



## C6+ Gas Analysis Report

|                               |                           |                                          |                     |
|-------------------------------|---------------------------|------------------------------------------|---------------------|
| <b>18840G</b>                 | <b>ART82075</b>           | <b>Morrison CTB Flare</b>                |                     |
| Sample Point Code             | Sample Point Name         | Sample Point Location                    |                     |
| <b>Laboratory Services</b>    | <b>2023079290</b>         | <b>2124</b>                              | <b>JT - Spot</b>    |
| Source Laboratory             | Lab File No               | Container Identity                       | Sampler             |
| <b>USA</b>                    | <b>USA</b>                | <b>USA</b>                               | <b>New Mexico</b>   |
| District                      | Area Name                 | Field Name                               | Facility Name       |
| <b>Nov 13, 2023 14:25</b>     | <b>Nov 13, 2023 14:25</b> | <b>Nov 14, 2023 07:42</b>                | <b>Nov 14, 2023</b> |
| Date Sampled                  | Date Effective            | Date Received                            | Date Reported       |
| <b>58.00</b>                  | <b>1,581.00</b>           | <b>System Administrator</b>              |                     |
| Ambient Temp (°F)             | Flow Rate (Mcf)           | Analyst                                  |                     |
|                               |                           | <b>57 @ 88</b>                           |                     |
|                               |                           | Press PSI @ Temp °F<br>Source Conditions |                     |
| <b>Silverback Exploration</b> |                           | <b>NG</b>                                |                     |
| Operator                      |                           | Lab Source Description                   |                     |

| Component          | Normalized Mol % | Un-Normalized Mol % | GPM    |
|--------------------|------------------|---------------------|--------|
| H2S (H2S)          | 0.7000           | 0.7                 |        |
| Nitrogen (N2)      | 1.7090           | 1.721               |        |
| CO2 (CO2)          | 1.3710           | 1.381               |        |
| Methane (C1)       | 65.1430          | 65.604              |        |
| Ethane (C2)        | 13.8850          | 13.982              | 3.7120 |
| Propane (C3)       | 8.6300           | 8.69                | 2.3770 |
| I-Butane (IC4)     | 1.2250           | 1.234               | 0.4010 |
| N-Butane (NC4)     | 2.8190           | 2.839               | 0.8890 |
| I-Pentane (IC5)    | 0.7600           | 0.765               | 0.2780 |
| N-Pentane (NC5)    | 0.7430           | 0.748               | 0.2690 |
| Hexanes Plus (C6+) | 3.0150           | 3.036               | 1.3080 |
| TOTAL              | 100.0000         | 100.7000            | 9.2340 |

Method(s): Gas C6+ - GPA 2261, Extended Gas - GPA 2286, Calculations - GPA 2172

## Analyzer Information

Device Type: Gas Chromatograph      Device Make: Shimadzu  
 Device Model: GC-2014      Last Cal Date: Nov 13, 2023

## Gross Heating Values (Real, BTU/ft³)

|                        |           |                       |           |
|------------------------|-----------|-----------------------|-----------|
| 14.696 PSI @ 60.00 Å°F |           | 14.73 PSI @ 60.00 Å°F |           |
| Dry                    | Saturated | Dry                   | Saturated |
| 1,477.1                | 1,452.9   | 1,480.5               | 1,456.3   |

## Calculated Total Sample Properties

GPA2145-16 \*Calculated at Contract Conditions

|                       |                        |
|-----------------------|------------------------|
| Relative Density Real | Relative Density Ideal |
| 0.9023                | 0.8975                 |
| Molecular Weight      |                        |
| 25.9963               |                        |

## C6+ Group Properties

Assumed Composition

|              |              |              |
|--------------|--------------|--------------|
| C6 - 60.000% | C7 - 30.000% | C8 - 10.000% |
|--------------|--------------|--------------|

Field H2S  
7000 PPM

## PROTREND STATUS:

Passed By Validator on Nov 14, 2023

## DATA SOURCE:

Imported

## PASSED BY VALIDATOR REASON:

Close enough to be considered reasonable.

## VALIDATOR:

Ashley Russell

## VALIDATOR COMMENTS:

Hexanes are at 3%

| <u>Operator</u>              | <u>Well</u>       | <u>Date</u> | <u>Gas Flared (MCF)</u> | <u>Method of Measurement</u>               |
|------------------------------|-------------------|-------------|-------------------------|--------------------------------------------|
| Silverback Operating II, LLC | Morrison Facility | 11/22/2023  | 1203                    | Orifice Meter-<br>Electronic Flow Computer |

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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 291424

DEFINITIONS

|                                                                                                  |                                                               |
|--------------------------------------------------------------------------------------------------|---------------------------------------------------------------|
| Operator:<br>Silverback Operating II, LLC<br>19707 IH10 West, Suite 201<br>San Antonio, TX 78256 | OGRID:<br>330968                                              |
|                                                                                                  | Action Number:<br>291424                                      |
|                                                                                                  | Action Type:<br>[C-129] Amend Venting and/or Flaring (C-129A) |

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: <ul style="list-style-type: none"><li>• this application's operator, hereinafter "this operator";</li><li>• venting and/or flaring, hereinafter "vent or flare";</li><li>• any notification or report(s) of the C-129 form family, hereinafter "any C-129 forms";</li><li>• the statements in (and/or attached to) this, hereinafter "the statements in this";</li><li>• and the past tense will be used in lieu of mixed past/present tense questions and statements.</li></ul> |
|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|

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QUESTIONS

Action 291424

QUESTIONS

|                                                                                                  |                                                               |
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|                                                                                                  | Action Number:<br>291424                                      |
|                                                                                                  | Action Type:<br>[C-129] Amend Venting and/or Flaring (C-129A) |

