Form 3160-3
(June 2015)

HOBBS OCD
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FORM APPROVED
OMB No. 1004-0137
Expires: January 31, 2018

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

APPLICATION FOR PERMIT TO DRILL OR REENTER

5. Lease Serial No.
NMNM127446

6. If Indian, Allotee or Tribe Name

1a. Type of work: ☑ DRILL ☐ REENTER

1b. Type of Well: ☑ Oil Well ☐ Gas Well ☐ Other

1c. Type of Completion: ☐ Hydraulic Fracturing ☑ Single Zone ☐ Multiple Zone

7. If Unit or CA Agreement, Name and No.

8. Lease Name and Well No.
PAC-MAN 36 FEDERAL COM
601H (326211)

2. Name of Operator
CENTENNIAL RESOURCE PRODUCTION LLC (372165)

9. API Well No.
30-025-46434

3a. Address
1001 17th Street, Suite 1800 Denver CO 80202

3b. Phone No. *(include area code)*
(720)499-1400

10. Field and Pool, or Exploratory (97983)
THIRD BONE SPRING / OJO CHISO; BO

4. Location of Well *(Report location clearly and in accordance with any State requirements.*)*
At surface SESW / 300 FSL / 1340 FWL / LAT 32.341732 / LONG -103.427979
At proposed prod. zone SESW / 100 FSL / 2158 FWL / LAT 32.312144 / LONG -103.425323

11. Sec., T. R. M. or Blk. and Survey or Area
SEC 36 / T22S / R34E / NMP

14. Distance in miles and direction from nearest town or post office*	12. County or Parish	13. State
24.3 miles	LEA	NM

15. Distance from proposed* location to nearest property or lease line, ft. (Also to nearest drlg. unit line, if any)	16. No of acres in lease	17. Spacing Unit dedicated to this well
1356 feet	320.44	320.14
18. Distance from proposed location* to nearest well, drilling, completed, applied for, on this lease, ft.	**19. Proposed Depth**	**20. BLM/BIA Bond No. in file**
30 feet	11430 feet / 22066 feet	FED: NMB001471

21. Elevations (Show whether DF, KDB, RT, GL, etc.)	22. Approximate date work will start*	23. Estimated duration
3379 feet	01/01/2020	25 days

24. Attachments

The following, completed in accordance with the requirements of Onshore Oil and Gas Order No. 1, and the Hydraulic Fracturing rule per 43 CFR 3162.3-3 (as applicable)

1. Well plat certified by a registered surveyor.
2. A Drilling Plan.
3. A Surface Use Plan (if the location is on National Forest System Lands, the SUPO must be filed with the appropriate Forest Service Office).
4. Bond to cover the operations unless covered by an existing bond on file (see Item 20 above).
5. Operator certification.
6. Such other site specific information and/or plans as may be requested by the BLM.

25. Signature	Name *(Printed/Typed)*	Date
(Electronic Submission)	Kanicia Schlichting / Ph: (720)499-1537	12/06/2018
Title: Sr. Regulatory Analyst		
Approved by *(Signature)*	Name *(Printed/Typed)*	Date
(Electronic Submission)	Cody Layton / Ph: (575)234-5959	10/11/2019
Title: Assistant Field Manager Lands & Minerals	Office: CARLSBAD	

Application approval does not warrant or certify that the applicant holds legal or equitable title to those rights in the subject lease which would entitle the applicant to conduct operations thereon.
Conditions of approval, if any, are attached.

Title 18 U.S.C. Section 1001 and Title 43 U.S.C. Section 1212, make it a crime for any person knowingly and willfully to make to any department or agency of the United States any false, fictitious or fraudulent statements or representations as to any matter within its jurisdiction.

GCP Rec 10/16/19

KZ 10/17/19

SL

APPROVED WITH CONDITIONS

Approval Date: 10/11/2019

(Continued on page 2)

*(Instructions on page 2)

INSTRUCTIONS

GENERAL: This form is designed for submitting proposals to perform certain well operations, as indicated on Federal and Indian lands and leases for action by appropriate Federal agencies, pursuant to applicable Federal laws and regulations. Any necessary special instructions concerning the use of this form and the number of copies to be submitted, particularly with regard to local, area, or regional procedures and practices, either are shown below or will be issued by, or may be obtained from local Federal offices.

ITEM I: If the proposal is to redrill to the same reservoir at a different subsurface location or to a new reservoir, use this form with appropriate notations. Consult applicable Federal regulations concerning subsequent work proposals or reports on the well.

ITEM 4: Locations on Federal or Indian land should be described in accordance with Federal requirements. Consult local Federal offices for specific instructions.

ITEM 14: Needed only when location of well cannot readily be found by road from the land or lease description. A plat, or plats, separate or on the reverse side, showing the roads to, and the surveyed location of, the wen, and any other required information, should be furnished when required by Federal agency offices.

ITEMS 15 AND 18: If well is to be, or has been directionany drilled, give distances for subsurface location of hole in any present or objective productive zone.

ITEM 22: Consult applicable Federal regulations, or appropriate officials, concerning approval of the proposal before operations are started.

ITEM 24: If the proposal will involve hydraulic fracturing operations, you must comply with 43 CFR 3162.3-3, including providing information about the protection of usable water. Operators should provide the best available information about all formations containing water and their depths. This information could include data and interpretation of resistivity logs run on nearby wells. Information may also be obtained from state or tribal regulatory agencies and from local BLM offices.

NOTICES

The Privacy Act of 1974 and regulation in 43 CFR 2.48(d) provide that you be furnished the following information in connection with information required by this application.
AUTHORITY: 30 U.S.C. 181 et seq., 25 U.S.C. 396; 43 CFR 3160
PRINCIPAL PURPOSES: The information will be used to: (1) process and evaluate your application for a permit to drill a new oil, gas, or service wen or to reenter a plugged and abandoned well; and (2) document, for administrative use, information for the management, disposal and use of National Resource Lands and resources including (a) analyzing your proposal to discover and extract the Federal or Indian resources encountered; (b) reviewing procedures and equipment and the projected impact on the land involved; and (c) evaluating the effects of the proposed operation on the surface and subsurface water and other environmental impacts.
ROUTINE USE: Information from the record and/or the record win be transferred to appropriate Federal, State, and local or foreign agencies, when relevant to civil, criminal or regulatory investigations or prosecution, in connection with congressional inquiries and for regulatory responsibilities.
EFFECT OF NOT PROVIDING INFORMATION: Filing of this application and disclosure of the information is mandatory only if you elect to initiate a drilling or reentry operation on an oil and gas lease.

The Paperwork Reduction Act of 1995 requires us to inform you that:
The BLM conects this information to anow evaluation of the technical, safety, and environmental factors involved with drilling for oil and/or gas on Federal and Indian oil and gas leases. This information will be used to analyze and approve applications. Response to this request is mandatory only if the operator elects to initiate drilling or reentry operations on an oil and gas lease. The BLM would like you to know that you do not have to respond to this or any other Federal agency-sponsored information collection unless it displays a currently valid OMB control number.

BURDEN HOURS STATEMENT: Public reporting burden for this form is estimated to average 8 hours per response, including the time for reviewing instructions, gathering and maintaining data, and completing and reviewing the form. Direct comments regarding the burden estimate or any other aspect of this form to U.S. Department of the Interior, Bureau of Land Management (1004-0137), Bureau Information Conection Clearance Officer (WO-630), 1849 C Street, N.W., Mail Stop 401 LS, Washington, D.C. 20240.

(Continued on page 3)

Additional Operator Remarks

Location of Well

1. SHL: SESW / 300 FSL / 1340 FWL / TWSP: 22S / RANGE: 34E / SECTION: 36 / LAT: 32.341732 / LONG: -103.427979 (TVD: 0 feet, MD: 0 feet)
   PPP: NENW / 100 FNL / 2158 FWL / TWSP: 23S / RANGE: 34E / SECTION: 1 / LAT: 32.340632 / LONG: -103.425333 (TVD: 11430 feet, MD: 11805 feet)
   BHL: SESW / 100 FSL / 2158 FWL / TWSP: 23S / RANGE: 34E / SECTION: 12 / LAT: 32.312144 / LONG: -103.425323 (TVD: 11430 feet, MD: 22066 feet)

BLM Point of Contact

Name: Priscilla Perez
Title: Legal Instruments Examiner
Phone: 5752345934
Email: pperez@blm.gov

Approval Date: 10/11/2019

Review and Appeal Rights

A person contesting a decision shall request a State Director review. This request must be filed within 20 working days of receipt of the Notice with the appropriate State Director (see 43 CFR 3165.3). The State Director review decision may be appealed to the Interior Board of Land Appeals, 801 North Quincy Street, Suite 300, Arlington, VA 22203 (see 43 CFR 3165.4). Contact the above listed Bureau of Land Management office for further information.

PECOS DISTRICT
DRILLING CONDITIONS OF APPROVAL

OPERATOR'S NAME:	**CENTENNIAL RESOURCES PRODUCTION**
LEASE NO.:	**NMNM127446**
LOCATION:	**Section 36, T.22 S., R.34 E., NMPM**
COUNTY:	**Lea County, New Mexico**

WELL NAME & NO.:	**PAC-MAN 36 FED COM 601H**
SURFACE HOLE FOOTAGE:	**300'/S & 1340'/W**
BOTTOM HOLE FOOTAGE	**100'/N & 2158'/W**

WELL NAME & NO.:	**PAC-MAN 36 FED COM 602H**
SURFACE HOLE FOOTAGE:	**300'/S & 1310'/W**
BOTTOM HOLE FOOTAGE	**100'/N & 1244'/W**

WELL NAME & NO.:	**PAC-MAN 36 FED COM 603H**
SURFACE HOLE FOOTAGE:	**300'/S & 1280'/W**
BOTTOM HOLE FOOTAGE	**100'/N & 330'/W**

COA

H2S	○ Yes	◉ No	
Potash	◉ None	○ Secretary	○ R-111-P
Cave/Karst Potential	◉ Low	○ Medium	○ High
Cave/Karst Potential	○ Critical		
Variance	○ None	◉ Flex Hose	○ Other
Wellhead	○ Conventional	◉ Multibowl	○ Both
Other	☐ 4 String Area	☑ Capitan Reef	☐ WIPP
Other	☑ Fluid Filled	☐ Cement Squeeze	☐ Pilot Hole
Special Requirements	☐ Water Disposal	☑ COM	☐ Unit

A. HYDROGEN SULFIDE

Hydrogen Sulfide (H2S) monitors shall be installed prior to drilling out the surface shoe. If H2S is detected in concentrations greater than 100 ppm, the Hydrogen Sulfide area shall meet Onshore Order 6 requirements, which includes equipment and personnel/public protection items. If Hydrogen Sulfide is encountered, provide measured values and formations to the BLM.

B. CASING

1. The **13-3/8** inch surface casing shall be set at approximately **1868** feet (a minimum of **25 feet (Lea County)** into the Rustler Anhydrite and above the salt) and cemented to the surface.

    a. If cement does not circulate to the surface, the appropriate BLM office shall be notified and a temperature survey utilizing an electronic type temperature survey with surface log readout will be used or a cement bond log shall be run to verify the top of the cement. Temperature survey will be run a minimum of six hours after pumping cement and ideally between 8-10 hours after completing the cement job.
    b. Wait on cement (WOC) time for a primary cement job will be a minimum of **8 hours** or 500 pounds compressive strength, whichever is greater. (This is to include the lead cement)
    c. Wait on cement (WOC) time for a remedial job will be a minimum of 4 hours after bringing cement to surface or 500 pounds compressive strength, whichever is greater.
    d. If cement falls back, remedial cementing will be done prior to drilling out that string.

    Intermediate casing must be kept fluid filled to meet BLM minimum collapse requirement.

2. The minimum required fill of cement behind the **9-5/8** inch intermediate casing is:

    - Cement to surface. If cement does not circulate see B.1.a, c-d above. **Wait on cement (WOC) time for a primary cement job is to include the lead cement slurry due to cave/karst or potash.**

    ❖ In Capitan Reef Areas if cement does not circulate to surface on the first two casing strings, the cement on the 3rd casing string must come to surface.

    ❖ **Special Capitan Reef requirements.** If lost circulation (50% or greater) occurs below the Base of the Salt, the operator shall do the following:

    - Switch to fresh water mud to protect the Capitan Reef and use fresh water mud until setting the intermediate casing. The appropriate BLM office is to be notified for a PET to witness the switch to fresh water.

    - Daily drilling reports from the Base of the Salt to the setting of the intermediate casing are to be submitted to the BLM CFO engineering staff via e-mail by 0800 hours each morning. Any lost circulation encountered is to be recorded on these drilling reports. The daily drilling report should show mud volume per shift/tour. Failure to submit these reports will result in an Incidence of Non-Compliance being issued for failure to comply with the Conditions of Approval.

If not already planned, the operator shall run a caliper survey for the intermediate well bore and submit to the appropriate BLM office.

3. The minimum required fill of cement behind the **5-1/2** inch production casing is:

    - Cement should tie-back at least **50 feet above the capitan reef**. Operator shall provide method of verification.

C. PRESSURE CONTROL

1. Variance approved to use flex line from BOP to choke manifold. Manufacturer's specification to be readily available. No external damage to flex line. Flex line to be installed as straight as possible (no hard bends).'

2. Operator has proposed a multi-bowl wellhead assembly. This assembly will only be tested when installed on the surface casing. Minimum working pressure of the blowout preventer (BOP) and related equipment (BOPE) required for drilling below the surface casing shoe shall be **5000 (5M)** psi.

    a. Wellhead shall be installed by manufacturer's representatives, submit documentation with subsequent sundry.
    b. If the welding is performed by a third party, the manufacturer's representative shall monitor the temperature to verify that it does not exceed the maximum temperature of the seal.
    c. Manufacturer representative shall install the test plug for the initial BOP test.
    d. If the cement does not circulate and one inch operations would have been possible with a standard wellhead, the well head shall be cut off, cementing operations performed and another wellhead installed.
    e. Whenever any seal subject to test pressure is broken, all the tests in OOGO2.III.A.2.i must be followed.

D. SPECIAL REQUIREMENT (S)

Communitization Agreement

- The operator will submit a Communitization Agreement to the Carlsbad Field Office, 620 E Greene St. Carlsbad, New Mexico 88220, at least 90 days before the anticipated date of first production from a well subject to a spacing order issued by the New Mexico Oil Conservation Division. The Communitization Agreement will include the signatures of all working interest owners in all Federal and Indian leases subject to the Communitization Agreement (i.e., operating rights owners and lessees of record), or certification that the operator has obtained the written signatures of all such owners and will make those signatures available to the BLM immediately upon request.
- If the operator does not comply with this condition of approval, the BLM may take enforcement actions that include, but are not limited to, those specified in 43 CFR 3163.1.

- In addition, the well sign shall include the surface and bottom hole lease numbers. When the Communitization Agreement number is known, it shall also be on the sign.

GENERAL REQUIREMENTS

The BLM is to be notified in advance for a representative to witness:

a. Spudding well (minimum of 24 hours)
b. Setting and/or Cementing of all casing strings (minimum of 4 hours)
c. BOPE tests (minimum of 4 hours)

☒ Eddy County
Call the Carlsbad Field Office, 620 East Greene St., Carlsbad, NM 88220, (575) 361-2822

☒ Lea County
Call the Hobbs Field Station, 414 West Taylor, Hobbs NM 88240, (575) 393-3612

1. Unless the production casing has been run and cemented or the well has been properly plugged, the drilling rig shall not be removed from over the hole without prior approval.

   a. In the event the operator has proposed to drill multiple wells utilizing a skid/walking rig. Operator shall secure the wellbore on the current well, after installing and testing the wellhead, by installing a blind flange of like pressure rating to the wellhead and a pressure gauge that can be monitored while drilling is performed on the other well(s).
   b. When the operator proposes to set surface casing with Spudder Rig
      - Notify the BLM when moving in and removing the Spudder Rig.
      - Notify the BLM when moving in the 2nd Rig. Rig to be moved in within 90 days of notification that Spudder Rig has left the location.
      - BOP/BOPE test to be conducted per Onshore Oil and Gas Order No. 2 as soon as 2nd Rig is rigged up on well.

2. Floor controls are required for 3M or Greater systems. These controls will be on the rig floor, unobstructed, readily accessible to the driller and will be operational at all times during drilling and/or completion activities. Rig floor is defined as the area immediately around the rotary table; the area immediately above the substructure on which the draw works are located, this does not include the dog house or stairway area.

3. The record of the drilling rate along with the GR/N well log run from TD to surface (horizontal well – vertical portion of hole) shall be submitted to the BLM office as

well as all other logs run on the borehole 30 days from completion. If available, a digital copy of the logs is to be submitted in addition to the paper copies. The Rustler top and top and bottom of Salt are to be recorded on the Completion Report.

A. CASING

1. Changes to the approved APD casing program need prior approval if the items substituted are of lesser grade or different casing size or are Non-API. The Operator can exchange the components of the proposal with that of superior strength (i.e. changing from J-55 to N-80, or from 36# to 40#). Changes to the approved cement program need prior approval if the altered cement plan has less volume or strength or if the changes are substantial (i.e. Multistage tool, ECP, etc.). The initial wellhead installed on the well will remain on the well with spools used as needed.

2. Wait on cement (WOC) for Potash Areas: After cementing but before commencing any tests, the casing string shall stand cemented under pressure until both of the following conditions have been met: 1) cement reaches a minimum compressive strength of 500 psi for all cement blends, 2) until cement has been in place at least 24 hours. WOC time will be recorded in the driller's log. The casing intergrity test can be done (prior to the cement setting up) immediately after bumping the plug.

3. Wait on cement (WOC) for Water Basin: After cementing but before commencing any tests, the casing string shall stand cemented under pressure until both of the following conditions have been met: 1) cement reaches a minimum compressive strength of 500 psi at the shoe, 2) until cement has been in place at least 8 hours. WOC time will be recorded in the driller's log. See individual casing strings for details regarding lead cement slurry requirements. The casing intergrity test can be done (prior to the cement setting up) immediately after bumping the plug.

4. Provide compressive strengths including hours to reach required 500 pounds compressive strength prior to cementing each casing string. Have well specific cement details onsite prior to pumping the cement for each casing string.

5. No pea gravel permitted for remedial or fall back remedial without prior authorization from the BLM engineer.

6. On that portion of any well approved for a 5M BOPE system or greater, a pressure integrity test of each casing shoe shall be performed. Formation at the shoe shall be tested to a minimum of the mud weight equivalent anticipated to control the formation pressure to the next casing depth or at total depth of the well. This test shall be performed before drilling more than 20 feet of new hole.

7. If hardband drill pipe is rotated inside casing, returns will be monitored for metal. If metal is found in samples, drill pipe will be pulled and rubber protectors which have a larger diameter than the tool joints of the drill pipe will be installed prior to continuing drilling operations.

8. Whenever a casing string is cemented in the R-111-P potash area, the NMOCD requirements shall be followed.

B. PRESSURE CONTROL

1. All blowout preventer (BOP) and related equipment (BOPE) shall comply with well control requirements as described in Onshore Oil and Gas Order No. 2 and API RP 53 Sec. 17.

2. If a variance is approved for a flexible hose to be installed from the BOP to the choke manifold, the following requirements apply: The flex line must meet the requirements of API 16C. Check condition of flexible line from BOP to choke manifold, replace if exterior is damaged or if line fails test. Line to be as straight as possible with no hard bends and is to be anchored according to Manufacturer's requirements. The flexible hose can be exchanged with a hose of equal size and equal or greater pressure rating. Anchor requirements, specification sheet and hydrostatic pressure test certification matching the hose in service, to be onsite for review. These documents shall be posted in the company man's trailer and on the rig floor.

3. 5M or higher system requires an HCR valve, remote kill line and annular to match. The remote kill line is to be installed prior to testing the system and tested to stack pressure.

4. If the operator has proposed a multi-bowl wellhead assembly in the APD. The following requirements must be met:

    a. Wellhead shall be installed by manufacturer's representatives, submit documentation with subsequent sundry.
    b. If the welding is performed by a third party, the manufacturer's representative shall monitor the temperature to verify that it does not exceed the maximum temperature of the seal.
    c. Manufacturer representative shall install the test plug for the initial BOP test.
    d. Whenever any seal subject to test pressure is broken, all the tests in OOGO2.III.A.2.i must be followed.
    e. If the cement does not circulate and one inch operations would have been possible with a standard wellhead, the well head shall be cut off, cementing operations performed and another wellhead installed.

5. The appropriate BLM office shall be notified a minimum of 4 hours in advance for a representative to witness the tests.

    a. In a water basin, for all casing strings utilizing slips, these are to be set as soon as the crew and rig are ready and any fallback cement remediation has been done. The casing cut-off and BOP installation can be initiated four hours after installing the slips, which will be approximately six hours after bumping the

plug. For those casing strings not using slips, the minimum wait time before cut-off is eight hours after bumping the plug. BOP/BOPE testing can begin after cut-off or once cement reaches 500 psi compressive strength (including lead when specified), whichever is greater. However, if the float does not hold, cut-off cannot be initiated until cement reaches 500 psi compressive strength (including lead when specified).

b. In potash areas, for all casing strings utilizing slips, these are to be set as soon as the crew and rig are ready and any fallback cement remediation has been done. For all casing strings, casing cut-off and BOP installation can be initiated at twelve hours after bumping the plug. However, **no tests** shall commence until the cement has had a minimum of 24 hours setup time, except the casing pressure test can be initiated immediately after bumping the plug (only applies to single stage cement jobs).

c. The tests shall be done by an independent service company utilizing a test plug not a cup or J-packer. The operator also has the option of utilizing an independent tester to test without a plug (i.e. against the casing) pursuant to Onshore Order 2 with the pressure not to exceed 70% of the burst rating for the casing. Any test against the casing must meet the WOC time for water basin (8 hours) or potash (24 hours) or 500 pounds compressive strength, whichever is greater, prior to initiating the test (see casing segment as lead cement may be critical item).

d. The test shall be run on a 5000 psi chart for a 2-3M BOP/BOP, on a 10000 psi chart for a 5M BOP/BOPE and on a 15000 psi chart for a 10M BOP/BOPE. If a linear chart is used, it shall be a one hour chart. A circular chart shall have a maximum 2 hour clock. If a twelve hour or twenty-four hour chart is used, tester shall make a notation that it is run with a two hour clock.

e. The results of the test shall be reported to the appropriate BLM office.

f. All tests are required to be recorded on a calibrated test chart. A copy of the BOP/BOPE test chart and a copy of independent service company test will be submitted to the appropriate BLM office.

g. The BOP/BOPE test shall include a low pressure test from 250 to 300 psi. The test will be held for a minimum of 10 minutes if test is done with a test plug and 30 minutes without a test plug. This test shall be performed prior to the test at full stack pressure.

h. BOP/BOPE must be tested by an independent service company within 500 feet of the top of the Wolfcamp formation if the time between the setting of the intermediate casing and reaching this depth exceeds 20 days. This test does not exclude the test prior to drilling out the casing shoe as per Onshore Order No. 2.

C. DRILLING MUD

Mud system monitoring equipment, with derrick floor indicators and visual and audio alarms, shall be operating before drilling into the Wolfcamp formation, and shall be used until production casing is run and cemented.

D. WASTE MATERIAL AND FLUIDS

All waste (i.e. drilling fluids, trash, salts, chemicals, sewage, gray water, etc.) created as a result of drilling operations and completion operations shall be safely contained and disposed of properly at a waste disposal facility. No waste material or fluid shall be disposed of on the well location or surrounding area.

Porto-johns and trash containers will be on-location during fracturing operations or any other crew-intensive operations.
JJP10072019

Approval Date: 10/11/2019

AFMSS

U.S. Department of the Interior
BUREAU OF LAND MANAGEMENT

Operator Certification Data Report

10/14/2019

Operator Certification

I hereby certify that I, or someone under my direct supervision, have inspected the drill site and access route proposed herein; that I am familiar with the conditions which currently exist; that I have full knowledge of state and Federal laws applicable to this operation; that the statements made in this APD package are, to the best of my knowledge, true and correct; and that the work associated with the operations proposed herein will be performed in conformity with this APD package and the terms and conditions under which it is approved. I also certify that I, or the company I represent, am responsible for the operations conducted under this application. These statements are subject to the provisions of 18 U.S.C. 1001 for the filing of false statements.

NAME: Kanicia Schlichting **Signed on:** 12/06/2018

Title: Sr. Regulatory Analyst

Street Address: 1001 17th Street, Suite 1800

City: Denver **State:** CO **Zip:** 80202

Phone: (720)499-1537

Email address: Kanicia.schlichting@cdevinc.com

Field Representative

Representative Name:

Street Address:

City: **State:** **Zip:**

Phone:

Email address:

AFMSS

U.S. Department of the Interior
BUREAU OF LAND MANAGEMENT

Application Data Report

10/14/2019

APD ID: 10400036839 **Submission Date:** 12/06/2018

Operator Name: CENTENNIAL RESOURCE PRODUCTION LLC

Well Name: PAC-MAN 36 FEDERAL COM **Well Number:** 601H

Well Type: OIL WELL **Well Work Type:** Drill

[redacted]

Show Final Text

Section 1 - General

APD ID: 10400036839 **Tie to previous NOS?** **Submission Date:** 12/06/2018

BLM Office: CARLSBAD **User:** Kanicia Schlichting **Title:** Sr. Regulatory Analyst

Federal/Indian APD: FED **Is the first lease penetrated for production Federal or Indian?** FED

Lease number: NMNM127446 **Lease Acres:** 320.44

Surface access agreement in place? **Allotted?** **Reservation:**

Agreement in place? NO **Federal or Indian agreement:**

Agreement number:

Agreement name:

Keep application confidential? YES

Permitting Agent? NO **APD Operator:** CENTENNIAL RESOURCE PRODUCTION LLC

Operator letter of designation:

Operator Info

Operator Organization Name: CENTENNIAL RESOURCE PRODUCTION LLC

Operator Address: 1001 17th Street, Suite 1800

Zip: 80202

Operator PO Box:

Operator City: Denver **State:** CO

Operator Phone: (720)499-1400

Operator Internet Address:

Section 2 - Well Information

Well in Master Development Plan? NEW **Master Development Plan name:** Pac-Man 36 Federal Com

Well in Master SUPO? NO **Master SUPO name:**

Well in Master Drilling Plan? NO **Master Drilling Plan name:**

Well Name: PAC-MAN 36 FEDERAL COM **Well Number:** 601H **Well API Number:**

Field/Pool or Exploratory? Field and Pool **Field Name:** THIRD BONE SPRING **Pool Name:** OJO CHISO; BONESPRING,S

Is the proposed well in an area containing other mineral resources? USEABLE WATER

Operator Name: CENTENNIAL RESOURCE PRODUCTION LLC

Well Name: PAC-MAN 36 FEDERAL COM **Well Number:** 601H

Is the proposed well in an area containing other mineral resources? USEABLE WATER

Is the proposed well in a Helium production area? N **Use Existing Well Pad?** NO **New surface disturbance?**

Type of Well Pad: MULTIPLE WELL **Multiple Well Pad Name:** PAC-MAN 36 FEDERAL COM **Number:** 601H

Well Class: HORIZONTAL **Number of Legs:** 1

Well Work Type: Drill

Well Type: OIL WELL

Describe Well Type:

Well sub-Type: INFILL

Describe sub-type:

Distance to town: 24.3 Miles **Distance to nearest well:** 30 FT **Distance to lease line:** 1356 FT

Reservoir well spacing assigned acres Measurement: 320.14 Acres

Well plat: PAC_MAN_36_FED_COM_601H_ANT_PLAT_20181129145308.pdf

PAC_MAN_36_FED_COM_601H_PLAT_20181129145309.pdf

PAC_MAN_36_FED_COM_601H_LEASE_PLAT_20181130131400.pdf

Well work start Date: 01/01/2020 **Duration:** 25 DAYS

Section 3 - Well Location Table

Survey Type: RECTANGULAR

Describe Survey Type:

Datum: NAD83 **Vertical Datum:** NAVD88

Survey number: 23782 **Reference Datum:**

	NS-Foot	NS Indicator	EW-Foot	EW Indicator	Twsp	Range	Section	Aliquot/Lot/Tract	Latitude	Longitude	County	State	Meridian	Lease Type	Lease Number	Elevation	MD	TVD
SHL Leg #1	300	FSL	1340	FWL	22S	34E	36	Aliquot SESW	32.341732	-103.427979	LEA	NEW MEXICO	NEW MEXICO	S	STATE	3379	0	0
KOP Leg #1	371	FSL	2153	FWL	22S	34E	36	Aliquot SESW	32.341944	-103.4252778	LEA	NEW MEXICO	NEW MEXICO	S	STATE	-7478	10905	10857

Operator Name: CENTENNIAL RESOURCE PRODUCTION LLC

Well Name: PAC-MAN 36 FEDERAL COM **Well Number:** 601H

	NS-Foot	NS Indicator	EW-Foot	EW Indicator	Twsp	Range	Section	Aliquot/Lot/Tract	Latitude	Longitude	County	State	Meridian	Lease Type	Lease Number	Elevation	MD	TVD
PPP Leg #1	100	FNL	2158	FWL	23S	34E	1	Aliquot NENW	32.340632	-103.425333	LEA	NEW MEXICO	NEW MEXICO	F	NMNM 127446	-8051	11805	11430
EXIT Leg #1	100	FSL	2158	FWL	23S	34E	12	Aliquot SESW	32.312144	-103.425323	LEA	NEW MEXICO	NEW MEXICO	S	STATE	-8051	22066	11430
BHL Leg #1	100	FSL	2158	FWL	23S	34E	12	Aliquot SESW	32.312144	-103.425323	LEA	NEW MEXICO	NEW MEXICO	S	STATE	-8051	22066	11430

District I
1625 N. French Dr., Hobbs, NM 88240
Phone: (575) 393-6161 Fax: (575) 393-0720
District II
811 S. First St., Artesia, NM 88210
Phone: (575) 748-1283 Fax: (575) 748-9720
District III
1000 Rio Brazos Road, Aztec, NM 87410
Phone: (505) 334-6178 Fax: (505) 334-6170
District IV
1220 S. St. Francis Dr., Santa Fe, NM 87505
Phone: (505) 476-3460 Fax: (505) 476-3462

State of New Mexico
Energy, Minerals & Natural Resources Department
OIL CONSERVATION DIVISION
1220 South St. Francis Dr.
Santa Fe, NM 87505

Form C-102
Revised August 1, 2011
Submit one copy to appropriate District Office

☐ AMENDED REPORT

WELL LOCATION AND ACREAGE DEDICATION PLAT

1 API Number	2 Pool Code	3 Pool Name
	2205	Antelope Ridge; Bone Spring

4 Property Code	5 Property Name	6 Well Number
	PAC-MAN 36 FED COM	#601H

7 OGRID No.	8 Operator Name	9 Elevation
372165	CENTENNIAL RESOURCE PRODUCTION, LLC	3378.8'

10 Surface Location

UL or lot no.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
N	36	22S	34E		300	SOUTH	1340	WEST	LEA

11 Bottom Hole Location If Different From Surface

UL or lot no.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
N	12	23S	34E		100	SOUTH	2158	WEST	LEA

12 Dedicated Acres	13 Joint or Infill	14 Consolidation Code	15 Order No.
160			

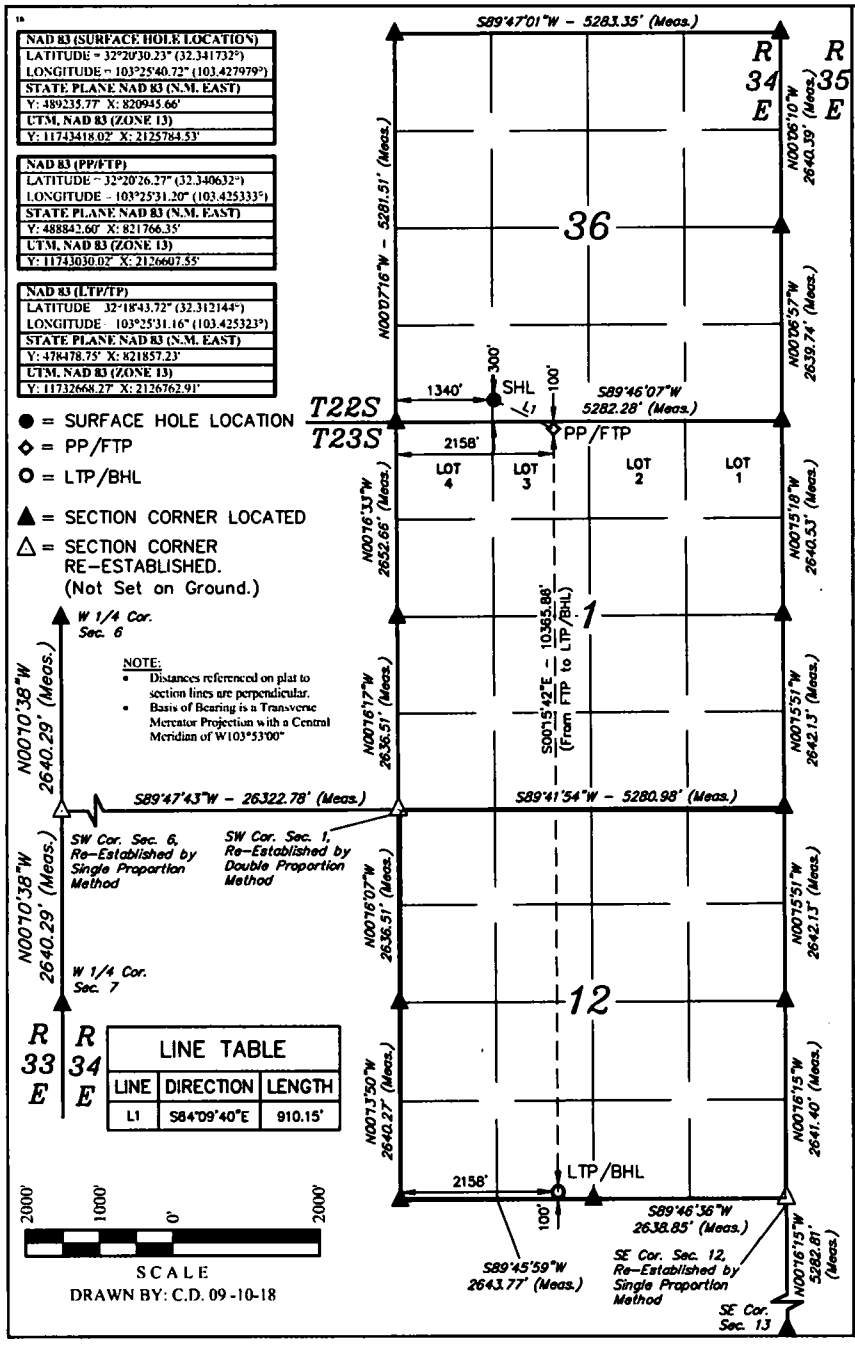
No allowable will be assigned to this completion until all interests have been consolidated or a non-standard unit has been approved by the division.

16

NAD 83 (SURFACE HOLE LOCATION)
LATITUDE = 32°20'30.23" (32.341732°)
LONGITUDE = 103°25'40.72" (103.427979°)
STATE PLANE NAD 83 (N.M. EAST)
Y: 489235.77' X: 820945.66'
UTM, NAD 83 (ZONE 13)
Y: 11743418.02' X: 2125784.53'

NAD 83 (PP/FTP)
LATITUDE = 32°20'26.27" (32.340632°)
LONGITUDE = 103°25'31.20" (103.425333°)
STATE PLANE NAD 83 (N.M. EAST)
Y: 488842.60' X: 821766.35'
UTM, NAD 83 (ZONE 13)
Y: 11743030.02' X: 2126607.55'

NAD 83 (LTP/TP)
LATITUDE 32°18'43.72" (32.312144°)
LONGITUDE 103°25'31.16" (103.425323°)
STATE PLANE NAD 83 (N.M. EAST)
Y: 478478.75' X: 821857.23'
UTM, NAD 83 (ZONE 13)
Y: 11732668.27' X: 2126762.91'



LINE TABLE		
LINE	DIRECTION	LENGTH
L1	S84°09'40"E	910.15'

17 OPERATOR CERTIFICATION

I hereby certify that the information contained herein is true and complete to the best of my knowledge and belief, and that this organization either owns a working interest or unleased mineral interest in the land including the proposed bottom hole location or has a right to drill this well at this location pursuant to a contract with an owner of such a mineral or working interest, or to a voluntary pooling agreement or a compulsory pooling order heretofore entered by the division.

Signature 11/28/18 Date

Kanicia Castillo
Printed Name

kanicia.castillo@cdevinc.com
E-mail Address

18 SURVEYOR CERTIFICATION

I hereby certify that the well location shown on this plat was plotted from field notes of actual surveys made by me or under my supervision, and that the same is true and correct to the best of my belief.

