

JAN 29 2010

Do not use this form for proposals to drill or to re-enter an abandoned well. Use Form 3160-3 (APD) for such proposals. RECEIVED

5. Lease Serial No.

6. If Indian, Allottee or Tribe Name

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

1. Type of Well

☒ Oil Well ☐ Gas Well ☐ Other

2. Name of Operator
Apache Corporation

8. Well Name and No.	
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Hawk Federal B-1 #069 (24427)

9. API Well No.	30-025-40458
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3a. Address
303 Veterans Airpark Lane, Suite 3000
Midland, TX 79705

3b. Phone No. (include area code)

432/818-1062

10. Field and Pool or Exploratory Area
Wantz; Abo (62700)

4. Location of Well (Footage, Sec., T., R., M., or Survey Description)

2480' FSL & 1805' FEL UL J Sec 8 T21S R37E

11. Country or Parish, State

Lea County, NM

12. CHECK THE APPROPRIATE BOX(ES) TO INDICATE NATURE OF NOTICE, REPORT OR OTHER DATA

TYPE OF SUBMISSION	TYPE OF ACTION				
<input checked="" type="checkbox"/> Notice of Intent	<input type="checkbox"/> Acidize	<input type="checkbox"/> Deepen	<input type="checkbox"/> Production (Start/Resume)	<input type="checkbox"/> Water Shut-Off	
	<input type="checkbox"/> Alter Casing	<input checked="" type="checkbox"/> Fracture Treat	<input type="checkbox"/> Reclamation	<input type="checkbox"/> Well Integrity	
<input type="checkbox"/> Subsequent Report	<input type="checkbox"/> Casing Repair	<input type="checkbox"/> New Construction	<input type="checkbox"/> Recomplete	<input type="checkbox"/> Other _____	
	<input type="checkbox"/> Change Plans	<input type="checkbox"/> Plug and Abandon	<input type="checkbox"/> Temporarily Abandon	_____	
<input type="checkbox"/> Final Abandonment Notice	<input type="checkbox"/> Convert to Injection	<input type="checkbox"/> Plug Back	<input type="checkbox"/> Water Disposal	_____	

13. Describe Proposed or Completed Operation: Clearly state all pertinent details, including estimated starting date of any proposed work and approximate duration thereof. If the proposal is to deepen directionally or recompletable horizontally, give subsurface locations and measured and true vertical depths of all pertinent markers and zones. Attach the Bond under which the work will be performed or provide the Bond No. on file with BLM/BIA. Required subsequent reports must be filed within 30 days following completion of the involved operations. If the operation results in a multiple completion or recompletable in a new interval, a Form 3160-4 must be filed once testing has been completed. Final Abandonment Notices must be filed only after all requirements, including reclamation, have been completed and the operator has determined that the site is ready for final inspection.)

Apache intends to fracture treat the above referenced well, per the attached procedure. This work will not change the configuration of the well downhole; a current wellbore diagram is also attached.

14. I hereby certify that the foregoing is true and correct. Name (Printed/Typed)

Reesa Holland Fisher

Title Sr. Staff Reg Tech

Signature

Date 10/01/2013

THIS SPACE FOR FEDERAL OR STATE OFFICE USE

Approved by _____

Conditions of approval, if any, are attached. Approval of this notice 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.

Title

Office

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.

(Instructions on page 2)

FEB 03 2014

Hawk B-1 #69 (API: 30-025-40458) Proposed Procedure

September 30, 2013

Acid Fracture the Abo

Day 1: MIRU. POOH w/ rods and pump. Install BOP. TFF and POOH w/ 2-7/8" tubing

Day 2: If necessary, RIH w/ 4-3/4" bit on 2-7/8" tubing, clean well out to PBTD @ 7050'. POOH

