

Field:

# Certificate of Analysis

Number: 6030-22030084-001A

**Artesia Laboratory** 200 E Main St. Artesia, NM 88210 Phone 575-746-3481

Mar. 07, 2022

**Chandler Montgomery** Occidental Petroleum 1502 W Commerce Dr. Carlsbad, NM 88220

> **Platinum** Sampled By: Michael Mirabal Platinum CTB Train 2 Sample Of: Gas Spot

Station Name: Station Number: 17422c Sample Date: 03/03/2022 11:26 Sample Point: Meter Sample Conditions: 11081 psig 03/03/2022 11:26 Meter Number: Effective Date: County: Eddy Method: GPA-2261M

Type of Sample: Spot-Cylinder Cylinder No: 1111-003938 Heat Trace Used: N/A Instrument: 70142339 (Inficon GC-MicroFusion)

Sampling Method: Fill and Purge Last Inst. Cal.: 03/07/2022 0:00 AM

Sampling Company: OXY Analyzed: 03/07/2022 12:28:38 by ERG

### **Analytical Data**

Components U	Jn-normalized Mol %	Mol. %	Wt. %	GPM at 14.65 psia	
Hydrogen Sulfide	NIL	NIL	NIL		
Nitrogen	2.103	2.11939	2.618		
Carbon Dioxide	5.154	5.19486	10.083		
Methane	72.601	73.18069	51.776		
Ethane	10.387	10.46946	13.884	2.795	
Propane	5.175	5.21583	10.143	1.434	
Iso-Butane	0.667	0.67223	1.723	0.220	
n-Butane	1.637	1.64967	4.229	0.519	
Iso-Pentane	0.389	0.39201	1.247	0.143	
n-Pentane	0.422	0.42557	1.354	0.154	
Hexanes	0.282	0.28415	1.080	0.117	
Heptanes	0.240	0.24222	1.070	0.112	
Octanes	0.124	0.12509	0.630	0.064	
Nonanes Plus	0.029	0.02883	0.163	0.016	
	99.210	100.00000	100.000	5.574	
Calculated Physical Pro	operties	Total	l	C9+	
Calculated Molecular We	eight	22.67	•	128.26	
Compressibility Factor		0.9962	<u>)</u>		
Relative Density Real Ga	as	0.7856	5	4.4283	
<b>GPA 2172 Calculation:</b>					
Calculated Gross BTU	per ft³ @ 14.65 ps	sia & 60°F			
Real Gas Dry BTU		1201.5	j	6974.4	
Water Sat. Gas Base BT	-	1181.0		6852.4	
Ideal, Gross HV - Dry at	14.65 psia	1197.0		6974.4	
Ideal, Gross HV - Wet		1176.0	)	6852.4	
Comments: H2S Field	Content 0 ppm				

Hydrocarbon Laboratory Manager

The above analyses are performed in accordance with ASTM, UOP, GPA guidelines for quality

assurance, unless otherwise stated.

Quality Assurance:

### **UPSET FLARING EVENT SPECIFIC JUSTIFICATIONS FORM**

Flare Date: 06/06/2022

**Duration of event:** 2 Hour 10 Minutes **MCF Flared:** 465

Start Time: 05:40 PM End Time: 07:50 PM

**Cause:** Downstream Activity Issue > Enterprise > Facility Emergency Shutdown

Method of Flared Gas Measurement: Gas Flare Meter

**Comments:** This upset event was not caused by any wells associated with the facility.

### 1. Reason why this event was beyond Operator's control:

The emissions event was caused by the unforeseen, unexpected, sudden, and unavoidable interruption, restriction or complete shut-in of a gas pipeline by a third-party pipeline operator, which impacted Oxy's ability to send gas to a third-party gas pipeline. This interruption, restriction or complete shut-in of the gas pipeline by a third-party pipeline operator is downstream of Oxy's custody transfer point and out of Oxy's control to avoid or prevent from happening and did not stem from any of Oxy's upstream facility activity that could have been foreseen and avoided, and could not have been avoided by good design, operation, and preventative maintenance practices. Internal Oxy procedures ensure that upon a sudden and unexpected flaring event, production techs are promptly notified, and are instructed to assess the issue as soon as possible to take prompt corrective action and minimize emissions. Oxy production techs must assess and determine cause of flaring at its upstream facility. In this case, third-party pipeline operator, Enterprise, had an emergency shutdown of their downstream Sand Dunes North Corridor station facility, which was, caused by their tanks venting, which then triggered their gas detection alarm devices, prompting an immediate shutdown their facility. This sudden and unexpected Enterprise facility shutdown greatly impacted the gas flow from Oxy's upstream facility when Enterprise's ESD valve immediately closed and shut-in gas pipeline services when vented gas was detected by their detection alarms, and their downstream facility was shut down. This ESD of Enterprise's facility caused a flaring event at Oxy's upstream facility as Oxy was unable to push its gas to Enterprise's sales gas service pipeline. Until Enterprise 's facility was back up and returned to normal working operation and was able to handle the volume of gas sent to them, Oxy was forced to route stranded gas to a flare, as it was not able to push all its gas into Enterprise's gas pipeline. Upon immediate flaring at Oxy's upstream facility, Oxy personnel immediately contacted Enterprise to determine cause. No advance warning of any kind was provided to Oxy personnel from Enterprise personnel regarding issues with their sales gas service system pipeline, the ESD system or valve, and/or issues with their downstream facility. Oxy personnel had to contact Enterprise directly when flaring started at its upstream facility to determine cause, as all Oxy's facility equipment were operating as designed prior to the flaring event occurring.

### 2. Steps Taken to limit duration and magnitude of venting or flaring:

It is OXY's policy to route all stranded gas to a flare during an unforeseen and unavoidable emergency or malfunction, that is beyond Oxy's control to avoid, prevent or foresee, to minimize emissions as much as possible as part of the overall steps taken to limit duration and magnitude of flaring. The flare at this facility has a 98% combustion efficiency to lessen emissions as much as possible. In this case, third-party pipeline operator, Enterprise, had an emergency shutdown of their downstream Sand Dunes North Corridor station facility, which was triggered by their gas detection

devices and prompted and immediate shutdown their facility. This sudden and unexpected Enterprise facility shutdown greatly impacted the gas flow from Oxy's upstream facility when Enterprise's ESD valve immediately closed and shut-in gas pipeline services when vented gas was detected by their detection alarms, and their downstream facility was shut down. This ESD of Enterprise's facility caused a flaring event at Oxy's upstream facility as Oxy was unable to push its gas to Enterprise's sales gas service pipeline. Until Enterprise 's facility was back up and returned to normal working operation and was able to handle the volume of gas sent to them, Oxy was forced to route stranded gas to a flare, as it was not able to push all its gas into Enterprise's gas pipeline. No advance warning of any kind was provided to Oxy personnel from Enterprise personnel regarding issues with their sales gas service system pipeline, the ESD system or valve, and/or issues with their downstream facility. To significantly minimize emissions during this flaring event, Oxy engaged in alternative offloading procedures by routing gas to DCP and Lucid as well. Oxy personnel were informed by Enterprise personnel that an Enterprise tech was in route to open their ESD valve.

### 3. Corrective Actions taken to eliminate the cause and reoccurrence of venting or flaring:

Oxy is limited in its corrective actions to eliminate the cause and potential reoccurrence of an Enterprise gas flow pipeline restriction or shut in, as this control issue is downstream of Oxy's custody transfer point and out of Oxy's control to avoid or prevent from happening or reoccurring. Enterprise 's downstream facility issues will re-occur from time to time, which in turn, directly impacts Oxy's ability to send gas to them. When Enterprise downstream facility and/or its facility equipment has issues or greatly struggles to handle the volume of gas being sent to them by Oxy, Enterprise then restricts or cuts off Oxy's ability to send gas, which then prompts Oxy to route its stranded gas not pushed into the Enterprise gas pipeline, to flare. OXY makes every effort to control and minimize emissions as much as possible during these circumstances. The limited actions that Oxy can do in this circumstance is to shut in multiple high GOR wells and/or engage in secondary third-party operator offload alternative routes, when possible, to minimize flaring volumes during this third-party pipeline operator downstream activity restriction and/or shut in.