August 16, 2018
Date of Survey

Signature and Seal of Professional Surveyor:

PAUL BUCHELE NEW MEXICO 23782 09-23-18 PROFESSIONAL SURVEYOR

Certificate Number:

APD ID: 10400036839 **Submission Date:** 12/06/2018

Operator Name: CENTENNIAL RESOURCE PRODUCTION LLC

Well Name: PAC-MAN 36 FEDERAL COM **Well Number:** 601H

Well Type: OIL WELL **Well Work Type:** Drill

[redacted]

Show Final Text

Section 1 - Geologic Formations

Formation ID	Formation Name	Elevation	True Vertical Depth	Measured Depth	Lithologies	Mineral Resources	Producing Formation
1	RUSTLER	3379	1843	1843	SANDSTONE	NONE	N
2	CAPITAN REEF	-6424	4435	4435	OTHER : CARBONATE	USEABLE WATER	N
3	BELL CANYON	-7364	5375	5375	SANDSTONE	NATURAL GAS,OIL	N
4	CHERRY CANYON	-7951	5962	5962	SANDSTONE	NATURAL GAS,OIL	N
5	BRUSHY CANYON	-9170	7181	7181	SANDSTONE	NATURAL GAS,OIL	N
6	BONE SPRING LIME	-10564	8575	8575	OTHER : CARBONATE	NATURAL GAS,OIL	N
7	AVALON SAND	-10715	8726	8726	SHALE	NATURAL GAS,CO2,OIL	N
8	FIRST BONE SPRING SAND	-11696	9707	9707	SANDSTONE	NATURAL GAS,OIL	N
9	BONE SPRING 2ND	-11897	9908	9908	SHALE,OTHER : CARBONATE	NATURAL GAS,OIL	N
10	BONE SPRING 3RD	-13114	11125	11125	SANDSTONE	NATURAL GAS,OIL	Y

Section 2 - Blowout Prevention

Pressure Rating (PSI): 5M **Rating Depth:** 11430

Equipment: The BOP and related equipment will meet or exceed the requirements of a 5M-psi system as set forth in On Shore Order No. 2. See attached BOP Schematic. A. Casinghead: 13 5/8" – 5,000 psi SOW x 13" – 5,000 psi WP Intermediate Spool: 13" – 5,000 psi WP x 11" – 5,000 psi WP Tubinghead: 11" – 5,000 psi WP x 7 1/16" – 15,000 psi WP B. Minimum Specified Pressure Control Equipment • Annular preventer • One Pipe ram, One blind ram • Drilling spool, or blowout preventer with 2 side outlets. Choke side will be a 3-inch minimum diameter, kill line shall be at least 2-inch diameter • 3 inch diameter choke line • 2 – 3 inch choke line valves • 2 inch kill line • 2 chokes with 1 remotely controlled from rig floor (see Figure 2) • 2 – 2 inch kill line valves and a check valve • Upper kelly cock valve with handle available • When the expected pressures approach working pressure of the system, 1 remote kill line tested to stack pressure (which shall run to the outer edge of the substructure and be unobstructed) • Lower kelly cock valve with handle available • Safety valve(s) and subs to fit all drill string connections in use • Inside BOP or float sub available • Pressure gauge on choke manifold • All BOPE connections subjected to well pressure shall be flanged, welded, or clamped • Fill-up line above the uppermost preventer. C. Auxiliary Equipment • Audio and visual mud monitoring equipment shall be placed to detect volume changes indicating loss or gain of circulating fluid volume. (OOS 1, III.C.2) • Gas Buster will be used below intermediate casing setting

depth. • Upper and lower kelly cocks with handles, safety valve and subs to fit all drill string connections and a pressure gauge installed on choke manifold.
Requesting Variance? YES

[redacted]

Testing Procedure: The BOP test shall be performed before drilling out of the surface casing shoe and will occur at a minimum: a. when initially installed b. whenever any seal subject to test pressure is broken c. following related repairs d. at 30 day intervals e. checked daily as to mechanical operating conditions. The ram type preventer(s) will be tested using a test plug to 250 psi (low) and 5,000 psi (high) (casinghead WP) with a test plug upon its installation onto the 13" surface casing. If a test plug is not used, the ram type preventer(s) shall be tested to 70% of the minimum internal yield pressure of the casing. The annular type preventer(s) shall be tested to 50% of its working pressure. Pressure will be maintained for at least 10 minutes or until provisions of the test are met, whichever is longer. • A Sundry Notice (Form 3160 5), along with a copy of the BOP test report, shall be submitted to the local BLM office within 5 working days following the test. • If the bleed line is connected into the buffer tank (header), all BOP equipment including the buffer tank and associated valves will be rated at the required BOP pressure. • The BLM office will be provided with a minimum of four (4) hours' notice of BOP testing to allow witnessing. The BOP Configuration, choke manifold layout, and accumulator system, will be in compliance with Onshore Order 2 for a 5,000 psi system. A remote accumulator will be used. Pressures, capacities, and specific placement and use of the manual and/or hydraulic controls, accumulator controls, bleed lines, etc., will be identified at the time of the BLM witnessed BOP test. Any remote controls will be capable of both opening and closing all preventers and shall be readily accessible

Choke Diagram Attachment:

Choke_Diagram_5K_20181130104913.pdf

BOP Diagram Attachment:

HP650_BOP_Schematic_CoFlex_Choke_5K_2019_1_29_20190506133531.pdf

Section 3 - Casing

Casing ID	String Type	Hole Size	Csg Size	Condition	Standard	Tapered String	Top Set MD	Bottom Set MD	Top Set TVD	Bottom Set TVD	Top Set MSL	Bottom Set MSL	Calculated casing length MD	Grade	Weight	Joint Type	Collapse SF	Burst SF	Joint SF Type	Joint SF	Body SF Type	Body SF
1	CONDUCTOR	26	20.0	NEW	API	N	0	120	0	120	3379	3259	120	H-40	94	OTHER - WELD						
2	SURFACE	17.5	13.375	NEW	API	N	0	1800	0	1800	3379	1579	1800	J-55	54.5	OTHER - BTC	1.27	3.07	DRY	9.27	DRY	8.7
3	INTERMEDIATE	12.25	9.625	NEW	API	N	0	5300	0	5300	3379	-1921	5300	J-55	40	LT&C	1.32	1.43	DRY	2.45	DRY	2.97
4	PRODUCTION	8.75	5.5	NEW	API	N	0	10905	0	10857	3379	-7478	10905	P-110	20	OTHER - TMK UP DQX	2.07	2.36	DRY	2.95	DRY	2.95
5	PRODUCTION	8.5	5.5	NEW	API	N	10905	22066	10857	11430	-7478	-8051	11161	P-110	20	OTHER - TMK UP DQX	1.97	2.24	DRY	55.93	DRY	55.93

Operator Name: CENTENNIAL RESOURCE PRODUCTION LLC

Well Name: PAC-MAN 36 FEDERAL COM **Well Number:** 601H

Casing Attachments

Casing ID: 1 **String Type:** CONDUCTOR

Inspection Document:

Spec Document:

Tapered String Spec:

Casing Design Assumptions and Worksheet(s):

Casing ID: 2 **String Type:** SURFACE

Inspection Document:

Spec Document:

Tapered String Spec:

Casing Design Assumptions and Worksheet(s):

CASING_ASSUMPTIONS_WORKSHEET_20181130112247.pdf

Casing ID: 3 **String Type:** INTERMEDIATE

Inspection Document:

Spec Document:

Tapered String Spec:

Casing Design Assumptions and Worksheet(s):

CASING_ASSUMPTIONS_WORKSHEET_20181130112236.pdf

Operator Name: CENTENNIAL RESOURCE PRODUCTION LLC

Well Name: PAC-MAN 36 FEDERAL COM **Well Number:** 601H

Casing Attachments

Casing ID: 4 **String Type:** PRODUCTION

Inspection Document:

Spec Document:

Tapered String Spec:

Casing Design Assumptions and Worksheet(s):

CASING_ASSUMPTIONS_WORKSHEET_20181130112225.pdf

Technical_Data_Sheet_TMK_UP_DQX_5.5_x_20_P110_CY_20190506133731.pdf

Casing ID: 5 **String Type:** PRODUCTION

Inspection Document:

Spec Document:

Tapered String Spec:

Casing Design Assumptions and Worksheet(s):

CASING_ASSUMPTIONS_WORKSHEET_20181130112215.pdf

Technical_Data_Sheet_TMK_UP_DQX_5.5_x_20_P110_CY_20190506133742.pdf

Section 4 - Cement

String Type	Lead/Tail	Stage Tool Depth	Top MD	Bottom MD	Quantity(sx)	Yield	Density	Cu Ft	Excess%	Cement type	Additives
PRODUCTION	Lead					0					
CONDUCTOR	Lead					1.49					

Operator Name: CENTENNIAL RESOURCE PRODUCTION LLC

Well Name: PAC-MAN 36 FEDERAL COM **Well Number:** 601H

String Type	Lead/Tail	Stage Tool Depth	Top MD	Bottom MD	Quantity(sx)	Yield	Density	Cu Ft	Excess%	Cement type	Additives
SURFACE	Lead					1.74					
SURFACE	Tail										
INTERMEDIATE	Lead					3.44					
INTERMEDIATE	Tail										
PRODUCTION	Lead					3.41					
PRODUCTION	Tail										

Section 5 - Circulating Medium

Mud System Type: Closed

Will an air or gas system be Used? NO

Description of the equipment for the circulating system in accordance with Onshore Order #2:

Diagram of the equipment for the circulating system in accordance with Onshore Order #2:

Describe what will be on location to control well or mitigate other conditions: Sufficient quantities of mud materials will be on the well site at all times for the purpose of assuring well control and maintaining wellbore integrity. Surface interval will employ fresh water mud. The intermediate hole will utilize a diesel emulsified brine fluid to inhibit salt washout and prevent severe fluid losses. The production hole will employ oil base fluid to inhibit formation reactivity and of the appropriate density to maintain well control.

Describe the mud monitoring system utilized: Centrifuge separation system. Open tank monitoring with EDR will be used for drilling fluids and return volumes. Open tank monitoring will be used for cement and cuttings return volumes. Mud properties will be monitored at least every 24 hours using industry accepted mud check practices.

Circulating Medium Table

Operator Name: CENTENNIAL RESOURCE PRODUCTION LLC

Well Name: PAC-MAN 36 FEDERAL COM **Well Number:** 601H

Top Depth	Bottom Depth	Mud Type	Min Weight (lbs/gal)	Max Weight (lbs/gal)	Density (lbs/cu ft)	Gel Strength (lbs/100 sqft)	PH	Viscosity (CP)	Salinity (ppm)	Filtration (cc)	Additional Characteristics
0	22066	OTHER : Brine/OBM	8.8	9.5							
0	1800	OTHER : Fresh Water	8.6	9.5							
1800	5300	OTHER : Brine	9.8	10							

Section 6 - Test, Logging, Coring

List of production tests including testing procedures, equipment and safety measures:

Will utilize MWD/LWD (Gamma ray logging) from intermediate hole to TD of the well.

List of open and cased hole logs run in the well:

GR

Coring operation description for the well:

n/a

Section 7 - Pressure

Anticipated Bottom Hole Pressure: 5363 **Anticipated Surface Pressure:** 2848.4

Anticipated Bottom Hole Temperature(F): 170

Anticipated abnormal pressures, temperatures, or potential geologic hazards? NO

Describe:

Contingency Plans geoharzards description:

Contingency Plans geohazards attachment:

Hydrogen Sulfide drilling operations plan required? YES

Hydrogen sulfide drilling operations plan:

Pac_Man_Fed_601H_602H_603H_H2S_Plan_20181130114254.docx

Operator Name: CENTENNIAL RESOURCE PRODUCTION LLC

Well Name: PAC-MAN 36 FEDERAL COM **Well Number:** 601H

Section 8 - Other Information

Proposed horizontal/directional/multi-lateral plan submission:

PAC_MAN_36_FED_COM_601H_PLAN_20181130114550.pdf

Other proposed operations facets description:

o 13-3/8" Surface Casing - CRD intends to preset 13-3/8" casing to a depth approved in the APD. Surface Holes will be batch set by a Spudder rig. Appropriate notifications will be made prior to spudding the well, running and cementing casing and prior to skidding to the rig to the next well on pad.

o Intermediate and Production Casing – For all subsequent Intermediate and Production Casing Strings, the well will be drilled below 13-3/8" to it's intended final TD. Batch drilling will not be executed for casing strings below the 13-3/8". Appropriate notifications will be made prior Testing BOPE, and prior to running/cementing all casing strings.

Gas Capture Plan is attached.
OCD is considering this a preapproved DHC. We are staying in the same field just using two state pools. Please see C-102's attached.

Other proposed operations facets attachment:

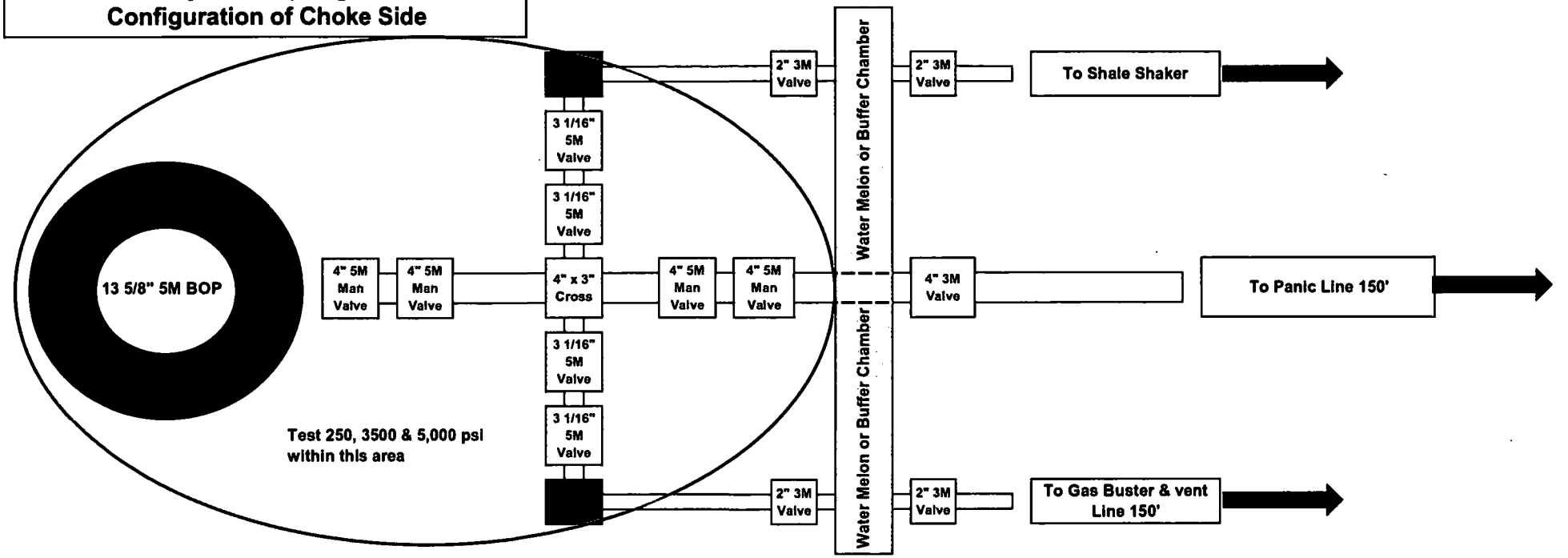
Pac_Man_Fed_601H_Gas_Capture_Plan_20181205142617.pdf

CDEV_Multi_Bowl_Procedure__PacMan_36_Fed_Com_601H_20190910154453.pdf

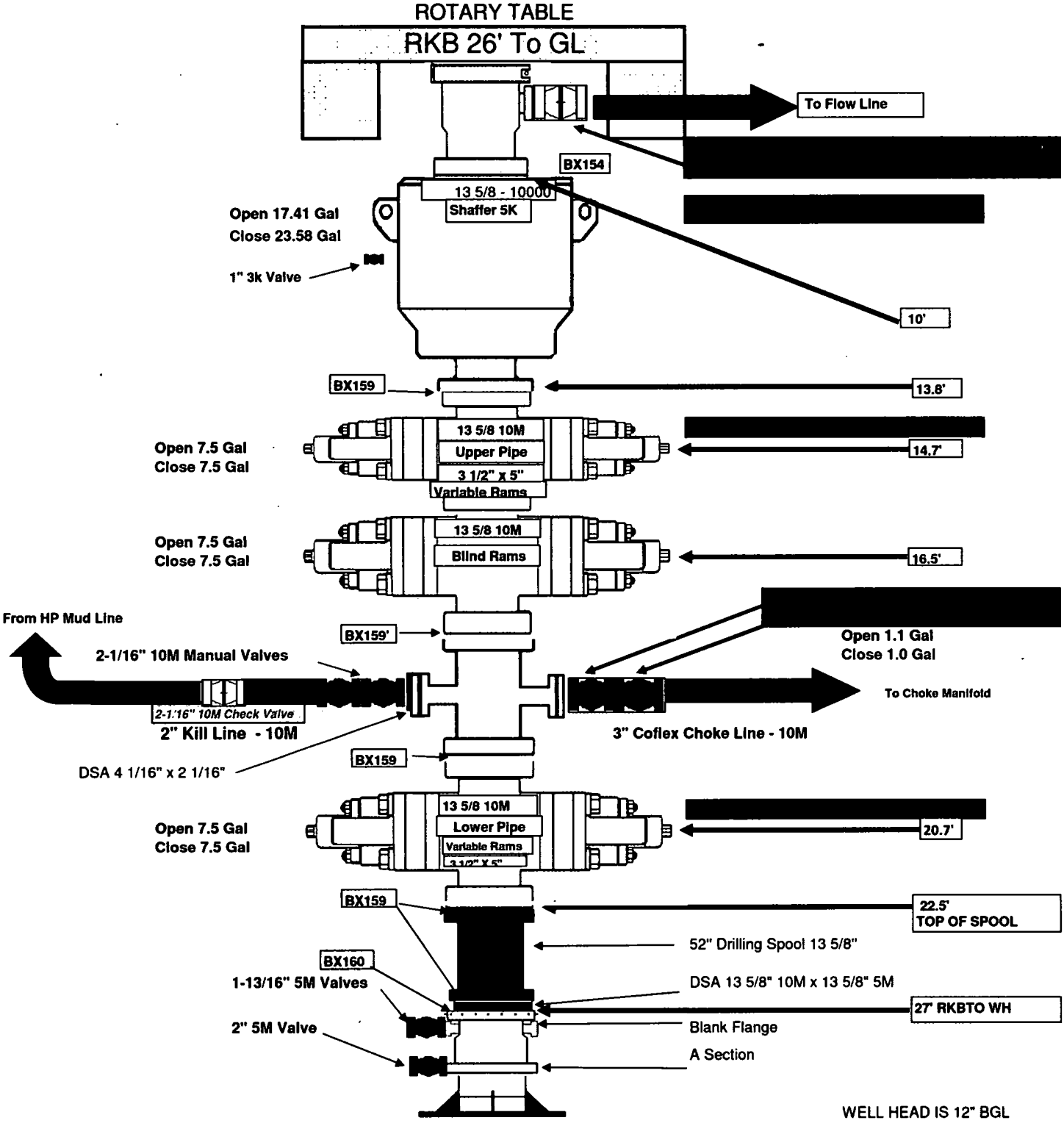
Other Variance attachment:

Flex_Hose_Specs_20181130114616.pdf

Centennial - Any Bone Spring Well: Minimum Configuration of Choke Side



H&P 650


ROTARY TABLE
RKB 26' To GL
To Flow Line
BX154
13 5/8 - 10000
Shaffer 5K
Open 17.41 Gal
Close 23.58 Gal
1" 3k Valve
10'
BX159
13.8'
13 5/8 10M
Upper Pipe
3 1/2" x 5"
Variable Rams
Open 7.5 Gal
Close 7.5 Gal
14.7'
13 5/8 10M
Blind Rams
Open 7.5 Gal
Close 7.5 Gal
16.5'
From HP Mud Line
BX159'
2-1/16" 10M Manual Valves
Open 1.1 Gal
Close 1.0 Gal
To Choke Manifold
2-1/16" 10M Check Valve
2" Kill Line - 10M
3" Coflex Choke Line - 10M
DSA 4 1/16" x 2 1/16"
BX159
13 5/8 10M
Lower Pipe
Variable Rams
3 1/2" X 5"
Open 7.5 Gal
Close 7.5 Gal
20.7'
BX159
22.5'
TOP OF SPOOL
52" Drilling Spool 13 5/8"
BX160
1-13/16" 5M Valves
DSA 13 5/8" 10M x 13 5/8" 5M
27' RKBTO WH
2" 5M Valve
Blank Flange
A Section
WELL HEAD IS 12" BGL

CASING ASSUMPTIONS WORKSHEET:

Centralizer Program:

Surface: - 3 welded bow spring centralizers, one on each of the bottom 3 joints, plus one on the shoe joint (4 minimum)
- No Cement baskets will be run

Production: - 1 welded bow spring centralizer on a stop ring 6' above float shoe
- 1 centralizer every other joint to the top of the tail cement
- 1 centralizer every 4 joints to 500' below the top of the lead cement
- The actual number and placement of centralizers will be determined from hole deviation and potential production zones. Centralizers will be run for maximum practical standoff and through all potential productive zones.

- All casing strings below the conductor shall be tested, prior to drilling out the casing shoe, to 0.22 psi/ft of casing string length or 1500 psi, whichever is greater, but not to exceed 70% of the internal yield pressure of the casing. If pressure declines more than 10 percent in 30 minutes, corrective action will be taken.

No freshly hard banded pipe will be rotated in the surface casing

- CENTENNIAL RESOURCE DEVELOPOMENT will not employ an air-drill rig for the surface casing. The casing shoe will be tested by drilling 5'-10' out from under the shoe and pressure testing to the maximum expected mud weight equivalent as shown in the mud program listed in the drilling plan.

CASING ASSUMPTIONS WORKSHEET:

Centralizer Program:

Surface: - 3 welded bow spring centralizers, one on each of the bottom 3 joints, plus one on the shoe joint (4 minimum)
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CASING ASSUMPTIONS WORKSHEET:

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No freshly hard banded pipe will be rotated in the surface casing

- CENTENNIAL RESOURCE DEVELOPOMENT will not employ an air-drill rig for the surface casing. The casing shoe will be tested by drilling 5'-10' out from under the shoe and pressure testing to the maximum expected mud weight equivalent as shown in the mud program listed in the drilling plan.

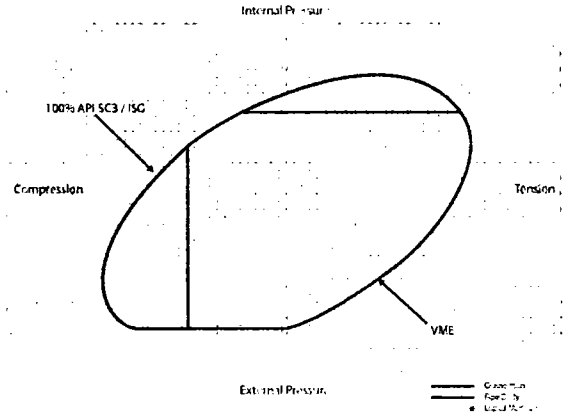
TECHNICAL DATA SHEET TMK UP DQX 5.5 X 20 P110 CY

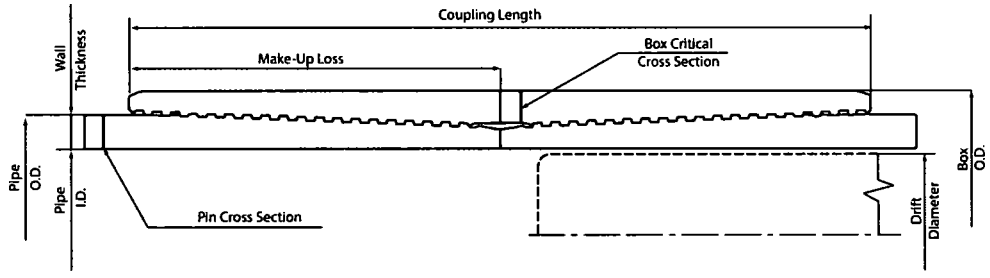
TUBULAR PARAMETERS	
Nominal OD, (inch)	5.500
Wall Thickness, (inch)	0.361
Pipe Grade	P110 CY
Coupling	Regular
Coupling Grade	P110 CY
Drift	Standard

CONNECTION PARAMETERS	
Connection OD (inch)	6.05
Connection ID, (inch)	4.778
Make-Up Loss, (inch)	4.122
Connection Critical Area, (sq inch)	5.828
Yield Strength in Tension, (klbs)	641
Yeld Strength in Compression, (klbs)	641
Tension Efficiency	100%
Compression Efficiency	100%
Min. Internal Yield Pressure, (psi)	12 640
Collapse Pressure, (psi)	11 110
Uniaxial Bending (deg/100ft)	92.0

MAKE-UP TORQUES	
Yield Torque, (ft-lb)	20 600
Minimum Make-Up Torque, (ft-lb)	11 600
Optimum Make-Up Torque, (ft-lb)	12 900
Maximum Make-Up Torque, (ft-lb)	14 100
Operating Torque, (ft-lb)	17 500

PIPE BODY PROPERTIES	
PE Weight, (lbs/ft)	19.81
Nominal Weight, (lbs/ft)	20.00
Nominal ID, (inch)	4.778
Drift Diameter, (inch)	4.653
Nominal Pipe Body Area, (sq inch)	5.828
Yield Strength in Tension, (klbs)	641
Min. Internal Yield Pressure, (psi)	12 640
Collapse Pressure, (psi)	11 110





NOTE. The content of this Technical Data Sheet is for general information only and does not guarantee performance or imply fitness for a particular purpose, which only a competent drilling professional can determine considering the specific installation and operation parameters. This information supersede all prior versions for this connection. Information that is printed or downloaded is no longer controlled by TMK and might not be the latest information. Anyone using the information herein does so at their own risk. To verify that you have the latest technical information, please contact PAO "TMK" Technical Sales in Russia (Tel. +7 (495) 775-76-00 Email: techsales@tmk-group.com) and TMK IPSCO in North America (Tel. +1 (281)949-1044, Email: techsales@tmk-ipsco.com)

Print date: 12/04/2018 19:42

CASING ASSUMPTIONS WORKSHEET:

Centralizer Program:

Surface: - 3 welded bow spring centralizers, one on each of the bottom 3 joints, plus one on the shoe joint (4 minimum)
- No Cement baskets will be run

Production: - 1 welded bow spring centralizer on a stop ring 6' above float shoe
- 1 centralizer every other joint to the top of the tail cement
- 1 centralizer every 4 joints to 500' below the top of the lead cement
- The actual number and placement of centralizers will be determined from hole deviation and potential production zones. Centralizers will be run for maximum practical standoff and through all potential productive zones.

- All casing strings below the conductor shall be tested, prior to drilling out the casing shoe, to 0.22 psi/ft of casing string length or 1500 psi, whichever is greater, but not to exceed 70% of the internal yield pressure of the casing. If pressure declines more than 10 percent in 30 minutes, corrective action will be taken.

No freshly hard banded pipe will be rotated in the surface casing

- CENTENNIAL RESOURCE DEVELOPOMENT will not employ an air-drill rig for the surface casing. The casing shoe will be tested by drilling 5'-10' out from under the shoe and pressure testing to the maximum expected mud weight equivalent as shown in the mud program listed in the drilling plan.

CASING ASSUMPTIONS WORKSHEET:

Centralizer Program:

Surface: - 3 welded bow spring centralizers, one on each of the bottom 3 joints, plus one on the shoe joint (4 minimum)
- No Cement baskets will be run

Production: - 1 welded bow spring centralizer on a stop ring 6' above float shoe
- 1 centralizer every other joint to the top of the tail cement
- 1 centralizer every 4 joints to 500' below the top of the lead cement
- The actual number and placement of centralizers will be determined from hole deviation and potential production zones. Centralizers will be run for maximum practical standoff and through all potential productive zones.

- All casing strings below the conductor shall be tested, prior to drilling out the casing shoe, to 0.22 psi/ft of casing string length or 1500 psi, whichever is greater, but not to exceed 70% of the internal yield pressure of the casing. If pressure declines more than 10 percent in 30 minutes, corrective action will be taken.

No freshly hard banded pipe will be rotated in the surface casing

- CENTENNIAL RESOURCE DEVELOPOMENT will not employ an air-drill rig for the surface casing. The casing shoe will be tested by drilling 5'-10' out from under the shoe and pressure testing to the maximum expected mud weight equivalent as shown in the mud program listed in the drilling plan.

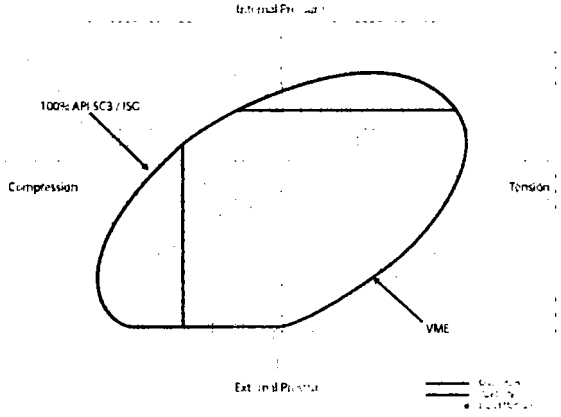
TECHNICAL DATA SHEET TMK UP DQX 5.5 X 20 P110 CY

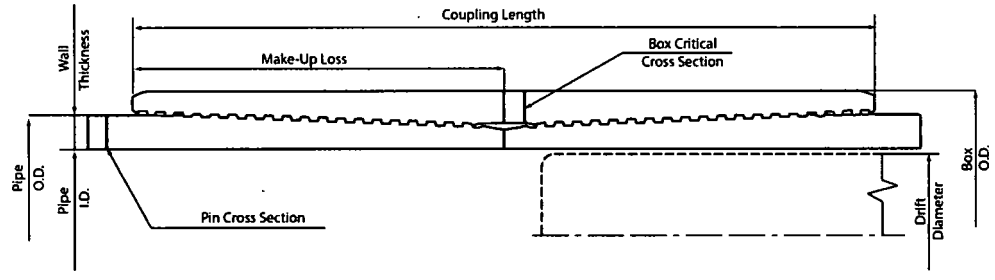
TUBULAR PARAMETERS	
Nominal OD, (inch)	5.500
Wall Thickness, (inch)	0.361
Pipe Grade	P110 CY
Coupling	Regular
Coupling Grade	P110 CY
Drift	Standard

CONNECTION PARAMETERS	
Connection OD (inch)	6.05
Connection ID, (inch)	4.778
Make-Up Loss, (inch)	4.122
Connection Critical Area, (sq inch)	5.828
Yield Strength in Tension, (klbs)	641
Yeld Strength in Compression, (klbs)	641
Tension Efficiency	100%
Compression Efficiency	100%
Min. Internal Yield Pressure, (psi)	12 640
Collapse Pressure, (psi)	11 110
Uniaxial Bending (deg/100ft)	92.0

MAKE-UP TORQUES	
Yield Torque, (ft-lb)	20 600
Minimum Make-Up Torque, (ft-lb)	11 600
Optimum Make-Up Torque, (ft-lb)	12 900
Maximum Make-Up Torque, (ft-lb)	14 100
Operating Torque, (ft-lb)	17 500

PIPE BODY PROPERTIES	
PE Weight, (lbs/ft)	19.81
Nominal Weight, (lbs/ft)	20.00
Nominal ID, (inch)	4.778
Drift Diameter, (inch)	4.653
Nominal Pipe Body Area, (sq inch)	5.828
Yield Strength in Tension, (klbs)	641
Min. Internal Yield Pressure, (psi)	12 640
Collapse Pressure, (psi)	11 110





NOTE. The content of this Technical Data Sheet is for general information only and does not guarantee performance or imply fitness for a particular purpose, which only a competent drilling professional can determine considering the specific installation and operation parameters. This information supersede all prior versions for this connection. Information that is printed or downloaded is no longer controlled by TMK and might not be the latest information. Anyone using the information herein does so at their own risk. To verify that you have the latest technical information, please contact PAO "TMK" Technical Sales in Russia (Tel: +7 (495) 775-76-00 Email: techsales@tmk-group.com) and TMK IPSCO in North America (Tel: +1 (281)949-1044, Email: techsales@tmk-ipsco.com)

Print date: 12/04/2018 19:42

CENTENNIAL
RESOURCE DEVELOPMENT, INC

HYDROGEN SULFIDE CONTINGENCY PLAN

[redacted]

Initial Date: 11/19/18

Revision Date:

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Page 12: Emergency Contact List

INTRODUCTION

This plan specifies precautionary measures, safety equipment, emergency procedures, responsibilities, duties, and the compliance status pertaining to the production operations of Hydrogen Sulfide producing wells on:

Centennial Resource Development, Inc.

This plan will be in full effect prior to and continuing with all drilling operations for all wells producing potential Hydrogen Sulfide on the

[redacted]

This plan was developed in response to the potential hazards involved when producing formations that may contain Hydrogen Sulfide (H_2S) It has been written in compliance with current **New Mexico Oil Conservation Division Rule 118 and Bureau of Land Management 43 CFR 3160 Onshore Order No. 6.**

All personnel shall receive proper H2S training in accordance with Onshore Order III.C.3.a

This plan shall require the full cooperation and efforts of all individuals participating in the production of potential H_2S wells.

Each individual is required to know their assigned responsibilities and duties in regard to normal production operations and emergency procedures.

Each person should thoroughly understand and be able to use all safety related equipment on the production facility.

Each person should become familiar with the location of all safety equipment and become involved in ensuring that all equipment is properly stored, easily accessible, and routinely maintained.

An ongoing training program will remain in effect with regular training, equipment inspections, and annual certifications for all personnel.

Centennial Resource Development, Inc. shall make every reasonable effort to provide all possible safeguards to protect all personnel, both on this location and in the immediate vicinity, from the harmful effects of H_2S exposure, if a release to the atmosphere should occur.

DIRECTIONS TO LOCATION

BEGINNING AT THE INTERSECTION OF HIGHWAY 18 & HIGHWAY 128 FROM JAL, NEW MEXICO PROCEED IN A WESTERLY, THEN NORTHWESTERLY, THEN
WESTERLY DIRECTION ALONG HIGHWAY 128 APPROXIMATELY 20.6 MILES TO THE JUNCTION OF THIS ROAD AND DELAWARE BASIN ROAD TO THE NORTH; TURN RIGHT AND PROCEED IN A NORTHERLY, THEN EASTERLY DIRECTION APPROXIMATELY 12.2 MILES TO THE JUNCTION OF THIS ROAD AND COUNTY ROAD 32 TO THE NORTH; TURN LEFT AND PROCEED IN A NORTHERLY DIRECTION APPROXIMATELY 1.0 MILES TO THE JUNCTION OF THIS ROAD AND AN EXISTING ROAD TO THE EAST; TURN RIGHT AND PROCEED IN AN EASTERLY, THEN NORTHEASTERLY DIRECTION APPROXIMATELY 0.3 MILES TO THE EXISTING PRYOR STATE 1H & 4H WELL PAD; PROCEED IN A SOUTHEASTERLY DIRECTION TO THE BEGINNING OF THE PROPOSED MORTAL KOMBAT 36 STATE COM #502H ACCESS ROAD TO THE SOUTHEAST; FOLLOW ROAD FLAGS IN A SOUTHEASTERLY DIRECTION APPROXIMATELY 196' TO THE BEGINNING OF THE PROPOSED ACCESS ROAD
TO THE EAST; FOLLOW ROAD FLAGS IN A EASTERLY, THEN NORTHERLY DIRECTION APPROXIMATELY 898' TO THE PROPOSED LOCATION.
TOTAL DISTANCE FROM JAL, NEW MEXICO TO THE PROPOSED WELL LOCATION IS APPROXIMATELY 34.3 MILES.

SAFE BRIEFING AREAS

Two areas will be designated as "SAFE BRIEFING AREAS".

The Primary Safe Briefing Area

If the Primary Safe Briefing Area cannot be used due to wind conditions; the designated secondary safe briefing area will be used.

These two areas are so designated for accessibility reasons related to self-contained safe breathing air device locations, evacuation muster point utility, and for ease of overall communication, organizational support, as well as the all-important prevailing wind directions. Drawings of the facility denoting these locations are included on Page 15.

If H_2S is detected in concentrations equal to or in excess of 15 PPM, all personnel not assigned emergency duties are to assemble in the appropriate "SAFE BRIEFING AREA" for instructions.

Wind Direction Indicators: A windsock, shall be positioned, allowing the wind direction to be observed from anywhere on the charted facility location.

Warning-DANGER SIGNS for Approaching Traffic: All signs shall also be illuminated under conditions of poor visibility.

DANGER
POISONOUS GAS
HYDROGEN SULFIDE
DO NOT APPROACH IF AMBER LIGHTS ARE FLASHING

An amber strobe light system will be activated for H_2S concentrations of 10 PPM or greater and an audible alarm will sound when H_2S exceeds 15 ppm, and. This condition will exist until the all clear is given.

DRILL SITE LOCATION:

1. The drilling rig should be situated on location such that the prevailing winds blow across the rig toward the reserve pit or at right angles to a line from the rig to the reserve pit.

2. The entrance to the location should be designated so that it can be barricaded if Hydrogen Sulfide emergency conditions arise. An auxiliary exit (or entrance) should be available in case of a catastrophe; a shift in wind direction would not preclude escape from the location. Appropriate warning signs and flags should be placed at all location entrances.

3. Once H2S safety procedures are established on location, no beards or facial hair, which will interfere with face seal or mask, will be allowed on location.

4. A minimum of two BRIEFING AREAS will be established, no less than 250 feet from the wellhead and in such location that at least one area will be up-wind from the well at all times. Upon recognition of an emergency situation, all personnel should assemble at the designated briefing areas for instructions.

5. A safety equipment trailer will be station at one of the briefing areas.

6. Windsocks will be installed and wind streamers (6 to 8 feet above ground level) placed at the location entrance. Windsocks shall be illuminated for nighttime operations. Personnel should develop wind direction consciousness.

7. The mud-logging trailer will be located so as to minimize the danger from the gas that breaks out of the drilling fluid.

8. Shale shaker mud tanks will be located so as to minimize the danger from gas that breaks out of the drilling fluid.

9. Electric power plant(s) will be located as far from the well bore as practical so that it may be used under conditions where it otherwise would have to be shut down.

10. When approaching depth where Hydrogen Sulfide may be encountered, appropriate warning signs will be posted on all access roads to the location and at the foot of all stairways to the derrick floor.

11. Appropriate smoking areas will be designated, and smoking will be prohibited elsewhere.

The table below lists various poisonous gases and the concentrations at which they become dangerous.

TOXICITY OF VARIOUS GASES

TOXICITY OF GASES (Taken from API RP-49 September 1974 – Re-issued August 1978)					
Common Name	**Chemical Formula**	**Gravity (Air = 1)**	**Threshold 1 Limit**	**Hazardous 2 Limit**	**Lethal 3 Limit**
Hydrogen Sulfide	H_2S	1.18	10 ppm	250 ppm/1hr	600 ppm
Sulfur Dioxide	SO_2	2.21	20 ppm	---	1000 ppm
Carbon Monoxide	CO	0.97	50 ppm	400 ppm/1hr	1000 ppm
Carbon Dioxide	CO_2	1.52	5000 ppm	5%	10%
Methane	CH_4	0.55	90000 ppm	Combustible Above 5% in Air	

1. Threshold concentration at which it is believed that all workers may repeatedly be exposed day after day, without adverse effect	2. Hazardous concentration that may cause death	3. Lethal concentration that will cause death with short-term exposure

Properties of Gases

The produced gas will probably be a mixture of Carbon Dioxide, Hydrogen Sulfide, and Methane.

Carbon Dioxide

Carbon Dioxide (CO_2) is usually considered inert and is commonly used to extinguish fires.

It is heavier than air (1.52 times) and it will concentrate in low areas of still air.

Humans cannot breathe air containing more than 10% CO_2 without losing consciousness. Air containing 5% CO_2 will cause disorientation in a few minutes.

Continued exposures to CO_2 after being affected will cause convulsions, coma, and respiratory failure.

The threshold limit of CO_2 is 5000 ppm.

Short-term exposure to 50,000 PPM (5%) is reasonable. This gas is colorless and odorless and can be tolerated in relatively high concentrations.

Hydrogen Sulfide

Hydrogen Sulfide (H_2S) itself is a colorless, transparent gas and is flammable. It is heavier than air and, hence, may accumulate in low places.

Although the slightest presence of H_2S in the air is normally detectable by its characteristic "rotten egg" odor, it is dangerous to rely on the odor as a means of detecting excessive concentrations because the sense of smell is rapidly lost, allowing lethal concentrations to be accumulated without warning. The following table indicates the poisonous nature of Hydrogen Sulfide.

HYDROGEN SULFIDE TOXICITY			
Concentration			Effects
$\%H_2S$	PPM	GR/100 SCF 1	
0.001	10	0.65	Safe for 8 hours without respirator. Obvious and unpleasant odor.
0.002	20	1.30	Burning in eyes and irritation of respiratory tract after on hour.
0.01	100	6.48	Kills smell in 3 to 15 minutes; may sting eyes and throat.
0.02	200	12.96	Kills smell shortly; stings eyes and throat.
0.05	500	32.96	Dizziness; breathing ceases in a few minutes; need prompt artificial respiration.
0.07	700	45.92	Unconscious quickly; death will result if not rescued promptly
0.10	1000	64.80	DEATH!
Note: 1 grain per 100 cubic feet			

Sulfur Dioxide

Sulfur Dioxide is a colorless, transparent gas and is non-flammable.

Sulfur Dioxide (SO_2) is produced during the burning of H_2S. Although SO_2 is heavier than air, it will be picked up by a breeze and carried downwind at elevated temperatures. Since Sulfur Dioxide is extremely irritating to the eyes and mucous membranes of the upper respiratory tract, it has exceptionally good warning powers in this respect. The following table indicates the toxic nature of the gas.

SULFUR DIOXIDE TOXICITY		
Concentration		Effects
$\%SO_2$	PPM	
0.0005	3 to 5	Pungent odor-normally a person can detect SO_2 in this range.
0.0012	12	Throat irritation, coughing, and constriction of the chest tearing and smarting of eyes.
0.15	150	So irritating that it can only be endured for a few minutes.
0.05	500	Causes a sense of suffocation, even with first breath.

H_2S REQUIRED EQUIPMENT LIST

RESPIRATORY SAFETY SYSTEMS

- Working cascade system available on rig floor and pit system & 750' of air line hose
- Four (4) breathing air manifolds
- Four (4) 30-minute rescue packs
- Five (5) work/Escape units
- Five (5) escape units
- One (1) filler hose for the work/escape/rescue units

DETECTION AND ALARM SYSTEM

- **4 channel H2S monitor**
- **4 wireless H2S monitors**
- **H2S alarm system (Audible/Red strobe)**
- **Personal gas monitor for each person on location**
- **Gas sample tubes**

WELL CONTROL EQUIPMENT

- **Flare line with remote ignitor and backup flare gun, placed 150' from wellhead**
- **Choke manifold with remotely operated choke**
- **Mud gas separator**

VISUAL WARNING SYSTEMS

- **One color code condition sign will be placed at each entrance reflecting possible conditions at the site**
- **A colored condition flag will be on display, reflecting current condition at the site at the time**
- **At least 4 wind socks placed on location, visible at all angles and locations**

MUD PROGRAM

- **Mud will contain sufficient weight and additives to control and minimize H2S**

METALLURGY

- **All drill strings, casing, tubing, wellhead, BOP, spools, kill lines, choke manifold and lines, and valves shall be suitable for anticipated H2S volume and pressure**

COMMUNICATION

- **Cell phones, intercoms, and satellite phones will be available on location**

ADDITIONAL SAFETY RELATED ITEMS

- **Stretcher**
- **2 OSHA full body harness**

- **20# class ABC fire extinguisher**

DETERMINATION OF RADIUS OF EXPOSURE

Potentially hazardous volume means a volume of gas of such H2S concentration and flow rate that it may result in radius of exposure-calculated ambient concentrations of 100 ppm H2S at any occupied residence, school, church, park, school bus stop, place of business or other area where the public could reasonably be expected to frequent, or 500 ppm H2S at any Federal, State, County or municipal road or highway.