Day 3: NU frac equipment

Acid frac the Middle/Upper Abo down 5-1/2" casing with 3,000 gal 15% HCl spearhead followed by 30,000 gal x-linked brine and 450 lb rock salt/24,000 gal retarded 15% HCl/6,000 gal 15% HCl in four equal stages @ 40-60 BPM (max pressure 6,200 psi) as per frac recommendation. Shut-down to obtain fracture closure. After fracture closure, perform 3,000 gal diverted 15% HCl acid stage at matrix rates (max pressure 1,500 psi) to ensure connectivity of hydraulic fracture to the wellbore

ND frac equipment. Shut well in overnight to allow acid to spend

Day 4: Open well up and flow back treatment

Day 5: RIH w/ 2-7/8" production tubing. RIH w/ 1-1/2" pump and rods

Return well to production. Place well in test

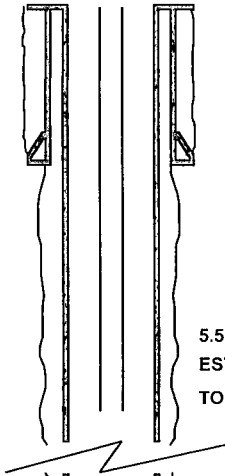
Apache Corporation

Hawk B-1 #69



WELL DIAGRAM (CURRENT CONFIGURATION)

SURF. CSG.
CMT. CIRC.



5.5"
EST. CEMENT TOP
TOC @ 130' (CBL)

Abo Perfs

6922-30'
8', 32 shots

6977-7035'
24', 24 shots

CIBP: 7050'

7057-7144'
8', 32 shots
(suspended)

PBTD: 7,050.0
TD: 7,500.0

WELL NAME:	Hawk B-1 #69	API:	30-025-40458
LOCATION:	2480'S/1805'E Unit J, Sec 8, T-21S, R-37E	COUNTY:	Lea Co, NM
SPUD-TD DATE:	05/25/2012-06/03/2012	COMP. DATE:	6/20/2012
PREPARED BY:	Cindy Rios	DATE:	9/5/2013
TD (ft):	7,500.0	KB Elev. (ft):	3544.00
PBTD (ft):	7,050.0	Ground Elev. (ft):	3531.00
		KB to Ground (ft):	13

CASING/TUBING	SIZE (IN)	WEIGHT (LB/FT)	GRADE	DEPTHS (FT)
Surface Casing	8-5/8"	24.0	J-55	0.00 1,389.0
	(Cemented w/725sx circ to surface)			
Prod. Casing	5-1/2"	17.0	L-80	0.00 7,500.0
	(Cemented w/1400sx TOC @ 130' CBL)			
Open Hole				
Tubing	2-7/8"	6.5	J-55	0.00 7,047.0

PRODUCTION TBG STRING

ITEM	DESCRIPTION	LENGTH (FT)	Depth (FT)
1	216 JTS 2-7/8" 6.5# J-55 TBG		
2	TAC		6848.0
3	SN		7047.0
4			
5			
6			
7			
8			
9			
10			

PRODUCTION ROD STRING

ITEM	DESCRIPTION	LENGTH (FT)	Btm (FT)
1	111 JTS 1-1/4" FG RODS	4162.5	4162.5
2	61 JTS 1" KD RODS	1525.0	5687.5
3	37 JTS 7/8" KD RODS	925.0	6612.5
4	12 JTS 1-1/2" K BARS	300.0	6912.5
5	BHP: 2"X 1-3/4"X 24' RHBC	24.0	6936.5
6			
7			
8			
9			
10			

SURFACE EQUIPMENT

PUMPING UNIT SIZE:	640 PU	MOTOR HP:	
PUMPING UNIT MAKE:		MOTOR MAKE:	

PERFORATIONS

Form.	Intervals	FT	SPF
Upper Abo	6922-30'	8	4
Middle Abo	6977', 79', 81', 87', 89', 91', 93', 95', 97', 99', 7001', 03', 05', 11', 19', 21', 23', 24', 26', 27', 28', 32', 33', 35'	24	1
Lower Abo	7057', 59', 77', 7111', 13', 30', 44' (suspended)	8	4