District I
1625 N. French Dr., Hobbs, NM 88240
Phone: (575) 393-6161 Fax: (575) 393-0720 District II

811 S. First St., Artesia, NM 88210 Phone:(575) 748-1283 Fax:(575) 748-9720 District III

1000 Rio Brazos Rd., Aztec, NM 87410 Phone:(505) 334-6178 Fax:(505) 334-6170

1220 S. St Francis Dr., Santa Fe, NM 87505 Phone:(505) 476-3470 Fax:(505) 476-3462

**State of New Mexico Energy, Minerals and Natural Resources Oil Conservation Division** 1220 S. St Francis Dr. **Santa Fe, NM 87505** 

DEFINITIONS

Action 119313

#### **DEFINITIONS**

Operator:	OGRID:
OXY USA INC	16696
P.O. Box 4294	Action Number:
Houston, TX 772104294	119313
	Action Type:
	[C-129] Venting and/or Flaring (C-129)

### **DEFINITIONS**

For the sake of brevity and completeness, please allow for the following in all groups of questions and for the rest of this application:

- this application's operator, hereinafter "this operator";
- · venting and/or flaring, hereinafter "vent or flare";
- any notification or report(s) of the C-129 form family, hereinafter "any C-129 forms";
- the statements in (and/or attached to) this, hereinafter "the statements in this";
- and the past tense will be used in lieu of mixed past/present tense questions and statements.

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## **State of New Mexico Energy, Minerals and Natural Resources Oil Conservation Division** 1220 S. St Francis Dr. **Santa Fe, NM 87505**

QUESTIONS

Action 119313

Phone:(505) 476-3470 Fax:(505) 476-3462		
0	UESTIONS	
Operator: OXY USA INC		OGRID: 16696
P.O. Box 4294		Action Number:
Houston, TX 772104294		119313 Action Type:
		[C-129] Venting and/or Flaring (C-129)
QUESTIONS		•
Prerequisites		
Any messages presented in this section, will prevent submission of this application. Please resolve	these issues before continuing wi	th the rest of the questions.
Incident Well	Not answered.	
Incident Facility	[fAPP2126657589] PLATIN	IUM CTB
Determination of Reporting Requirements		
Answer all questions that apply. The Reason(s) statements are calculated based on your answers at		).
Was this vent or flare caused by an emergency or malfunction	Yes	
Did this vent or flare last eight hours or more cumulatively within any 24-hour period from a single event	No	
Is this considered a submission for a vent or flare event	Yes, minor venting and/or	flaring of natural gas.
An operator shall file a form C-141 instead of a form C-129 for a release that, includes liquid during v	enting and/or flaring that is or ma	y be a maior or minor release under 19.15.29.7 NMAC.
Was there at least 50 MCF of natural gas vented and/or flared during this event	Yes	
Did this vent or flare result in the release of <b>ANY</b> liquids (not fully and/or completely		
flared) that reached (or has a chance of reaching) the ground, a surface, a	No	
watercourse, or otherwise, with reasonable probability, endanger public health, the environment or fresh water		
Was the vent or flare within an incorporated municipal boundary or withing 300 feet		
from an occupied permanent residence, school, hospital, institution or church in	No	
existence		
Equipment Involved		
Primary Equipment Involved	Other (Specify)	
	- (1 )/	
Additional details for Equipment Involved. Please specify	Emergency Flare > Downs	tream Activity Issue > Enterprise > Facility Emergency Shutdown
	3 ,	, , , , , , , , , , , , , , , , , , , ,
	•	
Representative Compositional Analysis of Vented or Flared Natural Gas		
Please provide the mole percent for the percentage questions in this group.	T	
Methane (CH4) percentage	73	
Nitrogen (N2) percentage, if greater than one percent	2	
Hydrogen Sulfide (H2S) PPM, rounded up	0	
Carbon Dioxide (C02) percentage, if greater than one percent	5	
Oxygen (02) percentage, if greater than one percent	0	
If you are venting and/or flaring because of Pipeline Specification, please provide the required spec	ifications for each gas.	
Methane (CH4) percentage quality requirement	Not answered.	
Nitrogen (N2) percentage quality requirement	Not answered.	
Hydrogen Sufide (H2S) PPM quality requirement	Not answered.	
Carbon Dioxide (C02) percentage quality requirement	Not answered.	

