: 371838 NATURAL GAS MANAGEMENT PLAN GALLO CANYON UNIT 303H, 304H, 305H, 307H, 308H, 309H SWSW M-26-23N-06W

# SEPARATION EQUIPMENT

DJR Operating, LLC (DJR) has pulled representative pressurized samples from wells in the same producing formation. DJR has utilized these samples in process simulations to determine the amount of gas anticipated in each stage of the process and utilized this information with a safety factor to size the equipment listed below:

Separation equipment will be set as follows:

- Individual 3 phase separators will be set for each individual well.
- The separators will be sized based on the anticipated volume of the well and the pressure of the lines utilized for oil, gas, and water takeaway.
- The 3 phase production separators will each be equipped with a 0.75 MMBtu/hr indirect fired heater.

Heater treaters will be set as follows:

- Individual heater treaters will be set for each individual well.
- The heater treaters are sized based on the anticipated combined volume of oil and produced water predicted to come from the initial 3 phase separators.
- Oil will be separated from the produced water and the produced water will be sent to its respective tanks.
- The combined oil and natural gas stream is routed to the Vapor Recovery Tower.

Vapor Recovery Equipment will be set as follows:

- The Vapor Recovery Tower has been sized, based on the anticipated volume of gas from the heater treater and oil and water tanks.
- The Vapor Recovery Unit has been sized, based on the anticipated volume of gas from the heater treater and oil and water tanks. The Vapor Recovery Unit is utilized to push the recovered gas into the sales pipeline.

Production storage tanks will be set as follows:

- The oil and produced water tanks utilize a closed vent capture system to ensure all breathing, working, and flashing losses are routed to the Vapor Recovery Tower and Vapor Recovery Unit.
- Each of the production storage tanks will be equipped with a 0.5 MMBtu/hr indirect heater.



## DJR OPERATING, LLC. OGRID NO: 371838 NATURAL GAS MANAGEMENT PLAN GALLO CANYON UNIT 303H, 304H, 305H, 307H, 308H, 309H SWSW M-26-23N-06W

# **OPERATIONAL PRACTICES**

#### 19.15.27.8 A. Venting and Flaring of Natural Gas

DJR Operating, LLC (DJR) understands the requirements of NMAC 19.15.27.8 which states that the venting and flaring of natural gas during drilling, completion or production that constitutes waste as defined in 19.15.2 are prohibited.

#### 19.15.27.8 B. Venting and flaring during drilling operations

- DJR shall capture or combust natural gas if technically feasible during drilling operations using best industry practices.
- A flare stack with a 100% capacity for expected volumes will be set on location of the facility at least 100 feet from the nearest surface hole location, well heads, and storage tanks.
- In the event of an emergency, DJR will vent natural gas in order to avoid substantial impact. DJR shall report the vented or flared gas to the NMOCD.

#### 19.15.27.8 E. Venting and flaring during completion or recompletion operations

During Completion Operations, DJR utilizes the following:

- DJR facilities are built and ready from day 1 of Flowback.
- Individual well test separators will be set to properly separate gas and liquids. Temporary
  test separator will be utilized initially to process volumes. In addition, separators will be
  tied into flowback tanks which will be tied into the gas processing equipment for sales
  down a pipeline. See Separation Equipment for details.
- Should the facility not yet be capable of processing gas, or the gas does not meet quality standards, then storage tanks will be set that are tied into gas busters or temporary flare to manage natural gas. This flare would meet the following requirements:
  - 1) An appropriately sized flare stack with an automatic igniter.
  - 2) DJR analyzes the natural gas samples twice per week.
  - 3) DJR routes the natural gas into a gathering pipeline as soon as the pipeline specifications are met.
  - 4) DJR provides the NMOCD with pipeline specifications and natural gas data.



# 19.15.27.8 D. Venting and flaring during production operations

During Production Operations DJR will not vent or flare natural gas except under the following circumstances:

- 1. During an emergency or malfunction
- 2. To unload or clean-up liquid holdup in a well to atmospheric pressure, provided:
  - a. DJR does not vent after the well achieves a stabilized rate and pressure.
    - b. DJR will remain present on-site during liquids unloading by manual purging and tall all reasonable actions to achieve a stabilized rate and pressure at the earliest practical time.
    - c. DJR will optimize the system to minimize natural gas venting on any well equipped with a plunger lift or auto control system.
    - d. Best Management Practices will be used during downhole well maintenance.
- 3. During the first year of production from an exploratory well provided:
  - a. DJR receives approval from the NMOCD.
  - b. DJR remains in compliance with the NM gas capture requirements.
  - c. DJR submits an updated C-129 form to the NMOCD.
- 4. During the following activities unless prohibited:
  - a. Gauging or sampling a storage tank or low-pressure production vessel.
  - b. Loading out liquids from a storage tank.
  - c. Repair and maintenance.
  - d. Normal operation of gas activated pneumatic controller or pump.
  - e. Normal operation of a storage tank but not including venting from a thief hatch.
  - f. Normal operation of dehydration units.
  - g. Normal operations of compressors, compressor engines, turbines, valves, flanges, and connectors.
  - h. During a bradenhead, packer leakage test, or production test lasting less than 24hours.
  - i. When natural gas does not meet the gathering pipeline specifications.
  - j. Commissioning of pipelines, equipment, or facilities only for as long as necessary to purge introduced impurities.