QUESTIONS

|                                                                                                                                                                                                   |                               |
|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------------------|
| <b>Prerequisites</b><br>Any messages presented in this section, will prevent submission of this application. Please resolve these issues before continuing with the rest of the questions.        |                               |
| Incident ID (n#)                                                                                                                                                                                  | Unavailable.                  |
| Incident Name                                                                                                                                                                                     | Unavailable.                  |
| Incident Type                                                                                                                                                                                     | Flare                         |
| Incident Status                                                                                                                                                                                   | Unavailable.                  |
| Incident Facility                                                                                                                                                                                 | [fAPP2328956691] MORRISON CTB |
| Only valid Vent, Flare or Vent with Flaring incidents (selected above in the Application Details section) that are assigned to your current operator can be amended with this C-129A application. |                               |

|                                                                                                                                                                                                                                                                                     |                                                   |
|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|---------------------------------------------------|
| <b>Determination of Reporting Requirements</b><br>Answer all questions that apply. The Reason(s) statements are calculated based on your answers and may provide additional guidance.                                                                                               |                                                   |
| 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                                                                                                                                                                          | Yes                                               |
| Is this considered a submission for a vent or flare event                                                                                                                                                                                                                           | Yes, major 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 venting and/or flaring that is or may 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                                               |
| Did this vent or flare result in the release of ANY 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 within 300 feet from an occupied permanent residence, school, hospital, institution or church in existence                                                                                                       | No                                                |

|                                                           |               |
|-----------------------------------------------------------|---------------|
| <b>Equipment Involved</b>                                 |               |
| Primary Equipment Involved                                | Not answered. |
| Additional details for Equipment Involved. Please specify | Not answered. |

|                                                                                                                                                             |               |
|-------------------------------------------------------------------------------------------------------------------------------------------------------------|---------------|
| <b>Representative Compositional Analysis of Vented or Flared Natural Gas</b><br>Please provide the mole percent for the percentage questions in this group. |               |
| Methane (CH4) percentage                                                                                                                                    | 65            |
| Nitrogen (N2) percentage, if greater than one percent                                                                                                       | 2             |
| Hydrogen Sulfide (H2S) PPM, rounded up                                                                                                                      | 7,000         |
| Carbon Dioxide (CO2) percentage, if greater than one percent                                                                                                | 1             |
| Oxygen (O2) percentage, if greater than one percent                                                                                                         | 0             |
| If you are venting and/or flaring because of Pipeline Specification, please provide the required specifications for each gas.                               |               |
| Methane (CH4) percentage quality requirement                                                                                                                | Not answered. |
| Nitrogen (N2) percentage quality requirement                                                                                                                | Not answered. |
| Hydrogen Sulfide (H2S) PPM quality requirement                                                                                                              | Not answered. |
| Carbon Dioxide (CO2) percentage quality requirement                                                                                                         | Not answered. |
| Oxygen (O2) percentage quality requirement                                                                                                                  | Not answered. |



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QUESTIONS, Page 2

Action 291424

**QUESTIONS (continued)**

|                                                                                                  |                                                               |
|--------------------------------------------------------------------------------------------------|---------------------------------------------------------------|
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|                                                                                                  | Action Number:<br>291424                                      |
|                                                                                                  | Action Type:<br>[C-129] Amend Venting and/or Flaring (C-129A) |

**QUESTIONS**

| Date(s) and Time(s)                            |            |
|------------------------------------------------|------------|
| Date vent or flare was discovered or commenced | 11/22/2023 |
| 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             | 24         |

| Measured or Estimated Volume of Vented or Flared Natural Gas              |                                                                                                                           |
|---------------------------------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------|
| Natural Gas Vented (Mcf) Details                                          | Not answered.                                                                                                             |
| Natural Gas Flared (Mcf) Details                                          | Cause: Initial Flowback   Producing Well   Natural Gas Flared   Released: 1,203 Mcf   Recovered: 0 Mcf   Lost: 1,203 Mcf. |
| Other Released Details                                                    | Cause:     Other (Specify)   Released: 0 (Unknown Released Amount)   Recovered: 0   Lost: 0                               |
| 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 |               |
| 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                                                     | Initial Flowback on new well |
| Steps taken to limit the duration and magnitude of vent or flare                                                                | Initial Flowback on new well |
| Corrective actions taken to eliminate the cause and reoccurrence of vent or flare                                               | Initial Flowback on new well |



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ACKNOWLEDGMENTS  
  
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ACKNOWLEDGMENTS

|                                     |                                                                                                                                                                                                                                                                                                     |
|-------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <input checked="" type="checkbox"/> | I acknowledge that with this application I will be amending an existing incident file (assigned to this operator) for a vent or flare event, pursuant to 19.15.27 and 19.15.28 NMAC.                                                                                                                |
| <input checked="" type="checkbox"/> | I acknowledge that amending an incident file does not replace original submitted application(s) or information and understand that any C-129 forms submitted to the OCD will be logged and stored as public record.                                                                                 |
| <input checked="" type="checkbox"/> | I hereby certify the statements in this amending 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.                                                                         |
| <input checked="" type="checkbox"/> | 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. |
| <input checked="" type="checkbox"/> | 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 291424

CONDITIONS

|                                                                                                  |                                                               |
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|                                                                                                  | Action Type:<br>[C-129] Amend Venting and/or Flaring (C-129A) |

CONDITIONS

| Created By | Condition                                                                                                                                                                                  | Condition Date |
|------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------------|
| htreffert  | If the information provided in this report requires further amendment(s), submit a [C-129] Amend Venting and/or Flaring Incident (C-129A), utilizing your incident number from this event. | 12/5/2023      |