Form 3160-5 (August 2007)

DEPARTMENT OF THE INTERIOR BUREAU OF LAND MANAGEMENT

UNITED STATES

FORM APPROVED OMB NO. 1004-0135 Expires: July 31, 2010

5. Lease Serial No. NMNM20965

SUNDRY NOTICES AND REPORTS ON WELLS Do not use this form for proposals to drill or to re-enter an abandoned well. Use form 3160-3 (APD) for such proposals.

6. If Indian, Allottee or Tribe Name

SUBMIT IN TRIPLICATE - Other instructions on reverse side.					7. If Unit or CA/Agreement, Name and/or No.		
Type of Well Gas Well ☐ Oth		8. Well Name and No. RDX FEDERAL 17 21					
2. Name of Operator RKI EXPLORATION & PROD	AMPLEY	9. API Well No. 30-015-41088-00-X1					
3a. Address 210 PARK AVE SUITE 900 OKLAHOMA CITY, OK 73102	o. (include area code) 16-5775 6-5772	10. Field and Pool, or Exploratory BRUSHY DRAW					
4. Location of Well (Footage, Sec., T.	<u>-</u>	11. County or Parish, and State					
Sec 17 T26S R30E NESE 208			EDDY COUNTY, NM				
12. CHECK APPR	ROPRIATE BOX(ES) TO) INDICATE	ENATURE OF N	NOTICE, RE	EPORT, OR OTHE	R DATA	
TYPE OF SUBMISSION	TYPE OF ACTION						
☐ Notice of Intent	☐ Acidize	☐ Dee	☐ Deepen ☐ Production (S		ion (Start/Resume)	☐ Water Shut-Off	
_	Alter Casing	Frac	☐ Fracture Treat ☐ Reclamation		ntion	Well Integrity	
Subsequent Report	□ Casing Repair	□ Nev	v Construction	□ Recomp	lete	Other	
☐ Final Abandonment Notice	☐ Change Plans ☐		g and Abandon	☐ Temporarily Abandon			
	☐ Convert to Injection ☐		g Back	☐ Water D	Disposal		
following completion of the involved operations. If the operation results in a multiple completion or recompletion in a new interval, a Form 3160-4 shall be filed once testing has been completed. Final Abandonment Notices shall be filed only after all requirements, including reclamation, have been completed, and the operator has determined that the site is ready for final inspection.) Started completion activities on 3/30/2013. Drilled out DV tool @ 5463 feet. continue in hole and tad PBTD at 7390 feet. Placed 1000 psi on well.Ran CBL/GR/CCL to surface. Estimated TOC at 2910 feet. Fracturing Data: Perf STG 1 from 6919 feet to 7084 feet (44 holes). Test lines to 7500#. Pump STG 1, 162 Zone as follows, pumped 7581 gals of slick water, bull head 1500 gal of 15% HCL acid, (BRK press 3425) 39588 gal of Delta Frac 140- 20# w/ 78233 lb Premium White 16/30 prop in 0.5/1/2/3/4 ppg tailed with 9531 gal of DF 140- 20# w/ 33930 lb of CRC 16/30 prop at 5 ppg. Flushed to bottom perf W/ 7033 gal 20# Water frac G, ISIP 336, 5/10/15 min sip? 336/326/320, F.G48, Avg rate 77.8 bpm, Max 14. Thereby certify that the foregoing is true and correct.							
Electronic Submission #210213 verified by the BLM Well Information System For RKI EXPLORATION & PRDD LLC, sent to the Carlsbad Committed to AFMSS for processing by KURT SIMMONS on 06/11/2013 (13KMS6408SE)							
Name(Printed/Typed) ROBYN L LAMPLEY			Title REGUL	ATORY AN	ALYSI		
Signature (Electronic Submission)			Date 06/10/2	013			
	THIS SPACE FO	OR FEDERA	AL OR STATE	OFFICE US	SE		
_Approved By_ACCEPTED			JAMES A . TitleSUPERVIS				
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.			Office Carlsbac	t			
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.							

OCD Artesia

Additional data for EC transaction #210213 that would not fit on the form

32. Additional remarks, continued

rate 83.1 bpm, MTP 5194, ATP 3221, 60 bio balls, 5374 psi ball out. Total prop 112230, TLR 80280 gal.

