District I
1625 N. French Dr., Hobbs, NM 88240
District II
811 S. First St., Artesia, NM 88210
District III
1000 Rio Brazos Road, Aztec, NM 87410
District IV
1220 S. St. Francis Dr., Santa Fe, NM 87505

# State of New Mexico Energy, Minerals and Natural Resources Department

Submit Original to Appropriate District Office

Oil Conservation Division 1220 South St. Francis Dr. Santa Fe, NM 87505

#### GAS CAPTURE PLAN Date: 5/2/18 ○ Original Operator & OGRID No.: Energen Resources Corporation 162928 ☐ Amended - Reason for Amendment: Brenda F. Rathjen Energen Regulatory Analyst 432-688-3323 brathjen@energen.com 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 - Name of facility - Central Tank Battery on Pad #3 of the Pitchblende Fed lease The well(s) that will be located at the production facility are shown in the table below. Well Name API Well **Footages** Expected Flared or Comments MCF/D Vented Location SEE ATTACHED FOR ALL WELLS ON LEASE

### **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 <u>Lucid Energy Delaware</u>, <u>LLC</u> and will be connected to <u>Lucid Energy Delaware</u>, <u>LLC</u> low/high pressure gathering system located in <u>Lea County</u>, New Mexico. It will require <u>~4,750'</u> of pipeline to connect the facility to low/high pressure gathering system. <u>Energen Resources Corporation</u> provides (periodically) to <u>Lucid Energy Delaware</u>, <u>LLC</u> (Gas Transporter) a drilling, completion and estimated first production date for wells that are scheduled to be drilled in the foreseeable future. In addition, <u>Energen Resources Corporation</u> (Operator) and <u>Lucid Energy Delaware</u>, <u>LLC</u> (Gas Transporter) have periodic conference calls to discuss changes to drilling and completion schedules. Gas from these wells will be processed at <u>Lucid's Red Hills Processing Plant</u> located in <u>Sec.13</u>, <u>Twn. 24S</u>, <u>Rng.33E</u>, <u>Lea County</u>, <u>New Mexico</u>. 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 <u>Gas Transporter</u> system at that time. Based on current information, it is <u>Operator's</u> 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 non-pipeline 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
  - 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

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## GAS CAPTURE PLAN page 2

## **Energen Resources Corporation 162928**

# Well(s)/Production Facility - Pitchblende Fed CTB facility on Pad #3, Lea County NM

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

Well Name	API	Well Location (ULSTR)	Footages	Expected MCF/D	Flared or vented	Comments
Pitchblended Fed 19-30 #038H	30-025-	A, 19-25S-35E	450 FNL 710 FEL	1,900	As needed	
Pitchblended Fed 19-30 #208H	30-025-	A, 19-25S-35E	450 FNL 660 FEL	1,900	As needed	
Pitchblended Fed 19-30 #358H	30-025-	A, 19-25S-35E	450 FNL 610 FEL	1,900	As needed	
Mohklanded Ded 19-80 1953A	30-025- <i>4566.</i>	Ã, 19-25S-35E	250 FNL 635 FEL	1,900	As needed	<del></del>
Pitchblended Fed 19-30 #608H	30-025-	A, 19-25S-35E	250 FNL 685 FEL	1,900	As needed	
Pitchblended Fed 24-25 #031H	30-025-	L, 24-25S-34E	2191 FSL 610 FWL	1,900	As needed	
Pitchblended Fed 24-25 #201H	30-025-	L, 24-25S-34E	2191 FSL 990 FWL	1,900	As needed	
Pitchblended Fed 24-25 #351H	30-025-	L, 24-25S-34E	2191 FSL 710 FWL	1,900	As needed	
Pitchblended Fed 24-25 #451H	30-025-	L, 24-25S-34E	2391 FSL 685 FWL	1,900	As needed	
Pitchblended Fed 24-25 #601H	30-025-	L, 24-25S-34E	2391 FSL 635 FWL	1,900	As needed	
Pitchblended Fed 19-30 #037H	30-025-	B, 19-25S-35E	450 FNL 2030 FEL	1,900	As needed	
Pitchblended Fed 19-30 #457H	30-025-	B, 19-25S-35E	330 FNL 1955 FEL	1,900	As needed	<u>-</u>
Pitchblended Fed 19-30 #607H	30-025-	B, 19-25S-35E	250 FNL 2005 FEL	1,900	As needed	