

FREMONT ENVIRONMENTAL INC.

February 09, 2023

Mr. Daniel Peterson
Noble Energy Inc.
2115 117th Avenue
Greeley, CO 80634

Subject: **Flowline Closure Data Submittal**
PTF C 32-8
API # 05-123-14879
SENE Sec. 32, T4N, R64W
Weld County, Colorado
Fremont Project No. C022-089
Facility # 247082, Remediation #23204

Dear Mr. Peterson:

As you requested, Fremont Environmental Inc. (Fremont) personnel conducted Flowline Closure activities for the Noble Energy Inc. (Noble) PTF C 32-8. Impacted soil was not encountered during abandonment activities. Details of the PTF C 32-8 flowline closure activities are documented in the attached Closure Report. Groundwater was not encountered during flowline abandonment activities.

Please contact me at (303) 956-8714 if you require any additional information. Fremont appreciates the opportunity to provide this service.

Sincerely,

FREMONT ENVIRONMENTAL INC.



Paul V. Henchan, P.E.
Senior Consultant

Attachments:

Facility Closure Checklist
Tables
Figures
Photos
Laboratory Reports

**1759 REDWING LANE, BROOMFIELD, CO 80020
(303) 956-8714 (DIRECT)**

Flowline Closure Checklist

COGCC Rule 911.a.(4) Environmental Site Closure Assessment Field Form

| | | | | | | | | |
|---|--------------------|----------------------|--|------------------|---|-------------|--|-------------------------------------|
| Additional Attachments: | | Tank Battery Closure | | Wellhead Closure | | Pit Closure | | Partially Buried Vault Closure |
| Site Name & COGCC Facility Number: PTF-64N64W 32SENE Facility ID: 327571 | | Date: 07/19/2022 | | | | | | Remediation Project #: 23204 |
| Associated Wells: PTF C 32-1 & PTF C 32-8 API: 05-123-14878 Facility ID: 247081 API: 05-123-14879 Facility ID: 247082 | | Age of Site: 1991 | | | | | | Number of Photos Attached: 5 Photos |
| Starting point: (GPS coordinates and descriptions) 40.270221, -104.567746 | | | | | | | | |
| End point: (GPS coordinates and descriptions) 40.271330, -104.565757 | | | | | | | | |
| USCS Soil Type: SW | | | | | Estimated Depth to Groundwater: 8-10ft | | | |
| Hydrocarbon Impacted Soils / Spills: (Note estimated size and if impact appears to be surficial or extends to an unknown depth) | | | | | | | | |
| None observed | | | | | | | | |
| Salt Crusted Soils or Impacted Vegetation: (Note estimated size and if impact appears to be surficial or extends to an unknown depth) | | | | | | | | |
| None observed | | | | | | | | |
| Flowlines | | | | | | | | |
| Flowline type | 2" Steel | | | | | | | |
| Depth | 3-5ft | | | | | | | |
| Age | 1991 | | | | | | | |
| Length | 950ft | | | | | | | |
| Construction Material | Non ACM / 2" Steel | | | | | | | |
| Were flowlines pulled? | Yes | | | | | | | |
| Visual Integrity of lines | No Damage | | | | | | | |
| Visual impacts if trenched | No Impacts | | | | | | | |
| PID Readings if trenched | High @ 1.0ppm | | | | | | | |
| Sample taken? Location/Sample ID# | Fieldscreened Only | | | | | | | |
| Photo Number(s) | Photo 1A-1E | | | | | | | |
| Other observations regarding on location flowlines: | | | | | | | | |
| Summary | | | | | | | | |
| Was impacted soil identified? No Yes - less than 10 cubic yards Yes - more than 10 cubic yards | | | | | | | | |
| Total number of samples field screened: 6 Samples | | | | | Total number of samples collected: 6 Samples | | | |
| Highest PID Reading: High @1.0ppm (8FL06@4.0', 8FL03@4.5' and 8FL04@5.0') | | | | | Total number of samples submitted to lab for analysis: 0 Sample | | | |
| If more than 10 cubic yards of impacted soil were observed: | | | | | | | | |
| Vertical extent: N/A | | | | | Estimated spill volume: N/A | | | |
| Lateral extent: N/A | | | | | Volume of soil removed: N/A | | | |
| Is additional investigation required? N/A | | | | | | | | |
| Was groundwater encountered during the investigation? No Yes - not impacted or in contact with impacted soils Yes - groundwater impacted and/or in contact with impacted soils | | | | | | | | |
| Measured depth to groundwater: N/A | | | | | Was remedial groundwater removal conducted? Yes No | | | |
| Date Groundwater was encountered: N/A | | | | | Commencement date of removal: N/A | | | |
| Sheen on groundwater? Yes No | | | | | Volume of groundwater removed prior to sampling: N/A | | | |
| Free product observed? Yes No | | | | | Volume of groundwater removed post sampling: N/A | | | |
| Total number of samples collected: N/A | | | | | Total Volume of groundwater removed: N/A | | | |
| Total number of samples submitted to lab for analysis: N/A | | | | | | | | |