Not answered.

Oxygen (02) percentage quality requirement

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District IV 1220 S. St Francis Dr., Santa Fe, NM 87505 Phone:(505) 476-3470 Fax:(505) 476-3462

## **State of New Mexico Energy, Minerals and Natural Resources Oil Conservation Division** 1220 S. St Francis Dr. **Santa Fe, NM 87505**

QUESTIONS, Page 2

Action 119313

QU	EST	IONS	(continued)	)

Operator:	OGRID:
OXY USA INC	16696
P.O. Box 4294	Action Number:
Houston, TX 772104294	119313
	Action Type:
	[C-129] Venting and/or Flaring (C-129)

### QUESTIONS

Date(s) and Time(s)		
Date vent or flare was discovered or commenced	06/06/2022	
Time vent or flare was discovered or commenced	05:40 PM	
Time vent or flare was terminated	07:50 PM	
Cumulative hours during this event	2	

Measured or Estimated Volume of Vented or Flared Natural Gas			
Natural Gas Vented (Mcf) Details	Not answered.		
Natural Gas Flared (Mcf) Details	Cause: Other   Other (Specify)   Natural Gas Flared   Released: 465 Mcf   Recovered: 0 Mcf   Lost: 465 Mcf ]		
Other Released Details	Not answered.		
Additional details for Measured or Estimated Volume(s). Please specify	Gas Flare Meter		
Is this a gas only submission (i.e. only significant Mcf values reported)	Yes, according to supplied volumes this appears to be a "gas only" report.		

Venting or Flaring Resulting from Downstream Activity		
Was this vent or flare a result of downstream activity	Yes	
Was notification of downstream activity received by this operator	No	
Downstream OGRID that should have notified this operator	[713731] Enterprise Crude Pipeline LLC	
Date notified of downstream activity requiring this vent or flare	Not answered.	
Time notified of downstream activity requiring this vent or flare	Not answered.	