Currently there are no residence located within the ROE

Radius of exposure means the calculation resulting from using the Pasquill -Gifford derived equation, or by such other method(s) that may be approved by the authorized officer. Advanced Fire and Safety has provided the Pasquill-Gifford formula in excel format for simple calculations.

NEW MEXICO OIL & GAS CONSERVATION DIVISION 118

[redacted]

H2S Concentration- [redacted] PPM (Block 13)

Maximum Escape Volume- [redacted] MCF/Day (Block 13)

100 PPM Radius of Exposure (Block 15)- [redacted]
(Formula= 1.589 x (B5/1000000) x (B6 x 1000) x .6258

500 PPM Radius of Exposure (Block 16)- [redacted]
Formula= .4546 x (B5/1000000) x (B6 x 1000) x .6258

EMERGENCY CONTACT LIST

911 is available in the area			
NAME	POSITION	COMPANY	NUMBER
Centennial Contacts			
Jeremy Ray	Drilling Engineer	CDEV	303-263-7872
Ricky Mills/John Helm	Superintendent	CDEV	432-305-1068
Mike Ponder/Wayne Miller	Field Superintendent	CDEV	432-287-3003
Brett Thompson	Drilling Manager	CDEV	720-656-7027
Reggie Phillips	HSE Manager	CDEV	432-638-3380
H&P 650 Drilling Office	Drilling Supervisor	CDEV	432-538-3343
Local Emergency Response			
Fire Department			575-395-2511
Jal Community Hospital			505-395-2511
State Police			505-827-9000
Lea County Sheriff			575-396-3611
Safety Contractor			
Advanced Safety	Office	Advanced Safety	833-296-3913
Joe Gadway	Permian Supervisor	Advanced Safety	318-446-3716
Clint Hudson	Operations Manager	Advanced Safety	337-552-8330
Well Control Company			
Wild Well Control			866-404-9564
Contractors			
Tommy E Lee	Pump Trucks		432-813-7140
Paul Smith	Drilling Fluids	Momentum	307-258-6254
Compass Coordinators	Cement	Compass	432-561-5970

CENTENNIAL
RESOURCE DEVELOPMENT, INC

New Mexico

LEA
PAC-MAN
PAC-MAN 36 FED COM 601H

PAC-MAN 36 FED COM 601H

Plan: PWP0

Survey Report - Geographic

07 November, 2018

CENTENNIAL

LGC

Survey Report - Geographic

Company:	New Mexico	**Local Co-ordinate Reference:**	Well PAC-MAN 36 FED COM 601H
Project:	LEA	**TVD Reference:**	RKB=3378.8+25 @ 3403.8usft
Site:	PAC-MAN	**MD Reference:**	RKB=3378.8+25 @ 3403.8usft
Well:	PAC-MAN 36 FED COM 601H	**North Reference:**	True
Wellbore:	PAC-MAN 36 FED COM 601H	**Survey Calculation Method:**	Minimum Curvature
Design:	PWP0	**Database:**	Centennial EDM SQL Server

Project	LEA		
Map System:	Universal Transverse Mercator (US Survey Feet)	**System Datum:**	Mean Sea Level
Geo Datum:	North American Datum 1983		
Map Zone:	Zone 13N (108 W to 102 W)		

Site	PAC-MAN				
Site Position:		**Northing:**	0.00 usft	**Latitude:**	0° 0' 0.000 N
From:	Map	**Easting:**	0.00 usft	**Longitude:**	109° 29' 19.478 W
Position Uncertainty:	0.0 usft	**Slot Radius:**	13-3/16 "	**Grid Convergence:**	0.00 °

Well	PAC-MAN 36 FED COM 601H					
Well Position	**+N/-S**	0.0 usft	**Northing:**	11,743,417.67 usft	**Latitude:**	32° 20' 30.230 N
	+E/-W	0.0 usft	**Easting:**	2,125,784.90 usft	**Longitude:**	103° 25' 40.720 W
Position Uncertainty		0.0 usft	**Wellhead Elevation:**	usft	**Ground Level:**	3,378.8 usft

Wellbore	PAC-MAN 36 FED COM 601H				
Magnetics	**Model Name**	**Sample Date**	**Declination (°)**	**Dip Angle (°)**	**Field Strength (nT)**
	IGRF200510	12/31/2009	7.69	60.38	48,880.25529565

Design	PWP0				
Audit Notes:					
Version:		**Phase:**	PROTOTYPE	**Tie On Depth:**	0.0
Vertical Section:	**Depth From (TVD) (usft)**	**+N/-S (usft)**	**+E/-W (usft)**	**Direction (°)**	
	0.0	0.0	0.0	175.64	

Survey Tool Program **Date** 11/6/2018

From (usft)	To (usft)	Survey (Wellbore)	Tool Name	Description
0.0	22,066.0	PWP0 (PAC-MAN 36 FED COM 601H)	MWD+IFR1+MS	OWSG MWD + IFR1 + Multi-Station Correction

Planned Survey

Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Map Northing (usft)	Map Easting (usft)	Latitude	Longitude
0.0	0.00	0.00	0.0	0.0	0.0	11,743,417.67	2,125,784.90	32° 20' 30.230 N	103° 25' 40.720 W
100.0	0.00	0.00	100.0	0.0	0.0	11,743,417.67	2,125,784.90	32° 20' 30.230 N	103° 25' 40.720 W
200.0	0.00	0.00	200.0	0.0	0.0	11,743,417.67	2,125,784.90	32° 20' 30.230 N	103° 25' 40.720 W
300.0	0.00	0.00	300.0	0.0	0.0	11,743,417.67	2,125,784.90	32° 20' 30.230 N	103° 25' 40.720 W
400.0	0.00	0.00	400.0	0.0	0.0	11,743,417.67	2,125,784.90	32° 20' 30.230 N	103° 25' 40.720 W
500.0	0.00	0.00	500.0	0.0	0.0	11,743,417.67	2,125,784.90	32° 20' 30.230 N	103° 25' 40.720 W
600.0	0.00	0.00	600.0	0.0	0.0	11,743,417.67	2,125,784.90	32° 20' 30.230 N	103° 25' 40.720 W
700.0	0.00	0.00	700.0	0.0	0.0	11,743,417.67	2,125,784.90	32° 20' 30.230 N	103° 25' 40.720 W
800.0	0.00	0.00	800.0	0.0	0.0	11,743,417.67	2,125,784.90	32° 20' 30.230 N	103° 25' 40.720 W
900.0	0.00	0.00	900.0	0.0	0.0	11,743,417.67	2,125,784.90	32° 20' 30.230 N	103° 25' 40.720 W
1,000.0	0.00	0.00	1,000.0	0.0	0.0	11,743,417.67	2,125,784.90	32° 20' 30.230 N	103° 25' 40.720 W
1,100.0	0.00	0.00	1,100.0	0.0	0.0	11,743,417.67	2,125,784.90	32° 20' 30.230 N	103° 25' 40.720 W

Company:	New Mexico	**Local Co-ordinate Reference:**	Well PAC-MAN 36 FED COM 601H
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Design:	PWP0	**Database:**	Centennial EDM SQL Server

Planned Survey

Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Map Northing (usft)	Map Easting (usft)	Latitude	Longitude
1,200.0	0.00	0.00	1,200.0	0.0	0.0	11,743,417.67	2,125,784.90	32° 20' 30.230 N	103° 25' 40.720 W
1,300.0	0.00	0.00	1,300.0	0.0	0.0	11,743,417.67	2,125,784.90	32° 20' 30.230 N	103° 25' 40.720 W
1,400.0	0.00	0.00	1,400.0	0.0	0.0	11,743,417.67	2,125,784.90	32° 20' 30.230 N	103° 25' 40.720 W
1,500.0	0.00	0.00	1,500.0	0.0	0.0	11,743,417.67	2,125,784.90	32° 20' 30.230 N	103° 25' 40.720 W
1,600.0	0.00	0.00	1,600.0	0.0	0.0	11,743,417.67	2,125,784.90	32° 20' 30.230 N	103° 25' 40.720 W
1,700.0	0.00	0.00	1,700.0	0.0	0.0	11,743,417.67	2,125,784.90	32° 20' 30.230 N	103° 25' 40.720 W
1,800.0	0.00	0.00	1,800.0	0.0	0.0	11,743,417.67	2,125,784.90	32° 20' 30.230 N	103° 25' 40.720 W
1,900.0	0.00	0.00	1,900.0	0.0	0.0	11,743,417.67	2,125,784.90	32° 20' 30.230 N	103° 25' 40.720 W
2,000.0	0.00	0.00	2,000.0	0.0	0.0	11,743,417.67	2,125,784.90	32° 20' 30.230 N	103° 25' 40.720 W
2,100.0	0.00	0.00	2,100.0	0.0	0.0	11,743,417.67	2,125,784.90	32° 20' 30.230 N	103° 25' 40.720 W
2,200.0	0.00	0.00	2,200.0	0.0	0.0	11,743,417.67	2,125,784.90	32° 20' 30.230 N	103° 25' 40.720 W
2,300.0	0.00	0.00	2,300.0	0.0	0.0	11,743,417.67	2,125,784.90	32° 20' 30.230 N	103° 25' 40.720 W
2,400.0	0.00	0.00	2,400.0	0.0	0.0	11,743,417.67	2,125,784.90	32° 20' 30.230 N	103° 25' 40.720 W
2,500.0	0.00	0.00	2,500.0	0.0	0.0	11,743,417.67	2,125,784.90	32° 20' 30.230 N	103° 25' 40.720 W
2,600.0	0.00	0.00	2,600.0	0.0	0.0	11,743,417.67	2,125,784.90	32° 20' 30.230 N	103° 25' 40.720 W
2,700.0	0.00	0.00	2,700.0	0.0	0.0	11,743,417.67	2,125,784.90	32° 20' 30.230 N	103° 25' 40.720 W
2,800.0	0.00	0.00	2,800.0	0.0	0.0	11,743,417.67	2,125,784.90	32° 20' 30.230 N	103° 25' 40.720 W
2,900.0	0.00	0.00	2,900.0	0.0	0.0	11,743,417.67	2,125,784.90	32° 20' 30.230 N	103° 25' 40.720 W
3,000.0	0.00	0.00	3,000.0	0.0	0.0	11,743,417.67	2,125,784.90	32° 20' 30.230 N	103° 25' 40.720 W
3,100.0	1.00	85.00	3,100.0	0.1	0.9	11,743,417.76	2,125,785.77	32° 20' 30.231 N	103° 25' 40.710 W
3,200.0	2.00	85.00	3,200.0	0.3	3.5	11,743,418.03	2,125,788.37	32° 20' 30.233 N	103° 25' 40.679 W
3,300.0	3.00	85.00	3,299.9	0.7	7.8	11,743,418.47	2,125,792.71	32° 20' 30.237 N	103° 25' 40.629 W
3,400.0	4.00	85.00	3,399.7	1.2	13.9	11,743,419.09	2,125,798.78	32° 20' 30.242 N	103° 25' 40.558 W
3,500.0	5.00	85.00	3,499.4	1.9	21.7	11,743,419.89	2,125,806.59	32° 20' 30.249 N	103° 25' 40.467 W
3,600.0	6.00	85.00	3,598.9	2.7	31.3	11,743,420.87	2,125,816.12	32° 20' 30.257 N	103° 25' 40.356 W
3,700.0	7.00	85.00	3,698.3	3.7	42.5	11,743,422.02	2,125,827.39	32° 20' 30.267 N	103° 25' 40.224 W
3,800.0	7.00	85.00	3,797.5	4.8	54.7	11,743,423.26	2,125,839.51	32° 20' 30.277 N	103° 25' 40.083 W
3,900.0	7.00	85.00	3,896.8	5.8	66.8	11,743,424.50	2,125,851.63	32° 20' 30.288 N	103° 25' 39.941 W
4,000.0	7.00	85.00	3,996.0	6.9	79.0	11,743,425.74	2,125,863.76	32° 20' 30.298 N	103° 25' 39.799 W
4,100.0	7.00	85.00	4,095.3	8.0	91.1	11,743,426.98	2,125,875.88	32° 20' 30.309 N	103° 25' 39.658 W
4,200.0	7.00	85.00	4,194.5	9.0	103.2	11,743,428.22	2,125,888.00	32° 20' 30.319 N	103° 25' 39.516 W
4,300.0	7.00	85.00	4,293.8	10.1	115.4	11,743,429.46	2,125,900.13	32° 20' 30.330 N	103° 25' 39.375 W
4,400.0	7.00	85.00	4,393.0	11.2	127.5	11,743,430.70	2,125,912.25	32° 20' 30.340 N	103° 25' 39.233 W
4,500.0	7.00	85.00	4,492.3	12.2	139.7	11,743,431.94	2,125,924.38	32° 20' 30.351 N	103° 25' 39.092 W
4,600.0	7.00	85.00	4,591.6	13.3	151.8	11,743,433.18	2,125,936.50	32° 20' 30.361 N	103° 25' 38.950 W
4,700.0	7.00	85.00	4,690.8	14.3	164.0	11,743,434.42	2,125,948.62	32° 20' 30.372 N	103° 25' 38.809 W
4,800.0	7.00	85.00	4,790.1	15.4	176.1	11,743,435.66	2,125,960.75	32° 20' 30.382 N	103° 25' 38.667 W
4,900.0	7.00	85.00	4,889.3	16.5	188.2	11,743,436.90	2,125,972.87	32° 20' 30.393 N	103° 25' 38.526 W
5,000.0	7.00	85.00	4,988.6	17.5	200.4	11,743,438.14	2,125,984.99	32° 20' 30.403 N	103° 25' 38.384 W
5,100.0	7.00	85.00	5,087.8	18.6	212.5	11,743,439.38	2,125,997.12	32° 20' 30.414 N	103° 25' 38.243 W
5,200.0	7.00	85.00	5,187.1	19.7	224.7	11,743,440.62	2,126,009.24	32° 20' 30.425 N	103° 25' 38.101 W
5,300.0	7.00	85.00	5,286.3	20.7	236.8	11,743,441.86	2,126,021.36	32° 20' 30.435 N	103° 25' 37.960 W
5,400.0	7.00	85.00	5,385.6	21.8	248.9	11,743,443.10	2,126,033.49	32° 20' 30.446 N	103° 25' 37.818 W
5,500.0	7.00	85.00	5,484.8	22.8	261.1	11,743,444.34	2,126,045.61	32° 20' 30.456 N	103° 25' 37.677 W
5,600.0	7.00	85.00	5,584.1	23.9	273.2	11,743,445.59	2,126,057.74	32° 20' 30.467 N	103° 25' 37.535 W
5,700.0	7.00	85.00	5,683.4	25.0	285.4	11,743,446.83	2,126,069.86	32° 20' 30.477 N	103° 25' 37.394 W
5,800.0	7.00	85.00	5,782.6	26.0	297.5	11,743,448.07	2,126,081.98	32° 20' 30.488 N	103° 25' 37.252 W
5,900.0	7.00	85.00	5,881.9	27.1	309.6	11,743,449.31	2,126,094.11	32° 20' 30.498 N	103° 25' 37.110 W
6,000.0	7.00	85.00	5,981.1	28.2	321.8	11,743,450.55	2,126,106.23	32° 20' 30.509 N	103° 25' 36.969 W
6,100.0	7.00	85.00	6,080.4	29.2	333.9	11,743,451.79	2,126,118.35	32° 20' 30.519 N	103° 25' 36.827 W
6,200.0	7.00	85.00	6,179.6	30.3	346.1	11,743,453.03	2,126,130.48	32° 20' 30.530 N	103° 25' 36.686 W
6,300.0	7.00	85.00	6,278.9	31.3	358.2	11,743,454.27	2,126,142.60	32° 20' 30.540 N	103° 25' 36.544 W
6,400.0	7.00	85.00	6,378.1	32.4	370.3	11,743,455.51	2,126,154.72	32° 20' 30.551 N	103° 25' 36.403 W
6,500.0	7.00	85.00	6,477.4	33.5	382.5	11,743,456.75	2,126,166.85	32° 20' 30.561 N	103° 25' 36.261 W
6,600.0	7.00	85.00	6,576.6	34.5	394.6	11,743,457.99	2,126,178.97	32° 20' 30.572 N	103° 25' 36.120 W

Company:	New Mexico	**Local Co-ordinate Reference:**	Well PAC-MAN 36 FED COM 601H
Project:	LEA	**TVD Reference:**	RKB=3378.8+25 @ 3403.8usft
Site:	PAC-MAN	**MD Reference:**	RKB=3378.8+25 @ 3403.8usft
Well:	PAC-MAN 36 FED COM 601H	**North Reference:**	True
Wellbore:	PAC-MAN 36 FED COM 601H	**Survey Calculation Method:**	Minimum Curvature
Design:	PWP0	**Database:**	Centennial EDM SQL Server

Planned Survey

Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Map Northing (usft)	Map Easting (usft)	Latitude	Longitude
6,700.0	7.00	85.00	6,675.9	35.6	406.8	11,743,459.23	2,126,191.10	32° 20' 30.582 N	103° 25' 35.978 W
6,800.0	7.00	85.00	6,775.2	36.6	418.9	11,743,460.47	2,126,203.22	32° 20' 30.593 N	103° 25' 35.837 W
6,900.0	7.00	85.00	6,874.4	37.7	431.0	11,743,461.71	2,126,215.34	32° 20' 30.603 N	103° 25' 35.695 W
7,000.0	7.00	85.00	6,973.7	38.8	443.2	11,743,462.95	2,126,227.47	32° 20' 30.614 N	103° 25' 35.554 W
7,100.0	7.00	85.00	7,072.9	39.8	455.3	11,743,464.19	2,126,239.59	32° 20' 30.624 N	103° 25' 35.412 W
7,200.0	7.00	85.00	7,172.2	40.9	467.5	11,743,465.43	2,126,251.71	32° 20' 30.635 N	103° 25' 35.271 W
7,300.0	7.00	85.00	7,271.4	42.0	479.6	11,743,466.67	2,126,263.84	32° 20' 30.645 N	103° 25' 35.129 W
7,400.0	7.00	85.00	7,370.7	43.0	491.7	11,743,467.91	2,126,275.96	32° 20' 30.656 N	103° 25' 34.988 W
7,500.0	7.00	85.00	7,469.9	44.1	503.9	11,743,469.15	2,126,288.08	32° 20' 30.666 N	103° 25' 34.846 W
7,600.0	7.00	85.00	7,569.2	45.1	516.0	11,743,470.39	2,126,300.21	32° 20' 30.677 N	103° 25' 34.705 W
7,700.0	7.00	85.00	7,668.4	46.2	528.2	11,743,471.63	2,126,312.33	32° 20' 30.687 N	103° 25' 34.563 W
7,800.0	7.00	85.00	7,767.7	47.3	540.3	11,743,472.87	2,126,324.46	32° 20' 30.698 N	103° 25' 34.421 W
7,900.0	7.00	85.00	7,867.0	48.3	552.4	11,743,474.11	2,126,336.58	32° 20' 30.708 N	103° 25' 34.280 W
8,000.0	7.00	85.00	7,966.2	49.4	564.6	11,743,475.35	2,126,348.70	32° 20' 30.719 N	103° 25' 34.138 W
8,100.0	7.00	85.00	8,065.5	50.5	576.7	11,743,476.59	2,126,360.83	32° 20' 30.729 N	103° 25' 33.997 W
8,200.0	7.00	85.00	8,164.7	51.5	588.9	11,743,477.83	2,126,372.95	32° 20' 30.740 N	103° 25' 33.855 W
8,300.0	7.00	85.00	8,264.0	52.6	601.0	11,743,479.07	2,126,385.07	32° 20' 30.750 N	103° 25' 33.714 W
8,400.0	7.00	85.00	8,363.2	53.6	613.2	11,743,480.31	2,126,397.20	32° 20' 30.761 N	103° 25' 33.572 W
8,500.0	7.00	85.00	8,462.5	54.7	625.3	11,743,481.55	2,126,409.32	32° 20' 30.771 N	103° 25' 33.431 W
8,600.0	7.00	85.00	8,561.7	55.8	637.4	11,743,482.79	2,126,421.44	32° 20' 30.782 N	103° 25' 33.289 W
8,700.0	7.00	85.00	8,661.0	56.8	649.6	11,743,484.03	2,126,433.57	32° 20' 30.792 N	103° 25' 33.148 W
8,800.0	7.00	85.00	8,760.2	57.9	661.7	11,743,485.27	2,126,445.69	32° 20' 30.803 N	103° 25' 33.006 W
8,900.0	7.00	85.00	8,859.5	59.0	673.9	11,743,486.51	2,126,457.82	32° 20' 30.813 N	103° 25' 32.865 W
9,000.0	7.00	85.00	8,958.8	60.0	686.0	11,743,487.75	2,126,469.94	32° 20' 30.824 N	103° 25' 32.723 W
9,100.0	7.00	85.00	9,058.0	61.1	698.1	11,743,489.00	2,126,482.06	32° 20' 30.834 N	103° 25' 32.582 W
9,200.0	7.00	85.00	9,157.3	62.1	710.3	11,743,490.24	2,126,494.19	32° 20' 30.845 N	103° 25' 32.440 W
9,300.0	7.00	85.00	9,256.5	63.2	722.4	11,743,491.48	2,126,506.31	32° 20' 30.855 N	103° 25' 32.299 W
9,400.0	7.00	85.00	9,355.8	64.3	734.6	11,743,492.72	2,126,518.43	32° 20' 30.866 N	103° 25' 32.157 W
9,500.0	7.00	85.00	9,455.0	65.3	746.7	11,743,493.96	2,126,530.56	32° 20' 30.876 N	103° 25' 32.016 W
9,600.0	7.00	85.00	9,554.3	66.4	758.8	11,743,495.20	2,126,542.68	32° 20' 30.887 N	103° 25' 31.874 W
9,700.0	7.00	85.00	9,653.5	67.5	771.0	11,743,496.44	2,126,554.81	32° 20' 30.897 N	103° 25' 31.732 W
9,800.0	6.00	85.00	9,752.9	68.4	782.3	11,743,497.59	2,126,566.07	32° 20' 30.907 N	103° 25' 31.601 W
9,900.0	5.00	85.00	9,852.4	69.3	791.8	11,743,498.56	2,126,575.60	32° 20' 30.915 N	103° 25' 31.490 W
10,000.0	4.00	85.00	9,952.1	70.0	799.6	11,743,499.36	2,126,583.41	32° 20' 30.922 N	103° 25' 31.399 W
10,100.0	3.00	85.00	10,051.9	70.5	805.7	11,743,499.98	2,126,589.48	32° 20' 30.927 N	103° 25' 31.328 W
10,200.0	2.00	85.00	10,151.8	70.9	810.0	11,743,500.43	2,126,593.82	32° 20' 30.931 N	103° 25' 31.277 W
10,300.0	1.00	85.00	10,251.8	71.1	812.7	11,743,500.69	2,126,596.42	32° 20' 30.934 N	103° 25' 31.247 W
10,400.0	0.00	0.00	10,351.8	71.2	813.5	11,743,500.78	2,126,597.29	32° 20' 30.934 N	103° 25' 31.237 W
10,500.0	0.00	0.00	10,451.8	71.2	813.5	11,743,500.78	2,126,597.29	32° 20' 30.934 N	103° 25' 31.237 W
10,600.0	0.00	0.00	10,551.8	71.2	813.5	11,743,500.78	2,126,597.29	32° 20' 30.934 N	103° 25' 31.237 W
10,700.0	0.00	0.00	10,651.8	71.2	813.5	11,743,500.78	2,126,597.29	32° 20' 30.934 N	103° 25' 31.237 W
10,800.0	0.00	0.00	10,751.8	71.2	813.5	11,743,500.78	2,126,597.29	32° 20' 30.934 N	103° 25' 31.237 W
10,900.0	0.00	0.00	10,851.8	71.2	813.5	11,743,500.78	2,126,597.29	32° 20' 30.934 N	103° 25' 31.237 W
10,905.0	0.00	0.00	10,856.8	71.2	813.5	11,743,500.78	2,126,597.29	32° 20' 30.934 N	103° 25' 31.237 W
11,000.0	9.50	181.05	10,951.4	63.3	813.4	11,743,492.93	2,126,597.26	32° 20' 30.857 N	103° 25' 31.238 W
11,100.0	19.49	181.05	11,048.1	38.3	812.9	11,743,467.93	2,126,597.17	32° 20' 30.609 N	103° 25' 31.244 W
11,200.0	29.49	181.05	11,138.9	-3.1	812.2	11,743,426.53	2,126,597.02	32° 20' 30.200 N	103° 25' 31.252 W
11,300.0	39.48	181.05	11,221.3	-59.6	811.1	11,743,369.99	2,126,596.81	32° 20' 29.640 N	103° 25' 31.265 W
11,400.0	49.48	181.05	11,292.5	-129.6	809.8	11,743,300.01	2,126,596.56	32° 20' 28.948 N	103° 25' 31.279 W
11,500.0	59.47	181.05	11,350.6	-210.8	808.4	11,743,218.72	2,126,596.26	32° 20' 28.143 N	103° 25' 31.297 W
11,600.0	69.47	181.05	11,393.6	-300.9	806.7	11,743,128.60	2,126,595.93	32° 20' 27.252 N	103° 25' 31.316 W
11,700.0	79.47	181.05	11,420.3	-397.2	804.9	11,743,032.38	2,126,595.58	32° 20' 26.300 N	103° 25' 31.337 W
11,800.0	89.46	181.05	11,430.0	-496.5	803.1	11,742,932.97	2,126,595.22	32° 20' 25.316 N	103° 25' 31.358 W
11,805.4	90.00	181.05	11,430.0	-501.9	803.0	11,742,927.58	2,126,595.20	32° 20' 25.263 N	103° 25' 31.359 W
11,900.0	90.00	181.00	11,430.0	-596.5	801.3	11,742,832.97	2,126,594.90	32° 20' 24.326 N	103° 25' 31.379 W

Company:	New Mexico	**Local Co-ordinate Reference:**	Well PAC-MAN 36 FED COM 601H
Project:	LEA	**TVD Reference:**	RKB=3378.8+25 @ 3403.8usft
Site:	PAC-MAN	**MD Reference:**	RKB=3378.8+25 @ 3403.8usft
Well:	PAC-MAN 36 FED COM 601H	**North Reference:**	True
Wellbore:	PAC-MAN 36 FED COM 601H	**Survey Calculation Method:**	Minimum Curvature
Design:	PWP0	**Database:**	Centennial EDM SQL Server

Planned Survey

Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Map Northing (usft)	Map Easting (usft)	Latitude	Longitude
12,000.0	90.00	180.95	11,430.0	-696.5	799.6	11,742,732.97	2,126,594.66	32° 20' 23.337 N	103° 25' 31.399 W
12,100.0	90.00	180.90	11,430.0	-796.5	798.0	11,742,632.97	2,126,594.51	32° 20' 22.347 N	103° 25' 31.418 W
12,200.0	90.00	180.85	11,430.0	-896.5	796.5	11,742,532.97	2,126,594.44	32° 20' 21.358 N	103° 25' 31.436 W
12,300.0	90.00	180.80	11,430.0	-996.5	795.0	11,742,432.97	2,126,594.47	32° 20' 20.368 N	103° 25' 31.452 W
12,400.0	90.00	180.75	11,430.0	-1,096.5	793.7	11,742,332.97	2,126,594.58	32° 20' 19.379 N	103° 25' 31.468 W
12,500.0	90.00	180.70	11,430.0	-1,196.5	792.4	11,742,232.97	2,126,594.78	32° 20' 18.389 N	103° 25' 31.483 W
12,600.0	90.00	180.65	11,430.0	-1,296.5	791.2	11,742,132.97	2,126,595.06	32° 20' 17.400 N	103° 25' 31.497 W
12,700.0	90.00	180.60	11,430.0	-1,396.5	790.1	11,742,032.97	2,126,595.43	32° 20' 16.410 N	103° 25' 31.510 W
12,800.0	90.00	180.55	11,430.0	-1,496.4	789.1	11,741,932.97	2,126,595.89	32° 20' 15.421 N	103° 25' 31.522 W
12,900.0	90.00	180.50	11,430.0	-1,596.4	788.2	11,741,832.97	2,126,596.44	32° 20' 14.431 N	103° 25' 31.532 W
13,000.0	90.00	180.45	11,430.0	-1,696.4	787.4	11,741,732.98	2,126,597.07	32° 20' 13.442 N	103° 25' 31.542 W
13,100.0	90.00	180.40	11,430.0	-1,796.4	786.6	11,741,632.98	2,126,597.79	32° 20' 12.452 N	103° 25' 31.551 W
13,200.0	90.00	180.35	11,430.0	-1,896.4	785.9	11,741,532.98	2,126,598.60	32° 20' 11.462 N	103° 25' 31.559 W
13,300.0	90.00	180.30	11,430.0	-1,996.4	785.4	11,741,432.99	2,126,599.50	32° 20' 10.473 N	103° 25' 31.565 W
13,400.0	90.00	180.25	11,430.0	-2,096.4	784.9	11,741,332.99	2,126,600.48	32° 20' 9.483 N	103° 25' 31.571 W
13,500.0	90.00	180.20	11,430.0	-2,196.4	784.5	11,741,233.00	2,126,601.55	32° 20' 8.493 N	103° 25' 31.576 W
13,600.0	90.00	180.15	11,430.0	-2,296.4	784.2	11,741,133.00	2,126,602.71	32° 20' 7.504 N	103° 25' 31.579 W
13,700.0	90.00	180.10	11,430.0	-2,396.4	784.0	11,741,033.01	2,126,603.95	32° 20' 6.514 N	103° 25' 31.582 W
13,800.0	90.00	180.05	11,430.0	-2,496.4	783.8	11,740,933.02	2,126,605.29	32° 20' 5.525 N	103° 25' 31.583 W
13,900.0	90.00	180.00	11,430.0	-2,596.4	783.8	11,740,833.03	2,126,606.70	32° 20' 4.535 N	103° 25' 31.584 W
14,000.0	90.00	179.95	11,430.0	-2,696.4	783.8	11,740,733.04	2,126,608.21	32° 20' 3.545 N	103° 25' 31.584 W
14,100.0	90.00	179.90	11,430.0	-2,796.4	783.9	11,740,633.05	2,126,609.80	32° 20' 2.556 N	103° 25' 31.582 W
14,200.0	90.00	179.85	11,430.0	-2,896.4	784.1	11,740,533.07	2,126,611.49	32° 20' 1.566 N	103° 25' 31.580 W
14,300.0	90.00	179.80	11,430.0	-2,996.4	784.4	11,740,433.08	2,126,613.25	32° 20' 0.576 N	103° 25' 31.576 W
14,400.0	90.00	179.75	11,430.0	-3,096.4	784.8	11,740,333.10	2,126,615.11	32° 19' 59.587 N	103° 25' 31.572 W
14,436.3	90.00	179.74	11,430.0	-3,132.7	785.0	11,740,296.80	2,126,615.80	32° 19' 59.227 N	103° 25' 31.570 W
14,500.0	90.00	179.74	11,430.0	-3,196.4	785.3	11,740,233.12	2,126,617.03	32° 19' 58.597 N	103° 25' 31.566 W
14,600.0	90.00	179.74	11,430.0	-3,296.4	785.8	11,740,133.14	2,126,618.96	32° 19' 57.608 N	103° 25' 31.561 W
14,700.0	90.00	179.74	11,430.0	-3,396.4	786.2	11,740,033.16	2,126,620.89	32° 19' 56.618 N	103° 25' 31.556 W
14,800.0	90.00	179.74	11,430.0	-3,496.4	786.7	11,739,933.18	2,126,622.83	32° 19' 55.628 N	103° 25' 31.550 W
14,900.0	90.00	179.74	11,430.0	-3,596.4	787.1	11,739,833.19	2,126,624.76	32° 19' 54.639 N	103° 25' 31.545 W
15,000.0	90.00	179.74	11,430.0	-3,696.4	787.6	11,739,733.21	2,126,626.69	32° 19' 53.649 N	103° 25' 31.540 W
15,100.0	90.00	179.74	11,430.0	-3,796.4	788.1	11,739,633.23	2,126,628.62	32° 19' 52.660 N	103° 25' 31.534 W
15,200.0	90.00	179.74	11,430.0	-3,896.4	788.5	11,739,533.25	2,126,630.55	32° 19' 51.670 N	103° 25' 31.529 W
15,300.0	90.00	179.74	11,430.0	-3,996.4	789.0	11,739,433.27	2,126,632.48	32° 19' 50.680 N	103° 25' 31.523 W
15,400.0	90.00	179.74	11,430.0	-4,096.4	789.5	11,739,333.29	2,126,634.41	32° 19' 49.691 N	103° 25' 31.518 W
15,500.0	90.00	179.74	11,430.0	-4,196.4	789.9	11,739,233.31	2,126,636.34	32° 19' 48.701 N	103° 25' 31.513 W
15,600.0	90.00	179.74	11,430.0	-4,296.4	790.4	11,739,133.32	2,126,638.27	32° 19' 47.711 N	103° 25' 31.507 W
15,700.0	90.00	179.74	11,430.0	-4,396.4	790.8	11,739,033.34	2,126,640.20	32° 19' 46.722 N	103° 25' 31.502 W
15,800.0	90.00	179.74	11,430.0	-4,496.4	791.3	11,738,933.36	2,126,642.13	32° 19' 45.732 N	103° 25' 31.497 W
15,900.0	90.00	179.74	11,430.0	-4,596.4	791.8	11,738,833.38	2,126,644.06	32° 19' 44.743 N	103° 25' 31.491 W
16,000.0	90.00	179.74	11,430.0	-4,696.4	792.2	11,738,733.40	2,126,645.99	32° 19' 43.753 N	103° 25' 31.486 W
16,100.0	90.00	179.74	11,430.0	-4,796.4	792.7	11,738,633.42	2,126,647.92	32° 19' 42.763 N	103° 25' 31.481 W
16,200.0	90.00	179.74	11,430.0	-4,896.4	793.2	11,738,533.44	2,126,649.85	32° 19' 41.774 N	103° 25' 31.475 W
16,300.0	90.00	179.74	11,430.0	-4,996.4	793.6	11,738,433.46	2,126,651.78	32° 19' 40.784 N	103° 25' 31.470 W
16,400.0	90.00	179.74	11,430.0	-5,096.4	794.1	11,738,333.47	2,126,653.71	32° 19' 39.794 N	103° 25' 31.464 W
16,500.0	90.00	179.74	11,430.0	-5,196.4	794.5	11,738,233.49	2,126,655.64	32° 19' 38.805 N	103° 25' 31.459 W
16,600.0	90.00	179.74	11,430.0	-5,296.4	795.0	11,738,133.51	2,126,657.57	32° 19' 37.815 N	103° 25' 31.454 W
16,700.0	90.00	179.74	11,430.0	-5,396.4	795.5	11,738,033.53	2,126,659.50	32° 19' 36.826 N	103° 25' 31.448 W
16,800.0	90.00	179.74	11,430.0	-5,496.4	795.9	11,737,933.55	2,126,661.44	32° 19' 35.836 N	103° 25' 31.443 W
16,900.0	90.00	179.74	11,430.0	-5,596.4	796.4	11,737,833.57	2,126,663.37	32° 19' 34.846 N	103° 25' 31.438 W
17,000.0	90.00	179.74	11,430.0	-5,696.4	796.9	11,737,733.59	2,126,665.30	32° 19' 33.857 N	103° 25' 31.432 W
17,100.0	90.00	179.74	11,430.0	-5,796.4	797.3	11,737,633.60	2,126,667.23	32° 19' 32.867 N	103° 25' 31.427 W
17,200.0	90.00	179.74	11,430.0	-5,896.4	797.8	11,737,533.62	2,126,669.16	32° 19' 31.878 N	103° 25' 31.421 W
17,300.0	90.00	179.74	11,430.0	-5,996.4	798.2	11,737,433.64	2,126,671.09	32° 19' 30.888 N	103° 25' 31.416 W

CENTENNIAL

LGC

Survey Report - Geographic

Company:	New Mexico	**Local Co-ordinate Reference:**	Well PAC-MAN 36 FED COM 601H
Project:	LEA	**TVD Reference:**	RKB=3378.8+25 @ 3403.8usft
Site:	PAC-MAN	**MD Reference:**	RKB=3378.8+25 @ 3403.8usft
Well:	PAC-MAN 36 FED COM 601H	**North Reference:**	True
Wellbore:	PAC-MAN 36 FED COM 601H	**Survey Calculation Method:**	Minimum Curvature
Design:	PWP0	**Database:**	Centennial EDM SQL Server

