Office	es 10 Appropriate Distri	ict	State of New Me	XICO			rm C-103
District I	HC	BBS OCEnergy,	State of New Me Minerals and Natu	ral Resources	WELL API NO		une 19, 2008
District II	1 DI., HUUUS, NW 88240	้ 4. วดร์สิ ย C	30-025-33919				
District II 1301 W. Grand Ave., Artesia, NM 883 1 4 2001 L CONSERVATION DIVISION 1220 South St. Francis Dr.					5. Indicate Type of Lease		
1000 Rio Brazos Rd., Aztec, NM 87410 Sonto Fe NIM 87505					STATE FEE S 6. State Oil & Gas Lease No.		
1220 S. St. Francis Dr., Santa Fe, NM RECEIVED					N/A		
87505			PORTS ON WELLS			e or Unit Agreeme	ent Name
	E THIS FORM FOR PR	Bertha Barber					
DIFFERENT F PROPOSALS.		PPLICATION FOR PE	RMIT" (FORM C-101) FC	OR SUCH			
1. Type of	Well: ⊠Oil Well	☐ Gas Well ☐	Other:		8. Well Numb	,	
2. Name of Operator / Apache Corporation /					9. OGRID Nu 873	mber /	
3. Address	of Operator		10. Pool name or Wildcat				
1 .	s Airpark Lane, Suit	te 3000 Midland, T	X 79705				
4. Well Loc		24.42		1' 1.405		C (I Maria	
	it Letter K		et from the South	line and <u>165</u> inge 37E		from the West County Lea	line
Sec	otion 05		ownship 20S		NMPM	County Lea	
	***	3560' GR	ii (onon miemer Dr.,	1012, 111, 011, 010.		44	

	12. Chec	ck Appropriate	Box to Indicate N	ature of Notice,	Report or Oth	ner Data	
	NOTICE OF	INTENTION	TO·	l SUB	SEQUENT F	REPORT OF:	
PERFORM	REMEDIAL WORK		K [ALTERING C	ASING 🗌		
TEMPORARILY ABANDON						P AND A	
	LTER CASING	MULTIPLE	COMPL	CASING/CEMEN	T JOB		
DOWNHOL	E COMMINGLE						
OTHER: Re	ecompletion		×	OTHER:			
			ns. (Clearly state all p				
	tarting any proposed ecompletion.	d work). SEE RUI	LE 1403. For Multip	ie Completions: A	ttach wellbore di	agram of proposed	a completion
OI IV	ecompletion.						
Apache w	vould like to drill out	t all plugs, squeeze	the Blinebry and acid	d stimulate the Tubl	o and Abo as per	the attached proc	edure.
		•	•				
]		······································		
Spud Date:	05/12/1997		Rig Release Da	ite: 06/08/1997			
			_			· · · · · · · · · · · · · · · · · · ·	
I hereby certi	ify that the informa	tion above is true	and complete to the be	est of my knowledg	e and belief		· · · · · · · · · · · · · · · · · · ·
coj com			complete to the of	or my knowledg	, una conoi.		
		~					
SIGNATURI				DATE 11/08/20	12		
Type or print	name Fatima Vaso	quez	E-mail address	s: Fatima.Vasquez@ap	pachecorp.com	PHONE: (432) 8	18-1015
For State Us		7	<u> </u>		.,		
A DDD OVER	DV F	-/ //	TITLE _ /	Tet MA		DATE //_ 2	7 7013
APPROVED		ral to Drill 0 toot oll n		131-1119		DATE//-C	1-00/6
senarate h	of Approval. Approv	ownbere Commingle	e until DHC				7
is approve	d in Hobbs District of	fice according to R-	11363.				,

NOV 2 9 2012

Bertha Barber #16 API # 30-025-33919 Sec 5, T20S, R37E

Elevation: 3570' KB, 3554' GL

TD: 7,800' PBTD: 5,563'

Casing Record:

13-3/8" 48# @ 490' w/ 545 sxs

8-5/8" 24# & 28# @ 2429' w/ 980 sxs

7" 23# @ 5122' w/ 150 sxs

4-1/2" 11.6# K-55 @ 7796' w/ 235 sxs

Liner HRG @ 4812 w/ 4-1/2" tie-back string to surface w/ 450 sxs

Perfs: Blinebry: 5604'-5802' (218 holes) (Temporarily Abandoned w/ CIBP @ 5563')

Tubb: 6418'-6481' (66 holes) (Abandoned w/ CIBP @ 5880' & 5900') Abo: 7204'-7230' (54 holes) (Abandoned w/ CIBP @ 5880' & 5900')

Objective: Drill out all plugs, squeeze the Blinebry and acid stimulate the Tubb and Abo.