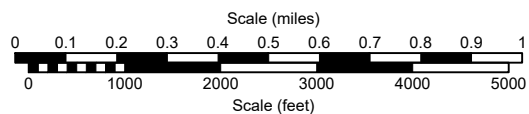
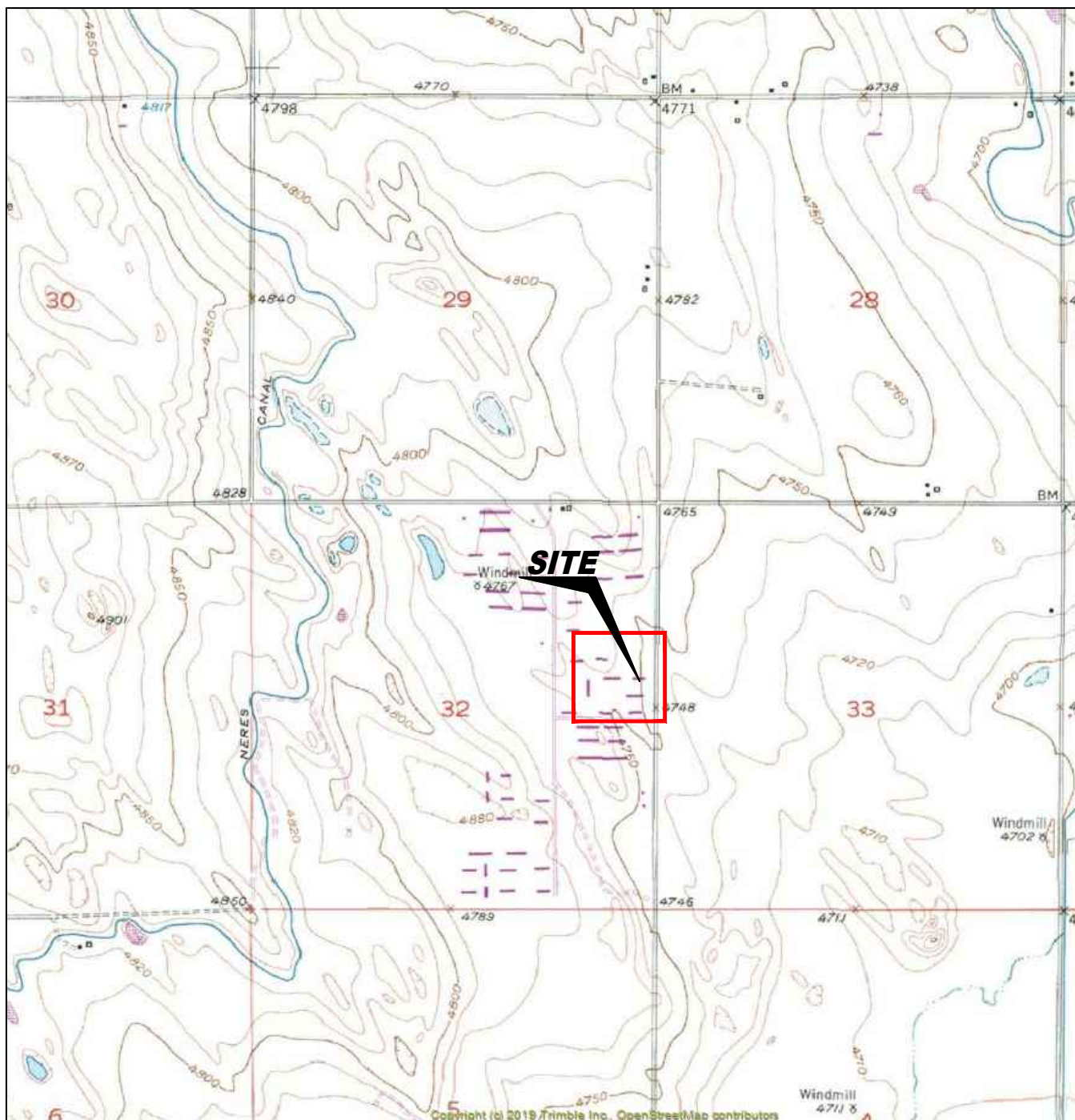
TABLE 1
SUMMARY OF POTHOLE FIELD OBSERVATIONS
NOBLE ENERGY INC.
PTF C 32-8, WELD COUNTY, COLORADO
FREMONT PROJECT C022-089