teps and Actions to Prevent Waste		
For this event, this operator could not have reasonably anticipated the current event and it was beyond this operator's control.	True	
Please explain reason for why this event was beyond this operator's control	The emissions event was caused by the unforeseen, unexpected, sudden, and unavoidable interruption, restriction or complete shut-in of a gas pipeline by a third-party pipeline operator, which impacted Oxy's ability to send gas to a third-party gas pipeline. This interruption, restriction or complete shut-in of the gas pipeline by a third-party pipeline operator is downstream of Oxy's custody transfer point and out of Oxy's control to avoid or prevent from happening and did not stem from any of Oxy's upstream facility activity that could have been foreseen and avoided, and could not have been avoided by good design, operation, and preventative maintenance practices. Internal Oxy procedures ensure that upon a sudden and unexpected flaring event, production techs are promptly notified, and are instructed to assess the issue as soon as possible to take prompt corrective action and minimize emissions. Oxy production techs must assess and determine cause of flaring at its upstream facility. In this case, third-party pipeline operator, Enterprise, had an emergency shutdown of their downstream Sand Dunes North Corridor station facility, which was, caused by their tanks venting, which then triggered their gas detection alarm devices, prompting an immediate shutdown their facility. This sudden and unexpected Enterprise facility shutdown greatly impacted the gas flow from Oxy's upstream facility when Enterprise's ESD valve immediately closed and shut-in gas pipeline services when vented gas was detected by their detection alarms, and their downstream facility was shut down. This ESD of Enterprise's facility caused a flaring event at Oxy's upstream facility as Oxy was unable to push its gas to Enterprise's sales gas service pipeline.	
Steps taken to limit the duration and magnitude of vent or flare	It is OXY's policy to route all stranded gas to a flare during an unforeseen and unavoidable emergency or malfunction, that is beyond Oxy's control to avoid, prevent or foresee, to minimize emissions as much as possible as part of the overall steps taken to limit duration and magnitude of flaring. The flare at this facility has a 98% combustion efficiency to lessen emissions as much as possible. In this case, third-party pipeline operator, Enterprise, had an emergency shutdown of their downstream Sand Dunes North Corridor station facility, which was triggered by their gas detection devices and prompted and immediate shutdown their facility. This sudden and unexpected Enterprise facility shutdown greatly impacted the gas flow from Oxy's upstream facility when Enterprise's ESD valve immediately closed and shut-in gas pipeline services when vented gas was detected by their detection alarms, and their downstream facility was shut down. This ESD of Enterprise's facility caused a flaring event at Oxy's upstream facility as Oxy was unable to push its gas to Enterprise's sales gas service pipeline. Until Enterprise 's facility was back up and returned to normal working operation and was able to handle the volume of gas sent to them, Oxy was forced to route stranded gas to a flare, as it was not able to push all its gas into Enterprise's gas pipeline. No advance warning of any kind was provided to Oxy personnel from Enterprise personnel regarding issues with their sales gas service system pipeline, the ESD system or valve, and/or issues with their downstream facility. To significantly minimize emissions during this flaring event, Oxy personnel were informed by Enterprise personnel that an Enterprise tech was in route to open their ESD valve.	
Corrective actions taken to eliminate the cause and reoccurrence of vent or flare	Oxy is limited in its corrective actions to eliminate the cause and potential reoccurrence of an Enterprise gas flow pipeline restriction or shut in, as this control issue is downstream of Oxy's custody transfer point and out of Oxy's control to avoid or prevent from happening or reoccurring. Enterprise 's downstream facility issues will re-occur from time to time, which in turn, directly impacts Oxy's ability to send gas to them. When Enterprise downstream facility and/or its facility equipment has issues or greatly struggles to handle the volume of gas being sent to them by Oxy, Enterprise then restricts or cuts off Oxy's ability to send gas, which then prompts Oxy to route its stranded gas not pushed into the Enterprise gas pipeline, to flare. OXY makes every effort to control and minimize emissions as much as possible during these circumstances. The limited actions that Oxy can do in this circumstance is to shut in multiple high GOR wells and/or engage in secondary third-party operator offload alternative routes, when possible, to minimize flaring volumes during this third-party pipeline operator downstream activity restriction and/or shut in.	

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ACKNOWLEDGMENTS

Action 119313

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P.O. Box 4294	Action Number:
Houston, TX 772104294	119313
	Action Type:
	[C-129] Venting and/or Flaring (C-129)

### **ACKNOWLEDGMENTS**

V	I acknowledge that I am authorized to submit a <i>Venting and/or Flaring</i> (C-129) report on behalf of this operator and understand that this report can be <b>a complete</b> C-129 submission per 19.15.27.8 and 19.15.28.8 NMAC.
V	I acknowledge that upon submitting this application, I will be creating a new incident file (assigned to this operator) to track any C-129 forms, pursuant to 19.15.27.7 and 19.15.28.8 NMAC and understand that this submission meets the notification requirements of Paragraph (1) of Subsection G and F respectively.
V	I hereby certify the statements in this report are true and correct to the best of my knowledge and acknowledge that any false statement may be subject to civil and criminal penalties under the Oil and Gas Act.
V	I acknowledge that the acceptance of any C-129 forms by the OCD does not relieve this operator of liability should their operations have failed to adequately investigate, report, and remediate contamination that poses a threat to groundwater, surface water, human health, or the environment.
V	I acknowledge that OCD acceptance of any C-129 forms does not relieve this operator of responsibility for compliance with any other applicable federal, state, or local laws and/or regulations.

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CONDITIONS

Action 119313

### **CONDITIONS**

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P.O. Box 4294	Action Number:
Houston, TX 772104294	119313
	Action Type:
	[C-129] Venting and/or Flaring (C-129)

#### CONDITIONS

Created By	Condition	Condition Date
marialuna2	If the information provided in this report requires an amendment, submit a [C-129] Amend Venting and/or Flaring Incident (C-129A), utilizing your incident number from this event.	6/21/2022