Planned Survey

Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Map Northing (usft)	Map Easting (usft)	Latitude	Longitude
17,400.0	90.00	179.74	11,430.0	-6,096.4	798.7	11,737,333.66	2,126,673.02	32° 19' 29.898 N	103° 25' 31.411 W
17,500.0	90.00	179.74	11,430.0	-6,196.4	799.2	11,737,233.68	2,126,674.95	32° 19' 28.909 N	103° 25' 31.405 W
17,600.0	90.00	179.74	11,430.0	-6,296.4	799.6	11,737,133.70	2,126,676.88	32° 19' 27.919 N	103° 25' 31.400 W
17,700.0	90.00	179.74	11,430.0	-6,396.4	800.1	11,737,033.72	2,126,678.81	32° 19' 26.929 N	103° 25' 31.395 W
17,800.0	90.00	179.74	11,430.0	-6,496.4	800.6	11,736,933.73	2,126,680.74	32° 19' 25.940 N	103° 25' 31.389 W
17,900.0	90.00	179.74	11,430.0	-6,596.4	801.0	11,736,833.75	2,126,682.67	32° 19' 24.950 N	103° 25' 31.384 W
18,000.0	90.00	179.74	11,430.0	-6,696.4	801.5	11,736,733.77	2,126,684.60	32° 19' 23.961 N	103° 25' 31.379 W
18,100.0	90.00	179.74	11,430.0	-6,796.4	801.9	11,736,633.79	2,126,686.53	32° 19' 22.971 N	103° 25' 31.373 W
18,200.0	90.00	179.74	11,430.0	-6,896.4	802.4	11,736,533.81	2,126,688.46	32° 19' 21.981 N	103° 25' 31.368 W
18,300.0	90.00	179.74	11,430.0	-6,996.4	802.9	11,736,433.83	2,126,690.39	32° 19' 20.992 N	103° 25' 31.362 W
18,400.0	90.00	179.74	11,430.0	-7,096.4	803.3	11,736,333.85	2,126,692.32	32° 19' 20.002 N	103° 25' 31.357 W
18,500.0	90.00	179.74	11,430.0	-7,196.4	803.8	11,736,233.87	2,126,694.25	32° 19' 19.013 N	103° 25' 31.352 W
18,600.0	90.00	179.74	11,430.0	-7,296.4	804.3	11,736,133.88	2,126,696.18	32° 19' 18.023 N	103° 25' 31.346 W
18,700.0	90.00	179.74	11,430.0	-7,396.4	804.7	11,736,033.90	2,126,698.11	32° 19' 17.033 N	103° 25' 31.341 W
18,800.0	90.00	179.74	11,430.0	-7,496.4	805.2	11,735,933.92	2,126,700.05	32° 19' 16.044 N	103° 25' 31.336 W
18,900.0	90.00	179.74	11,430.0	-7,596.4	805.6	11,735,833.94	2,126,701.98	32° 19' 15.054 N	103° 25' 31.330 W
19,000.0	90.00	179.74	11,430.0	-7,696.4	806.1	11,735,733.96	2,126,703.91	32° 19' 14.064 N	103° 25' 31.325 W
19,100.0	90.00	179.74	11,430.0	-7,796.4	806.6	11,735,633.98	2,126,705.84	32° 19' 13.075 N	103° 25' 31.319 W
19,200.0	90.00	179.74	11,430.0	-7,896.4	807.0	11,735,534.00	2,126,707.77	32° 19' 12.085 N	103° 25' 31.314 W
19,300.0	90.00	179.74	11,430.0	-7,996.4	807.5	11,735,434.01	2,126,709.70	32° 19' 11.096 N	103° 25' 31.309 W
19,400.0	90.00	179.74	11,430.0	-8,096.4	808.0	11,735,334.03	2,126,711.63	32° 19' 10.106 N	103° 25' 31.303 W
19,500.0	90.00	179.74	11,430.0	-8,196.4	808.4	11,735,234.05	2,126,713.56	32° 19' 9.116 N	103° 25' 31.298 W
19,600.0	90.00	179.74	11,430.0	-8,296.4	808.9	11,735,134.07	2,126,715.49	32° 19' 8.127 N	103° 25' 31.293 W
19,700.0	90.00	179.74	11,430.0	-8,396.4	809.3	11,735,034.09	2,126,717.42	32° 19' 7.137 N	103° 25' 31.287 W
19,800.0	90.00	179.74	11,430.0	-8,496.4	809.8	11,734,934.11	2,126,719.35	32° 19' 6.147 N	103° 25' 31.282 W
19,900.0	90.00	179.74	11,430.0	-8,596.4	810.3	11,734,834.13	2,126,721.28	32° 19' 5.158 N	103° 25' 31.276 W
20,000.0	90.00	179.74	11,430.0	-8,696.4	810.7	11,734,734.14	2,126,723.21	32° 19' 4.168 N	103° 25' 31.271 W
20,100.0	90.00	179.74	11,430.0	-8,796.4	811.2	11,734,634.16	2,126,725.14	32° 19' 3.179 N	103° 25' 31.266 W
20,200.0	90.00	179.74	11,430.0	-8,896.4	811.7	11,734,534.18	2,126,727.07	32° 19' 2.189 N	103° 25' 31.260 W
20,300.0	90.00	179.74	11,430.0	-8,996.4	812.1	11,734,434.20	2,126,729.00	32° 19' 1.199 N	103° 25' 31.255 W
20,400.0	90.00	179.74	11,430.0	-9,096.4	812.6	11,734,334.22	2,126,730.93	32° 19' 0.210 N	103° 25' 31.250 W
20,500.0	90.00	179.74	11,430.0	-9,196.4	813.0	11,734,234.24	2,126,732.86	32° 18' 59.220 N	103° 25' 31.244 W
20,600.0	90.00	179.74	11,430.0	-9,296.4	813.5	11,734,134.26	2,126,734.79	32° 18' 58.231 N	103° 25' 31.239 W
20,700.0	90.00	179.74	11,430.0	-9,396.4	814.0	11,734,034.27	2,126,736.72	32° 18' 57.241 N	103° 25' 31.233 W
20,800.0	90.00	179.74	11,430.0	-9,496.4	814.4	11,733,934.29	2,126,738.66	32° 18' 56.251 N	103° 25' 31.228 W
20,900.0	90.00	179.74	11,430.0	-9,596.4	814.9	11,733,834.31	2,126,740.59	32° 18' 55.262 N	103° 25' 31.223 W
21,000.0	90.00	179.74	11,430.0	-9,696.4	815.3	11,733,734.33	2,126,742.52	32° 18' 54.272 N	103° 25' 31.217 W
21,100.0	90.00	179.74	11,430.0	-9,796.4	815.8	11,733,634.35	2,126,744.45	32° 18' 53.282 N	103° 25' 31.212 W
21,200.0	90.00	179.74	11,430.0	-9,896.4	816.3	11,733,534.37	2,126,746.38	32° 18' 52.293 N	103° 25' 31.207 W
21,300.0	90.00	179.74	11,430.0	-9,996.4	816.7	11,733,434.39	2,126,748.31	32° 18' 51.303 N	103° 25' 31.201 W
21,400.0	90.00	179.74	11,430.0	-10,096.4	817.2	11,733,334.41	2,126,750.24	32° 18' 50.314 N	103° 25' 31.196 W
21,500.0	90.00	179.74	11,430.0	-10,196.4	817.7	11,733,234.42	2,126,752.17	32° 18' 49.324 N	103° 25' 31.190 W
21,600.0	90.00	179.74	11,430.0	-10,296.4	818.1	11,733,134.44	2,126,754.10	32° 18' 48.334 N	103° 25' 31.185 W
21,700.0	90.00	179.74	11,430.0	-10,396.4	818.6	11,733,034.46	2,126,756.03	32° 18' 47.345 N	103° 25' 31.180 W
21,800.0	90.00	179.74	11,430.0	-10,496.3	819.0	11,732,934.48	2,126,757.96	32° 18' 46.355 N	103° 25' 31.174 W
21,900.0	90.00	179.74	11,430.0	-10,596.3	819.5	11,732,834.50	2,126,759.89	32° 18' 45.365 N	103° 25' 31.169 W
22,000.0	90.00	179.74	11,430.0	-10,696.3	820.0	11,732,734.52	2,126,761.82	32° 18' 44.376 N	103° 25' 31.164 W
22,066.3	90.00	179.74	11,430.0	-10,762.6	820.3	11,732,668.26	2,126,763.10	32° 18' 43.720 N	103° 25' 31.160 W

Company:	New Mexico	**Local Co-ordinate Reference:**	Well PAC-MAN 36 FED COM 601H
Project:	LEA	**TVD Reference:**	RKB=3378.8+25 @ 3403.8usft
Site:	PAC-MAN	**MD Reference:**	RKB=3378.8+25 @ 3403.8usft
Well:	PAC-MAN 36 FED COM 601H	**North Reference:**	True
Wellbore:	PAC-MAN 36 FED COM 601H	**Survey Calculation Method:**	Minimum Curvature
Design:	PWP0	**Database:**	Centennial EDM SQL Server

Design Targets

Target Name - hit/miss target - Shape	Dip Angle (°)	Dip Dir. (°)	TVD (usft)	+N/-S (usft)	+E/-W (usft)	Northing (usft)	Easting (usft)	Latitude	Longitude
LTP/BHL - PAC MAN 36 - plan hits target center - Point	0.00	0.84	11,430.0	-10,762.6	820.3	11,732,668.26	2,126,763.10	32° 18' 43.720 N	103° 25' 31.160 W
FTP - PAC MAN 36 FEC - plan misses target center by 15.1usft at 11703.2usft MD (11420.9 TVD, -400.3 N, 804.9 E) - Circle (radius 50.0)	0.00	0.84	11,430.0	-399.7	816.9	11,743,030.02	2,126,607.55	32° 20' 26.275 N	103° 25' 31.198 W

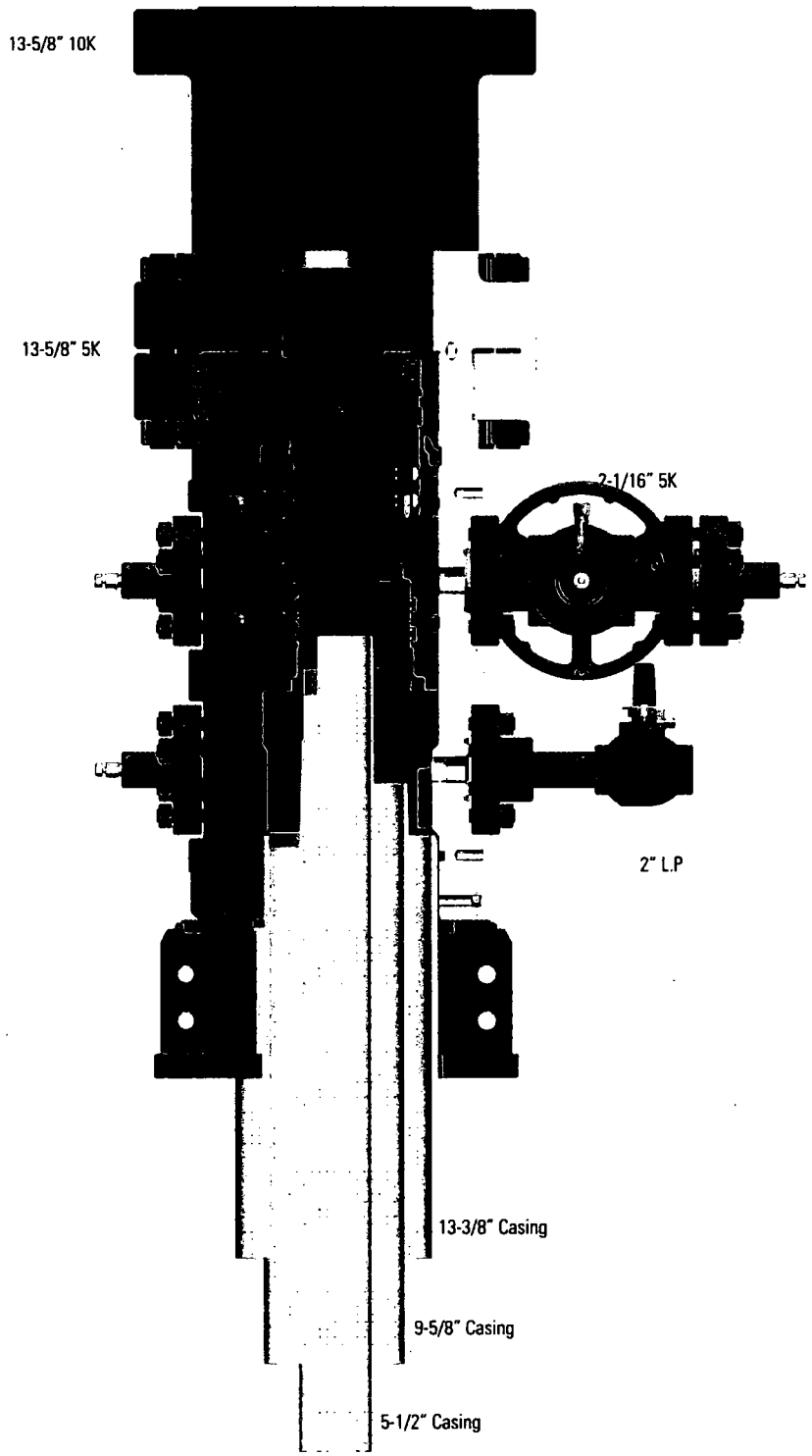
Checked By: _____ Approved By: _____ Date: _____

Pac-Man 36 Fed Com 601H

Centennial Drilling Plan for 3-Casing String Bone Springs Formation

13-3/8" x 9-5/8" x 5-1/2" Casing Design

1. Drill 17-1/2" surface hole to Total Depth with Spudder Rig and perform wellbore cleanup cycles.
2. Run and land 13-3/8" casing to Depth.
3. Cement 13-3/8" casing – cement to surface.
4. Cut / Dress Conductor and 13-3/8" casing as needed, weld on Cameron Multi-bowl system with baseplate supported by 20" conductor.
5. Test Weld to 70% of 13-3/8" casing collapse. Place nightcap with Pressure Gauge on wellhead and test seals to 70% of Casing Collapse.
6. Bleed Pressure if necessary and remove nightcap. Nipple up and test BOPE with test plug per Onshore Order 2.
7. Test casing per COA WOC timing (.22 psi/ft or 1500 psi whichever is greater) - not to exceed 70% casing burst. Cement must have achieved 500psi compressive strength prior to test.
8. Install wear bushing then drill out 13-3/8" shoe-track plus 20' and conduct FIT to minimum of the MW equivalent anticipated to control the formation pressure to the next casing point.
9. Drill 12-1/4" Intermediate hole to 9-5/8" casing point. (Base Capitan Reef).
10. Remove wear bushing then run and land 9-5/8" Intermediate Casing with mandrel hanger in wellhead.
11. Cement 9-5/8 casing – cement to surface.
12. Washout stack then run wash tool in wellhead and wash hanger and pack-off setting area.
13. Install pack-off and test to 5000 psi for 15 minutes.
    a. Test casing per COA WOC timing (.22 psi/ft or 1500 psi whichever is greater) - not to exceed 70% casing burst. Cement must have achieved 500psi compressive strength prior to test.
14. Install wear bushing then drill out 9-5/8" shoe-track plus 20' and conduct FIT to minimum MW equivalent to control the formation pressure to TD of well.
15. Drill 8-3/4" Vertical hole to KOP – Trip out for Curve BHA.
16. Drill 8-3/4" Curve, landing in production interval – Trip for Lateral BHA.
17. Drill 8-1/2" Lateral to Permitted BHL, perform cleanup cycles and trip out to run 5-1/2" Production Casing.
18. Remove wear bushing then run 5-1/2" production casing to TD landing casing mandrel in wellhead.
19. Cement 5-1/2" Production string to surface.
20. Run in with wash tool and wash wellhead area – install pack-off and test to 5000psi for 15 minutes.
21. Install BPV in 5-1/2" mandrel hanger – Nipple down BOPE and install nightcap.
22. Test nightcap void to 5000psi for 30 minutes.



CENTENNIAL

RESOURCE DEVELOPMENT INC

CAMERON CONFIDENTIAL INFORMATION			
DO NOT SCALE		CAMERON	Surface Systems
Drawn by: C.Moore	Date: 7/1/19		
Checked by: V.Atwell	Date: 7/1/19	13-5/8" 10k MN-DS	Rev: 02
Drawing No: 1655807-A			

QUALITY CONTROL INSPECTION AND TEST CERTIFICATE					CERT. N°:	504	
PURCHASER:	ContiTech Oil & Marine Corp.				P.O. N°:	4500409659	
CONTITECH RUBBER order N°:	538236		HOSE TYPE:	3" ID		Choke and Kill Hose	
HOSE SERIAL N°:	67255		NOMINAL / ACTUAL LENGTH:			10,67 m / 10,77 m	
W.P. 68,9 MPa	10000 psi		T.P. 103,4 MPa	15000 psi	Duration:	60 min.	

Pressure test with water at ambient temperature

See attachment. (1 page)

↑ 10 mm = 10 Min.

→ 10 mm = 20 MPa

COUPLINGS Type	Serial N°		Quality	Heat N°
3" coupling with	9251	9254	AISI 4130	A0579N
4 1/16" 10K API b.w. Flange end			AISI 4130	035608

Not Designed For Well Testing

API Spec 16 C

Temperature rate:"B"

All metal parts are flawless

WE CERTIFY THAT THE ABOVE HOSE HAS BEEN MANUFACTURED IN ACCORDANCE WITH THE TERMS OF THE ORDER INSPECTED AND PRESSURE TESTED AS ABOVE WITH SATISFACTORY RESULT.

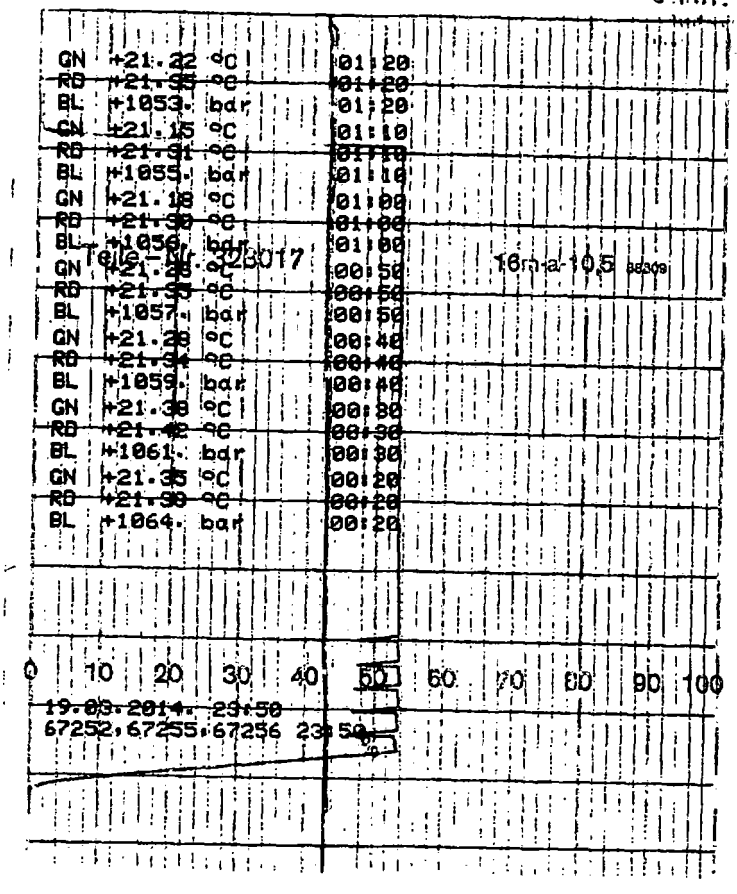
STATEMENT OF CONFORMITY: We hereby certify that the above items/equipment supplied by us are in conformity with the terms, conditions and specifications of the above Purchaser Order and that these items/equipment were fabricated inspected and tested in accordance with the referenced standards, codes and specifications and meet the relevant acceptance criteria and design requirements.

COUNTRY OF ORIGIN HUNGARY/EU

Date:	Inspector	Quality Control
20. March 2014.		ContiTech Rubber Industrial Kft. Quality Control Dept.

ATTACHMENT OF QUALITY CONTROL INSPECTION AND TEST CERTIFICATE *No: 501, 504, 505*

Page: 1 / 1



Hose Data Sheet

CRI Order No.	538236
Customer	ContiTech Oil & Marine Corp.
Customer Order No	4500409659
Item No.	1
Hose Type	Flexible Hose
Standard	**API SPEC 16 C**
Inside dia in inches	3
Length	35 ft
Type of coupling one end	FLANGE 4.1/16" 10K API SPEC 6A TYPE 6BX FLANGE C/W BX155 R.GR.SOUR
Type of coupling other end	FLANGE 4.1/16" 10K API SPEC 6A TYPE 6BX FLANGE C/W BX155 R.GR.SOUR
H2S service NACE MR0175	Yes
Working Pressure	10 000 psi
Design Pressure	10 000 psi
Test Pressure	15 000 psi
Safety Factor	2,25
Marking	USUAL PHOENIX
Cover	NOT FIRE RESISTANT
Outside protection	St.steel outer wrap
Internal stripwound tube	No
Lining	OIL + GAS RESISTANT SOUR
Safety clamp	No
Lifting collar	No
Element C	No
Safety chain	No
Safety wire rope	No
Max.design temperature [°C]	100
Min.design temperature [°C]	-20
Min. Bend Radius operating [m]	0,90
Min. Bend Radius storage [m]	0,90
Electrical continuity	The Hose is electrically continuous
Type of packing	WOODEN CRATE ISPM-15

APD ID: 10400036839 **Submission Date:** 12/06/2018

Operator Name: CENTENNIAL RESOURCE PRODUCTION LLC

Well Name: PAC-MAN 36 FEDERAL COM **Well Number:** 601H

Well Type: OIL WELL **Well Work Type:** Drill

[redacted]

Show Final Text

Section 1 - Existing Roads

Will existing roads be used? YES

Existing Road Map:

PAC_MAN_36_FED_COM_Existing_Road_map_20181130115628.pdf

Existing Road Purpose: ACCESS,FLUID TRANSPORT **Row(s) Exist?** YES

ROW ID(s)

ID:

Do the existing roads need to be improved? NO

Existing Road Improvement Description:

Existing Road Improvement Attachment:

Section 2 - New or Reconstructed Access Roads

Will new roads be needed? YES

New Road Map:

PAC_MAN_36_FED_COM_Existing_Road_map_20181130120020.pdf

New road type: COLLECTOR

Length: 897.62 Feet **Width (ft.):** 30

Max slope (%): 2 **Max grade (%):** 8

Army Corp of Engineers (ACOE) permit required? NO

ACOE Permit Number(s):

New road travel width: 30

New road access erosion control: Drainage and erosion will be constantly monitored to prevent compromising the road integrity and to protect the surrounding native topography.

New road access plan or profile prepared? NO

New road access plan attachment:

Access road engineering design? NO

Access road engineering design attachment:

Operator Name: CENTENNIAL RESOURCE PRODUCTION LLC

Well Name: PAC-MAN 36 FEDERAL COM **Well Number:** 601H

Turnout? N

Access surfacing type: OTHER

Access topsoil source: ONSITE

Access surfacing type description: Caliche

Access onsite topsoil source depth: 4

Offsite topsoil source description:

Onsite topsoil removal process: Equipment will be used to strip 4 inches in depth and stockpile, utilizing berms for run-off

Access other construction information:

Access miscellaneous information:

Number of access turnouts: **Access turnout map:**

Drainage Control

New road drainage crossing: OTHER

Drainage Control comments: Ditches will be utilized for drainage

Road Drainage Control Structures (DCS) description:

Road Drainage Control Structures (DCS) attachment:

TYPICAL_ACCESS_CROSS_SECTIONS_20180925155122.pdf

Access Additional Attachments

Section 3 - Location of Existing Wells

Existing Wells Map? YES

Attach Well map:

PAC_MAN_36_FED_COM_Existing_wells_20181130122219.pdf

Section 4 - Location of Existing and/or Proposed Production Facilities

Submit or defer a Proposed Production Facilities plan? SUBMIT

Production Facilities description: Handles/Separates Gas, Oil, and Water

Production Facilities map:

PAC_MAN_36_FED_COM_601H_Facilities_PLATS_20181130124253.pdf

Section 5 - Location and Types of Water Supply

Water Source Table

Operator Name: CENTENNIAL RESOURCE PRODUCTION LLC

Well Name: PAC-MAN 36 FEDERAL COM **Well Number:** 601H

Water source type: OTHER

Describe type: Private

Water source use type: SURFACE CASING

INTERMEDIATE/PRODUCTION CASING

STIMULATION

DUST CONTROL

Source latitude: **Source longitude:**

Source datum:

Water source permit type: PRIVATE CONTRACT

Water source transport method: PIPELINE

Source land ownership: PRIVATE

Source transportation land ownership: STATE

Water source volume (barrels): 350000 **Source volume (acre-feet):** 45.112583

Source volume (gal): 14700000

Water source and transportation map:

Pac_Man_water_transfer_map_20181130124432.pdf

Water source comments: Temporary surface lines will be used to transport water for drilling and completion operations from the East Gramma Ridge Pit to the Pac Man locations

New water well? NO

New Water Well Info

Well latitude: **Well Longitude:** **Well datum:**

Well target aquifer:

Est. depth to top of aquifer(ft): **Est thickness of aquifer:**

Aquifer comments:

Aquifer documentation:

Well depth (ft): **Well casing type:**

Well casing outside diameter (in.): **Well casing inside diameter (in.):**

New water well casing? **Used casing source:**

Drilling method: **Drill material:**

Grout material: **Grout depth:**

Operator Name: CENTENNIAL RESOURCE PRODUCTION LLC

Well Name: PAC-MAN 36 FEDERAL COM **Well Number:** 601H

Casing length (ft.): **Casing top depth (ft.):**

Well Production type: **Completion Method:**

Water well additional information:

State appropriation permit:

Additional information attachment:

Section 6 - Construction Materials

Using any construction materials: YES

Construction Materials description: Caliche will be hauled from the existing Limestone pit located in {NE4 NE4, Sec 21, T23S, R34E}. Pit has been identified for use in the attached exhibit. Any native caliche on the proposed site can be used by "flipping" the location and using all native soils.

Construction Materials source location attachment:

Pac_Man_caliche_route_map_20181130125001.pdf

Section 7 - Methods for Handling Waste

Waste type: DRILLING

Waste content description: Brine water based drilling fluid

Amount of waste: 1500 barrels

Waste disposal frequency : Monthly

Safe containment description: Steel tanks with plastic-lined containment berms

Safe containmant attachment:

Waste disposal type: HAUL TO COMMERCIAL FACILITY **Disposal location ownership:** COMMERCIAL

Disposal type description:

Disposal location description: Haul to a commercial facility

Waste type: DRILLING

Waste content description: Fresh water based drilling fluid.

Amount of waste: 1500 barrels

Waste disposal frequency : Weekly

Safe containment description: Steel tanks with plastic-lined containment berms.

Safe containmant attachment:

Waste disposal type: HAUL TO COMMERCIAL FACILITY **Disposal location ownership:** COMMERCIAL

Disposal type description:

Disposal location description: Commercial facility

Waste type: SEWAGE

Waste content description: Grey water/Human waste

Amount of waste: 5000 gallons

Waste disposal frequency : Weekly

Safe containment description: Approved waste storage tanks with containment.

Safe containmant attachment:

Waste disposal type: HAUL TO COMMERCIAL FACILITY **Disposal location ownership:** COMMERCIAL

Disposal type description:

Disposal location description: Commercial

Waste type: GARBAGE

Waste content description: General trash/garbage

Amount of waste: 5000 pounds

Waste disposal frequency : Weekly

Safe containment description: Enclosed trash trailer

Safe containmant attachment:

Waste disposal type: HAUL TO COMMERCIAL FACILITY **Disposal location ownership:** COMMERCIAL

Disposal type description:

Disposal location description: Haul to a commercial facility

Waste type: PRODUCED WATER

Waste content description: Produced water from the wellbore.

Amount of waste: 210000 gallons

Waste disposal frequency : Daily

Safe containment description: Containment built around the tanks, inside lined.

Safe containmant attachment:

Waste disposal type: OFF-LEASE INJECTION **Disposal location ownership:** COMMERCIAL

Disposal type description:

Disposal location description: Haul to commercial facility

Reserve Pit

Reserve Pit being used? NO

Temporary disposal of produced water into reserve pit?

Operator Name: CENTENNIAL RESOURCE PRODUCTION LLC

Well Name: PAC-MAN 36 FEDERAL COM **Well Number:** 601H

Reserve pit length (ft.) **Reserve pit width (ft.)**

Reserve pit depth (ft.) **Reserve pit volume (cu. yd.)**

Is at least 50% of the reserve pit in cut?

Reserve pit liner

Reserve pit liner specifications and installation description

Cuttings Area

Cuttings Area being used? NO

Are you storing cuttings on location? YES

Description of cuttings location Cuttings will be stored on site in steel tanks and hauled to an appropriate commercial facility when drilling operations are complete.

Cuttings area length (ft.) **Cuttings area width (ft.)**

Cuttings area depth (ft.) **Cuttings area volume (cu. yd.)**

Is at least 50% of the cuttings area in cut?

WCuttings area liner

Cuttings area liner specifications and installation description

Section 8 - Ancillary Facilities

Are you requesting any Ancillary Facilities?: NO

Ancillary Facilities attachment:

Comments:

Section 9 - Well Site Layout

Well Site Layout Diagram:

PAC_MAN_36_FED_COM_well_site_Layout_20181130125544.pdf

PAC_MAN_36_FED_COM__601H__Powerline___SWD_ROW_8_19_2019_20190912125304.pdf

Comments: 1. The pad is 665' x 345'. 2. The production facilities will be on the east side of the pad. It will be 345' x 100'. 3. The access road enters from the south side of the pad will be about 898' long. 4. We are tying into an existing power line. Powerline will run on along the access Rd.

Operator Name: CENTENNIAL RESOURCE PRODUCTION LLC

Well Name: PAC-MAN 36 FEDERAL COM **Well Number:** 601H

Section 10 - Plans for Surface Reclamation

Type of disturbance: New Surface Disturbance **Multiple Well Pad Name:** PAC-MAN 36 FEDERAL COM

Multiple Well Pad Number: 601H

Recontouring attachment:

PAC_MAN_36_FED_COM_IR_PLAT_20181130125841.pdf

Drainage/Erosion control construction: Drainage and erosion will be constantly monitored to prevent compromising the well site integrity, and to protect the surrounding native topography.

Drainage/Erosion control reclamation: Upon reclamation, well site will be returned to its native contour. Water breaks will be added if needed, to prevent unnatural erosion and loss of vegetation.

Well pad proposed disturbance (acres): 5.74

Road proposed disturbance (acres): 0.02

Powerline proposed disturbance (acres): 0.984

Pipeline proposed disturbance (acres): 0.127

Other proposed disturbance (acres): 0

Total proposed disturbance: 6.871

Well pad interim reclamation (acres): 0

Road interim reclamation (acres): 0

Powerline interim reclamation (acres): 0

Pipeline interim reclamation (acres): 0

Other interim reclamation (acres): 0

Total interim reclamation: 0

Well pad long term disturbance (acres): 2.92

Road long term disturbance (acres): 0.02

Powerline long term disturbance (acres): 0.117

Pipeline long term disturbance (acres): 0.127

Other long term disturbance (acres): 0

Total long term disturbance: 3.184

Disturbance Comments:

Reconstruction method: Come back in with heavy equipment, remove caliche in the reclamation area, and replace with native topsoil. Reconstruction of pad will occur once all wells on location have been drilled and completed.

Topsoil redistribution: Surface disturbance will be limited to well site surveyed dimensions. Topsoil will be stored along the west edge of the pad site.

Soil treatment: Native caliche will be used in the initial construction of the well pad. Pad will be compacted using fresh water, dust control measures will be implemented as needed.

Existing Vegetation at the well pad:

Existing Vegetation at the well pad attachment:

Existing Vegetation Community at the road:

Existing Vegetation Community at the road attachment:

Existing Vegetation Community at the pipeline:

Existing Vegetation Community at the pipeline attachment:

Existing Vegetation Community at other disturbances:

Existing Vegetation Community at other disturbances attachment:

Non native seed used? NO

Operator Name: CENTENNIAL RESOURCE PRODUCTION LLC

Well Name: PAC-MAN 36 FEDERAL COM **Well Number:** 601H

Non native seed description:

Seedling transplant description:

Will seedlings be transplanted for this project? NO

Seedling transplant description attachment:

Will seed be harvested for use in site reclamation? NO

Seed harvest description:

Seed harvest description attachment:

Seed Management

Seed Table

Seed type:

Seed source:

Seed name:

Source name:

Source address:

Source phone:

Seed cultivar:

Seed use location:

PLS pounds per acre:

Proposed seeding season:

Seed Summary

Total pounds/Acre:

Seed Type	Pounds/Acre

Seed reclamation attachment:

Operator Contact/Responsible Official Contact Info

First Name: Coral **Last Name:** Richline

Phone: (432)315-0119 **Email:** Coral.Richline@cdevinc.com

Seedbed prep: Prepare a 3-5 inch deep seedbed, with the top 3-4 inches consisting of topsoil.

Seed BMP: Seeding will be done in the proper season, and monitored for the re-establishment of native vegetation.

Seed method: Broadcast

Existing invasive species? NO

Existing invasive species treatment description:

Existing invasive species treatment attachment:

Weed treatment plan description: Spray for noxious weeds and bare ground as needed.

Weed treatment plan attachment:

Monitoring plan description: All disturbed areas will be closely monitored for any primary or secondary noxious weeds. Should any be found, chemical spraying in accordance with state regulations will be implemented.
Monitoring plan attachment:

Success standards: No primary or secondary noxious weed will be allowed. Vegetation will be returned to its native standard.
Pit closure description: No open pits will be constructed.

Pit closure attachment:

Section 11 - Surface Ownership

Disturbance type: WELL PAD

Describe:

Surface Owner: STATE GOVERNMENT

Other surface owner description:

BIA Local Office:

BOR Local Office:

COE Local Office:

DOD Local Office:

NPS Local Office:

State Local Office: STATE OF NEW MEXICO COMMISSIONER OF PUBLIC LANDS, SANTA FE, NEW MEXICO

Military Local Office:

USFWS Local Office:

Other Local Office:

USFS Region:

USFS Forest/Grassland: **USFS Ranger District:**

Disturbance type: EXISTING ACCESS ROAD

Describe:

Surface Owner: STATE GOVERNMENT

Other surface owner description:

BIA Local Office:

Operator Name: CENTENNIAL RESOURCE PRODUCTION LLC

Well Name: PAC-MAN 36 FEDERAL COM **Well Number:** 601H

BOR Local Office:

COE Local Office:

DOD Local Office:

NPS Local Office:

State Local Office: STATE OF NEW MEXICO COMMISSIONER OF PUBLIC LANDS, SANTA FE, NEW MEXICO

Military Local Office:

USFWS Local Office:

Other Local Office:

USFS Region:

USFS Forest/Grassland: **USFS Ranger District:**

Disturbance type: PIPELINE

Describe:

Surface Owner: STATE GOVERNMENT

Other surface owner description:

BIA Local Office:

BOR Local Office:

COE Local Office:

DOD Local Office:

NPS Local Office:

State Local Office: STATE OF NEW MEXICO COMMISSIONER OF PUBLIC LANDS, SANTA FE, NEW MEXICO

Military Local Office:

USFWS Local Office:

Other Local Office:

USFS Region:

USFS Forest/Grassland: **USFS Ranger District:**

Operator Name: CENTENNIAL RESOURCE PRODUCTION LLC

Well Name: PAC-MAN 36 FEDERAL COM **Well Number:** 601H

Disturbance type: OTHER

Describe: Power Line

Surface Owner: STATE GOVERNMENT

Other surface owner description:

BIA Local Office:

BOR Local Office:

COE Local Office:

DOD Local Office:

NPS Local Office:

State Local Office: STATE OF NEW MEXICO COMMISSIONER OF PUBLIC LANDS, SANTA FE, NEW MEXICO

Military Local Office:

USFWS Local Office:

Other Local Office:

USFS Region:

USFS Forest/Grassland: **USFS Ranger District:**

Section 12 - Other Information

Right of Way needed? NO **Use APD as ROW?**

ROW Type(s):

ROW Applications

SUPO Additional Information: FEE/FEE/FED

Use a previously conducted onsite? NO

Previous Onsite information:

Other SUPO Attachment

PAC_MAN_36_FED_COM_601H_ARCH_PLAT_20181130130518.pdf

BEGINNING AT THE INTERSECTION OF HIGHWAY 18 & HIGHWAY 128 FROM JAL, NEW MEXICO PROCEED IN A WESTERLY, THEN NORTHWESTERLY, THEN WESTERLY DIRECTION ALONG HIGHWAY 128 APPROXIMATELY 20.6 MILES TO THE JUNCTION OF THIS ROAD AND DELAWARE BASIN ROAD TO THE NORTH; TURN RIGHT AND PROCEED IN A NORTHERLY, THEN EASTERLY DIRECTION APPROXIMATELY 12.2 MILES TO THE JUNCTION OF THIS ROAD AND COUNTY ROAD 32 TO THE NORTH; TURN LEFT AND PROCEED IN A NORTHERLY DIRECTION APPROXIMATELY 1.0 MILES TO THE JUNCTION OF THIS ROAD AND AN EXISTING ROAD TO THE EAST; TURN RIGHT AND PROCEED IN AN EASTERLY, THEN NORTHEASTERLY DIRECTION APPROXIMATELY 0.3 MILES TO THE EXISTING PRYOR STATE 1H & 4H WELL PAD; PROCEED IN A SOUTHEASTERLY DIRECTION TO THE BEGINNING OF THE PROPOSED MORTAL KOMBAT 36 STATE COM #502H ACCESS ROAD TO THE SOUTHEAST; FOLLOW ROAD FLAGS IN A SOUTHEASTERLY DIRECTION APPROXIMATELY 196' TO THE BEGINNING OF THE PROPOSED ACCESS ROAD TO THE EAST; FOLLOW ROAD FLAGS IN A EASTERLY, THEN NORTHERLY DIRECTION APPROXIMATELY 898' TO THE PROPOSED LOCATION.

TOTAL DISTANCE FROM JAL, NEW MEXICO TO THE PROPOSED WELL LOCATION IS APPROXIMATELY 34.3 MILES.

CENTENNIAL RESOURCE PRODUCTION, LLC

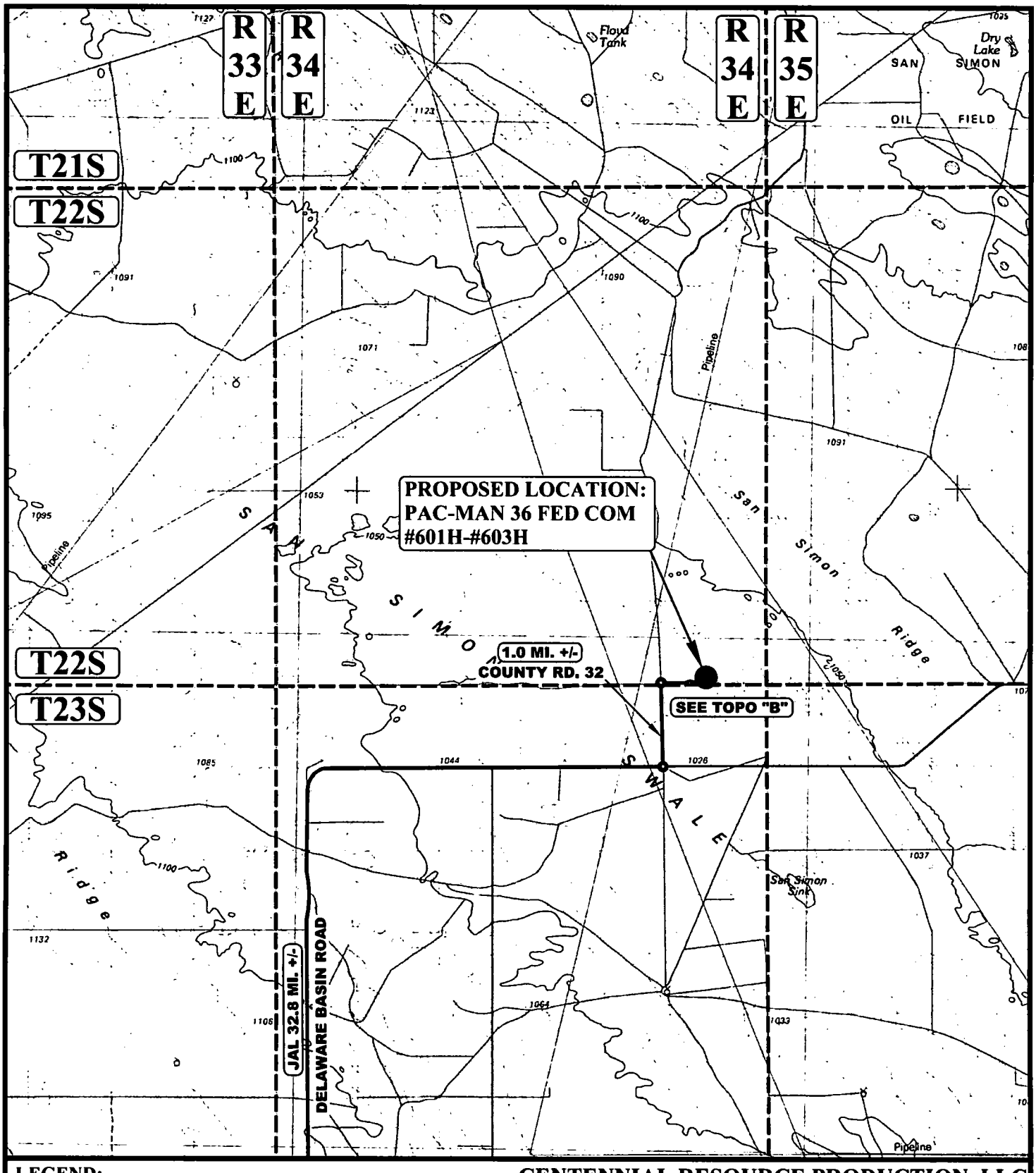
PAC-MAN 36 FED COM #601H-#603H ON EXISTING MORTAL KOMBAT 36 STATE COM #502H
S 1/2 SW 1/4, SECTION 36, T22S, R34E, N.M.P.M.
LEA COUNTY, NEW MEXICO

UINTAH ENGINEERING & LAND SURVEYING

UELS, LLC
Corporate Office * 85 South 200 East
Vernal, UT 84078 * (435) 789-1017

SURVEYED BY	B.B., M.W.	09-19-18	
DRAWN BY	C.D.	09-22-18	

ROAD DESCRIPTION



LEGEND:

● PROPOSED LOCATION

CENTENNIAL RESOURCE PRODUCTION, LLC

N

PAC-MAN 36 FED COM #601H-#603H ON EXISTING MORTAL KOMBAT 36 STATE COM #502H
S 1/2 SW 1/4, SECTION 36, T22S, R34E, N.M.P.M.
LEA COUNTY, NEW MEXICO

SURVEYED BY	B.B., M.W.	09-19-18	SCALE
DRAWN BY	C.D.	09-22-18	1 : 100,000

ACCESS ROAD MAP **TOPO A**

UINTAH ENGINEERING & LAND SURVEYING

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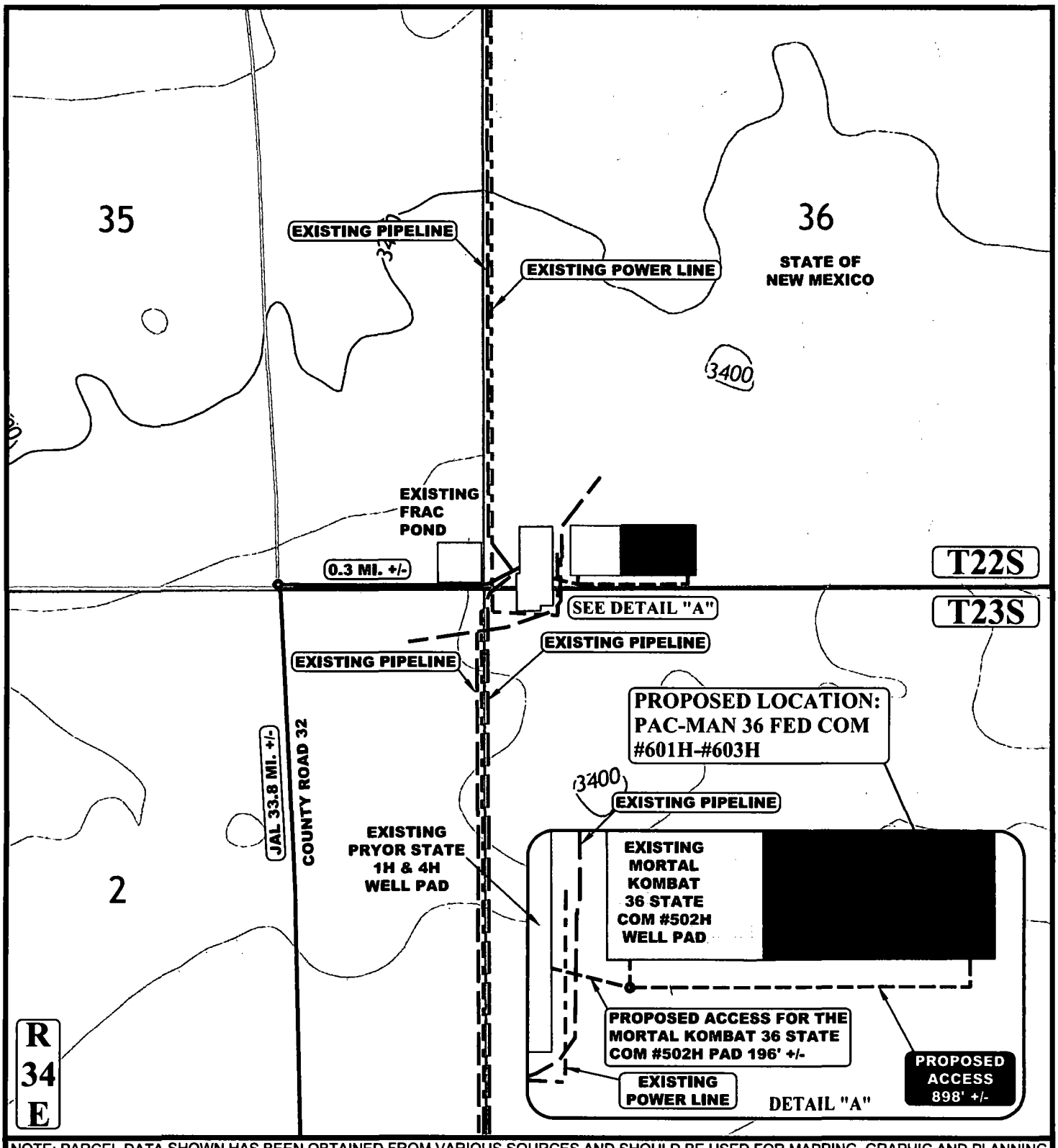

NOTE: PARCEL DATA SHOWN HAS BEEN OBTAINED FROM VARIOUS SOURCES AND SHOULD BE USED FOR MAPPING, GRAPHIC AND PLANNING PURPOSES ONLY. NO WARRANTY IS MADE BY UINTAH ENGINEERING AND LAND SURVEYING (UELS) FOR ACCURACY OF THE PARCEL DATA.

