

# Certificate of Analysis

Number: 6030-22080419-006A

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

Paul Martinez Aug. 30, 2022 Earthstone

801 Cherry St, Suite 1200 Fort Worth, TX 76102

Station Name:Bell Air 8-5 2BS Fed Com 6HSampled By:Arnulfo HererraStation Number:89410034Sample Of:GasSpotStation Location:ChisholmSample Date:08/29/2022

Sample Point: Meter run Sample Conditions: 90.5 psig, @ 111.1 °F Ambient: 81 °F

Type of Sample: Spot-Cylinder Effective Date: 08/29/2022
Heat Trace Used: N/A Method: GPA 2286
Sampling Method: Fill and Purge Cylinder No: 5030-04924

Sampling Company: SPL Instrument: 6030\_GC2 (Agilent GC-7890B)

Analyzed: 08/30/2022 14:26:36 by KNF Last Inst. Cal.: 08/29/2022 14:11 PM

## **Analytical Data**

Components	Un-normalized Mol %	Mol. %	Wt. %	GPM at 14.73 psia		
Nitrogen	2.906	2.89000	3.390		GPM TOTAL C2+	8.405
Methane	67.466	67.08500	45.067		GPM TOTAL C3+	4.178
Carbon Dioxide	0.476	0.47300	0.872		GPM TOTAL iC5+	0.822
Ethane	15.826	15.73700	19.816	4.227		
Propane	8.446	8.39800	15.508	2.323		
Iso-butane	0.950	0.94500	2.300	0.311		
n-Butane	2.292	2.27900	5.547	0.722		
Iso-pentane	0.548	0.54500	1.647	0.200		
n-Pentane	0.529	0.52600	1.589	0.191		
Hexanes Plus	1.128	1.12200	4.264	0.431		
	100.567	100.00000	100.000	8.405		
Calculated Physical	Properties	Tota		C6+		
Relative Density Real	l Gas	0.8280	)	3.1369		
Calculated Molecular	Weight	23.88	}	90.85		
Compressibility Factor	or	0.9954	ļ			
<b>GPA 2172 Calculation</b>	on:					
Calculated Gross B	TU per ft <sup>3</sup> @ 14.73 ps	sia & 60°F				
Real Gas Dry BTU	•	1379	1	4797		
Water Sat. Gas Base	BTU	1355	;	4714		
Ideal, Gross HV - Dry	at 14.73 psia	1372.2	<u>:</u>	4797.4		
Ideal, Gross HV - We		1348.3	}	0.000		

Data reviewed by: Krystle Fitzwater, Laboratory Manager

The above analyses are performed in accordance with ASTM, UOP, GPA guidelines for quality assurance, unless otherwise stated.

Quality Assurance:



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Station Name: Bell Air 8-5 2BS Fed Com 6H Sampled By: Arnulfo Hererra Station Number: 89410034 Sample Of: Gas Spot

Station Location: Chisholm Sample Date: 08/29/2022 Sample Point: Meter run Sample Conditions: 90.5 psig, @ 111.1 °F

Type of Sample: Spot-Cylinder Method: GPA 2286

Heat Trace Used: N/A Cylinder No: 5030-04924

Sampling Method: Fill and Purge Analyzed: 08/30/2022 14:25:24 by KNF

Sampling Company: SPL

## **Analytical Data**

Analytical Bata				
Components	Mol. %	Wt. %	GPM at 14.73 psia	
Hydrogen Sulfide	0.000	0.000		
Nitrogen	2.890	3.390		
Methane	67.085	45.067		
Carbon Dioxide	0.473	0.872		
Ethane	15.737	19.816	4.227	
Propane	8.398	15.508	2.323	
Iso-Butane	0.945	2.300	0.311	
n-Butane	2.279	5.547	0.722	
Iso-Pentane	0.545	1.647	0.200	
n-Pentane	0.526	1.589	0.191	
i-Hexanes	0.224	0.788	0.089	
n-Hexane	0.102	0.369	0.042	
Benzene	0.163	0.525	0.045	
Cyclohexane	0.124	0.438	0.042	
i-Heptanes	0.173	0.666	0.069	
n-Heptane	0.029	0.118	0.013	
Toluene	0.093	0.357	0.031	
i-Octanes	0.119	0.525	0.053	
n-Octane	0.008	0.039	0.004	
Ethylbenzene	0.017	0.075	0.007	
Xylenes	0.017	0.082	0.007	
i-Nonanes	0.029	0.147	0.015	
n-Nonane	0.006	0.034	0.003	
Decanes Plus	0.018	0.101	0.011	
	100.000	100.000	8.405	



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Station Name: Bell Air 8-5 2BS Fed Com 6H Sampled By: Arnulfo Hererra Station Number: 89410034 Sample Of: Gas Spot Station Location: Chisholm Sample Date: 08/29/2022

Sample Point: Meter run Sample Conditions: 90.5 psig, @ 111.1 °F

Type of Sample: Spot-Cylinder Method: GPA 2286
Heat Trace Used: N/A Cylinder No: 5030-04924

Sampling Method: Fill and Purge Analyzed: 08/30/2022 14:25:24 by KNF

Sampling Company: SPL

Calculated Physical Properties	Total	C10+	
Calculated Molecular Weight	23.88	145.59	
GPA 2172 Calculation:			
Calculated Gross BTU per ft <sup>3</sup> @ 14.73 p	sia & 60°F		
Real Gas Dry BTU	1378.5	7793.2	
Water Sat. Gas Base BTU	1354.5	7622.4	
Relative Density Real Gas	0.8280	5.0269	
Compressibility Factor	0.9954		
Ideal, Gross HV - Wet	1348.3		
Ideal, Gross HV - Dry at 14.73 psia	1372.2		
Net BTU Dry Gas - real gas	1255		
Net BTU Wet Gas - real gas	1233		

Data reviewed by: Krystle Fitzwater, Laboratory Manager

Quality Assurance: The above analyses are performed in accordance with ASTM, UOP, GPA guidelines for quality assurance, unless otherwise stated.

