District I
1625 N. French Dr., Hobbs, NM 88240
District II
1301 W. Grand Avenue, Artesia, NM 88210
District III
1000 Rio Brazos Road, Aztec, NM 87410
District IV
1220 S. St. Francis Dr., Santa Fe, NM 87505

State of New Mexico
Energy Minerals and Natural Resources

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

Form C-101
Revised March 17, 1999

Submit to appropriate District Office
State Lease - 6 Copies
Fee Lease - 5 Copies

☒ AMENDED REPORT

APPLICATION FOR PERMIT TO DRILL, RE-ENTER, DEEPEN, PLUGBACK, OR ADD A ZONE

[1] Operator Name and Address	[2] OGRID Number
Pecos Production Company 400 W. Illinois, Suite 1070 Midland, TX 79701	215758
	[3] API Number 30-025-36272

[3] Property Code	[5] Property Name	[6] Well No.
32116	Fort 21	1

[7] Surface Location

UL or lot no.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
G	21	14S	34E		2310'	North	1978'	East	Lea

[8] Proposed 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

[9] Proposed Pool 1	[10] Proposed Pool 2
Wildcat	

[11] Work Type Code	[12] Well Type Code	[13] Cable/Rotary	[14] Lease Type Code	[15] Ground Level Elevation
N	G	R	P	4124'
[16] Multiple	**[17] Proposed Depth**	**[18] Formation**	**[19] Contractor**	**[20] Spud Date**
No	14,000'	Mississippian	Unknown	As Soon As Approved

[21] Proposed Casing and Cement Program

Hole Size	Casing Size	Casing weight/foot	Setting Depth	Sacks of Cement	Estimated TOC
17-1/2"	13-3/8"	48#	400'	350 sxs	Circ
12-1/4"	9-5/8"	36# & 40#	4,500'	650sxs	2,500'
8-3/4"	5-1/2"	17# & 20#	14,000'	1250 sxs	6,500'

[22] Describe the proposed program. If this application is to DEEPEN or PLUG BACK, give the data on the present productivezone and proposed new productive zone. Describe the blowout prevention program, if any. Use additional sheets if necessary.

See Attached Program.

Permit Expires 1 Year From Approval Date Unless Drilling Underway

APR 2003 RECEIVED Hobbs OCD

[23] I hereby certify that the information given above is true and complete to the best of my knowledge and belief.

Signature:

Printed name: William R. Huck

Title: VP – Engr. & Operations

Date: 4-03-03 Phone: (915) 620-8480

OIL CONSERVATION DIVISION

Approved by:

Title: OC DISTRICT SUPERVISOR/GENERAL MANAGER

Approval Date: MAY 02 2003 Expiration Date:

Conditions of Approval:

Attached ☐

APR 0 1 2003

DISTRICT I
P.O. Box 1980, Hobbs, NM 88241-1980

DISTRICT II
P.O. Drawer DD, Artesia, NM 88211-0719

DISTRICT III
1000 Rio Brazos Rd., Aztec, NM 87410

DISTRICT IV
P.O. BOX 2088, SANTA FE, N.M. 87504-2088

State of New Mexico
Energy, Minerals and Natural Resources Department

OIL CONSERVATION DIVISION
P.O. Box 2088
Santa Fe, New Mexico 87504-2088

Form C-102
Revised February 10, 1994
Submit to Appropriate District Office
State Lease - 4 Copies
Fee Lease - 3 Copies

WELL LOCATION AND ACREAGE DEDICATION PLAT

☒ AMENDED REPORT

API Number	Pool Code	Pool Name
30-025-36272	✓	Wildcat

Property Code	Property Name	Well Number
32116	FORT 21	1

OGRID No.	Operator Name	Elevation
215758	PECOS Production COMPANY	4124'