| Location | Latitude | Longitude | PID Reading | Field Observations |
|------------|-----------|-------------|----------------|-----------------------|
| 8FL01@3.0' | 40.270221 | -104.567746 | 0.3ppm | No Impacts Noted |
| 8FL02@5.0' | 40.270325 | -104.567292 | 0.9ppm | No Impacts Noted |
| 8FL03@4.5' | 40.270485 | -104.566832 | 1.0ppm | No Impacts Noted |
| 8FL04@5.0' | 40.270951 | -104.566462 | 1.0ppm | No Impacts Noted |
| 8FL05@5.0' | 40.271502 | -104.566012 | 0.1ppm | No Impacts Noted |
| 8FL06@4.0' | 40.271330 | -104.565757 | 1.0ppm | No Impacts Noted |

TABLE 2
SUMMARY OF FLOW LINE CONDITION
NOBLE ENERGY INC.
PTF C 32-8, WELD COUNTY, COLORADO
FREMONT PROJECT C022-089

| START | STOP | FOOTAGE | PIPE TYPE AND CONDITION |
|------------|------------|---------|--|
| 8FL01@3.0' | 8FL02@5.0' | 115 | 2" Sch 80 welded steel pipe, Wrapped in Black Non ACM Tape, Good Condition |
| 8FL02@5.0' | 8FL03@4.5' | 135 | 2" Sch 80 welded steel pipe, Wrapped in Black Non ACM Tape, Good Condition |
| 8FL03@4.5' | 8FL04@5.0' | 180 | 2" Sch 80 welded steel pipe, Wrapped in Black Non ACM Tape, Good Condition |
| 8FL04@5.0' | 8FL05@5.0' | 220 | 2" Sch 80 welded steel pipe, Wrapped in Black Non ACM Tape, Good Condition |
| 8FL05@5.0' | 8FL06@4.0' | 300 | 2" Sch 80 welded steel pipe, Wrapped in Black Non ACM Tape, Good Condition |

950 Total linear feet of flow line



USGS 7.5 MINUTE SERIES (TOPOGRAPHIC)

Figure 1
SITE LOCATION MAP

Noble Energy, Inc. ~ PTF C 32-8
SENE Sec. 32, T4N, R64W, 6th PM
Weld County, Colorado
40.270210°, -104.567750°

| | | |
|------------------------------|-------------------------------|-----------------------------|
| Project # C022-089 | API # 05-123-14879 | Facility # 247082 |
| Date 2/7/23 | Remediation # 23204 | Filename 22089T4 |





LEGEND

| | | | | | | | |
|---|-----------------------------|-----------------|----------|----------|------------------|-----------|------------|
| ▲ PID READING LOCATION | ○ ABOVE GROUND STORAGE TANK | FORMER FACILITY | BUILDING | BUILDING | CONTAINMENT BERM | FLOW LINE | FENCE LINE |
| 8FL01 (2.5') PID 0.3 ppm | | | | | | | |
| PID READING LOCATION IDENTIFICATION PHOTO IONIZATION DETECTION (ppm) | | | | | | | |

Figure 2
SITE MAP

Noble Energy, Inc. ~ PTF C 32-8
SENE Sec. 32, T4N, R64W, 6th PM
Weld County, Colorado
40.270210°, -104.567750°

| | | | |
|--------------------------------|------------------------------|-------------------------------|--|
| Project No. C022-089 | API # 05-123-14879 | Facility # 247082 | |
| Date 2/7/23 | Reviewed By 23204 | Filename 22089Q32-8 | |



#1A – PTF C 32-8 Flowline Removal – 8FL01@3.0' – Wellhead Tie-in - No Impacts Noted - PID 0.3ppm



#1B – PTF C 32-8 Flowline Removal – 8FL03@4.5' – No Impacts Noted - PID 1.0ppm



#1C – PTF C 32-8 Flowline Removal – 8FL04@5.0' – No Impacts Noted - PID 1.0ppm



#1D – PTF C 32-8 Flowline Removal – 8FL05@5.0' – No Impacts Noted - PID 0.1ppm



#1E – PTF C 32-8 Flowline Removal – 8FL06@4.0' – Separator Tie-in – No Impacts Noted -
PID 1.0ppm