LEGEND:

- EXISTING ROAD
- PROPOSED ROAD
- PROPOSED ROAD (SERVICING OTHER WELLS)
- EXISTING PIPELINE
- EXISTING POWER LINE

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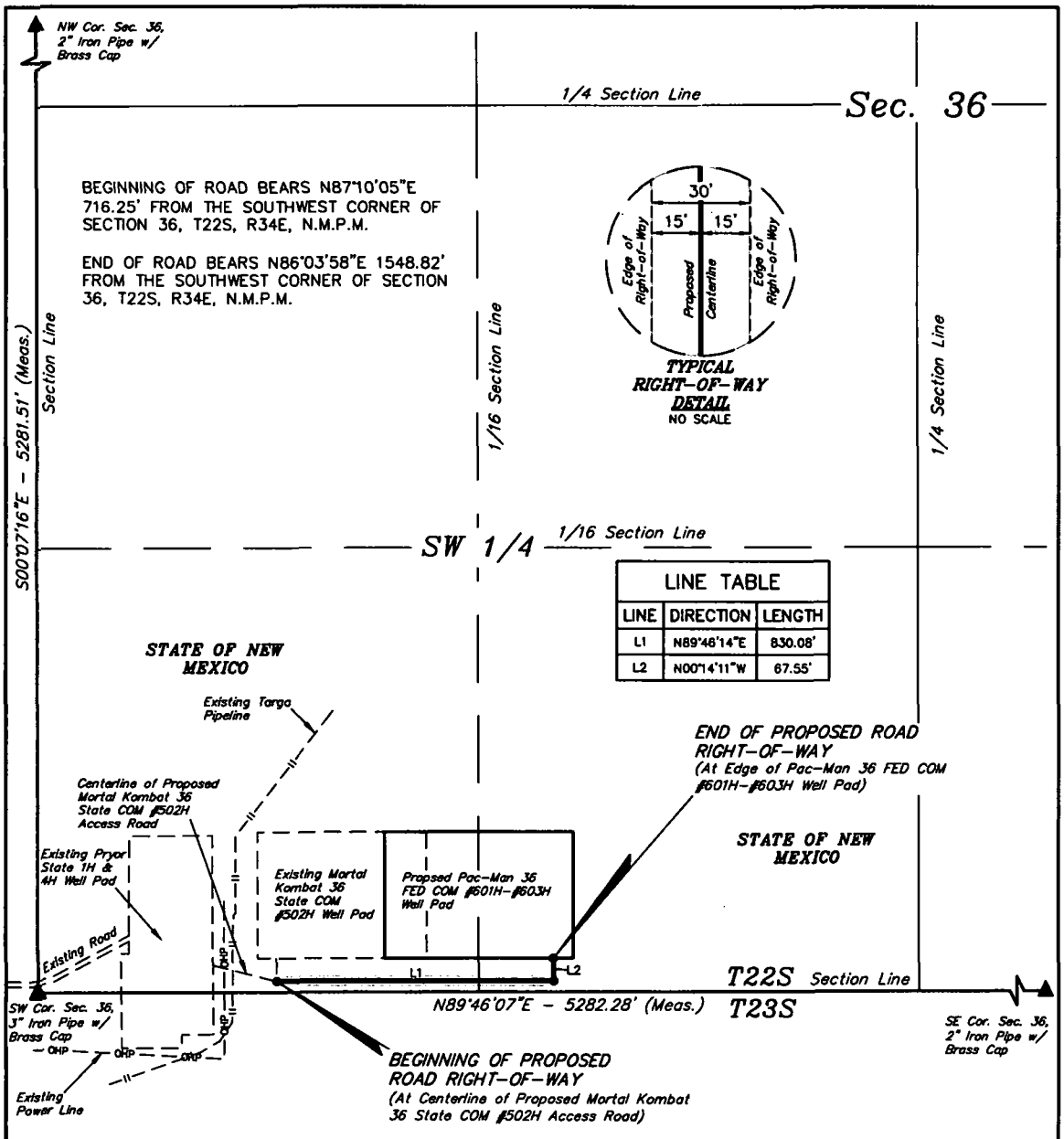
N

CENTENNIAL RESOURCE PRODUCTION, LLC

PAC-MAN 36 FED COM #601H-#603H ON EXISTING MORTAL KOMBAT 36 STATE COM #502H
S 1/2 SW 1/4, SECTION 36, T22S, R34E, N.M.P.M.
LEA COUNTY, NEW MEXICO

SURVEYED BY	B.B., M.W.	09-19-18	SCALE
DRAWN BY	C.D.	09-22-18	1 : 24,000

ACCESS ROAD MAP **TOPO B**



ROAD RIGHT-OF-WAY DESCRIPTION

A 30' WIDE RIGHT-OF-WAY 15' ON EACH SIDE OF THE FOLLOWING DESCRIBED CENTERLINE.

BEGINNING AT A POINT IN THE SW 1/4 SW 1/4 OF SECTION 36, T22S, R34E, N.M.P.M., WHICH BEARS N87°10'05"E 716.25' FROM THE SOUTHWEST CORNER OF SAID SECTION 36, THENCE N89°46'14"E 830.08'; THENCE N00°14'11"W 67.55' TO A POINT IN THE SE 1/4 SW 1/4 OF SAID SECTION 36, WHICH BEARS N86°03'58"E 1548.82' FROM THE SOUTHWEST CORNER OF SAID SECTION 36. THE SIDE LINES OF SAID DESCRIBED RIGHT-OF-WAY BEING SHORTENED OR ELONGATED TO MEET THE GRANTOR'S PROPERTY LINES. BASIS OF BEARINGS IS A TRANSVERSE MERCATOR PROJECTION WITH A CENTRAL MERIDIAN OF W103°53'00". CONTAINS 0.618 ACRES MORE OR LESS.

400' 200' 0' 400'

ACREAGE / LENGTH TABLE

	OWNERSHIP	FEET	RODS	ACRES
SEC. 36 (SW 1/4 SW 1/4)	STATE OF NEW MEXICO	605.12	36.67	0.417
SEC. 36 (SE 1/4 SW 1/4)	STATE OF NEW MEXICO	292.50	17.73	0.201
TOTAL		897.62	54.40	0.618

CERTIFICATE
THIS IS TO CERTIFY THAT THIS EASEMENT PLAT AND THE ACTUAL SURVEY ON THE GROUND UPON WHICH IT IS BASED WERE PERFORMED BY ME OR UNDER MY DIRECT SUPERVISION; THAT I AM RESPONSIBLE FOR THIS SURVEY; THAT THIS SURVEY MEETS THE MINIMUM STANDARDS FOR SURVEYING IN NEW MEXICO; AND THAT IT IS TRUE AND CORRECT TO THE BEST OF MY KNOWLEDGE AND BELIEF.

Paul Buchanan 23782 09-23-18 PROFESSIONAL SURVEYOR

▲ = SECTION CORNERS LOCATED.

FILE: 64716

NOTES:
- The maximum grade of existing ground for the proposed access road is ±1.4%.
- Basis of Bearings is a Transverse Mercator Projection with a Central Meridian of W103°53'00"

N

CENTENNIAL RESOURCE PRODUCTION, LLC

PAC-MAN 36 FED COM #601H-#603H
ON STATE OF NEW MEXICO LANDS IN
SECTION 36, T22S, R34E, N.M.P.M.
LEA COUNTY, NEW MEXICO

SURVEYED BY	B.B.	09-19-18	SCALE
DRAWN BY	C.D.	09-22-18	1" = 400'

ACCESS ROAD R-O-W

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UELS, LLC
Corporate Office * 85 South 200 East
Vernal, UT 84078 * (435) 789-1017

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CENTENNIAL RESOURCE PRODUCTION, LLC

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S 1/2 SW 1/4, SECTION 36, T22S, R34E, N.M.P.M.
LEA COUNTY, NEW MEXICO

UINTAH ENGINEERING & LAND SURVEYING

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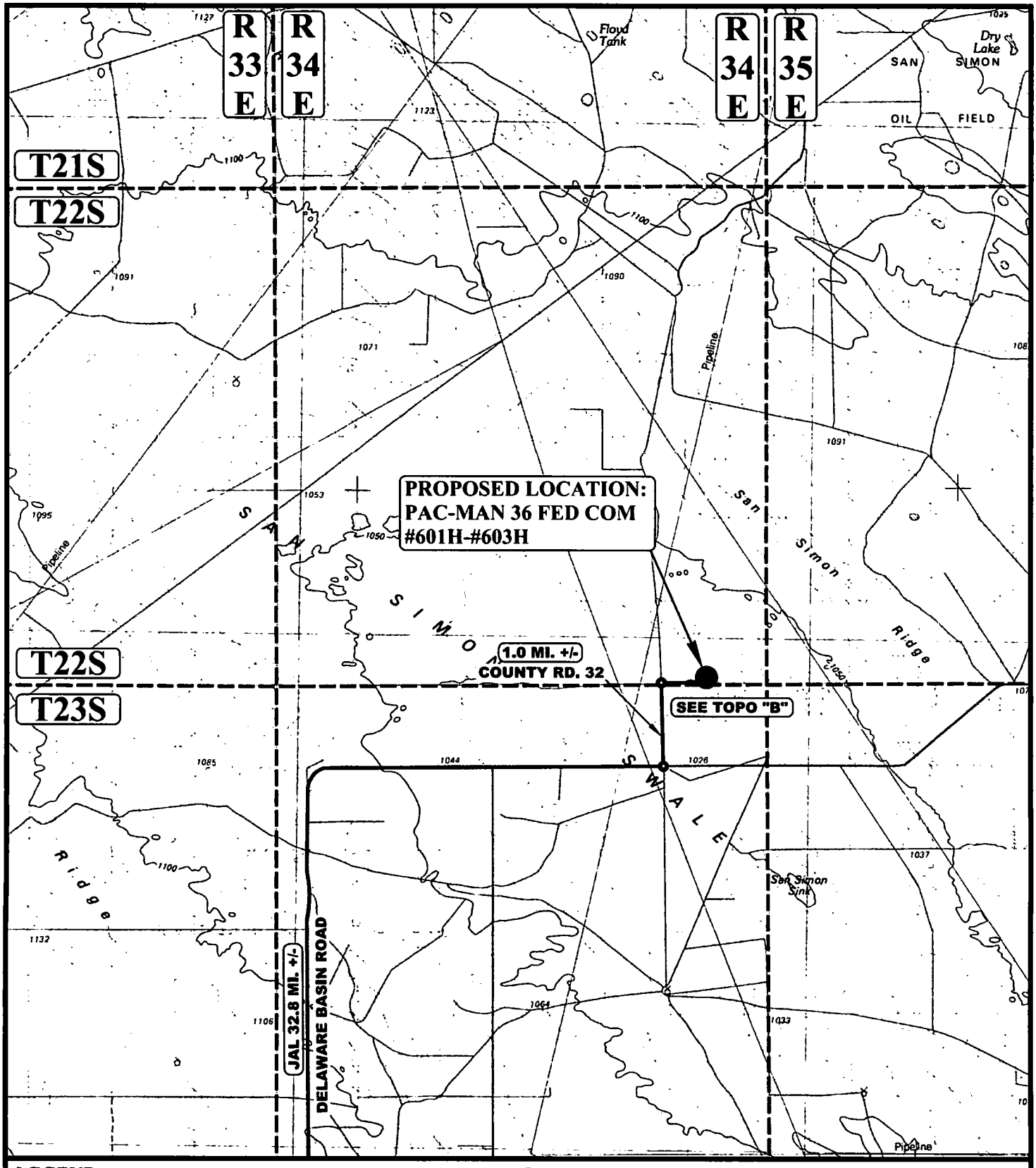
SURVEYED BY	B.B., M.W.	09-19-18	
DRAWN BY	C.D.	09-22-18	

ROAD DESCRIPTION



LEGEND:

● PROPOSED LOCATION

CENTENNIAL RESOURCE PRODUCTION, LLC

N

PAC-MAN 36 FED COM #601H-#603H ON EXISTING MORTAL KOMBAT 36 STATE COM #502H
S 1/2 SW 1/4, SECTION 36, T22S, R34E, N.M.P.M.
LEA COUNTY, NEW MEXICO

SURVEYED BY	B.B., M.W.	09-19-18	SCALE
DRAWN BY	C.D.	09-22-18	1 : 100,000

ACCESS ROAD MAP **TOPO A**

UINTAH ENGINEERING & LAND SURVEYING

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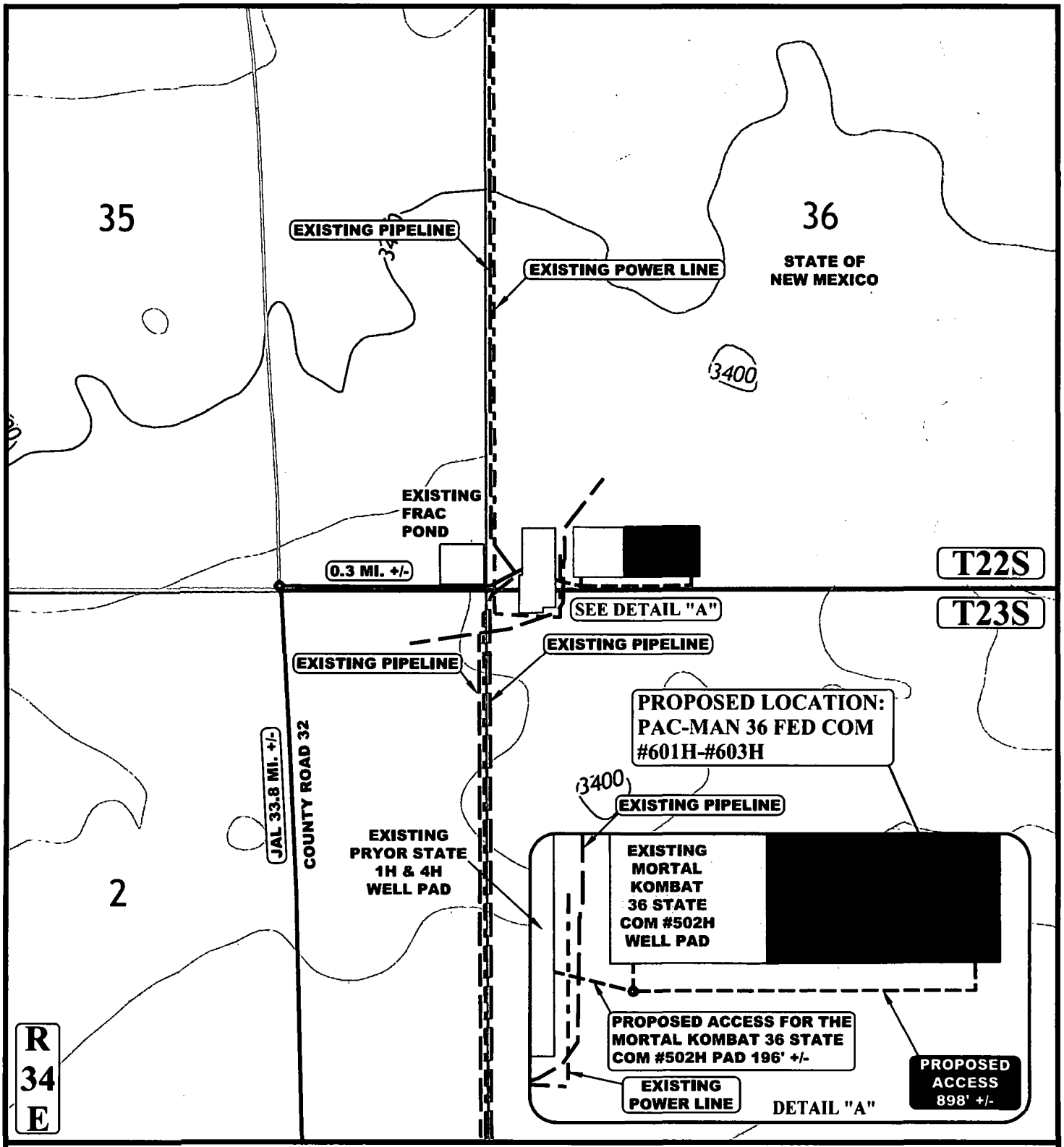

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LEGEND:

- EXISTING ROAD
- PROPOSED ROAD
- PROPOSED ROAD (SERVICING OTHER WELLS)
- EXISTING PIPELINE
- EXISTING POWER LINE

UINTAH ENGINEERING & LAND SURVEYING

UELS, LLC
Corporate Office * 85 South 200 East
Vernal, UT 84078 * (435) 789-1017

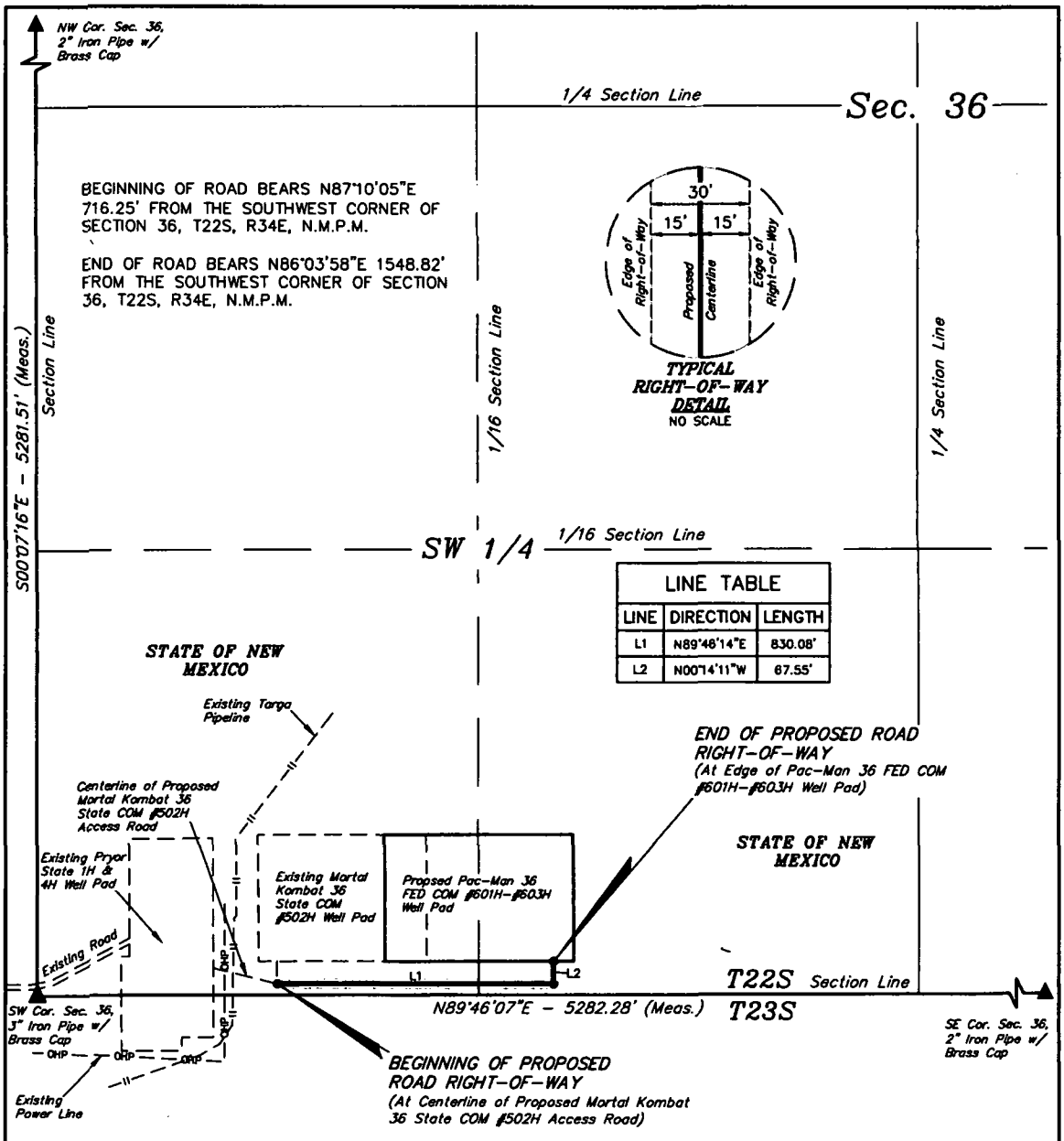
N

CENTENNIAL RESOURCE PRODUCTION, LLC

PAC-MAN 36 FED COM #601H-#603H ON EXISTING MORTAL KOMBAT 36 STATE COM #502H
S 1/2 SW 1/4, SECTION 36, T22S, R34E, N.M.P.M.
LEA COUNTY, NEW MEXICO

SURVEYED BY	B.B., M.W.	09-19-18	SCALE
DRAWN BY	C.D.	09-22-18	1 : 24,000

ACCESS ROAD MAP **TOPO B**



ROAD RIGHT-OF-WAY DESCRIPTION

A 30' WIDE RIGHT-OF-WAY 15' ON EACH SIDE OF THE FOLLOWING DESCRIBED CENTERLINE.

BEGINNING AT A POINT IN THE SW 1/4 SW 1/4 OF SECTION 36, T22S, R34E, N.M.P.M., WHICH BEARS N87°10'05"E 716.25' FROM THE SOUTHWEST CORNER OF SAID SECTION 36, THENCE N89°46'14"E 830.08'; THENCE N00°14'11"W 67.55' TO A POINT IN THE SE 1/4 SW 1/4 OF SAID SECTION 36, WHICH BEARS N86°03'58"E 1548.82' FROM THE SOUTHWEST CORNER OF SAID SECTION 36. THE SIDE LINES OF SAID DESCRIBED RIGHT-OF-WAY BEING SHORTENED OR ELONGATED TO MEET THE GRANTOR'S PROPERTY LINES. BASIS OF BEARINGS IS A TRANSVERSE MERCATOR PROJECTION WITH A CENTRAL MERIDIAN OF W103°53'00". CONTAINS 0.618 ACRES MORE OR LESS.

400' 200' 0' 400'

ACREAGE / LENGTH TABLE

	OWNERSHIP	FEET	RODS	ACRES
SEC. 36 (SW 1/4 SW 1/4)	STATE OF NEW MEXICO	605.12	36.67	0.417
SEC. 36 (SE 1/4 SW 1/4)	STATE OF NEW MEXICO	292.50	17.73	0.201
TOTAL		897.62	54.40	0.618

▲ = SECTION CORNERS LOCATED.

FILE: 64716

CERTIFICATE
THIS IS TO CERTIFY THAT THIS EASEMENT PLAT AND THE ACTUAL SURVEY ON THE GROUND UPON WHICH IT IS BASED WERE PERFORMED BY ME OR UNDER MY DIRECT SUPERVISION; THAT I AM RESPONSIBLE FOR THIS SURVEY; THAT THIS SURVEY MEETS THE MINIMUM STANDARDS FOR SURVEYING IN NEW MEXICO; AND THAT IT IS TRUE AND CORRECT TO THE BEST OF MY KNOWLEDGE AND BELIEF.

23782
09-23-18
PROFESSIONAL SURVEYOR

NOTES:
- The maximum grade of existing ground for the proposed access road is ±1.4%.
- Basis of Bearings is a Transverse Mercator Projection with a Central Meridian of W103°53'00"

N

CENTENNIAL RESOURCE PRODUCTION, LLC

PAC-MAN 36 FED COM #601H-#603H
ON STATE OF NEW MEXICO LANDS IN
SECTION 36, T22S, R34E, N.M.P.M.
LEA COUNTY, NEW MEXICO

SURVEYED BY	B.B.	09-19-18	SCALE
DRAWN BY	C.D.	09-22-18	1" = 400'

ACCESS ROAD R-O-W

UINTAH ENGINEERING & LAND SURVEYING
UELS, LLC
Corporate Office * 85 South 200 East
Vernal, UT 84078 * (435) 789-1017

CENTENNIAL RESOURCE PRODUCTION, LLC

SHEET: 1
DATE: 02-08-2018

GEOMETRIC SPECIFICATIONS

GRAVEL SPECIFICATION:

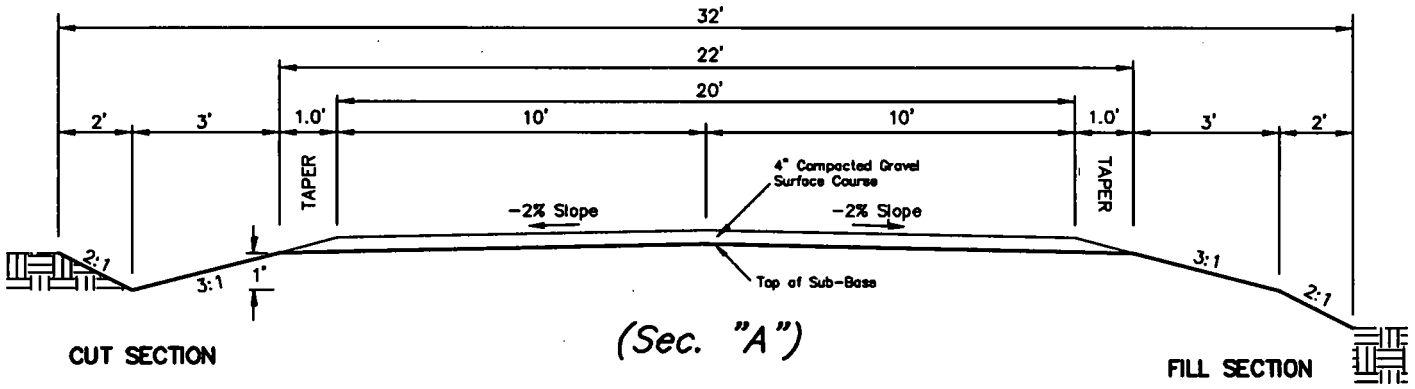
3" minus pit run gravel (AASHTO M145-49 A-1-a Soil)

Do not place gravel on road until Inspector/Engineer has approved the sub-grade.

Place gravel to full widened width on turnouts, curve widening, and intersection flares.

TYPICAL CROSS SECTIONS

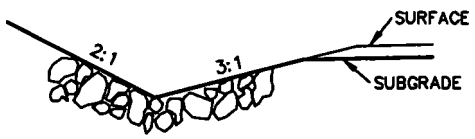
(for Proposed Access Road)



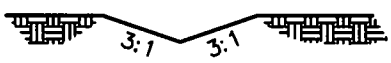
CUT SECTION

(Sec. "A")

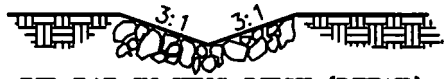
FILL SECTION



RIP RAP IN BAR DITCH
(Only Where Specified)

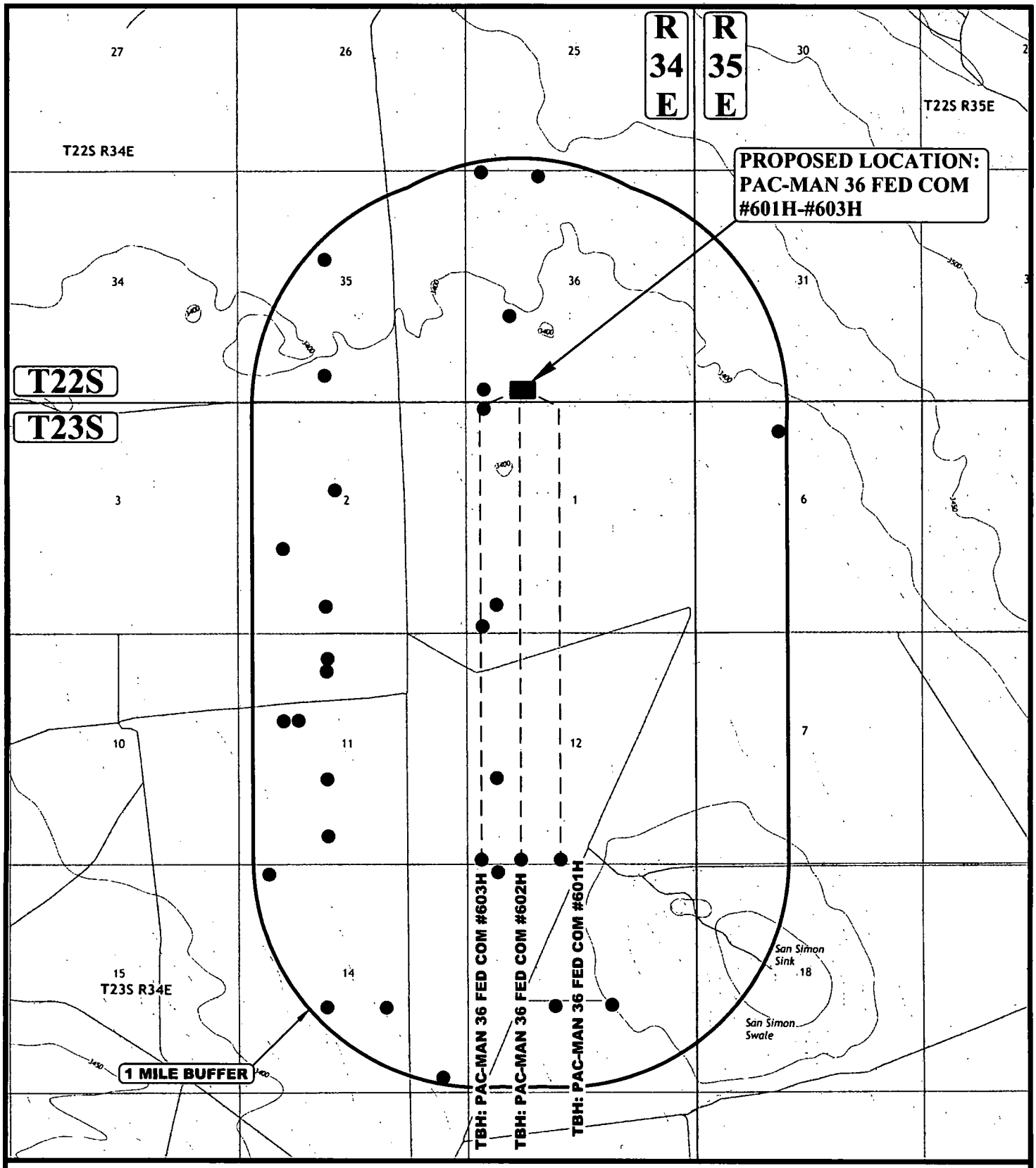


WING DITCH (DETAIL)



RIP RAP IN WING DITCH (DETAIL)
(Only Where Specified)

UINTAH ENGINEERING & LAND SURVEYING
85 So. 200 East Vernal, Utah



LEGEND:

● EXISTING WELLS

CENTENNIAL RESOURCE PRODUCTION, LLC

PAC-MAN 36 FED COM #601H-#603H ON EXISTING MORTAL KOMBAT 36 STATE COM #502H
S 1/2 SW 1/4, SECTION 36, T22S, R34E, N.M.P.M.
LEA COUNTY, NEW MEXICO