Surface Location

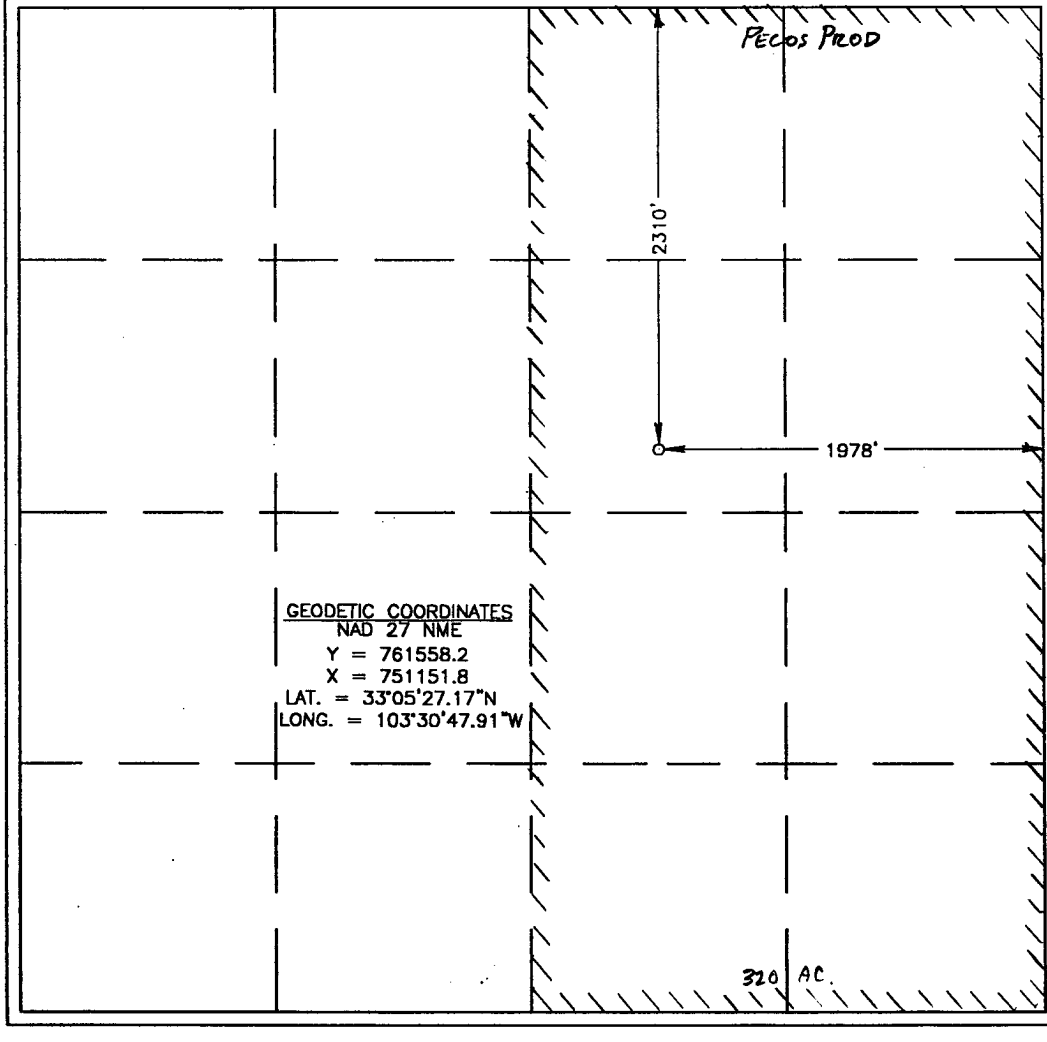
UL or lot No.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
G	21	14-S	34-E		2310'	NORTH	1978'	EAST	LEA

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

Dedicated Acres	Joint or Infill	Consolidation Code	Order No.
320			

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



OPERATOR CERTIFICATION

I hereby certify the the information contained herein is true and complete to the best of my knowledge and belief.

Signature

William R. Huck
Printed Name

VP - Engr. & Operations
Title

4-3-03
Date

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 supervison, and that the same is true and correct to the best of my belief.

MARCH 27, 2003
Date Surveyed A.W.B

Signature & Seal of Professional Surveyor

3/28/03

03.11.0365

Certificate No. RONALD J. EIDSON 3239
GARY EIDSON 12641

Pecos Production Company
Drilling Well Plan

Well Name: Fort 21 No. 1

Location: 2310' FNL & 1978' FEL, Section 21, Twp 14-S, Rge 34-E, Lea Co, NM

Objective: 14,000' Atoka – Morrow – Mississippian Test.

Rig Specs: 1000 Hp w/ 14,000 – 16,000' depth bracket.
Proj Max Drlg Hookload (20# dp): 300,000 lb.
Proj Max Casing Hookload: 275,000 lb.

BOP's:
Surface Hole: None
Intermediate: 13-5/8", 3M Double Ram w/ Annular.
Production: 11", 5M Double Ram w/ Annular.

EST FORMATION TOPS

Rustler	1,900	Cisco	10,700
Yates	2,950	Canyon	11,200
San Andres	4,400	Strawn	11,800
Tubb	7,350	Atoka	12,350
Abo	7,500	Morrow Clastics	13,300
Wolfcamp	9,650	Miss	13,500
Penn	10,150	TD	14,000

LOCATION

Build 300' x 200' caliche pad w/ 150 x 150 double horseshoe reserve. Use material from reserve for pad and road surface. Keep reserve pit below grade to facilitate reclamation to OCD guidelines. Install 6' x 6' x 6' cellar. Drill and grout in 40 ft of 20 " conductor pipe.

SURFACE HOLE

Drill 17-1/2" surface hole to +/- 400'. Use fresh water – native mud. Circulate steel pits to control washout. Run and cement 13-3/8" casing. Centralize every other collar. Install Texas Pattern Guide shoe and insert float. Displace w/ fresh water.