\*\*\*Calculations for the total Mcf flared\*\*\*
End Meter Volume – the Begin Meter Volume.

\*\*\*Composition for the gas has been entered into the question portion of the C-129. If further back up is needed please let us know and will provide requested data.

District I
1625 N. French Dr., Hobbs, NM 88240
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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** 

DEFINITIONS

Action 190354

#### **DEFINITIONS**

Operator:		OGRID:
	arthstone Operating, LLC	331165
14	400 Woodloch Forest; Ste 300	Action Number:
The Woodlands, TX 77380	190354	
		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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1220 S. St Francis Dr., Santa Fe, NM 87505

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

QUESTIONS

Action 190354

Phone:(505) 476-3470 Fax:(505) 476-3462		
Q	UESTIONS	
Operator: Earthstone Operating, LLC		OGRID: 331165
1400 Woodloch Forest; Ste 300 The Woodlands, TX 77380		Action Number: 190354
		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	Unavailable.	
Incident Facility	[fAPP2231962543] Bel Air	5-8 Fed Com Facility
Determination of Reporting Requirements		
Answer all questions that apply. The Reason(s) statements are calculated based on your answers a	nd may provide addional quidance	
Was this vent or flare caused by an emergency or malfunction	No	•
Did this vent or flare last eight hours or more cumulatively within any 24-hour period from a single event		
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	venting and/or flaring that is or may	v be a major 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	y as a major of million foliation and a formation to the control of the control o
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 watercourse, or otherwise, with reasonable probability, endanger public health, the environment or fresh water	No	
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 existence	No	
Equipment Involved		
Primary Equipment Involved	Not answered.	
Additional details for Equipment Involved. Please specify	Not answered.	
Representative Compositional Analysis of Vented or Flared Natural Gas		
Please provide the mole percent for the percentage questions in this group.  Methane (CH4) percentage	67	
Nitrogen (N2) percentage, if greater than one percent	3	
Hydrogen Sulfide (H2S) PPM, rounded up	0	
Carbon Dioxide (C02) percentage, if greater than one percent		
Oxygen (02) percentage, if greater than one percent	0	
	0	
If you are venting and/or flaring because of Pipeline Specification, please provide the required specification of CDIA) percentage quality requirement	1	
Methane (CH4) percentage quality requirement	Not answered.	
Nitrogen (N2) percentage quality requirement  Hydrogen Sufide (H2S) PPM quality requirement	Not answered.	
Carbon Dioxide (CO2) 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 190354

QUESTIONS	(continued)
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Operator:	OGRID:
Earthstone Operating, LLC	331165
1400 Woodloch Forest; Ste 300 The Woodlands, TX 77380	Action Number: 190354
	Action Type: [C-129] Venting and/or Flaring (C-129)

#### QUESTIONS

Date(s) and Time(s)		
Date vent or flare was discovered or commenced	09/20/2022	
Time vent or flare was discovered or commenced	12:00 AM	
Time vent or flare was terminated	11:59 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: Equipment Failure   Producing Well   Natural Gas Flared   Released: 76 Mcf   Recovered: 0 Mcf   Lost: 76 Mcf.
Other Released Details	Not answered.
Additional details for Measured or Estimated Volume(s). Please specify	Not answered.
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	No		
Was notification of downstream activity received by this operator	Not answered.		
Downstream OGRID that should have notified this operator	Not answered.		
Date notified of downstream activity requiring this vent or flare	Not answered.		
Time notified of downstream activity requiring this vent or flare	Not answered.		

Steps 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	Equipment downtime emissions controlled by flare.			
Steps taken to limit the duration and magnitude of vent or flare	Standard emission control of equipment downtime. Working with vendor to coordinate service time and minimize downtime.			
Corrective actions taken to eliminate the cause and reoccurrence of vent or flare	"No way to avoid Periodic downtime for repairs to address unforeseen condition. Process equipment emissions controlled by flare."			

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ACKNOWLEDGMENTS

Action 190354

### **ACKNOWLEDGMENTS**

Operator:	OGRID:
Earthstone Operating, LLC	331165
1400 Woodloch Forest; Ste 300	Action Number:
The Woodlands, TX 77380	190354
	Action Type:
	[C-129] Venting and/or Flaring (C-129)

#### **ACKNOWLEDGMENTS**

$\overline{\lor}$	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.
>	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.
<b>~</b>	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 190354

### **CONDITIONS**

Operator:	OGRID:
Earthstone Operating, LLC	331165
1400 Woodloch Forest; Ste 300	Action Number:
The Woodlands, TX 77380	190354
	Action Type:
	[C-129] Venting and/or Flaring (C-129)

#### CONDITIONS

Created By	Condition	Condition Date
cblack	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.	2/24/2023