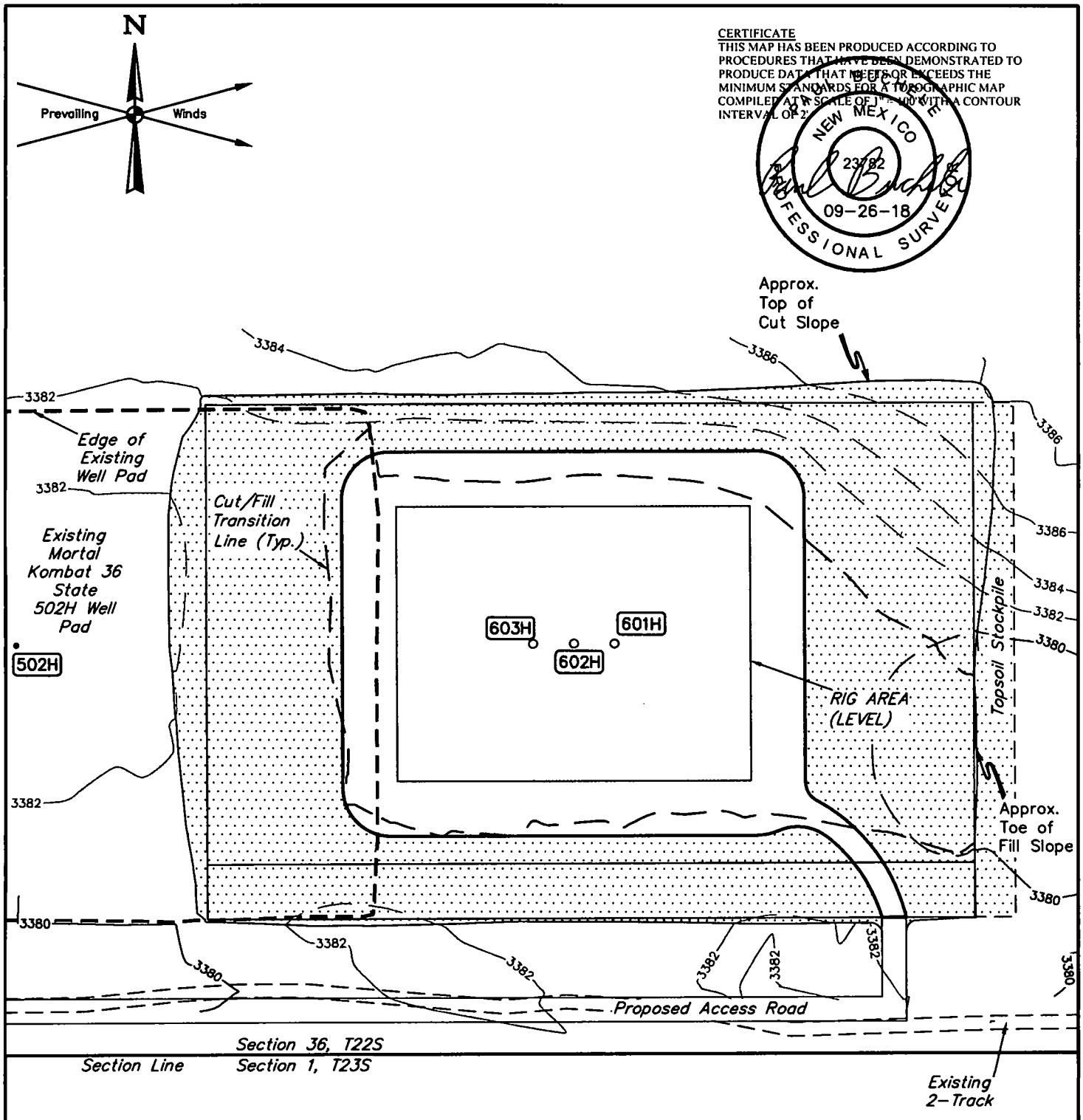
SURVEYED BY	B.B., M.W.	09-19-18	SCALE
DRAWN BY	C.D.	09-22-18	1 : 36,000

WELL PROXIMITY MAP **TOPO C**

UINTAH ENGINEERING & LAND SURVEYING

UELS, LLC
Corporate Office * 85 South 200 East
Vernal, UT 84078 * (435) 789-1017

API	well_type	wellname	section	township	range	unit_ltr	ogrid_name	pool_id_list	Well Type	Well Status	x	y
30-025-08482	O	PRE-ONGARD WELL #001	1	23S	34E	M	PRE-ONGARD WELL OPERATOR	No Data	Oil	Plugged (Site Released	-1.2E+07	3808469
30-025-08484	O	PRE-ONGARD WELL #001	13	23S	34E	J	PRE-ONGARD WELL OPERATOR	No Data	Oil	Plugged (Site Released	-1.2E+07	3803128
30-025-25922	O	PRE-ONGARD WELL #001	13	23S	34E	K	PRE-ONGARD WELL OPERATOR	No Data	Oil	Plugged (Site Released	-1.2E+07	3803128
30-025-26692	S	CAZA RIDGE 14 STATE #001	14	23S	34E	J	CAZA OPERATING, LLC	[2205] ANTELOPE RIDGE, BONE SPRING, NORTH; [70360] ANTELOPE RIDGE,	Salt Water Disposal	Plugged (Site Released	-1.2E+07	3803128
30-025-27097	O	PRE-ONGARD WELL #001	2	23S	34E	G	PRE-ONGARD WELL OPERATOR	No Data	Oil	Cancelled APD	-1.2E+07	3807426
30-025-27166	G	ANTELOPE 8006 JVP #001	2	23S	34E	F	BTA OIL PRODUCERS, LLC	[70360] ANTELOPE RIDGE, ATOKA (GAS)	Gas	Active	-1.2E+07	3807427
30-025-27200	O	MADDOX #001	12	23S	34E	L	MID-AMERICA PET INC	[66453] LEA UNDESIGNATED, GROUP 10	Oil	Plugged (Site Released	-1.2E+07	3805038
30-025-27310	O	HUDSON STATE 8006 JV-P #001	11	23S	34E	C	BTA OIL PRODUCERS	No Data	Oil	Plugged (Site Released	-1.2E+07	3805992
30-025-27364	O	HUDSON STATE 8006 JV-P #001Y	11	23S	34E	C	BTA OIL PRODUCERS, LLC	[70360] ANTELOPE RIDGE, ATOKA (GAS); [70400] ANTELOPE RIDGE, DEVON	Oil	Active	-1.2E+07	3805920
30-025-27486	S	STATE 2 8016 JV-P #001	2	23S	34E	N	BTA OIL PRODUCERS, LLC	[70360] ANTELOPE RIDGE, ATOKA (GAS); [96039] WILDCAT, GROUP 8; [961	Salt Water Disposal	Plugged (Not Released)	-1.2E+07	3806470
30-025-27516	O	PRE-ONGARD WELL #001	11	23S	34E	N	PRE-ONGARD WELL OPERATOR	No Data	Oil	Plugged (Site Released	-1.2E+07	3804560
30-025-27644	G	PRE-ONGARD WELL #001Y	11	23S	34E	N	PRE-ONGARD WELL OPERATOR	[70360] ANTELOPE RIDGE, ATOKA (GAS)	Gas	Plugged (Site Released	-1.2E+07	3804560
30-025-27760	O	ANTELOPE 8006 JVP #002	2	23S	34E	F	BTA OIL PRODUCERS	No Data	Oil	Cancelled APD	-1.2E+07	3807427
30-025-27824	G	MADDOX FEDERAL 8016 JV-P #001	35	22S	34E	N	BTA OIL PRODUCERS, LLC	[70360] ANTELOPE RIDGE, ATOKA (GAS)	Gas	Plugged (Site Released	-1.2E+07	3808383
30-025-30092	O	PRE-ONGARD WELL #001	36	22S	34E	L	PRE-ONGARD WELL OPERATOR	No Data	Oil	Plugged (Site Released	-1.2E+07	3808859
30-025-30535	G	BRIAN 8036 JV-P #001	11	23S	34E	L	BTA OIL PRODUCERS, LLC	[70360] ANTELOPE RIDGE, ATOKA (GAS)	Gas	Active	-1.2E+07	3805038
30-025-40396	O	PRYOR STATE COM #001H	36	22S	34E	M	CENTENNIAL RESOURCE PRODUCTION, LLC	[97293] OJO CHISO, BONE SPRING, SOUTH	Oil	Active	-1.2E+07	3808262
30-025-40715	O	PRYOR STATE COM #002C	36	22S	34E	N	GMT EXPLORATION COMPANY LLC	[96553] OJO CHISO, BONE SPRING; [97293] OJO CHISO, BONE SPRING, SOUT	Oil	Cancelled APD	-1.2E+07	3808149
30-025-40716	O	PRYOR STATE COM #006C	36	22S	34E	O	GMT EXPLORATION COMPANY LLC	[96553] OJO CHISO, BONE SPRING; [97293] OJO CHISO, BONE SPRING, SOUT	Oil	Cancelled APD	-1.2E+07	3808148
30-025-40717	O	PRYOR STATE COM #004D	1	23S	34E	4	GMT EXPLORATION COMPANY LLC	[97293] OJO CHISO, BONE SPRING, SOUTH	Oil	Cancelled APD	-1.2E+07	3808135
30-025-40844	O	PRYOR STATE COM #005C	36	22S	34E	M	GMT EXPLORATION COMPANY LLC	[97293] OJO CHISO, BONE SPRING, SOUTH	Oil	Cancelled APD	-1.2E+07	3808150
30-025-40862	O	PRYOR FEDERAL STATE COM #004H	1	23S	34E	4	CENTENNIAL RESOURCE PRODUCTION, LLC	[97293] OJO CHISO, BONE SPRING, SOUTH	Oil	Active	-1.2E+07	3808135
30-025-41773	O	HUDSON STATE 8016 JV-P #003C	2	23S	34E	H	BTA OIL PRODUCERS, LLC	[97293] OJO CHISO, BONE SPRING, SOUTH	Oil	Cancelled APD	-1.2E+07	3807248
30-025-42093	O	PRYOR DBR FEDERAL STATE COM #001H	1	23S	34E	M	CENTENNIAL RESOURCE PRODUCTION, LLC	[97293] OJO CHISO, BONE SPRING, SOUTH	Oil	Active	-1.2E+07	3806303
30-025-42519	O	BANTER STATE COM #004H	13	23S	34E	D	COG OPERATING LLC	[2205] ANTELOPE RIDGE, BONE SPRING, NORTH	Oil	Active	-1.2E+07	3804252
30-025-42981	S	LIMESTONE SWD #002C	12	23S	34E	A	OWL SWD OPERATING, LLC	[96101] SWD, DEVONIAN	Salt Water Disposal	Cancelled APD	-1.2E+07	3806142
30-025-43423	O	ORYX 14 B3CN FEDERAL COM #001H	14	23S	34E	C	MEWBOURNE OIL CO	[2209] ANTELOPE RIDGE, BONE SPRING, WEST	Oil	New (Not Drilled/Completed)	-1.2E+07	3804252
30-025-43519	O	DOUBLE DRAGON 12 #001H	12	23S	34E	C	CENTENNIAL RESOURCE PRODUCTION, LLC	[2205] ANTELOPE RIDGE, BONE SPRING, NORTH	Oil	New (Not Drilled/Completed)	-1.2E+07	3806159
30-025-43520	O	DUCK HUNT 12 #001H	12	23S	34E	B	CENTENNIAL RESOURCE PRODUCTION, LLC	[2205] ANTELOPE RIDGE, BONE SPRING, NORTH	Oil	New (Not Drilled/Completed)	-1.2E+07	3806159
30-025-43521	O	NINJA GAIDEN 12 #001C	12	23S	34E	A	CENTENNIAL RESOURCE PRODUCTION, LLC	[2205] ANTELOPE RIDGE, BONE SPRING, NORTH	Oil	Cancelled APD	-1.2E+07	3806160
30-025-44963	O	DUCK HUNT 1 STATE COM #501C	1	23S	34E	I	CENTENNIAL RESOURCE PRODUCTION, LLC	[2205] ANTELOPE RIDGE, BONE SPRING, NORTH	Oil	Cancelled APD	-1.2E+07	3807078
30-025-44964	O	DUCK HUNT 1 STATE COM #602C	1	23S	34E	I	CENTENNIAL RESOURCE PRODUCTION, LLC	[2205] ANTELOPE RIDGE, BONE SPRING, NORTH	Oil	Cancelled APD	-1.2E+07	3807078
30-025-45063	O	MORTAL KOMBAT 36 STATE COM #502H	36	22S	34E	M	CENTENNIAL RESOURCE PRODUCTION, LLC	[97293] OJO CHISO, BONE SPRING, SOUTH	Oil	Active	-1.2E+07	3808253
30-025-45264	O	DUCK HUNT 1 STATE COM #301H	1	23S	34E	I	CENTENNIAL RESOURCE PRODUCTION, LLC	[2205] ANTELOPE RIDGE, BONE SPRING, NORTH	Oil	New (Not Drilled/Completed)	-1.2E+07	3807078
30-025-45265	O	DUCK HUNT 1 STATE COM #501H	1	23S	34E	I	CENTENNIAL RESOURCE PRODUCTION, LLC	[2205] ANTELOPE RIDGE, BONE SPRING, NORTH	Oil	New (Not Drilled/Completed)	-1.2E+07	3807078
30-025-45266	O	DUCK HUNT 1 STATE COM #601H	1	23S	34E	I	CENTENNIAL RESOURCE PRODUCTION, LLC	[2205] ANTELOPE RIDGE, BONE SPRING, NORTH	Oil	New (Not Drilled/Completed)	-1.2E+07	3807078



LEGEND:

Reclaimed Area

APPROXIMATE PRODUCTION PAD ACREAGE = ±2.209 ACRES
APPROXIMATE RECLAIMED AREA ACREAGE = ±2.026 ACRES
TOTAL ACREAGE = ±4.235 ACRES

NOTES:

- Contours shown at 2' intervals.

CENTENNIAL RESOURCE PRODUCTION, LLC

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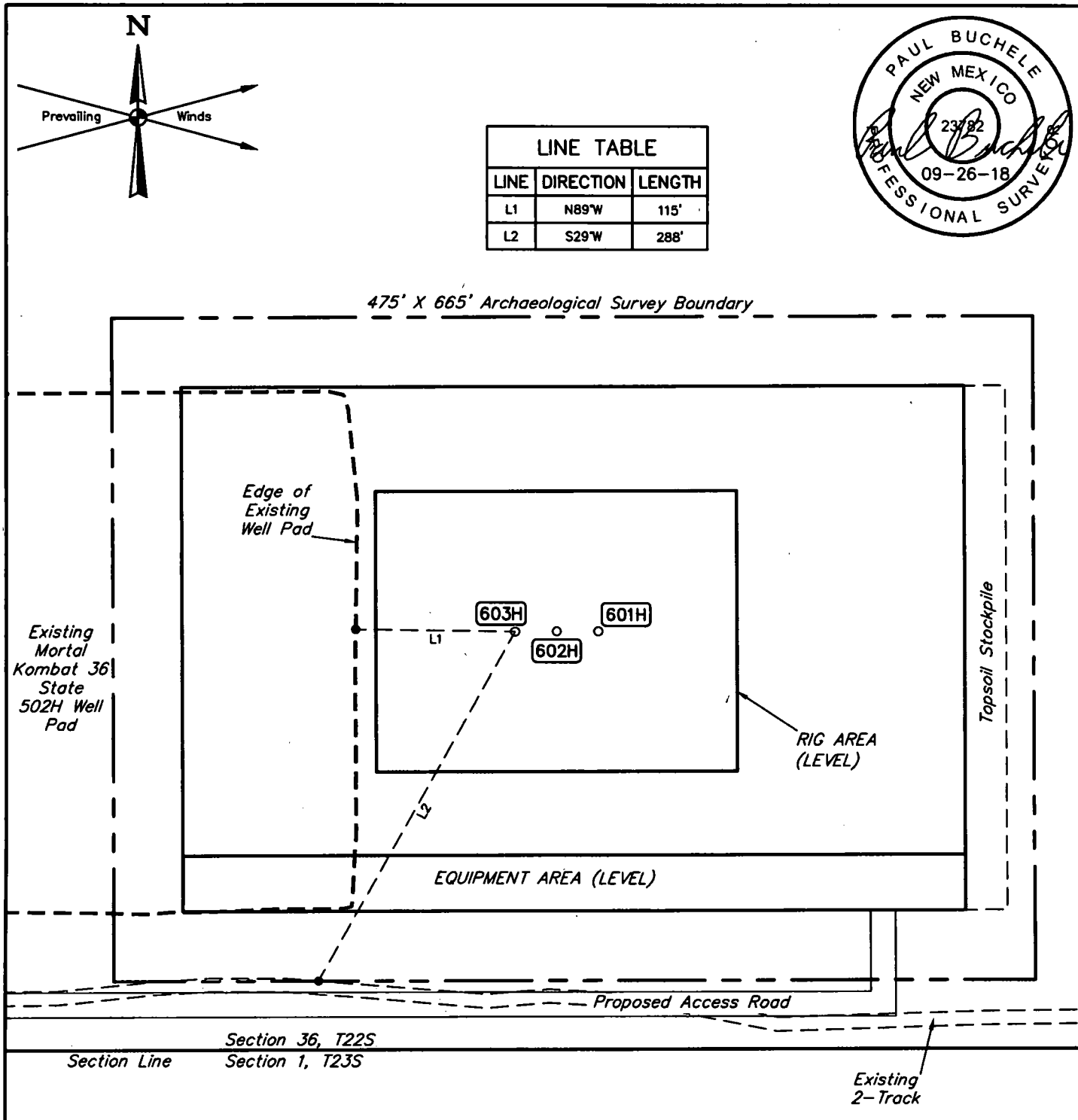
S 1/2 SW 1/4, SECTION 36, T22S, R34E, N.M.P.M.
LEA COUNTY, NEW MEXICO

UINTAH ENGINEERING & LAND SURVEYING

UELS, LLC
Corporate Office * 85 South 200 East
Vernal, UT 84078 * (435) 789-1017

SURVEYED BY	B.B.	09-19-18	SCALE
DRAWN BY	C.D.	09-22-18	1" = 100'

RECLAMATION DIAGRAM FIGURE #4



PAUL BUCHELE
NEW MEXICO
23782
09-26-18
PROFESSIONAL SURVEYOR

LINE TABLE		
LINE	DIRECTION	LENGTH
L1	N89°W	115'
L2	S29°W	288'

NOTES:

- Basis of Bearings is a Transverse Mercator Projection with a Central Meridian of W103°53'00"

CENTENNIAL RESOURCE PRODUCTION, LLC

PAC-MAN 36 FED COM #601H-#603H ON EXISTING MORTAL KOMBAT 36 STATE COM #502H
S 1/2 SW 1/4, SECTION 36, T22S, R34E, N.M.P.M.
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SURVEYED BY	B.B.	09-19-18	SCALE
DRAWN BY	C.D.	09-22-18	1" = 100'

ARCHAEOLOGICAL SURVEY BOUNDARY **FIGURE #5**

BEGINNING AT THE INTERSECTION OF HIGHWAY 18 & HIGHWAY 128 FROM JAL, NEW MEXICO PROCEED IN A WESTERLY, THEN NORTHWESTERLY, THEN WESTERLY DIRECTION ALONG HIGHWAY 128 APPROXIMATELY 20.6 MILES TO THE JUNCTION OF THIS ROAD AND DELAWARE BASIN ROAD TO THE NORTH; TURN RIGHT AND PROCEED IN A NORTHERLY, THEN EASTERLY DIRECTION APPROXIMATELY 12.2 MILES TO THE JUNCTION OF THIS ROAD AND COUNTY ROAD 32 TO THE NORTH; TURN LEFT AND PROCEED IN A NORTHERLY DIRECTION APPROXIMATELY 1.0 MILES TO THE JUNCTION OF THIS ROAD AND AN EXISTING ROAD TO THE EAST; TURN RIGHT AND PROCEED IN AN EASTERLY, THEN NORTHEASTERLY DIRECTION APPROXIMATELY 0.3 MILES TO THE EXISTING PRYOR STATE 1H & 4H WELL PAD; PROCEED IN A SOUTHEASTERLY DIRECTION TO THE BEGINNING OF THE PROPOSED MORTAL KOMBAT 36 STATE COM #502H ACCESS ROAD TO THE SOUTHEAST; FOLLOW ROAD FLAGS IN A SOUTHEASTERLY DIRECTION APPROXIMATELY 196' TO THE BEGINNING OF THE PROPOSED ACCESS ROAD TO THE EAST; FOLLOW ROAD FLAGS IN A EASTERLY, THEN NORTHERLY DIRECTION APPROXIMATELY 898' TO THE PROPOSED LOCATION.

TOTAL DISTANCE FROM JAL, NEW MEXICO TO THE PROPOSED WELL LOCATION IS APPROXIMATELY 34.3 MILES.

CENTENNIAL RESOURCE PRODUCTION, LLC

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S 1/2 SW 1/4, SECTION 36, T22S, R34E, N.M.P.M.
LEA COUNTY, NEW MEXICO

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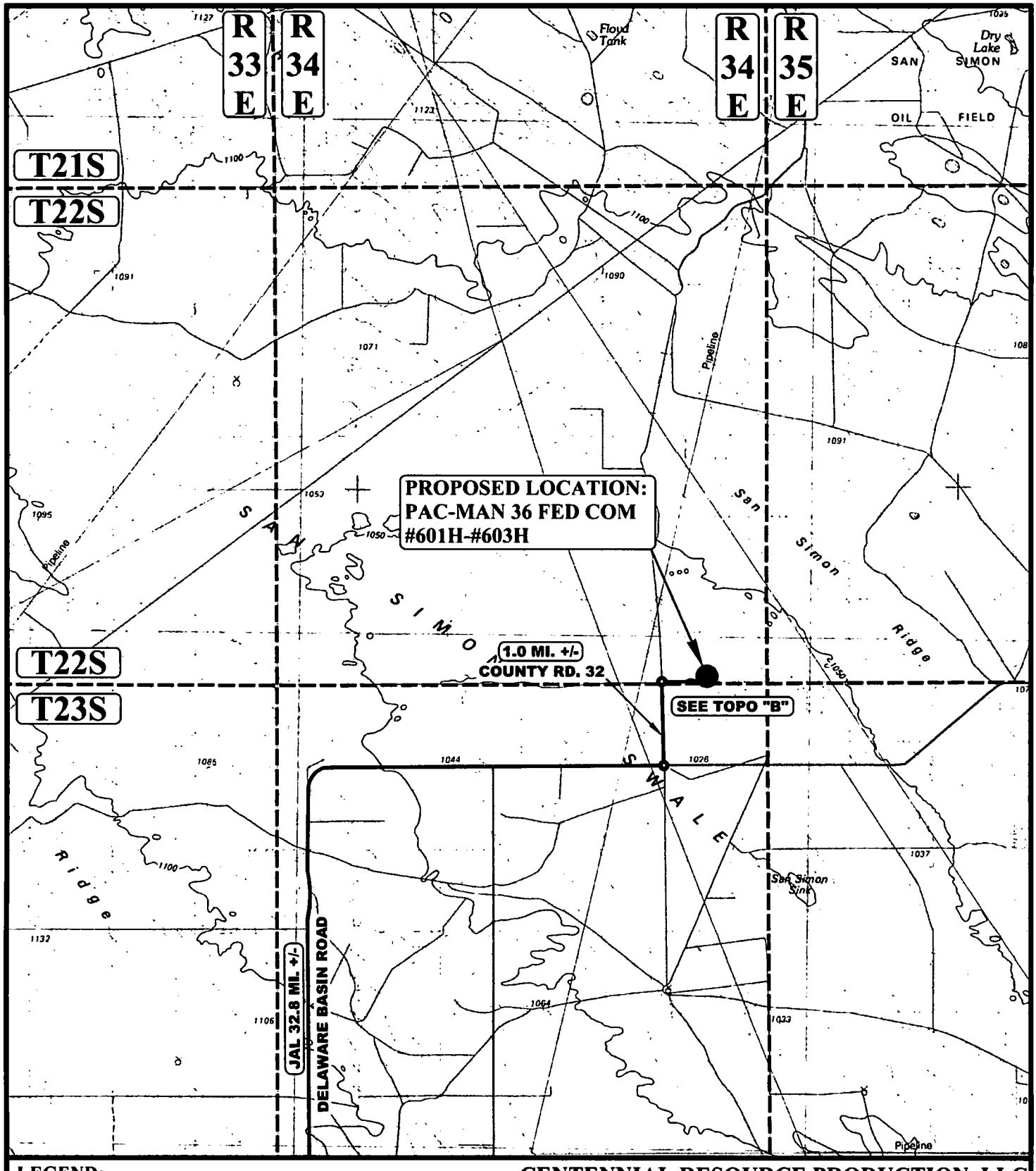
UELS, LLC
Corporate Office * 85 South 200 East
Vernal, UT 84078 * (435) 789-1017

SURVEYED BY	B.B., M.W.	09-19-18	
DRAWN BY	C.D.	09-22-18	

ROAD DESCRIPTION



LEGEND:

● PROPOSED LOCATION

CENTENNIAL RESOURCE PRODUCTION, LLC

N

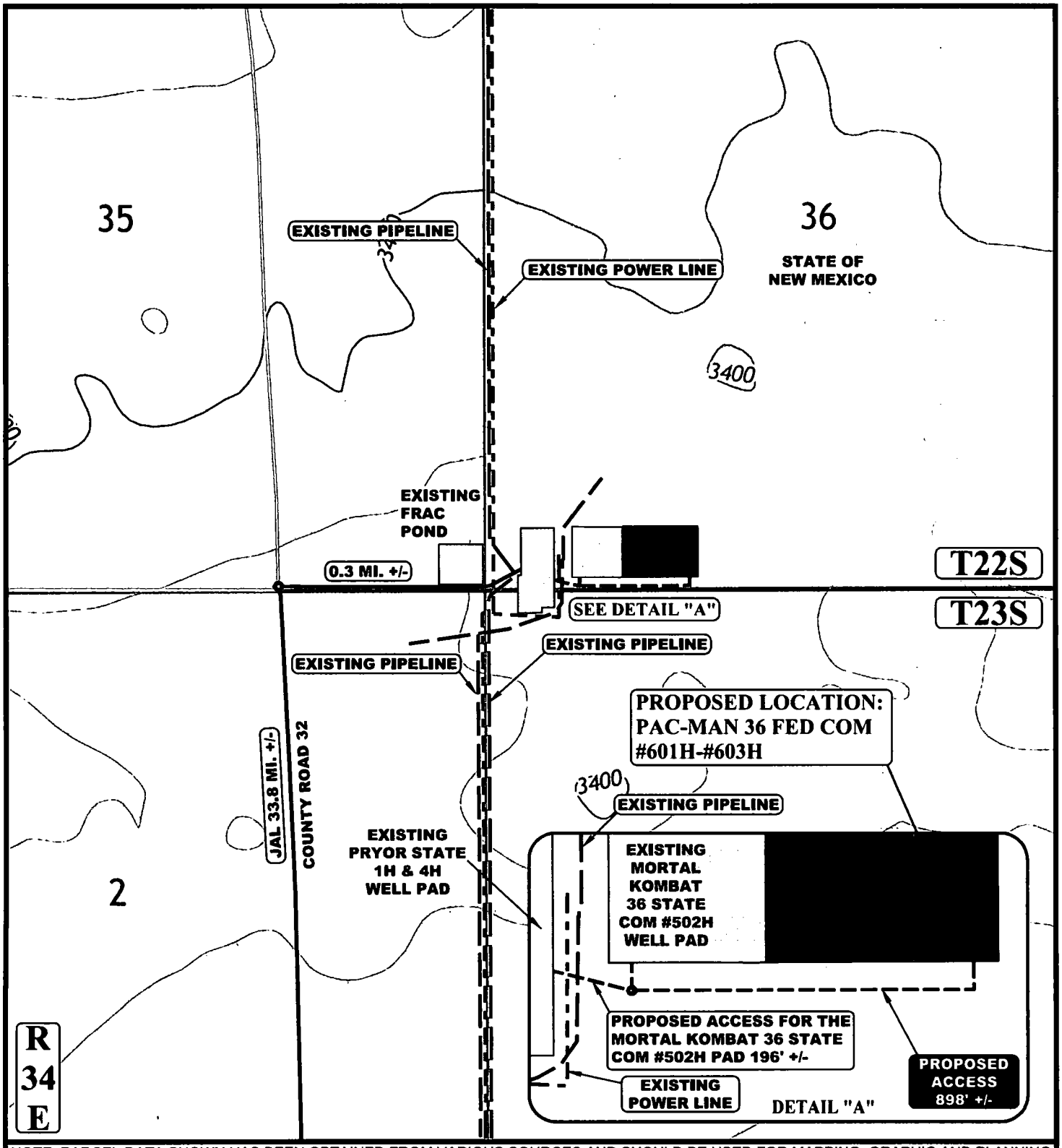
PAC-MAN 36 FED COM #601H-#603H ON EXISTING MORTAL KOMBAT 36 STATE COM #502H
S 1/2 SW 1/4, SECTION 36, T22S, R34E, N.M.P.M.
LEA COUNTY, NEW MEXICO

SURVEYED BY	B.B., M.W.	09-19-18	SCALE
DRAWN BY	C.D.	09-22-18	1 : 100,000

ACCESS ROAD MAP **TOPO A**

UINTAH ENGINEERING & LAND SURVEYING

UELS, LLC
Corporate Office * 85 South 200 East
Vernal, UT 84078 * (435) 789-1017



NOTE: PARCEL DATA SHOWN HAS BEEN OBTAINED FROM VARIOUS SOURCES AND SHOULD BE USED FOR MAPPING, GRAPHIC AND PLANNING PURPOSES ONLY. NO WARRANTY IS MADE BY UINTAH ENGINEERING AND LAND SURVEYING (UELS) FOR ACCURACY OF THE PARCEL DATA.

LEGEND:

- EXISTING ROAD
- PROPOSED ROAD
- PROPOSED ROAD (SERVICING OTHER WELLS)
- EXISTING PIPELINE
- EXISTING POWER LINE

UINTAH ENGINEERING & LAND SURVEYING

UELS, LLC
Corporate Office * 85 South 200 East
Vernal, UT 84078 * (435) 789-1017

N

CENTENNIAL RESOURCE PRODUCTION, LLC

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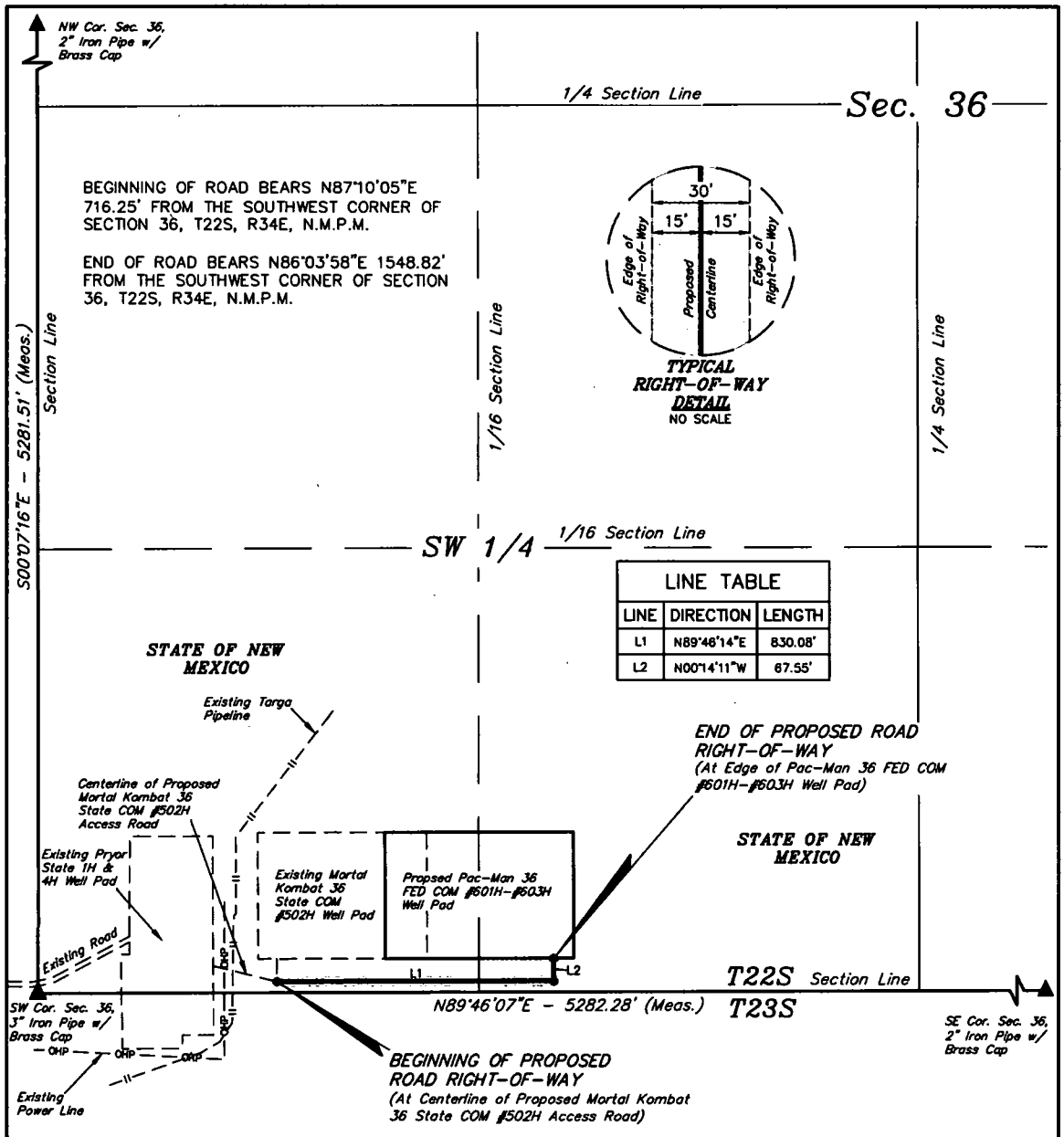
S 1/2 SW 1/4, SECTION 36, T22S, R34E, N.M.P.M.
LEA COUNTY, NEW MEXICO

SURVEYED BY	B.B., M.W.	09-19-18	SCALE
DRAWN BY	C.D.	09-22-18	1 : 24,000

ACCESS ROAD MAP **TOPO B**



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23782
09-23-18
PROFESSIONAL SURVEYOR

▲ = SECTION CORNERS LOCATED.

FILE: 64716

NOTES:
- The maximum grade of existing ground for the proposed access road is ±1.4%.
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N

CENTENNIAL RESOURCE PRODUCTION, LLC

PAC-MAN 36 FED COM #601H-#603H
ON STATE OF NEW MEXICO LANDS IN
SECTION 36, T22S, R34E, N.M.P.M.
LEA COUNTY, NEW MEXICO

SURVEYED BY	B.B.	09-19-18	SCALE
DRAWN BY	C.D.	09-22-18	1" = 400'

ACCESS ROAD R-O-W

UINTAH ENGINEERING & LAND SURVEYING
UELS, LLC
Corporate Office * 85 South 200 East
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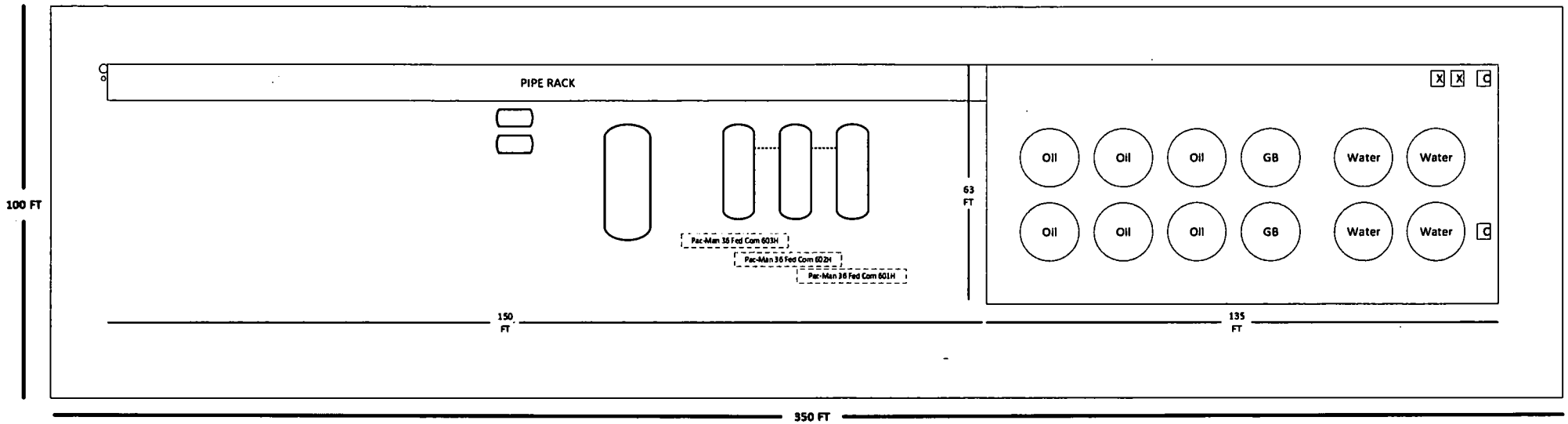
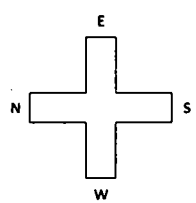
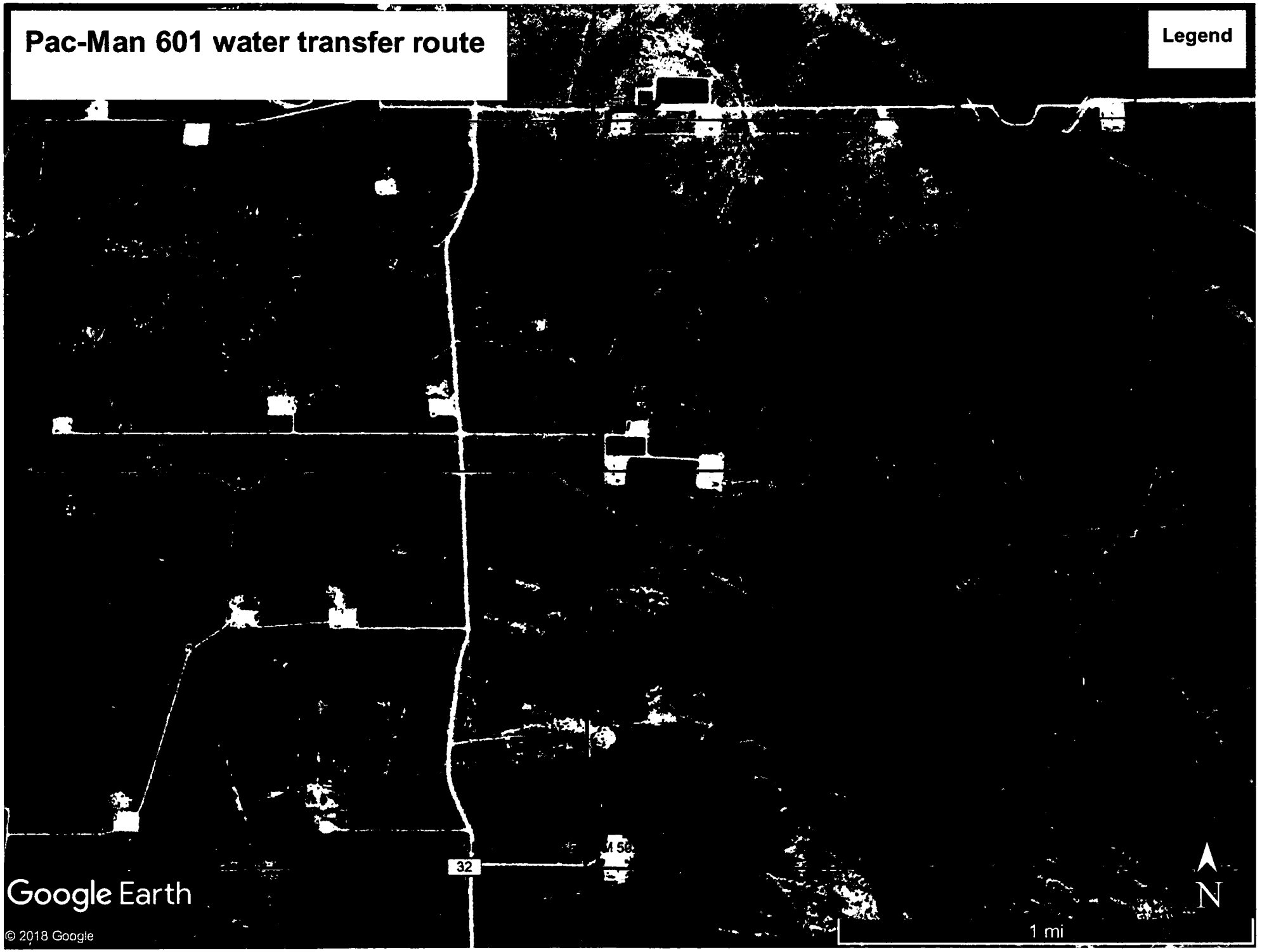
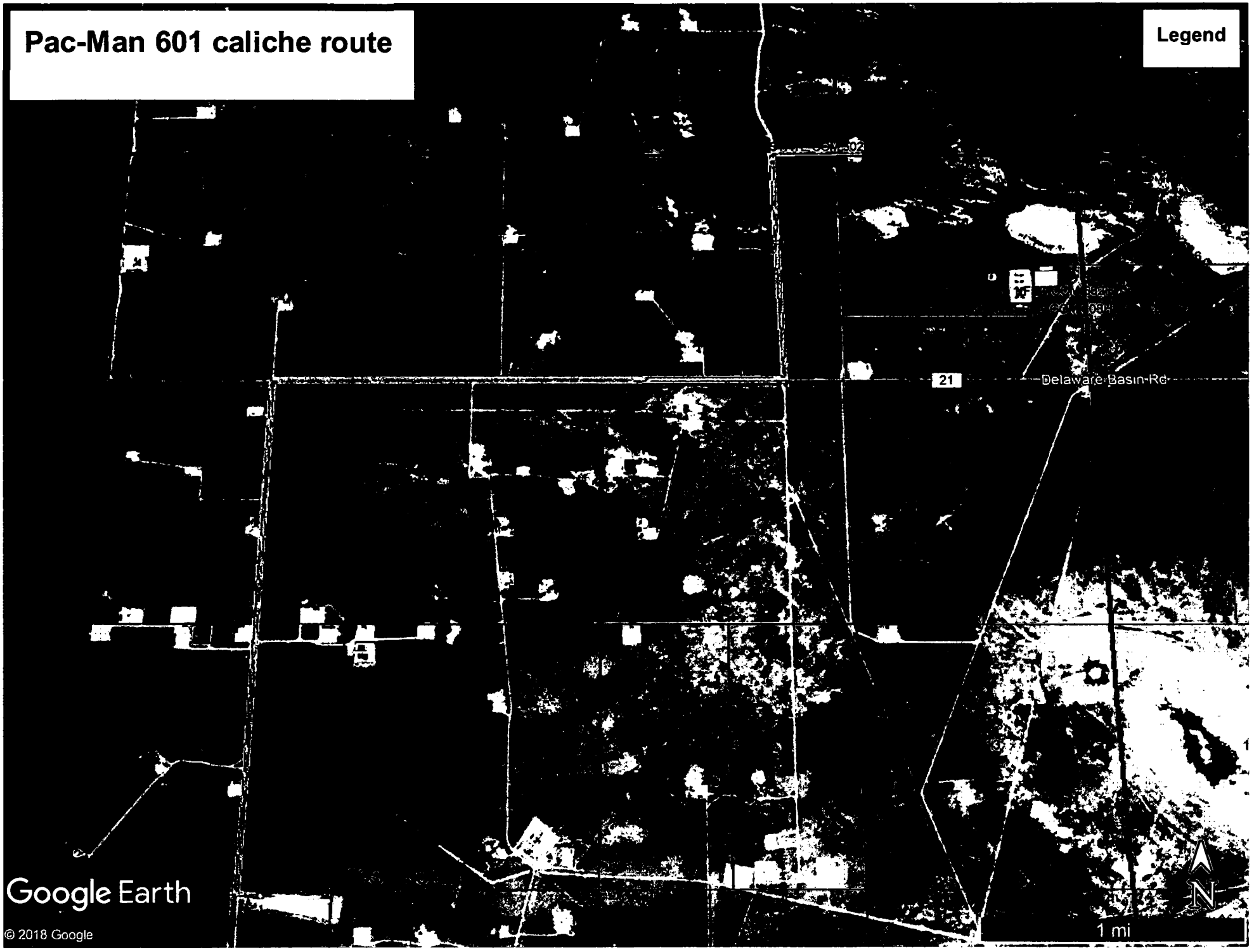
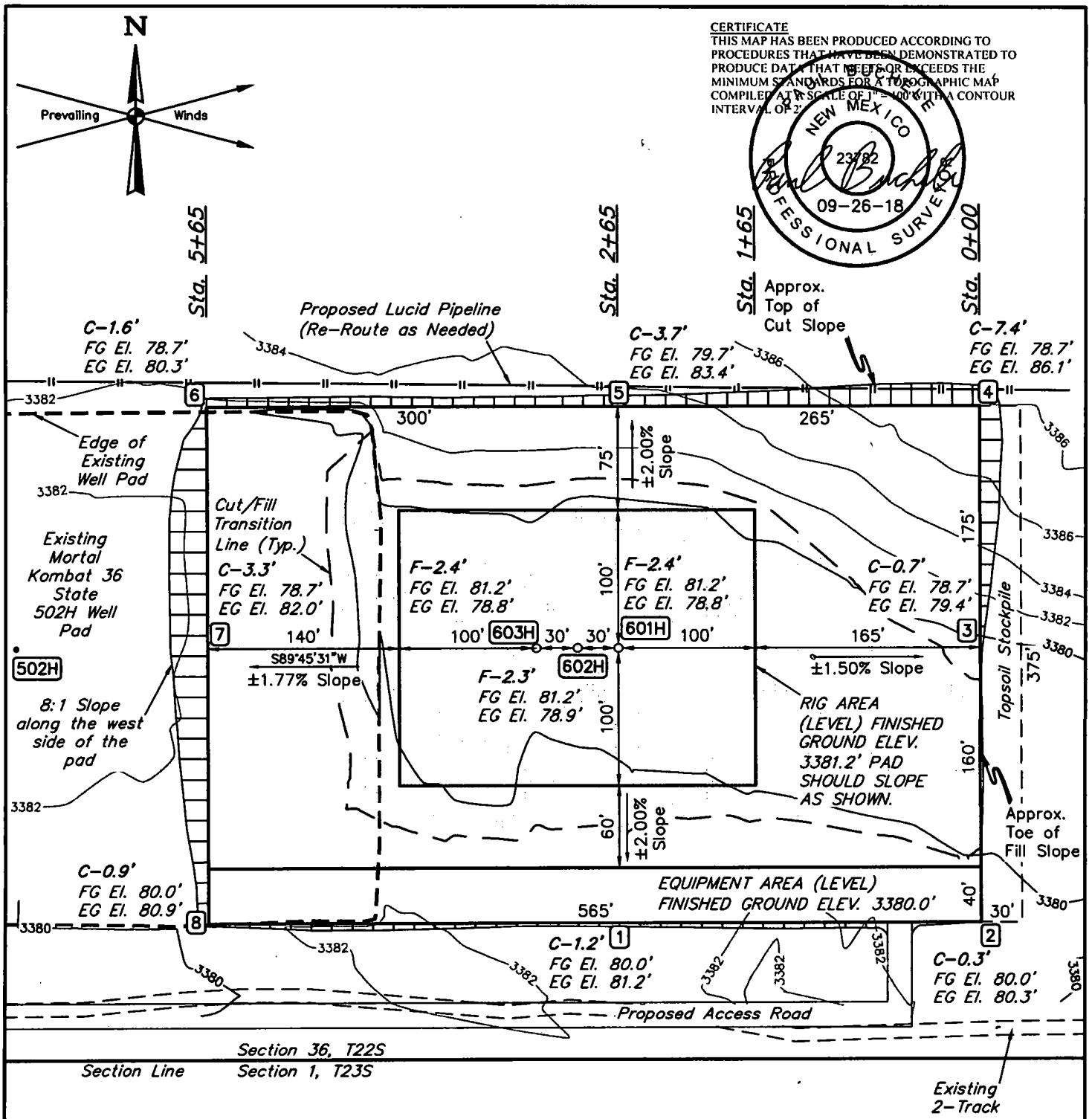


Pac-Man 36 Fed Com 601H/ 602H/ 603H Facilities




Pac-Man 601 water transfer route
Legend
32
Google Earth
© 2018 Google
N
1 mi


Pac-Man 601 caliche route
Legend
21
Delaware Basin Rd
Google Earth
© 2018 Google
1 mi
N



NOTE: Earthwork Calculations Require Fill @ the Location Stakes For Balance. All Fill is to be Compacted to a Minimum of 95% of the Maximum Dry Density Obtained by AASHTO Method t-99.