SURFACE CASING

Size	Wgt	Grd	Cplg	Depth	Col SF	Burst SF	Tens SF
13-3/8"	48#	H-40	STC	400	3.74	1.15	16.77

CEMENT

Lead: 200 sx Class C w/ 4% gel, ¼# Celloflake, 2% CaCl. 13.4 ppg. 1.77 cf/sk.
Tail: 150 sx Class C w/ ¼# celloflake, 2% CaCl. 14.8 ppg. 1.34 cf/sk.

INTERMEDIATE HOLE

WOC 4 hrs. Cut off conductor and 13-3/8" casing. Weld on 13-3/8" SO x 13-5/8", 3M Bradenhead. Install and test 13-5/8", 3M double-ram BOP's w/ Annular. Test casing to 1000 psi. Drill out shoe and drill 12-1/4" hole to 4500'. Circulate fresh water / native mud to 1800 ft. Add brine to control washout in salt section 1900' to 2900'. Add oil as need for lubricity. Lower waterloss to 20 cc at 4400 ft to

stabilize hole for casing job. Run and cement 9-5/8" casing. Centralize shoe joint and every 4 collar back to 3000'. Install cement nose guide shoe and float collar. Set 75 % csg weight on slips after bumping plug.

INTERMEDIATE CASING

Size	Wgt	Grd	Cplg	Sect L.	Depth	Col SF	Burst SF	Tens SF
9-5/8"	36	J-55	STC	3000	3000	1.21	1.17	2.34
9-5/8"	40	J-55	STC	1000	4000	1.31	1.21	7.5
9-5/8"	40	HCK-55	STC	500	4500	1.77	1.78	30.2
MASP	3000							

CEMENT

Lead: 400 sx 50:50 Poz:C w/ 5% salt, 10% gel. 11.6 ppg. 2.61 cf/sk. 1250' fill x 100% excess.
Tail: 250 sx Class C w/ 1% CaCl. 14.8 ppg. 1.34 cf/sk. 750' fill x 50% excess.
Calc TOC: 2500'.

PRODUCTION HOLE

Rig down 13-5/8" stack. Install 13-5/8" 3M x 11", 5M B-section and test seal to 3000 psi. Install 11", 5M double-ram BOP's w/ annular. Test BOP's w/ test plug to 5000 psi and annular to 3500 psi. Test casing to 2500 psi.. Drill out shoe and drill 8-3/4 " hole to 11,000 ft. If no loss circulation encountered, or other mitigating hole conditions, have option to reduce bit size to 7-7/8" to TD. Expect 9.8 ppg mud weights through Atoka and Morrow. If shallower formations are too weak, run 7" protection casing through Cisco to 11,000' and finish hole with 3-1/2" drillstring and 6-1/8" bits. Drill out 9/5/8" casing with fresh water. Mud up at 9500 with Bentonite- Polypac system w/ 34-36 sec vis and 10 – 15 cc WL. Maintain rheology and allow mud weight to increase to 9.5 ppg below 10,500 ft. Control seepage w/ fibrous LCM. If hole appears stable – switch out to XCD – Polymer system at 11,000 ft. MW – 9.5 – 9.8 ppg, Visc – 40 – 45 sec, WL below 6 cc. Maintain rheology to 14,000 ft TD. Condition hole and log. If productive – condition hole for casing, change BOP rams and run 5-1/2 " production casing to TD. Run float shoe and float collar. Centralize casing through zones of interest.

PRODUCTION CASING

Size	Wgt	Grd	Cplg	Sect. L	Depth	Col. SF	Burst SF	Tens SF
5-1/2"	20#	L-80	LTC	1000	1000	12.6	1.50	1.95
5-1/2"	17#	L-80	LTC	9000	10,000	1.165	1.51	1.75
5-1/2"	20#	L-80	LTC	2000	12,000	1.44	1.50	10.4
5-1/2"	20#	P-110	LTC	2000	14,000	1.55*	1.78	NA

* Over-design collapse through Atoka-Morrow interval in case of screen-out on frac job.

CEMENT

Lead: 380 sx 50:50 Poz:H w/ 10% gel, 2% salt, 5# gilsonite. 11.6 ppg. 2.50 cf/sk.
2500 ft fill w/ 50% excess.

Tail: 950 sx 15:61:11 Poz:H:CSE w/ .5% Fl-52, 5% salt, .5% Fl-25. 13.3 ppg. 1.59 cf/sk.
4000 ft fill w/ 50% excess.

COMPLETION

Set 75% casing weight on slips. Remove BOP's and install 11", 5M x 7-16", 10M tubinghead. Test seals to 5000 psi. RDMO rotary tools.

BLOWOUT PREVENTOR ARRANGEMENT

11" SHAFFER TYPE LWS, 5000 psi WP
11" CAMERON SPHERICAL, 5000 psi WP
120 GALLON, 5 STATION KOOMEY ACCUMULATOR
5000 psi WP CHOKE MANIFOLD