#### 19.15.27.8 E. Performance standards

- 1. DJR has utilized process simulations with a safety factor to design all separation and storage equipment. The equipment is routed to a Vapor Recovery System and utilizes a flare as back up for periods of startup, shutdown, maintenance, or malfunction of the VRU System.
- 2. DJR will install a flare that designed to handle the full volume of vapors from the facility in case of the VRU failure and it its designed with an auto ignition system.
- 3. Flare stacks will appropriately sized and designed to ensure proper combustion efficiency.



- a. Flare stacks installed or replaced will be equipped with an automatic ignitor or continuous pilot.
- b. Previously installed flare stacks will be retrofitted with an automatic ignitor, continuous pilot, or technology that alerts DJR of flare malfunction within 18 months after May 25, 2021.
- c. Flare stacks replaced after May 25, 2021, will be equipped with an automatic ignitor or continuous pilot if located at a well or facility with average daily production of 60,000 cubic feet of natural gas or less.
- d. Flare stacks will be located at least 100 feet from the well and storage tanks and securely anchored.
- 4. DJR will conduct an AVO inspection on all components for leaks and defects on a weekly basis.
- 5. DJR will make and keep records of AVO inspections which will be available to the NMOCD for at least 5 years.
- 6. DJR may use a remote or automated monitoring technology to detect leaks and releases in lieu of AVO inspections with prior NMOCD approval.
- 7. Facilities will be designed to minimize waste.
- 8. DJR will resolve emergencies as promptly as possible.

# 19.15.27.8 F. Measurement or estimation of vented and flared natural gas

- 1. DJR will have meters on both the low- and high-pressure sides of the flares and the volumes will be recorded in DJR's SCADA system.
- 2. DJR will install equipment to measure the volume of flared natural gas that has an average daily production of 60,000 cubic feet or greater of natural gas.
- 3. DJR's measuring equipment will conform to the industry standards.
- 4. The measurement system is designed such that it cannot be bypassed except for inspections and servicing meters.
- 5. DJR will estimate the volume of vented or flared natural gas using a methodology that can be independently verified if metering is not practicable due to low flow rate or pressure.
- 6. DJR will estimate the volume of flared and vented natural gas based on the results of an annual GOR test for wells that do not require measuring equipment reported on Form C-116.
- 7. DJR will install measuring equipment whenever the NMOCD determines that metering is necessary.



## DJR OPERATING, LLC. OGRID NO: 371838 NATURAL GAS MANAGEMENT PLAN GALLO CANYON UNIT 303H, 304H, 305H, 307H, 308H, 309H SWSW M-26-23N-06W

## **BEST MANAGEMENT PRACTICES**

DJR Operating, LLC (DJR) utilizes the following Best Management Practices to minimize venting during active and planned maintenance.

DJR has a closed vent capture system to route emissions from the heater treater, tanks, and vapor recovery to the vapor recovery unit with an enclosed combustion device (ECD) for backup. The system is designed such that if the vapor recovery unit is taken out of service for any reason, the vapors will be routed to the ECD for combustion.

DJR will isolate and attempt to route all vapors to the vapor recovery unit or ECD prior to opening any lines for maintenance to minimize venting from the equipment.

DJR shall notify the NMOCD of venting or flaring that exceeds 50 MCF but less than 500 MCF in volume that either resulted from an emergency or malfunction, or an event lasting over eight hours or more cumulatively within any 24-hour period from a single event by filing a form C-129 no later than 15 days following the discovery or commencement of venting or flaring.

DJR shall notify the NMOCD verbally or by e-mail within 24-hours following discovery or commencement of venting or flaring that exceeds 500 MCF in volume or otherwise qualifies as a major release as defined in 19.15.29.7 NMAC from a single event and provide the information required in form C-129 to the NMOCD no later than 15 days that verifies, updates, or corrects the verbal or e-mail notification.

DJR will install measuring equipment to conform to industry standards such as American Petroleum Institute (API) Manual of Petroleum Measurement Standards (MPMS) Chapter 14.10 Measurement of Flow to Flares.

DJRs measuring equipment shall not be designed or equipped with a manifold that allows the diversion of natural gas around the metering element except for the sole purpose of inspecting and servicing the measurement equipment.

DJR shall report the volume of vented and flared natural gas for each well or facility at which venting or flaring occurred on a monthly basis.