AFE: PA-12-4504

- 1. MIRU unit. Check pressure on well.
- 2. ND WH. NU BOP. PU and RIH w/ 3-7/8" bit, bit sub, and drill collars on 2-3/8" J-55 tubing to be used as work string to CIBP @ 5,563'. RU reverse unit and break circulation. Drill out CIBP or push to ± 5,880'. POOH.
- 3. RIH w/ CICR on WS and set at \pm 5,550°. Sting into CICR.
- 4. MIRU cement Service Company. Establish injection rate into perforations. Pump cement as dictated by injection rate. Hesitate squeeze perforations per Monument office recommendations. Displace to bottom perf with 32 bbls of flush.
- 5. Sting out of CICR and POOH w/ WS.
- 6. PU and RIH w/ 3-7/8" bit, bit sub and drill collars on WS. Tag CICR. RU reverse unit and break circulation. Drill out CICR and cement to 5,880'. Test casing squeeze to 1000 psi. *If squeeze does not test, repeat step 3-6.*
- 7. Continue to drill out CIBP and cement at 5,900'. TIH and clean well out to 7,300'. POOH.
- 8. RIH w/ sonic hammer on 2-3/8" WS to 7230'.
- 9. MIRU acid services. Acidize the Abo (7204-7230) with 1500 gallons 20% NEFE and the Tubb (6418-6481) with 2000 gallons 20% NEFE, respectively, through the sonic hammer.
- 10. RU swab equipment and recover load and swab test for fluid entry and oil cut. Report results to Midland. RD swab equipment. If unproductive, SI for future evaluation or plugging
- 11. Kill well if necessary. TOH w/ sonic hammer and WS.
- 12. RIH w/ production tubing and rods as per the Monument office specifications.
- 13. RDMOPU. Return well to production and place into test for 10 days.

Apache Corporation – Bertha Barber #16 GL=3554' Wellbore Diagram – Proposed KB=3570° Date: 10/30/2012 Spud:5/12/97 API: 30-025-33919 **Surface Location** 2140' FNL & 1650' FWL, Lot K Sec 5, T20S, R37E, Lea County, NM **Surface Casing** 13-3/8" 48# K-55 @ 490' w/ 545 sxs to surface Hole Size =17-1/2" **Intermediate Casing** 8-5/8" 24# &28# @ 2429' w/ 980 sxs to surface 9/99: Sqz'd csg leak @ 3,758'-3,788' w/1600 sxs 800 sx foamed, 100 sx thix, Hole Size 700 sx class "C" w/ adds; multiple attempts failed =11" 9/99: Ran 7" csg patch @ 3,753'-3793'. 9/99: Ran 108 jts 4-1/2" tie-back string to surf, pmpd 450 sx class "C" neat, then stung into liner top. 6/97: 4-1/2"x 7" Liner Hanger @ 4812' Hole Size **Intermediate Casing II** =7-7/8" 7" 23# K-55 @ 5122' w/ 150 sxs 5/07: Perf Blinebry @ 5,604'-30',5684'-5730',5,744'-52', 56'-60', 70'-72', 80'-87', 98'-5,802'. (218 holes) Acidized w/ 8000 gal 15% HCl. TBD: SQZ Blinebry w/ XX sxs cement 7/07: Set CIBP @ 5,737'. Isolated fr/ 5,744'-5,802'. 3/08: DO CIBP & push down to 5,880'. 5/07: Set CIBP @ 5,900' w/10'cmt. 10/99: Perf Tubb @ 6418-6422, 6437-6439, 6442-6452, 6464-6481 w/ 1 jspf. (66 holes). Acidized w/ 3000 gal 15%. Frac'd w/ 33k gal Delta frac w/ 32.5k# 20/40 snd. TBD: Acidized w/ 2000 gallons 20% NEFE 6/97: Perf Abo @ 7,204 - 7,230' w/ 2 jspf (54 holes). Acidize w/2,000 gals 15% Ferchek TBD: Acidized w/ 1500 gallons 20% NEFE Hole Size 2/05: Tight spot in csg @ 7,447'. =6-1/8"

R. Taylor

PBTD = 7.796'MD = 7.800

Production Liner 4-1/2" 11.6# K-55 @ 7796' w/ 235 sxs to 4812 Liner Hanger @ 4812'