| 811 S. First St., Artesia, NM 88210  District III  District III  District Office    1000 Rio Brazos Road, Aztec, NM 87410  1220 South St. Francis Dr.  1220 South St. Francis Dr.    1220 S. St. Francis Dr., Santa Fe, NM 87505  Santa Fe, NM 87505  GAS CAPTURE PLAN    Date:  11/12/2018  Operator & OGRID No.:  6317    Amended - Reason for Amendment: | <u>District I</u><br>1625 N. French Dr., Hobbs, NM 88240<br><u>District II</u><br>811 S. First St., Artesia, NM 88210 | State of New Mexico<br>Energy, Minerals and Natural Resources De |              |
|---|---|--|--------------|
| Date:  11/12/2018    ☑ Original  Operator & OGRID No.:  6317  | <u>District III</u><br>1000 Rio Brazos Road, Aztec, NM 87410<br><u>District IV</u>                                    | 1220 South St. Francis Dr.                                       | AND CONTRACT |
|   | Date: 11/12/2018  | GAS CAPTURE PLAN   |              |
|   | •   | Operator & OGRID No.:  | 6317         |

This Gas Capture Plan outlines actions to be taken by the Operator to reduce well/production facility flaring/venting for new completion (new drill, recomplete to new zone, re-frac) activity.

Note: Form C-129 must be submitted and approved prior to exceeding 60 days allowed by Rule (Subsection A of 19.15.18.12 NMAC).

## Well(s)/Production Facility – North Thistle 15-10 CTB 2

The well(s) that will be located at the production facility are shown in the table below.

| Well Name   | API  | Well<br>Location              | Footages                                     | Expected<br>MCF/D | Flared or<br>Vented | Comments   |
|---|------|-------------------------------|--|-------------------|---------------------|--|
| North Thistle 15-10 State<br>Com1H<br>North Thistle 15-10 State<br>Com 2H |      | 15-23S-33E                    | 415 FSL &<br>760 FWL<br>415 FSL &<br>810 FWL |                   |                     | Will go to N. Thistle<br>15-10 CTB 2<br>Will go to N. Thistle<br>15-10 CTB 2 |
| North Thistle 15-10 State<br>Com 3H                                       | es-4 | 15-23S-33E<br>5 <b>39 X</b> - | 475 FSL &<br>2615 FWL                        |                   |                     | Will go to N. Thistle<br>15-10 CTB 2   |
| North Thistle 15-10 State<br>Com4H  |      | 15-23S-33E                    | 475 FSL &<br>2645 FWL                        |                   |                     | Will go to N. Thistle<br>15-10 CTB 2   |
| North Thistle 15-10 State<br>Com 5H                                       |      | 15-23S-33E                    | 475 FSL &<br>855 FEL                         |                   |                     | Will go to N. Thistle<br>15-10 CTB 2   |
| North Thistle 15-10 State<br>Com 6H                                       |      | 15-23S-33E                    | 475 FSL &<br>825 FEL                         |                   |                     | Will go to N. Thistle<br>15-10 CTB 2   |

## **Gathering System and Pipeline Notification**

Well(s) will be connected to a production facility after flowback operations are complete, if gas transporter system is in place. The gas produced from production facility is dedicated to Lucid and will be connected to Lucid low/high pressure gathering system located in Lea County, New Mexico. It will require 2600' of pipeline to connect the facility to low/high pressure gathering system. Devon Energy provides (periodically) to Lucid a drilling, completion and estimated first production date for wells that are scheduled to be drilled in the foreseeable future. In addition, Devon Energy and Lucid have periodic conference calls to discuss changes to drilling and completion schedules. Gas from these wells will be processed at Lucid's Red Hills Processing Plant located in Sec.13, Twn.24S, Rng.34E, Lea County, New Mexico. The actual flow of the gas will be based on compression operating parameters and gathering system pressures.

## **Flowback Strategy**

After the fracture treatment/completion operations, well(s) will be produced to temporary production tanks and gas will be flared or vented. During flowback, the fluids and sand content will be monitored. When the produced fluids contain minimal sand, the wells will be turned to production facilities. Gas sales should start as soon as the wells start flowing through the production facilities, unless there are operational issues on Lucid system at that time. Based on current information, it is Devon Energy's belief the system can take this gas upon completion of the well(s).

Safety requirements during cleanout operations from the use of underbalanced air cleanout systems may necessitate that sand and nonpipeline quality gas be vented and/or flared rather than sold on a temporary basis.

## **Alternatives to Reduce Flaring**

Below are alternatives considered from a conceptual standpoint to reduce the amount of gas flared.

- Power Generation On lease
  - o Only a portion of gas is consumed operating the generator, remainder of gas will be flared
- Compressed Natural Gas On lease

o Gas flared would be minimal, but might be uneconomical to operate when gas volume declines

• NGL Removal – On lease

o Plants are expensive, residue gas is still flared, and uneconomical to operate when gas volume declines