NOTES:

- Contours shown at 2' intervals.
- Underground utilities shown on this sheet are for visualization purposes only, actual locations to be determined prior to construction.
- Basis of Bearings is a Transverse Mercator Projection with a Central Meridian of W103°53'00"
- Cut/Fill slopes 2:1 (Typ. except where noted)

CENTENNIAL RESOURCE PRODUCTION, LLC

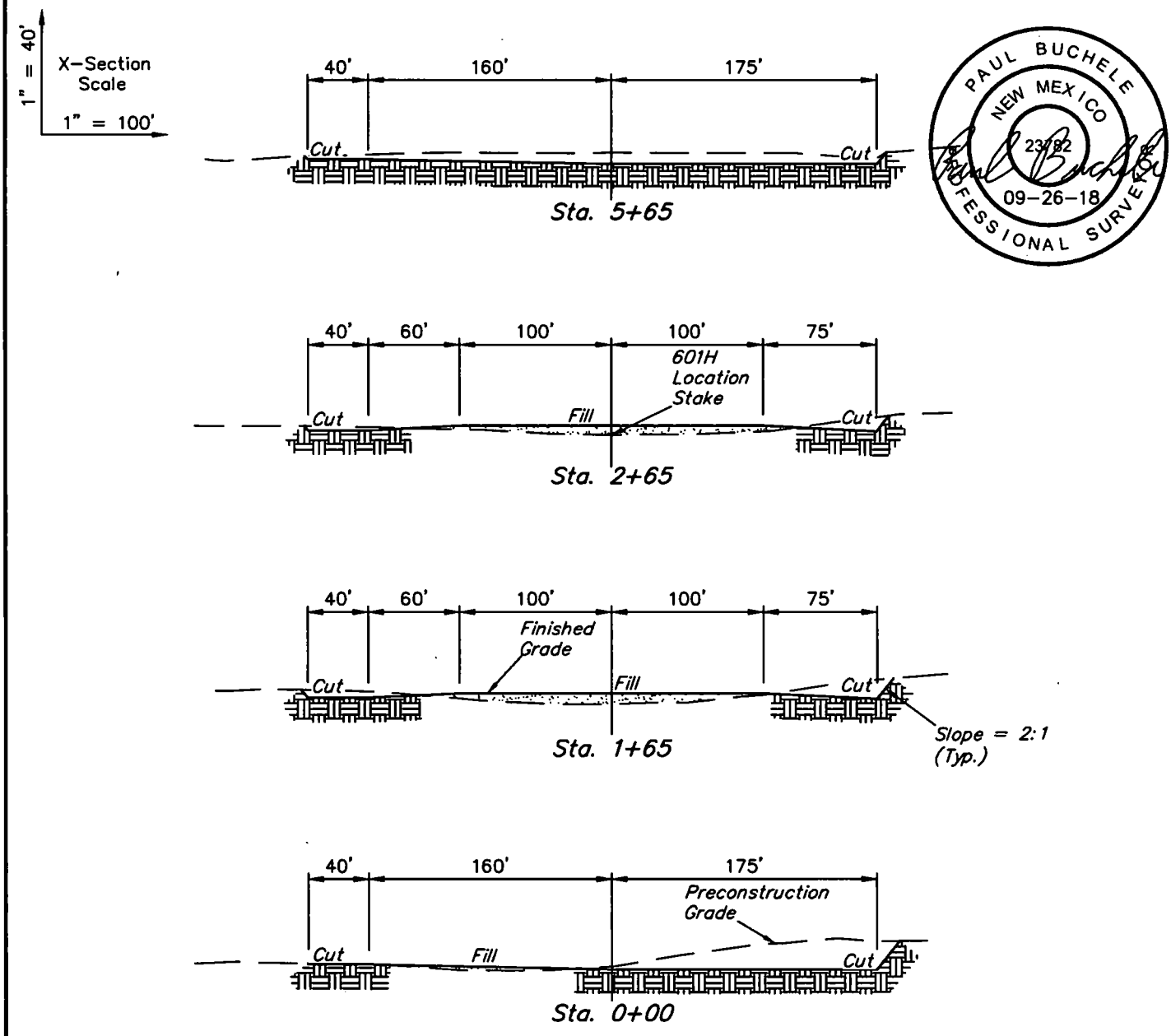
PAC-MAN 36 FED COM #601H-#603H ON EXISTING MORTAL KOMBAT 36 STATE COM #502H
S 1/2 SW 1/4, SECTION 36, T22S, R34E, N.M.P.M.
LEA COUNTY, NEW MEXICO

UINTAH ENGINEERING & LAND SURVEYING

UELS, LLC
Corporate Office * 85 South 200 East
Vernal, UT 84078 * (435) 789-1017

SURVEYED BY	B.B.	09-19-18	SCALE
DRAWN BY	C.D.	09-22-18	1" = 100'

LOCATION LAYOUT **FIGURE #1**



APPROXIMATE EARTHWORK QUANTITIES	
(4") TOPSOIL STRIPPING (New Construction Only)	2,280 Cu. Yds.
REMAINING LOCATION	7,200 Cu. Yds.
TOTAL CUT	**9,480 Cu. Yds.**
FILL	**7,200 Cu. Yds.**
EXCESS MATERIAL	2,280 Cu. Yds.
TOPSOIL	2,280 Cu. Yds.
TOTAL UNBALANCE (After Interim Rehabilitation)	**0 Cu. Yds.**

APPROXIMATE SURFACE DISTURBANCE AREAS		
	DISTANCE	**ACRES**
WELL SITE DISTURBANCE	N/A	±4.235
EXISTING WELL SITE DISTURBANCE	N/A	±1.237
30' WIDE ACCESS ROAD R-O-W DISTURBANCE	±897.62'	±0.618
TOTAL SURFACE USE AREA		**±6.090**

NOTES:

- Fill quantity includes 5% for compaction.
- Cut/Fill slopes 2:1 (Typ. except where noted)

CENTENNIAL RESOURCE PRODUCTION, LLC

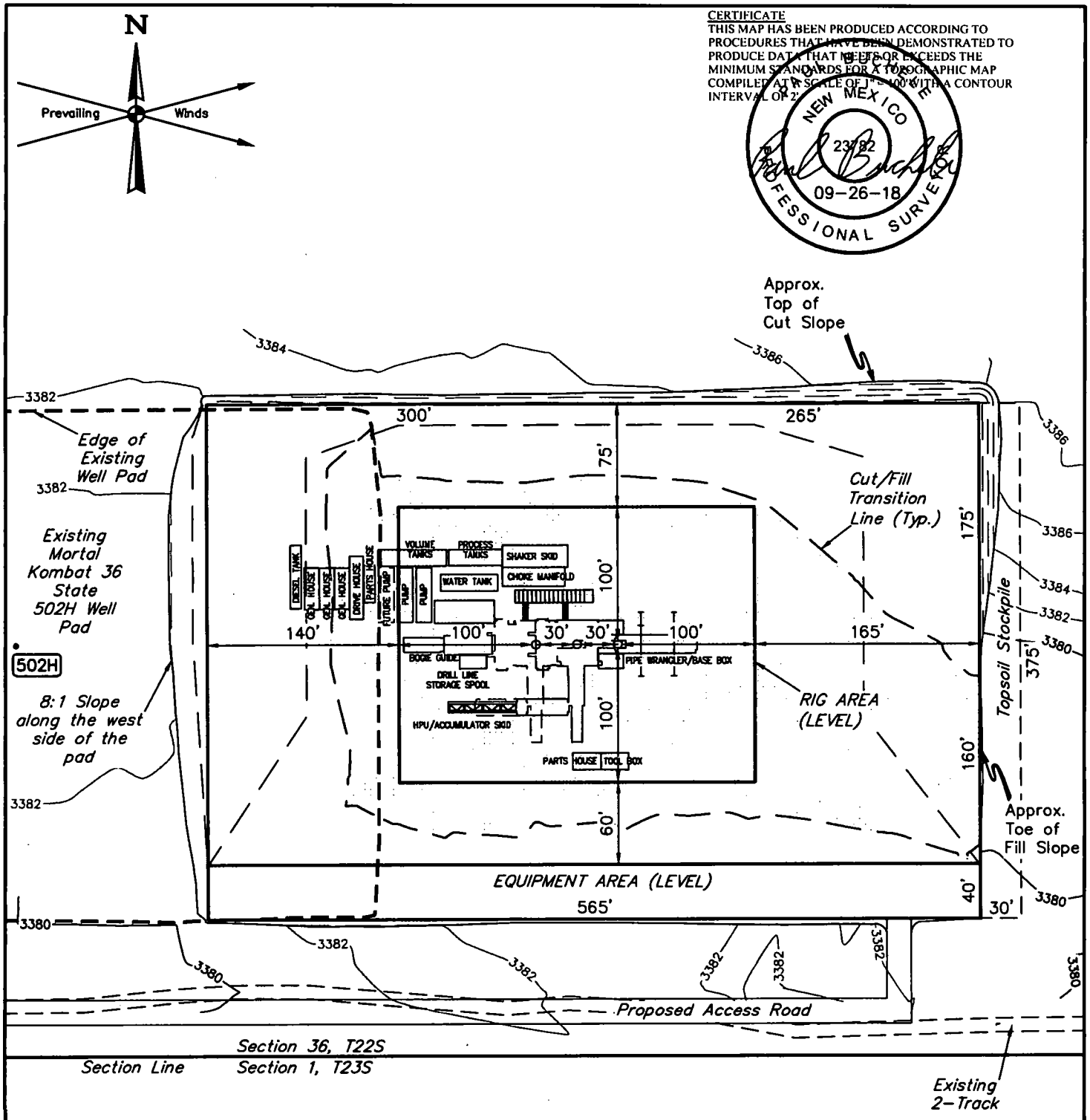
PAC-MAN 36 FED COM #601H-#603H ON EXISTING MORTAL KOMBAT 36 STATE COM #502H
S 1/2 SW 1/4, SECTION 36, T22S, R34E, N.M.P.M.
LEA COUNTY, NEW MEXICO

UINTAH ENGINEERING & LAND SURVEYING

UELS, LLC
Corporate Office * 85 South 200 East
Vernal, UT 84078 * (435) 789-1017

SURVEYED BY	B.B.	09-19-18	SCALE
DRAWN BY	C.D.	09-22-18	AS SHOWN

TYPICAL CROSS SECTIONS FIGURE #2



NOTES:

- Contours shown at 2' intervals.

CENTENNIAL RESOURCE PRODUCTION, LLC

PAC-MAN 36 FED COM #601H-#603H ON EXISTING MORTAL KOMBAT 36 STATE COM #502H
S 1/2 SW 1/4, SECTION 36, T22S, R34E, N.M.P.M.
LEA COUNTY, NEW MEXICO

SURVEYED BY	B.B.	09-19-18	SCALE
DRAWN BY	C.D.	09-22-18	1" = 100'

TYPICAL RIG LAYOUT **FIGURE #3**

UINTAH ENGINEERING & LAND SURVEYING

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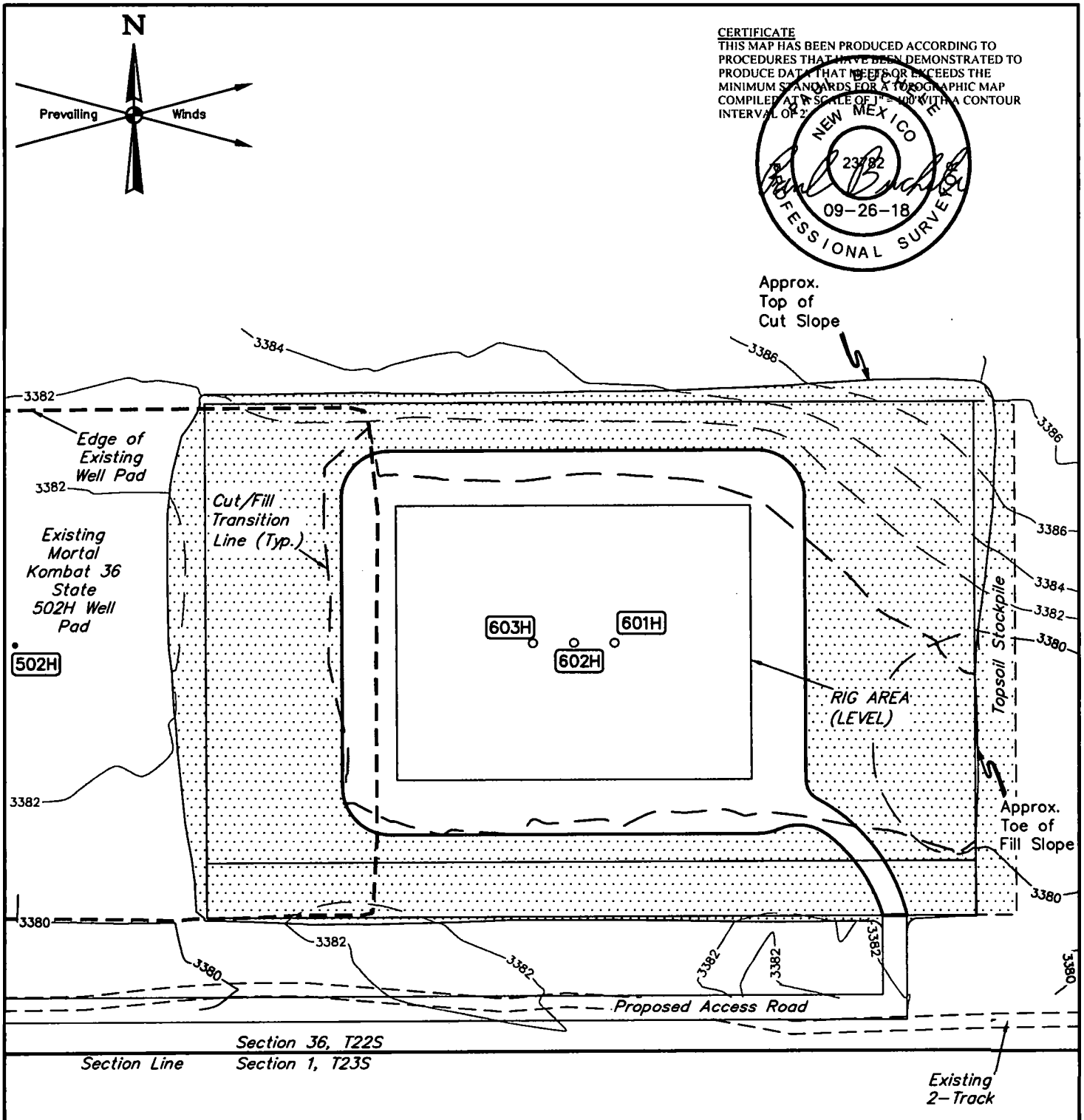
Vernal, UT 84078 * (435) 789-1017



CERTIFICATE
THIS MAP HAS BEEN PRODUCED ACCORDING TO PROCEDURES THAT HAVE BEEN DEMONSTRATED TO PRODUCE DATA THAT MEETS OR EXCEEDS THE MINIMUM STANDARDS FOR A TOPOGRAPHIC MAP COMPILED AT A SCALE OF 1" = 100' WITH A CONTOUR INTERVAL OF 2'.

BRENT A. BUCKNER — NEW MEXICO — 23782 — 09-26-18 — PROFESSIONAL SURVEYOR

LEGEND:
Reclaimed Area

APPROXIMATE PRODUCTION PAD ACREAGE = ±2.209 ACRES
APPROXIMATE RECLAIMED AREA ACREAGE = ±2.026 ACRES
TOTAL ACREAGE = ±4.235 ACRES

NOTES:
- Contours shown at 2' intervals.

CENTENNIAL RESOURCE PRODUCTION, LLC

PAC-MAN 36 FED COM #601H-#603H ON EXISTING MORTAL KOMBAT 36 STATE COM #502H
S 1/2 SW 1/4, SECTION 36, T22S, R34E, N.M.P.M.
LEA COUNTY, NEW MEXICO

SURVEYED BY	B.B.	09-19-18	SCALE
DRAWN BY	C.D.	09-22-18	1" = 100'

RECLAMATION DIAGRAM FIGURE #4

UINTAH ENGINEERING & LAND SURVEYING
UELS, LLC
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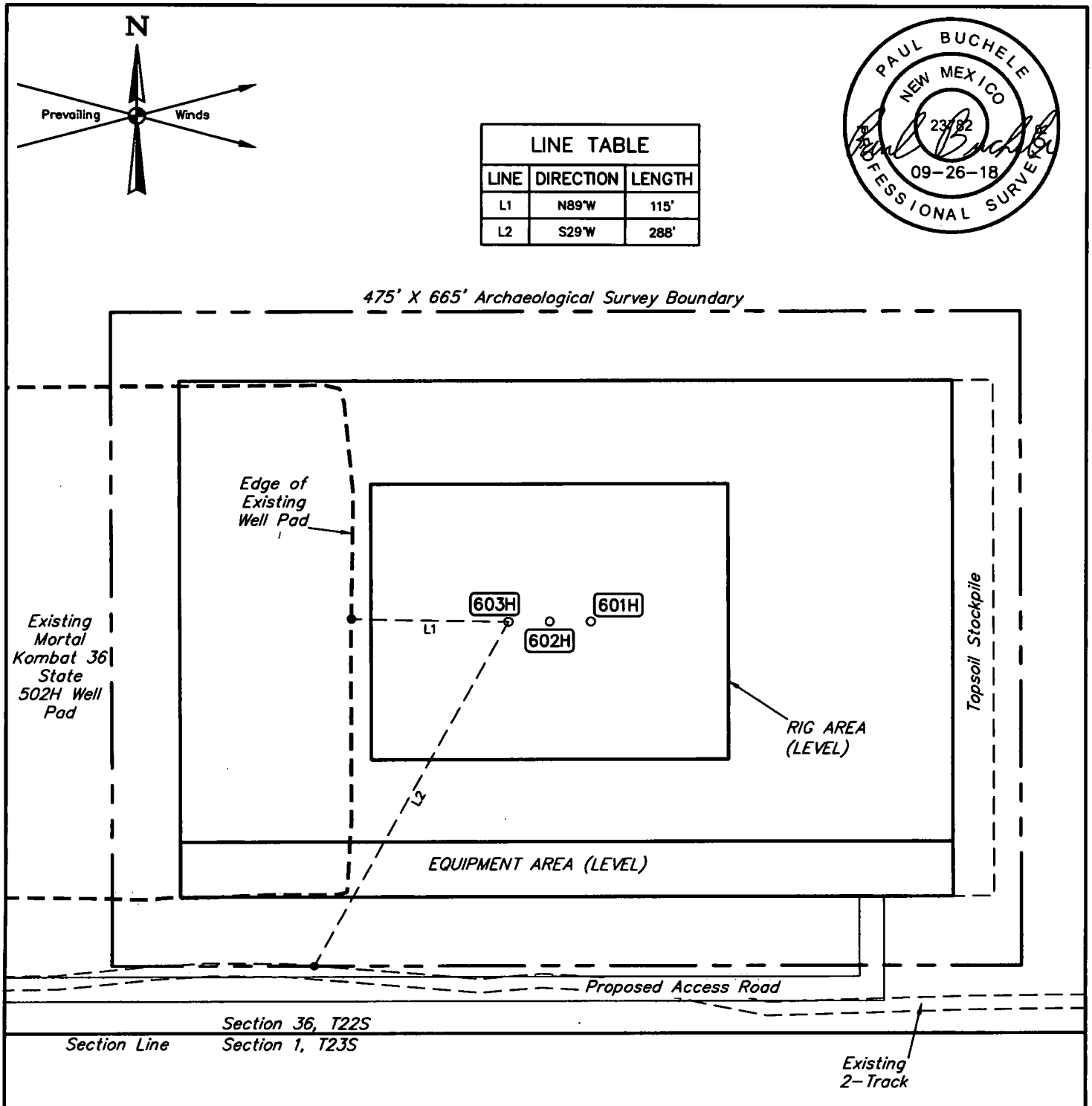


PAUL BUCHELE
NEW MEXICO
23782
09-26-18
PROFESSIONAL SURVEYOR

LINE TABLE		
LINE	DIRECTION	LENGTH
L1	N89°W	115'
L2	S29°W	288'

NOTES:
- Basis of Bearings is a Transverse Mercator Projection with a Central Meridian of W103°53'00"

CENTENNIAL RESOURCE PRODUCTION, LLC

PAC-MAN 36 FED COM #601H-#603H ON EXISTING MORTAL KOMBAT 36 STATE COM #502H
S 1/2 SW 1/4, SECTION 36, T22S, R34E, N.M.P.M.
LEA COUNTY, NEW MEXICO

UINTAH ENGINEERING & LAND SURVEYING

UELS, LLC
Corporate Office * 85 South 200 East
Vernal, UT 84078 * (435) 789-1017

SURVEYED BY	B.B.	09-19-18	SCALE
DRAWN BY	C.D.	09-22-18	1" = 100'

ARCHAEOLOGICAL SURVEY BOUNDARY **FIGURE #5**

BEGINNING AT THE INTERSECTION OF HIGHWAY 18 & HIGHWAY 128 FROM JAL, NEW MEXICO PROCEED IN A WESTERLY, THEN NORTHWESTERLY, THEN WESTERLY DIRECTION ALONG HIGHWAY 128 APPROXIMATELY 20.6 MILES TO THE JUNCTION OF THIS ROAD AND DELAWARE BASIN ROAD TO THE NORTH; TURN RIGHT AND PROCEED IN A NORTHERLY, THEN EASTERLY DIRECTION APPROXIMATELY 12.2 MILES TO THE JUNCTION OF THIS ROAD AND COUNTY ROAD 32 TO THE NORTH; TURN LEFT AND PROCEED IN A NORTHERLY DIRECTION APPROXIMATELY 1.0 MILES TO THE JUNCTION OF THIS ROAD AND AN EXISTING ROAD TO THE EAST; TURN RIGHT AND PROCEED IN AN EASTERLY, THEN NORTHEASTERLY DIRECTION APPROXIMATELY 0.3 MILES TO THE EXISTING PRYOR STATE 1H & 4H WELL PAD; PROCEED IN A SOUTHEASTERLY DIRECTION TO THE BEGINNING OF THE PROPOSED MORTAL KOMBAT 36 STATE COM #502H ACCESS ROAD TO THE SOUTHEAST; FOLLOW ROAD FLAGS IN A SOUTHEASTERLY DIRECTION APPROXIMATELY 196' TO THE BEGINNING OF THE PROPOSED ACCESS ROAD TO THE EAST; FOLLOW ROAD FLAGS IN A EASTERLY, THEN NORTHERLY DIRECTION APPROXIMATELY 898' TO THE PROPOSED LOCATION.

TOTAL DISTANCE FROM JAL, NEW MEXICO TO THE PROPOSED WELL LOCATION IS APPROXIMATELY 34.3 MILES.

CENTENNIAL RESOURCE PRODUCTION, LLC

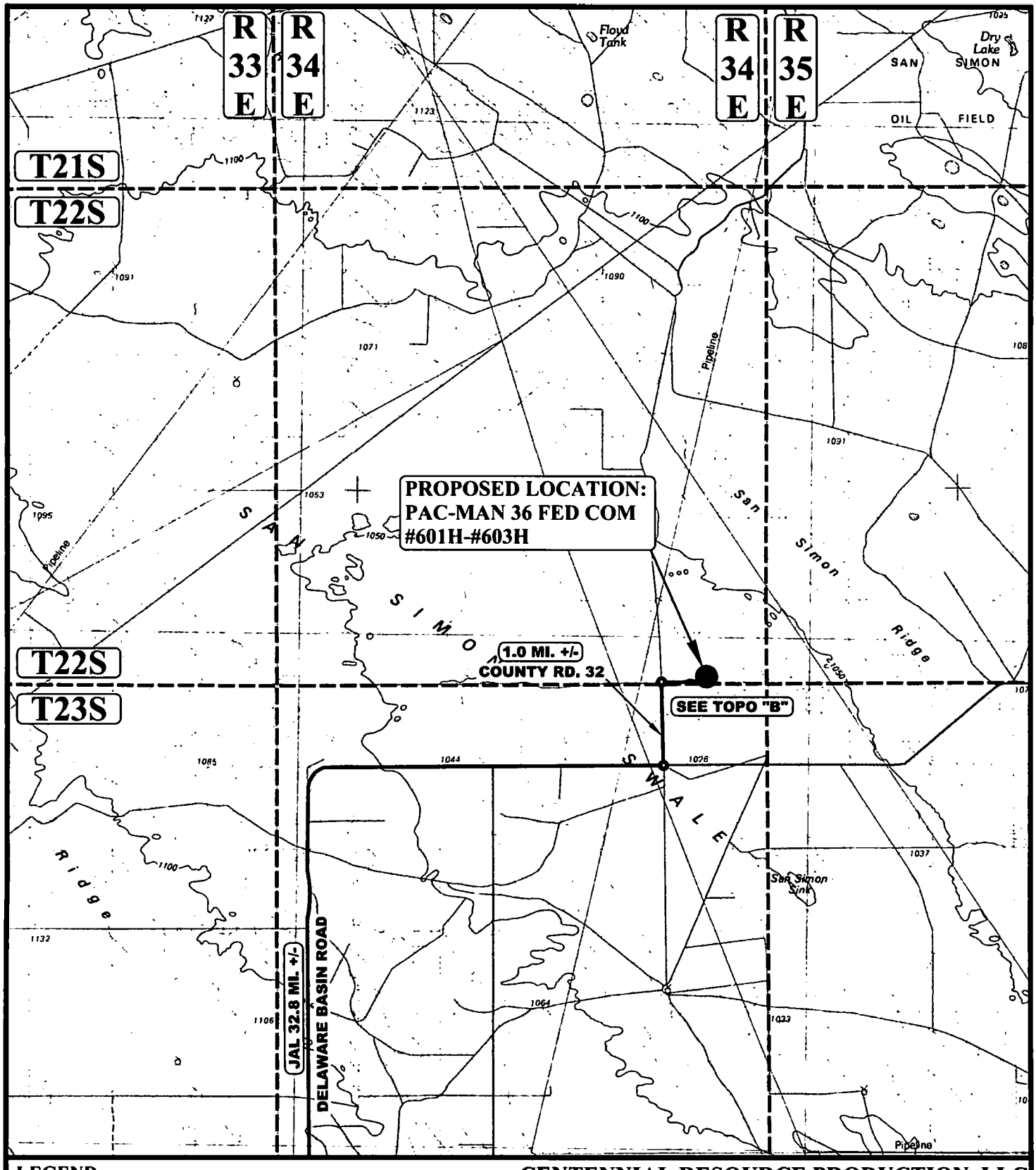
PAC-MAN 36 FED COM #601H-#603H ON EXISTING MORTAL KOMBAT 36 STATE COM #502H
S 1/2 SW 1/4, SECTION 36, T22S, R34E, N.M.P.M.
LEA COUNTY, NEW MEXICO

UINTAH ENGINEERING & LAND SURVEYING

UELS, LLC
Corporate Office * 85 South 200 East
Vernal, UT 84078 * (435) 789-1017

SURVEYED BY	B.B., M.W.	09-19-18	
DRAWN BY	C.D.	09-22-18	

ROAD DESCRIPTION



LEGEND:

● PROPOSED LOCATION

N

CENTENNIAL RESOURCE PRODUCTION, LLC

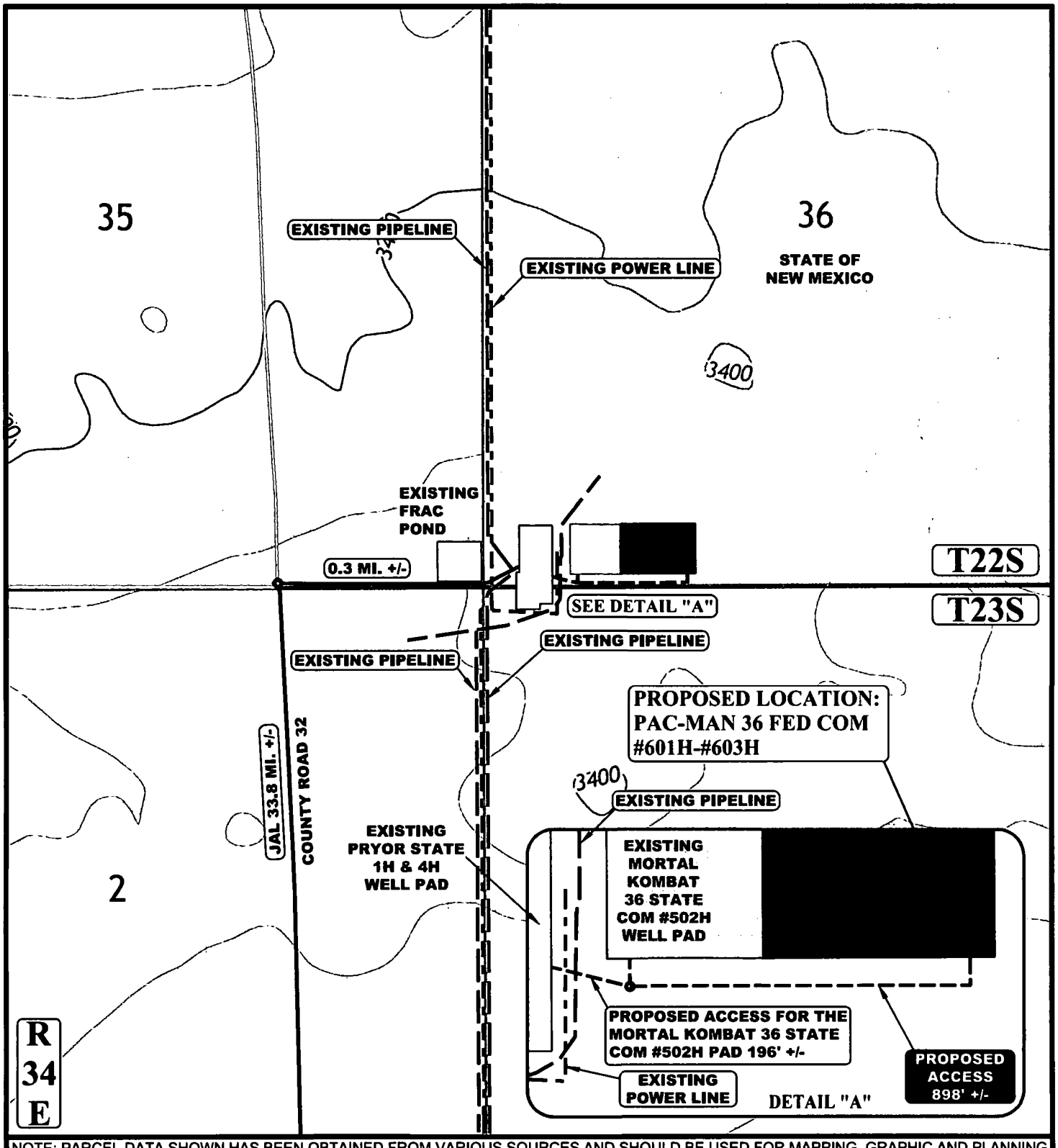
PAC-MAN 36 FED COM #601H-#603H ON EXISTING MORTAL KOMBAT 36 STATE COM #502H
S 1/2 SW 1/4, SECTION 36, T22S, R34E, N.M.P.M.
LEA COUNTY, NEW MEXICO

SURVEYED BY	B.B., M.W.	09-19-18	SCALE
DRAWN BY	C.D.	09-22-18	1 : 100,000

ACCESS ROAD MAP **TOPO A**

UINTAH ENGINEERING & LAND SURVEYING

UELS, LLC
Corporate Office * 85 South 200 East
Vernal, UT 84078 * (435) 789-1017



NOTE: PARCEL DATA SHOWN HAS BEEN OBTAINED FROM VARIOUS SOURCES AND SHOULD BE USED FOR MAPPING, GRAPHIC AND PLANNING PURPOSES ONLY. NO WARRANTY IS MADE BY UINTAH ENGINEERING AND LAND SURVEYING (UELS) FOR ACCURACY OF THE PARCEL DATA.

LEGEND:

- EXISTING ROAD
- PROPOSED ROAD
- PROPOSED ROAD (SERVICING OTHER WELLS)
- EXISTING PIPELINE
- EXISTING POWER LINE

UINTAH ENGINEERING & LAND SURVEYING

UELS, LLC
Corporate Office * 85 South 200 East
Vernal, UT 84078 * (435) 789-1017

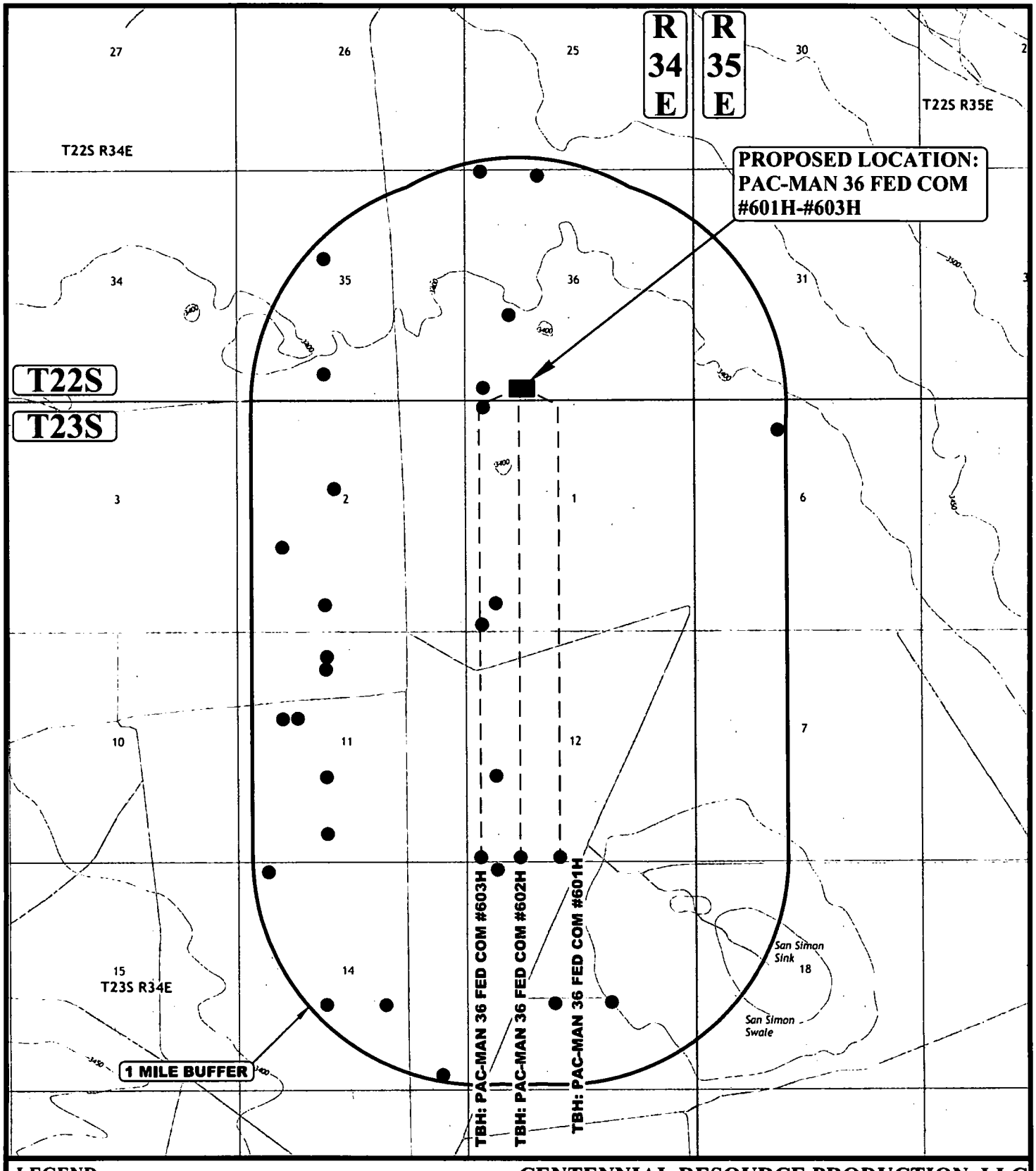
N

CENTENNIAL RESOURCE PRODUCTION, LLC

PAC-MAN 36 FED COM #601H-#603H ON EXISTING MORTAL KOMBAT 36 STATE COM #502H
S 1/2 SW 1/4, SECTION 36, T22S, R34E, N.M.P.M.
LEA COUNTY, NEW MEXICO

SURVEYED BY	B.B., M.W.	09-19-18	SCALE
DRAWN BY	C.D.	09-22-18	1 : 24,000

ACCESS ROAD MAP **TOPO B**



LEGEND:

● EXISTING WELLS

CENTENNIAL RESOURCE PRODUCTION, LLC

N

PAC-MAN 36 FED COM #601H-#603H ON EXISTING MORTAL KOMBAT 36 STATE COM #502H
S 1/2 SW 1/4, SECTION 36, T22S, R34E, N.M.P.M.
LEA COUNTY, NEW MEXICO

SURVEYED BY	B.B., M.W.	09-19-18	SCALE
DRAWN BY	C.D.	09-22-18	1 : 36,000

WELL PROXIMITY MAP **TOPO C**

UINTAH ENGINEERING & LAND SURVEYING

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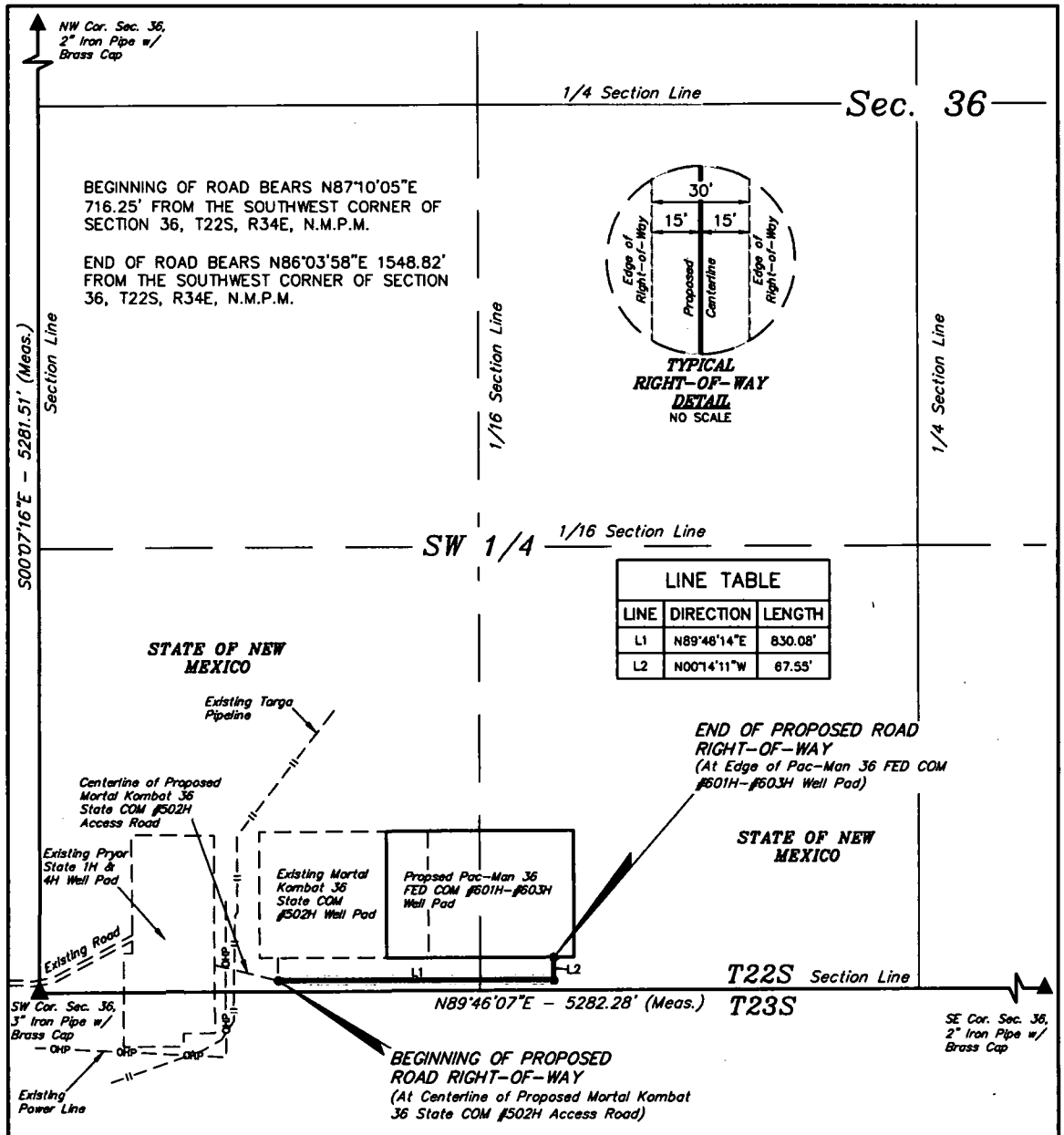
Corporate Office * 85 South 200 East
Vernal, UT 84078 * (435) 789-1017



ROAD RIGHT-OF-WAY DESCRIPTION

A 30' WIDE RIGHT-OF-WAY 15' ON EACH SIDE OF THE FOLLOWING DESCRIBED CENTERLINE.