Perf STG 2 from 6614 feet to 6768 feet (45 holes). Test lines to 7500#. Pump STG 2, MJW/Castle as follows, pumped 7487 gals of slick water, bull head 1500 gal of 15% HCL acid, (BRK press 2720) 39716 gal of Delta Frac 140 #20 w/ 78967 lb Premium White 16/30 prop in 0.5/1/2/3/4 ppg tailed with 12150 gal of Delta Frac 140 #20 w/ 33288 lb of CRC 16/30 prop at 5 ppg. Flushed to bottom perf W/ 6631 gal of 20# Water frac G, ISIP 383, 5/10/15 min sip ? 315/294/281, F.G. .49, Avg rate 79.7 bpm, Max rate 82.7 bpm, MTP 4061, ATP 2413, 60 bio balls, 2013 psi ball out. Total prop 112265, TLR 82614 gal.

TLR 82614 gal.

Perf STG 3 from 6456 feet to 6576 feet (36 holes). Test lines to 7500#. Pump STG 3, Tide/MWJ as follows, pumped 6429 gals of slick water, bull head 1500 gal of 15% HCL acid, (BRK press 2535) 38755 gal of Delta Frac 140 20# w/ 77686 lb Premium White 16/30 prop in 0.5/1/2/3/4 ppg tailed with 9937 gal of Delta Frac 140 20# w/ 36654 lb of CRC 16/30 prop at 5 ppg. Flushed to bottom perf W/ 6422 gal of 20# water frac G, ISIP 434, 5/10/15 min sip ? 245/198/172, F.G. .50, Avg rate 76.3 bpm, Max rate 81.7 bpm, MTP 5308, ATP 3081, 50 bio balls,5528 psi ball out. Total prop 114340, TLR 78372 gal.

Perf STG 4 from 6198 feet to 6392 feet (52 holes) Test lines to 7500#. Pump STG 4, Costello/Kingrea/Tide as follows, pumped 7490 gals of slick water, bull head 1500 gal of 15% HCL acid, (BRK press 2786) 54637 gal of Delta Frac 140 20# w/ 78239 lb Premium White 16/30 prop in 0.5/1/2/3/4 ppg tailed with 9384 gal of DF 140 20# w/ 35736 lb of CRC 16/30 prop at 5 ppg. Flushed to bottom perf W/ 6242 gal of 20# Water Frac G, ISIP 422, 5/10/15 min sip ? 240/211/185, F.G. .50, Avg rate 80.1 bpm, Max rate 81.1 bpm, MTP 4005, ATP 3066, 80 bioballs 4847 psi ball out. Total prop 113975, TLR 78954 gal.

Perf STG 5 from 5874 feet to 6068 feet (36 holes). Test lines to 7500#. Pump STG 5, Getty/Cougar as follows, pumped 6041 gals of slick water, bull head 1500 gal of 15% HCL acid, (BRK press 2348) 54741 gal of Delta Frac 140 20# w/ 77788 lb Premium White 16/30 prop in 0.5/1/2/3/4 ppg tailed with 6965 gal of Delta Frac 140 20# w/ 31463 lb of CRC 16/30 prop at 5 ppg. Flushed to bottom perf W/ 7923 gal of Water frac G , ISIP 290, 5/10/15 min sip ? 208/188/177, F.G. .48, Avg rate 76.3 bpm, Max rate 83.2 bpm, MTP 5074, ATP 3695, 50 bio balls, 5979 psi ball out. , Total prop 109252, TLR 76569 gal.

Perf STG 6 from 5492 feet to 5786 feet (48 holes). Test lines to 7500#. Pump STG 6, Getty/Topper as follows, pumped 11403 gals of slick water, bull head 1500 gal of 15% HCL acid, (BRK press 1052) 49603 gal of Delta Frac 140 20# w/ 60281 lb Premium White 16/30 prop in 0.5/1/2/3/4 ppg tailed with 5831 gal of Delta Frac 140 20# w/ 15876 lb of CRC 16/30 prop at 5 ppg. Flushed to bottom perf W/ 5967, ISIP 313, 5/10/15 min sip ? 197/171/155, F.G. .47, Avg rate 78.4 bpm, Max rate 81.1 bpm, MTP 3572, ATP 2413, 80 bio balls, 4823 psi ball out. , Total prop 76157, TLR 67736 gal.

TLR=464,525, Total proppant= 739,160 lbs.

Tied into ESP and produced well.