BEGINNING AT A POINT IN THE SW 1/4 SW 1/4 OF SECTION 36, T22S, R34E, N.M.P.M., WHICH BEARS N87°10'05"E 716.25' FROM THE SOUTHWEST CORNER OF SAID SECTION 36, THENCE N89°46'14"E 830.08'; THENCE N00°14'11"W 67.55' TO A POINT IN THE SE 1/4 SW 1/4 OF SAID SECTION 36, WHICH BEARS N86°03'58"E 1548.82' FROM THE SOUTHWEST CORNER OF SAID SECTION 36. THE SIDE LINES OF SAID DESCRIBED RIGHT-OF-WAY BEING SHORTENED OR ELONGATED TO MEET THE GRANTOR'S PROPERTY LINES. BASIS OF BEARINGS IS A TRANSVERSE MERCATOR PROJECTION WITH A CENTRAL MERIDIAN OF W103°53'00". CONTAINS 0.618 ACRES MORE OR LESS.

400' 200' 0' 400'

ACREAGE / LENGTH TABLE

	OWNERSHIP	FEET	RODS	ACRES
SEC. 36 (SW 1/4 SW 1/4)	STATE OF NEW MEXICO	605.12	36.67	0.417
SEC. 36 (SE 1/4 SW 1/4)	STATE OF NEW MEXICO	292.50	17.73	0.201
TOTAL		897.62	54.40	0.618

CERTIFICATE
THIS IS TO CERTIFY THAT THIS EASEMENT PLAT AND THE ACTUAL SURVEY ON THE GROUND UPON WHICH IT IS BASED WERE PERFORMED BY ME OR UNDER MY DIRECT SUPERVISION; THAT I AM RESPONSIBLE FOR THIS SURVEY; THAT THIS SURVEY MEETS THE MINIMUM STANDARDS FOR SURVEYING IN NEW MEXICO; AND THAT IT IS TRUE AND CORRECT TO THE BEST OF MY KNOWLEDGE AND BELIEF.

Paul Buchanan 23782 09-23-18 PROFESSIONAL SURVEYOR

▲ = SECTION CORNERS LOCATED.

FILE: 64716

NOTES:
- The maximum grade of existing ground for the proposed access road is ±1.4%.
- Basis of Bearings is a Transverse Mercator Projection with a Central Meridian of W103°53'00"

N

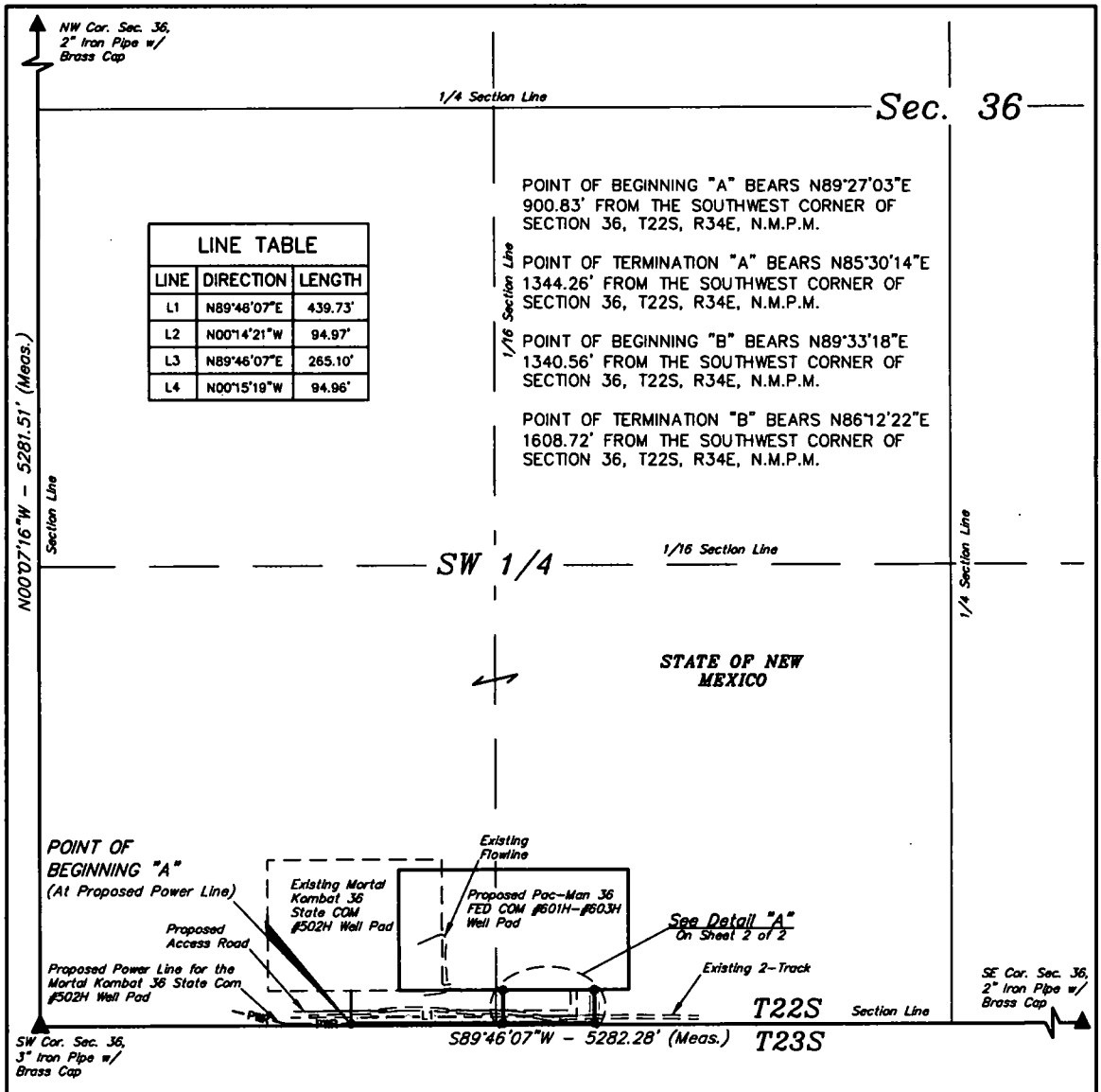
CENTENNIAL RESOURCE PRODUCTION, LLC

PAC-MAN 36 FED COM #601H-#603H
ON STATE OF NEW MEXICO LANDS IN
SECTION 36, T22S, R34E, N.M.P.M.
LEA COUNTY, NEW MEXICO

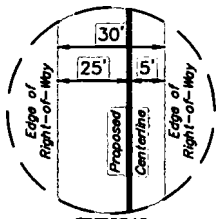
SURVEYED BY	B.B.	09-19-18	SCALE
DRAWN BY	C.D.	09-22-18	1" = 400'

ACCESS ROAD R-O-W

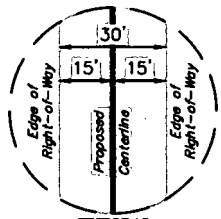
UINTAH ENGINEERING & LAND SURVEYING
UELS, LLC
Corporate Office * 85 South 200 East
Vernal, UT 84078 * (435) 789-1017



LINE TABLE		
LINE	DIRECTION	LENGTH
L1	N89°48'07"E	439.73'
L2	N00°14'21"W	94.97'
L3	N89°46'07"E	265.10'
L4	N00°15'19"W	94.96'



TYPICAL RIGHT-OF-WAY DETAIL FOR L1 & L3
NO SCALE



TYPICAL RIGHT-OF-WAY DETAIL FOR L2 & L4
NO SCALE

400' 200' 0' 400'

ACREAGE / LENGTH TABLE "A"			
LOCATION	FEET	RODS	ACRES
SEC. 36 (SW 1/4 SW 1/4)	419.76	25.44	0.289
SEC. 36 (SE 1/4 SW 1/4)	114.94	6.97	0.079
TOTAL	534.70	32.41	0.368

ACREAGE / LENGTH TABLE "B"			
LOCATION	FEET	RODS	ACRES
SEC. 36 (SE 1/4 SW 1/4)	360.06	21.82	0.248

▲ = SECTION CORNERS LOCATED.

CERTIFICATE
THIS IS TO CERTIFY THAT THIS SURFACE USE AREA PLAT AND THE ACTUAL SURVEY ON THE GROUND UPON WHICH IT IS BASED WERE PREPARED BY ME OR UNDER MY DIRECT SUPERVISION; THAT I AM RESPONSIBLE FOR THIS SURVEY; THAT THIS SURVEY MEETS THE MINIMUM STANDARDS FOR SURVEYING IN NEW MEXICO; AND THAT IT IS TRUE AND CORRECT TO THE BEST OF MY KNOWLEDGE AND BELIEF.

STATE OF NEW MEXICO
23782
PROFESSIONAL SURVEYOR
08-19-19

Sheet 1 of 2

FILE: 65971-A1

REV: 1 08-19-19 C.D. (TYPO CORRECTION)

NOTES:
- Basis of Bearings is a Transverse Mercator Projection with a Central Meridian of W103°53'00"

N

CENTENNIAL RESOURCE PRODUCTION, LLC

PAC-MAN 36 FED COM #601H-#603H
ON STATE OF NEW MEXICO LANDS IN
SECTION 36, T22S, R34E, N.M.P.M.
LEA COUNTY, NEW MEXICO

SURVEYED BY	S.L., C.H.	06-19-19	SCALE
DRAWN BY	L.K.	06-26-19	1" = 400'

POWER LINE R-O-W

UINTAH ENGINEERING & LAND SURVEYING

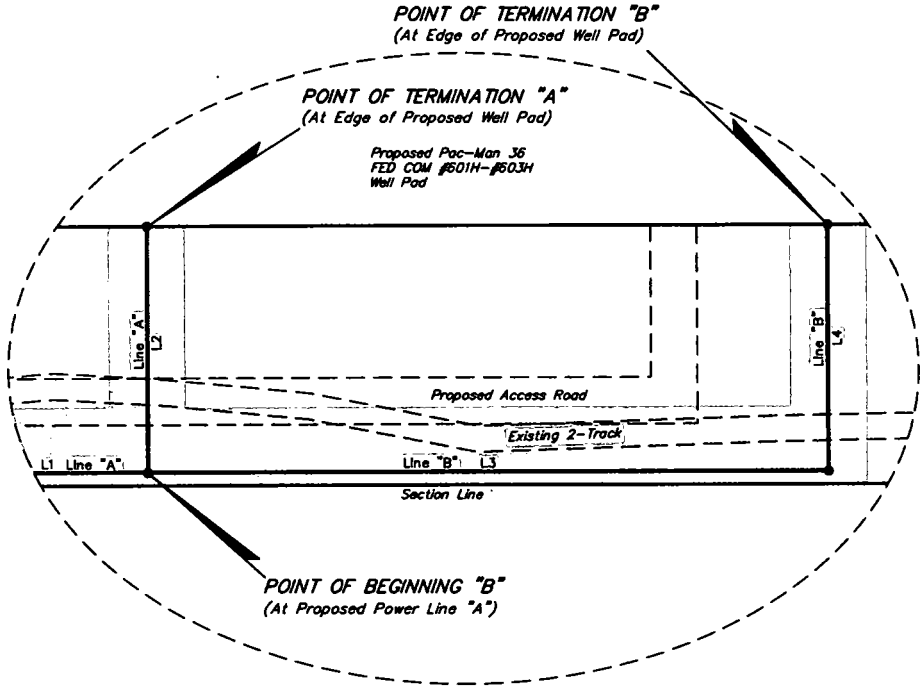
UELS, LLC
Corporate Office * 85 South 200 East
Vernal, UT 84078 * (435) 789-1017

POWER LINE "A" RIGHT-OF-WAY DESCRIPTION

BEGINNING AT A POINT IN THE SW 1/4 SW 1/4 OF SECTION 36, T22S, R34E, N.M.P.M., WHICH BEARS N89°27'03"E 900.83' FROM THE SOUTHWEST CORNER OF SAID SECTION 36, THENCE A 30' WIDE RIGHT-OF-WAY 5' ON THE RIGHT SIDE AND 25' ON THE LEFT SIDE OF THE FOLLOWING DESCRIBED CENTERLINE, N89°46'07"E 439.73'; THENCE A 30' WIDE RIGHT-OF-WAY 15' ON EACH SIDE OF THE FOLLOWING DESCRIBED CENTERLINE, N00°14'21"W 94.97' TO A POINT IN THE SE 1/4 SW 1/4 OF SAID SECTION 36 AND THE POINT OF TERMINATION, WHICH BEARS N85°30'14"E 1344.26' FROM THE SOUTHWEST CORNER OF SAID SECTION 36. THE SIDE LINES OF SAID DESCRIBED RIGHT-OF-WAY BEING SHORTENED OR ELONGATED TO MEET THE GRANTOR'S PROPERTY LINES. BASIS OF BEARINGS IS A TRANSVERSE MERCATOR PROJECTION WITH A CENTRAL MERIDIAN OF W103°53'00". CONTAINS 0.368 ACRES MORE OR LESS.

POWER LINE "B" RIGHT-OF-WAY DESCRIPTION

BEGINNING AT A POINT IN THE SE 1/4 SW 1/4 OF SECTION 36, T22S, R34E, N.M.P.M., WHICH BEARS N89°33'18"E 1340.56' FROM THE SOUTHWEST CORNER OF SAID SECTION 36, THENCE A 30' WIDE RIGHT-OF-WAY 5' ON THE RIGHT SIDE AND 25' ON THE LEFT SIDE OF THE FOLLOWING DESCRIBED CENTERLINE, N89°46'07"E 265.10'; THENCE A 30' WIDE RIGHT-OF-WAY 15' ON EACH SIDE OF THE FOLLOWING DESCRIBED CENTERLINE, N00°15'19"W 94.90' TO A POINT IN THE SE 1/4 SW 1/4 OF SAID SECTION 36 AND THE POINT OF TERMINATION, WHICH BEARS N86°12'22"E 1608.72' FROM THE SOUTHWEST CORNER OF SAID SECTION 36. THE SIDE LINES OF SAID DESCRIBED RIGHT-OF-WAY BEING SHORTENED OR ELONGATED TO MEET THE GRANTOR'S PROPERTY LINES. BASIS OF BEARINGS IS A TRANSVERSE MERCATOR PROJECTION WITH A CENTRAL MERIDIAN OF W103°53'00". CONTAINS 0.248 ACRES MORE OR LESS.



Detail "A"
No Scale

CERTIFICATE
THIS IS TO CERTIFY THAT THIS EASEMENT PLAT AND THE ACTUAL SURVEY ON THE GROUND UPON WHICH IT IS BASED WERE PERFORMED BY ME OR UNDER MY DIRECT SUPERVISION; THAT I AM RESPONSIBLE FOR THIS SURVEY; THAT THIS SURVEY MEETS THE MINIMUM STANDARDS FOR SURVEYING IN NEW MEXICO; AND THAT IT IS TRUE AND CORRECT TO THE BEST OF MY KNOWLEDGE AND BELIEF.

STATE OF NEW MEXICO
23782
PROFESSIONAL SURVEYOR
07-01-19

FILE: 65971-A2

Sheet 2 of 2

NOTES:
- Basis of Bearings is a Transverse Mercator Projection with a Central Meridian of W103°53'00"

N

CENTENNIAL RESOURCE PRODUCTION, LLC

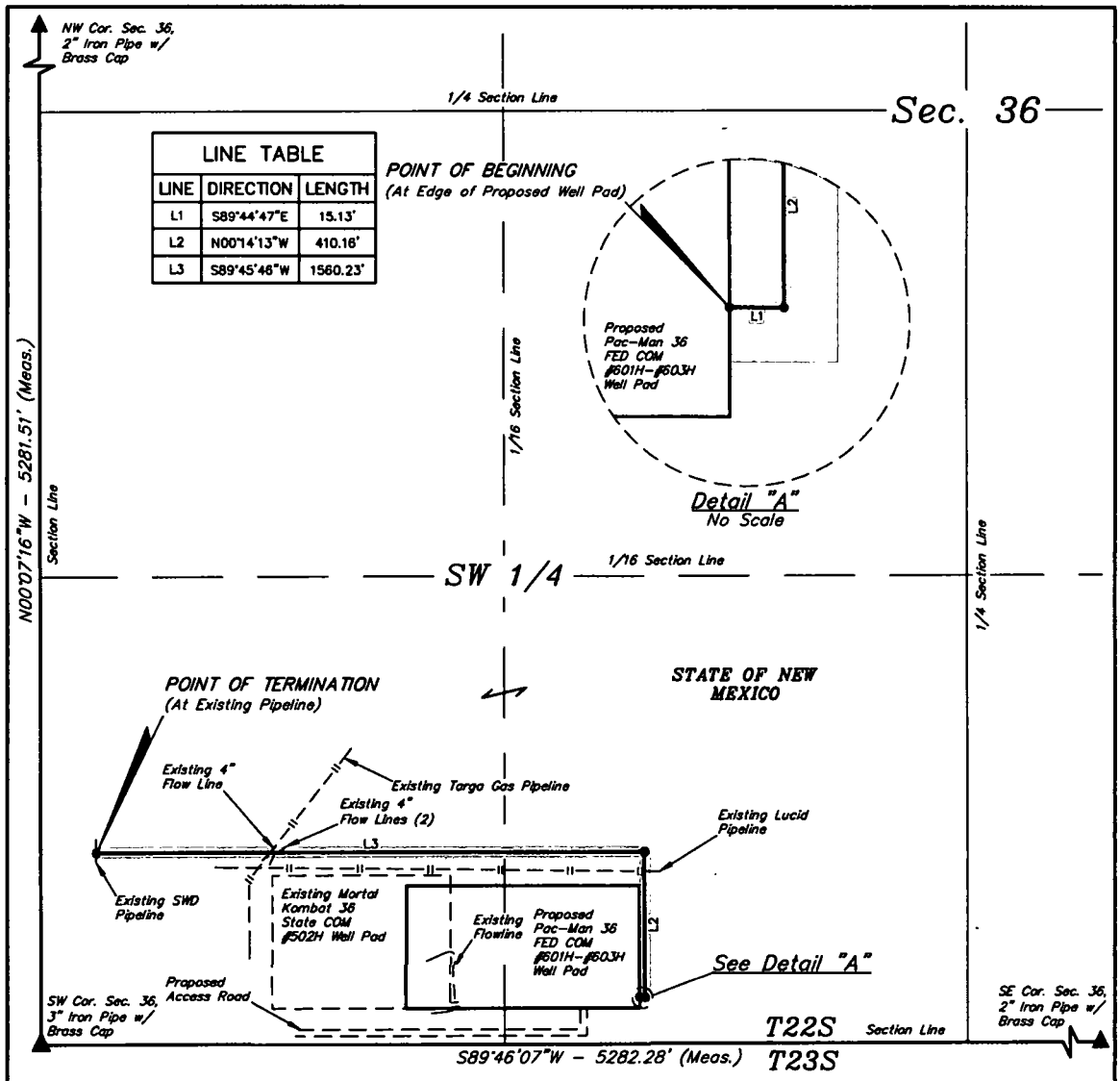
PAC-MAN 36 FED COM #601H-#603H
ON STATE OF NEW MEXICO LANDS IN
SECTION 36, T22S, R34E, N.M.P.M.
LEA COUNTY, NEW MEXICO

SURVEYED BY	S.L., C.H.	06-19-19	SCALE
DRAWN BY	L.K.	06-26-19	N/A

POWER LINE R-O-W

UINTAH ENGINEERING & LAND SURVEYING

UELS, LLC
Corporate Office * 85 South 200 East
Vernal, UT 84078 * (435) 789-1017



SWD PIPELINE RIGHT-OF-WAY DESCRIPTION

A 30' WIDE RIGHT-OF-WAY 15' ON EACH SIDE OF THE FOLLOWING DESCRIBED CENTERLINE.

BEGINNING AT A POINT IN THE SE 1/4 SW 1/4 OF SECTION 36, T22S, R34E, N.M.P.M., WHICH BEARS N85°24'30"E 1710.48' FROM THE SOUTHWEST CORNER OF SAID SECTION 36, THENCE S89°44'47"E 15.13'; THENCE N00°14'13"W 410.16'; THENCE S89°45'46"W 1560.23' TO A POINT IN THE SW 1/4 SW 1/4 OF SAID SECTION 36 AND THE POINT OF TERMINATION, WHICH BEARS N16°18'46"E 563.22' FROM THE SOUTHWEST CORNER OF SAID SECTION 36. THE SIDE LINES OF SAID DESCRIBED RIGHT-OF-WAY BEING SHORTENED OR ELONGATED TO MEET THE GRANTOR'S PROPERTY LINES. BASIS OF BEARINGS IS A TRANSVERSE MERCATOR PROJECTION WITH A CENTRAL MERIDIAN OF W103°53'00". CONTAINS 1.367 ACRES MORE OR LESS.

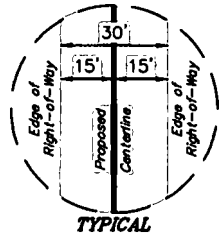
POINT OF BEGINNING BEARS N85°24'30"E 1710.48' FROM THE SOUTHWEST CORNER OF SECTION 36, T22S, R34E, N.M.P.M.

POINT OF TERMINATION BEARS N16°18'46"E 563.22' FROM THE SOUTHWEST CORNER OF SECTION 36, T22S, R34E, N.M.P.M.

400' 200' 0' 400'

ACREAGE / LENGTH TABLE			
LOCATION	FEET	RODS	ACRES
SEC. 36 (SE 1/4 SW 1/4)	824.26	49.96	0.568
SEC. 36 (SW 1/4 SW 1/4)	1161.26	70.38	0.800
TOTAL	1985.51	120.33	1.367

▲ = SECTION CORNERS LOCATED.



TYPICAL RIGHT-OF-WAY DETAIL
NO SCALE

CERTIFICATE
THIS IS TO CERTIFY THAT THIS EASEMENT PLAT AND THE ACTUAL SURVEY ON THE GROUND UPON WHICH IT IS BASED WERE PERFORMED BY ME OR UNDER MY DIRECT SUPERVISION; THAT I AM RESPONSIBLE FOR THIS SURVEY; THAT THIS SURVEY MEETS THE MINIMUM STANDARDS FOR SURVEYING IN NEW MEXICO; AND THAT IT IS TRUE AND CORRECT TO THE BEST OF MY KNOWLEDGE AND BELIEF.

STATE OF NEW MEXICO 23782 PROFESSIONAL SURVEYOR
07-01-19

FILE: 65975

NOTES:
- Basis of Bearings is a Transverse Mercator Projection with a Central Meridian of W103°53'00"

N

CENTENNIAL RESOURCE PRODUCTION, LLC

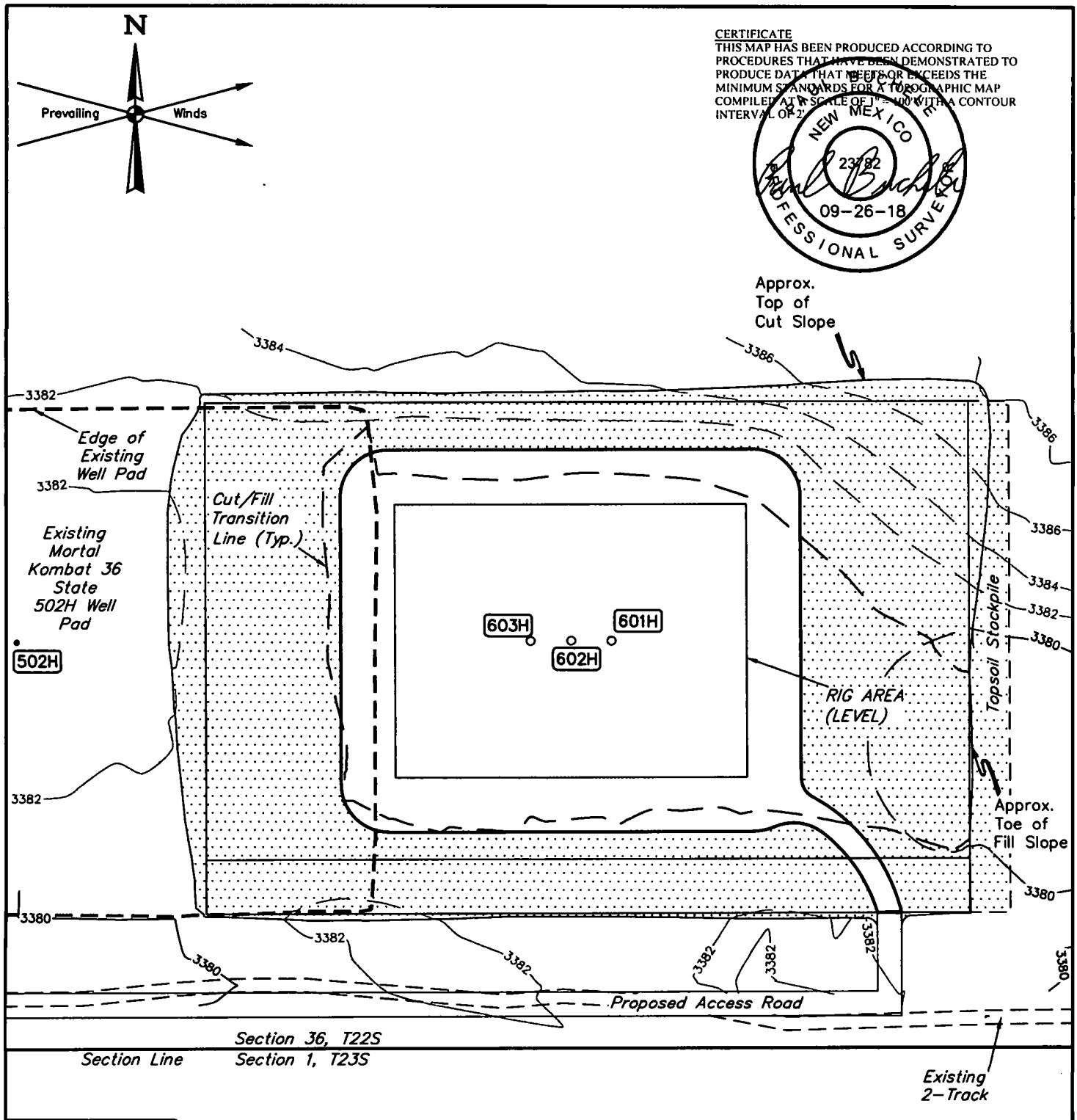
PAC-MAN 36 FED COM #601H-#603H
ON STATE OF NEW MEXICO LANDS IN
SECTION 36, T22S, R34E, N.M.P.M.
LEA COUNTY, NEW MEXICO

SURVEYED BY	S.L., C.H.	06-19-19	SCALE
DRAWN BY	L.K.	06-26-19	1" = 400'

SWD PIPELINE R-O-W

UINTAH ENGINEERING & LAND SURVEYING

UELS, LLC
Corporate Office * 85 South 200 East
Vernal, UT 84078 * (435) 789-1017



LEGEND:

Reclaimed Area

APPROXIMATE PRODUCTION PAD ACREAGE = ±2.209 ACRES
APPROXIMATE RECLAIMED AREA ACREAGE = ±2.026 ACRES
TOTAL ACREAGE = ±4.235 ACRES

NOTES:

- Contours shown at 2' intervals.

CENTENNIAL RESOURCE PRODUCTION, LLC

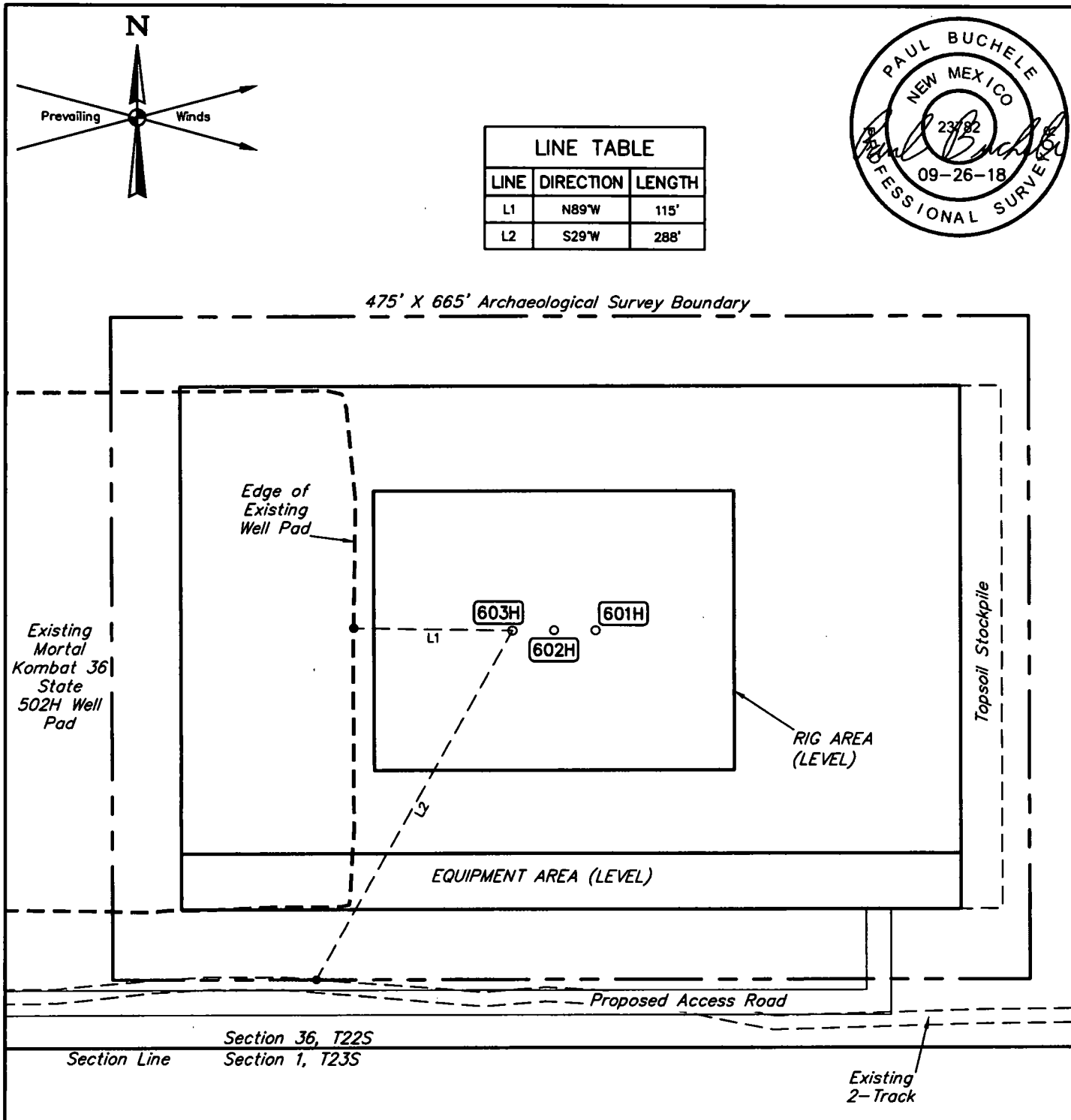
PAC-MAN 36 FED COM #601H-#603H ON EXISTING MORTAL KOMBAT 36 STATE COM #502H
S 1/2 SW 1/4, SECTION 36, T22S, R34E, N.M.P.M.
LEA COUNTY, NEW MEXICO

UINTAH ENGINEERING & LAND SURVEYING

UELS, LLC
Corporate Office * 85 South 200 East
Vernal, UT 84078 * (435) 789-1017

SURVEYED BY	B.B.	09-19-18	SCALE
DRAWN BY	C.D.	09-22-18	1" = 100'

RECLAMATION DIAGRAM FIGURE #4



PAUL BUCHELE
NEW MEXICO
23782
09-26-18
PROFESSIONAL SURVEYOR

LINE TABLE		
LINE	DIRECTION	LENGTH
L1	N89°W	115'
L2	S29°W	288'

NOTES:

- Basis of Bearings is a Transverse Mercator Projection with a Central Meridian of W103°53'00"

CENTENNIAL RESOURCE PRODUCTION, LLC

PAC-MAN 36 FED COM #601H-#603H ON EXISTING MORTAL KOMBAT 36 STATE COM #502H
S 1/2 SW 1/4, SECTION 36, T22S, R34E, N.M.P.M.
LEA COUNTY, NEW MEXICO

UINTAH ENGINEERING & LAND SURVEYING

UELS, LLC
Corporate Office * 85 South 200 East
Vernal, UT 84078 * (435) 789-1017

SURVEYED BY	B.B.	09-19-18	SCALE
DRAWN BY	C.D.	09-22-18	1" = 100'

ARCHAEOLOGICAL SURVEY BOUNDARY **FIGURE #5**

AFMSS

U.S. Department of the Interior
BUREAU OF LAND MANAGEMENT

PWD Data Report

10/14/2019

APD ID: 10400036839 **Submission Date:** 12/06/2018

Operator Name: CENTENNIAL RESOURCE PRODUCTION LLC

Well Name: PAC-MAN 36 FEDERAL COM **Well Number:** 601H

Well Type: OIL WELL **Well Work Type:** Drill

Section 1 - General

Would you like to address long-term produced water disposal? NO

Section 2 - Lined Pits

Would you like to utilize Lined Pit PWD options? NO

Produced Water Disposal (PWD) Location:

PWD surface owner: **PWD disturbance (acres):**

Lined pit PWD on or off channel:

Lined pit PWD discharge volume (bbl/day):

Lined pit specifications:

Pit liner description:

Pit liner manufacturers information:

Precipitated solids disposal:

Decribe precipitated solids disposal:

Precipitated solids disposal permit:

Lined pit precipitated solids disposal schedule:

Lined pit precipitated solids disposal schedule attachment:

Lined pit reclamation description:

Lined pit reclamation attachment:

Leak detection system description:

Leak detection system attachment:

Operator Name: CENTENNIAL RESOURCE PRODUCTION LLC

Well Name: PAC-MAN 36 FEDERAL COM **Well Number:** 601H

Lined pit Monitor description:

Lined pit Monitor attachment:

Lined pit: do you have a reclamation bond for the pit?

Is the reclamation bond a rider under the BLM bond?

Lined pit bond number:

Lined pit bond amount:

Additional bond information attachment:

Section 3 - Unlined Pits

Would you like to utilize Unlined Pit PWD options? NO

Produced Water Disposal (PWD) Location:

PWD disturbance (acres): **PWD surface owner:**

Unlined pit PWD on or off channel:

Unlined pit PWD discharge volume (bbl/day):

Unlined pit specifications:

Precipitated solids disposal:

Decribe precipitated solids disposal:

Precipitated solids disposal permit:

Unlined pit precipitated solids disposal schedule:

Unlined pit precipitated solids disposal schedule attachment:

Unlined pit reclamation description:

Unlined pit reclamation attachment:

Unlined pit Monitor description:

Unlined pit Monitor attachment:

Do you propose to put the produced water to beneficial use?

Beneficial use user confirmation:

Estimated depth of the shallowest aquifer (feet):

Does the produced water have an annual average Total Dissolved Solids (TDS) concentration equal to or less than that of the existing water to be protected?

TDS lab results:

Geologic and hydrologic evidence:

State authorization:

Unlined Produced Water Pit Estimated percolation:

Unlined pit: do you have a reclamation bond for the pit?

Operator Name: CENTENNIAL RESOURCE PRODUCTION LLC

Well Name: PAC-MAN 36 FEDERAL COM **Well Number:** 601H

Is the reclamation bond a rider under the BLM bond?

Unlined pit bond number:

Unlined pit bond amount:

Additional bond information attachment:

Section 4 - Injection

Would you like to utilize Injection PWD options? NO

Produced Water Disposal (PWD) Location:

PWD surface owner: **PWD disturbance (acres):**

Injection PWD discharge volume (bbl/day):

Injection well mineral owner:

Injection well type:

Injection well number: **Injection well name:**

Assigned injection well API number? **Injection well API number:**

Injection well new surface disturbance (acres):

Minerals protection information:

Mineral protection attachment:

Underground Injection Control (UIC) Permit?

UIC Permit attachment:

Section 5 - Surface Discharge

Would you like to utilize Surface Discharge PWD options? NO

Produced Water Disposal (PWD) Location:

PWD surface owner: **PWD disturbance (acres):**

Surface discharge PWD discharge volume (bbl/day):

Surface Discharge NPDES Permit?

Surface Discharge NPDES Permit attachment:

Surface Discharge site facilities information:

Surface discharge site facilities map:

Section 6 - Other

Would you like to utilize Other PWD options? NO

Produced Water Disposal (PWD) Location:

PWD surface owner: **PWD disturbance (acres):**

Other PWD discharge volume (bbl/day):

Operator Name: CENTENNIAL RESOURCE PRODUCTION LLC

Well Name: PAC-MAN 36 FEDERAL COM **Well Number:** 601H

Other PWD type description:

Other PWD type attachment:

Have other regulatory requirements been met?

Other regulatory requirements attachment:

AFMSS

U.S. Department of the Interior
BUREAU OF LAND MANAGEMENT

Bond Info Data Report

10/14/2019

APD ID: 10400036839 **Submission Date:** 12/06/2018

Operator Name: CENTENNIAL RESOURCE PRODUCTION LLC

Well Name: PAC-MAN 36 FEDERAL COM **Well Number:** 601H

Well Type: OIL WELL **Well Work Type:** Drill

Show Final Text

Bond Information

Federal/Indian APD: FED

BLM Bond number: NMB001471

BIA Bond number:

Do you have a reclamation bond? NO

Is the reclamation bond a rider under the BLM bond?

Is the reclamation bond BLM or Forest Service?

BLM reclamation bond number:

Forest Service reclamation bond number:

Forest Service reclamation bond attachment:

Reclamation bond number:

Reclamation bond amount:

Reclamation bond rider amount:

Additional reclamation bond information attachment: