KUVU DEL T.TT OIL CONS. DIV.

In Lieu of Form 3160-4 (July 1992)

SIGNED

## UNITED STATES DEPARTMENT OF THE INTERIOR **BUREAU OF LAND MANAGEMENT**

SUBMIT INT

FORM APPROVEDIST. 3
OMB NO. 1004-0137 Expires February 28, 1995

(See other instructions or

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5 LEASE DESIGNATION AND LEASE NO. NMSF-078777 6 IF INDIAN, ALLOTTEE OR WELL COMPLETION OR RECOMPLETION REPORTING ON Field Office Dureau of Land Wallagemen 7. UNIT AGREEMENT NAME Rosa Unit la. DRV OTHER TYPE OF COMPLETION b NMNM 78407X x NEW WELL WORKOVER DEEPEN PLUG BACK DIFF RESVR OTHER 2 NAME OF OPERATOR 8 FARM OR LEASE NAME, WELL NO WILLIAMS PRODUCTION COMPANY Rosa Unit #601 ADDRESS AND TELEPHONE NO 9 API WELL NO 3 30-039-30916 - 600 P.O. Box 640, Aztec, NM 87410 (505) 634-4208 4. LOCATION OF WELL (Report location clearly and in accordance with any State requirements)\* 10. FIELD AND POOL, OR WILDCAT At Surface: 1475' FNL & 1220' FEL, SEC 31, T31N, R4W Basın Dakota At top production interval reported below · Same At total depth: DATE ISSUED 12 COUNTY OR 14 PERMIT NO 13 STATE New Mexico Rio Arriba 16. DATE T D 17 DATE COMPLETED (READY TO PRODUCE) 18 ELEVATIONS (DK, RKB, RT, GR, ETC)\* 19 ELEVATION CASINGHEAD 15 DATE REACHED 8/23/11 6963' GR SPUDDED 10-18-10 9-13-10 20 TOTAL DEPTH. 21 PLUG, BACK T D, MD & TVD 22 IF MULTCOMP. 23 INTERVALS ROTARY TOOLS CABLE TOOLS HOW MANY DRILLED BY 8807' MD 8610' MD 24 PRODUCING INTERVAL(S), OF THIS COMPLETION - TOP, BOTTOM, NAME (MD AND TVD) 25 WAS DIRECTIONAL SURVEY MADE Basin Dakota: 8395'-8540' NOTE CIBPs @ 8630' & 8660' left in hole no 27 WAS WELL CORED 26 TYPE ELECTRIC AND OTHER LOGS RUN Run 1 -Array Compensated Restivity, Spectral Density/Dual Spaced Neutral, GR., Run 2 - Wave Sonic, Compensated Spectral Natural Gamma Ray. CBL NO 28 CASING REPORT (Report all strings set in well) AMOUNT PULLED CASING SIZE/GRADE WEIGHT, LB/FT DEPTH SET (MD) HOLE SIZE TOP OF CEMENT, CEMENTING RECORD 10-3/4", J-55 40.5# 14-3/4' 290 SX - SURFACE 50661s. 7 5/8", J-55 26 4# 4262' 9-7/8" 750 SX - Surface 4 1/2", P-110 11 6# 8805 6-3/4" 615 SX - 4450 29 LINER RECORD 30 TUBING RECORD TOP (MD) BOTTOM (MD) SACKS CEMENT\* SCREEN (MD) DEPTH SET (MD) PACKER SET (MD) SIZE 2.375", 4.7#, N-8524 none 80, EUE 8rd 32 ACID SHOT, FRACTURE, CEMENT SQUEEZE, ETC AMOUNT AND KIND OF MATERIAL USED DEPTH INTERVAL (MD) DK 3<sup>rd</sup> Stage - 24, 0.34" holes No stimulation - pressured out @6950# 8395'-8430' Frac with 4961# 100 mesh followed with 101,529# 40/70 mesh DK 2<sup>nd</sup> Stage - 48, 0.34" holes 8468'-8540' Ottawa DK 1st Stage - 27, 0 34" holes CIBP @ 8630 & 8660, this interval not 8683'-8722' No Frac producing 33 PRODUCTION Commingled with Mancos per DHC- 3636-AZ
PRODUCTION PRODUCTION METHOD (Flowing, gas lift, pumping-size and type of pump) DATE OF FIRST PRODUCTION WELL STATUS (PRODUCING OR SI) producing 5-5-11 DATE OF TEST TESTED CHOKE SIZE PROD'N FOR TEST OIL - BBL GAS - MCF WATER - BBL GAS-OIL RATIO PERIOD FLOW TBG PRESS CASING PRESSURE CALCULATED 24-HOUR RATE OIL - BBL GAS - MCF WATER - BBL OIL GRAVITY-API (CORR ) 34 DISPOSITION OF GAS (Sold, used for fuel, vented, etc.) TO BE SOLD APPEPEPEOR RECORD SUMMARY OF POROUS ZONES, WELLBORE DIAGRAM 35 LIST OF ATTACHMENTS AUG 2 6 2011 36 I hereby certify that the foregoing and attached information is complete and correct as determined from all available records

TITLE PERMIT SUPV

DATE <u>8/24/11</u>

FARMINGTON FIELD OFFICE BY Sa

SUMMARY OF POROUS ZO cushion used, time tool open,	MMARY OF POROUS ZONES (Show all important zones of porosity and contents thereof, cored intervals, and all drill-stem, tests, including depth interval tested, thion used, time tool open, flowing and shut-in pressures, and recoveries)			38.GEOLOGIC MARKERS				
FORMATION	FORMATION TOP BOTTOM		DESCRIPTION	DESCRIPTION, CONTENTS, ETC		ТОР		
		351,6.1.	DESCRITION, CONTENTS, ETC	OTTOM DESCRIPTION, CONTENTS, ETC NAME	TVINE	NAME	MEASURED TRUE VERTICAL DEPT DEPTH	
						OJO ALAMO	3209	
			-			PICTURED CLIFFS	3786'	
						CLIFFHOUSE	6000,	
						POINT LOOKOUT	6217'	:
						MANCOS	6738`	
						GRANEROS	8328'	
						DAKOTA	8467	
	'							
				·				

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## ROSA UNIT #601 BASIN MANCOS/BASIN DK

**Location:** 1475"FNL & 1220' FEL SE/4 NE/4 Section 31 (H), T31N, R4W

Rio Arriba Co., NM Elevation: 6963' GR API: 30-039-30916

Tops	Depth
Ojo Alamo	3209'
Kirtland	3325'
Pictured Cliffs	3786'
Cliff House	6000'
Point Lookout	6217'
Mancos	6738'
Graneros	8328'
Dakota .	8467'

MC 5th. 6925'-7025' (33, 34" holes) Frac w/7500# 100 mesh PSA followed w/99,900# 30/70 PSA

MC 4th. 7470'-7630' (39, .34" holes) Frac w/ 7500# 100 mesh Ottawa followed w/139,400# 40/70 Ottawa

MC 3rd· 7705'-7855' (42, 34" holes) Frac w/ 7660# 100 mesh followed w/130,050# 30/70 PSA

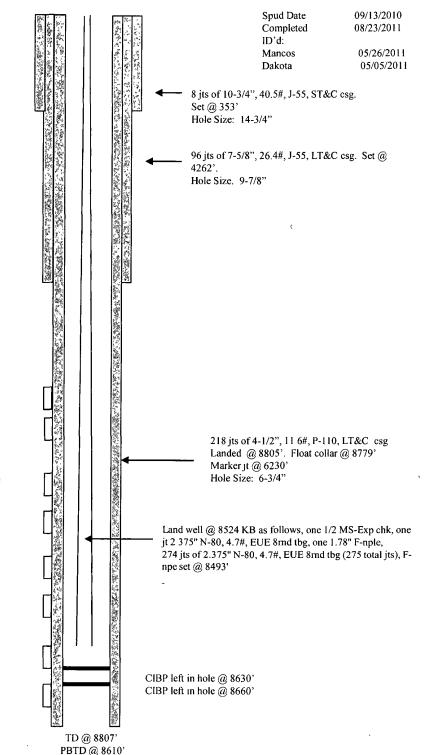
MC 2nd 7985'-8095' (36, 34" holes) Frac w/7640# 100 mesh folowed w/61,545# 30/50 Ottawa

MC 1st 8280'-8320' (27, 34" holes) Frac w/5200# 100 mesh followed w/80,200# 30/50 uniman sand

<u>Dakota 3rd</u> 8395'-8430' (24, 34" holes) No stimulation – pressured out @6950#

<u>Dakota 2nd</u>: 8468'-8540' (48, .34" holes) Frac w/4961#100 mesh sand followed w/101,529#40/70 Ottawa sand

<u>Dakota 1<sup>st</sup> stage:</u> 8683'-8722' (27, .34" holes) No stimulation



HOLE SIZE	CASING	CEMENT	VOLUME	CMT TOP
14-3/4"	10-3/4"	290 s x	522 cu.ft.	Surface
9-7/8"	7-5/8"	750 s x	1866 cu.ft.	Surface
6-3/4"	4-V2"	615 s x	861cu ft	4450' (CBL)

LH 08/24/11

In Lieu of Form 3160-4 (July 1992)

## UNITED STATES DEPARTMENT OF THE INTERIOR BUREAU OF LAND MANAGEMENT

SUBMIT IN

DUPLICATE 11

(See other instructions o

FORM APPROVED OMB NO 1004-0137 Expires February 28, 1995

TEST WITNESSE

Farmington Field Office 5 LI

5 LEASE DESIGNATION AND LEASE NO. NMSF-078777

Bureau of Land Wanayemo 6 IF INDIAN, ALLOTTEE OR WELL COMPLETION OR RECOMPLETION REPORT 7 UNIT AGREEMENT NAME X GAS WELL Rosa Unit TYPE OF WELL. I OIL WELL. DRY OTHER 1a TYPE OF COMPLETION MWM 78407X x NEW WELL WORKOVER DEEPEN DIFF RESVR PLUG BACK OTHER 8 FARM OR LEASE NAME, WELL NO NAME OF OPERATOR 2 WILLIAMS PRODUCTION COMPANY Rosa Unit #601 ADDRESS AND TELEPHONE NO 9 API WELL NO 30-039-30916 - 0002 P.O. Box 640, Aztec, NM 87410 (505) 634-4208 4. 10. FIELD AND POOL, OR WILDCAT LOCATION OF WELL (Report location clearly and in accordance with any State requirements)\* At Surface: 1475' FNL & 1220' FEL. SEC 31, T31N, R4W Basin Mancos At top production interval reported below Same At total depth: DATE ISSUED 12 COUNTY OR 14 PERMIT NO 13 STATE New Mexico Rio Arriba 16 DATE T D 17 DATE COMPLETED (READY TO PRODUCE) 18 ELEVATIONS (DK, RKB, RT,GR,ETC)\* 19 ELEVATION CASINGHEAD 15 DATE REACHED 8-23-11 6963' GR SPUDDED 10-18-10 9-13-10 21 PLUG, BACK T.D, MD & TVD 20 TOTAL DEPTH 22 IF MULTCOMP 23 INTERVALS ROTARY TOOLS CABLE TOOLS HOW MANY 8807' MD DRILLED BY 8610' MD 24 PRODUCING INTERVAL(S). OF THIS COMPLETION - TOP, BOTTOM, NAME (MD AND TVD)\* 25 WAS DIRECTIONAL SURVEY MADE Blanco Mancos 6925'-8320' 26. TYPE ELECTRIC AND OTHER LOGS RUN Run 1 - Array Compensated Restivity, Spectral Density/Dual Spaced Neutral, GR., 27 WAS WELL CORED NO Run 2 - Wave Sonic, Compensated Spectral Natural Gamma Ray. CBL 28 CASING REPORT (Report all strings set in well) CASING SIZE/GRADE WEIGHT, LB/FT DEPTH SET (MD) HOLE SIZE TOP OF CEMENT, CEMENTING RECORD AMOUNT PULLED 10-3/4", J-55 40 5# 353 14-3/4' 290 SX - SURFACE 7 5/8", J-55 26.4# 4262' 9-7/8" 750 SX - Surface 4 1/2", P-110 11.6# 8805 6-3/4" 615 SX - 4450 29 LINER RECORD 30 TUBING RECORD TOP (MD) BOTTOM (MD) SACKS CEMENT\* SCREEN (MD) DEPTH SET (MD) PACKER SET (MD) SIZE 2.375", 4.7#, N-8524 none 80, EUE 8rd 32 ACID, SHOT, FRACTURE, CEMENT SQUEEZE, ETC DEPTH INTERVAL AMOUNT AND KIND OF MATERIAL USED (MD) Frac with 7500# 100 mesh PSA followed with 99,900# 30/70 mesh MC 5th Stage - 33, 0.34" holes 6925'-7025' Frac with 7500# 100 mesh Ottawa sand followed with 139,400#  $MC 4^{th} stage - 39, 0.34$ " holes 40/70 mesh Ottawa sand 7470'-7630' Frac with 7660# 100 mesh sand followed with 130,050# 30/70 MC 3<sup>rd</sup> Stage - 42, 0 34" holes 7705'-7855' mesh PSA MC 2<sup>nd</sup> Stage - 36, 0 34" holes Frac with 7640# 100 mesh followed with 61,545# 30/50 mesh 7985'-8095' Ottawa MC 1st Stage - 27, 0.34" holes Frac with 5200# 100 mesh sand followed with 80,200# 30/50 mesh 8280'-8320' Uniman sand 33 PRODUCTION Commingled with Dakota per DHC-3636-AZ DATE OF FIRST PRODUCTION PRODUCTION METHOD (Flowing, gas lift, pumping-size and type of pump) WELL STATUS (PRODUCING OR SI) 5-26-11 producing TED FOR DEGORD WATERCEREP DATE OF TEST TESTED CHOKE SIZE PROD'N FOR TEST OIL - BBL GAS - MCF FLOW TBG PRESS CASING PRESSURE CALCULATED 24-HOUR RATE OIL - BBL GAS - MCF FARMINGTON FIELD OFFICE

34. DISPOSITION OF GAS (Sold, used for fuel, vented, etc.) TO BE SOLD

35	LIST OF	ATTACHMENTS	

SUMMARY OF POROUS ZONES, WELLBORE DIAGRAM

36 I hereby certify that the foregoing and attached information is complete and correct as determined from all available records

SIGNED Carry Hoggin TITLE PERMIT SUPV

DATE <u>8/24/11</u>

FORMATION	тор вотто	воттом	DESCRIPTION, CONTENTS, ETC		NAME	TOP		
						NAME	MEASURED DEPTH	TRUE VERTICAL DEPT
						OJO ALAMO	3209'	
						PICTURED CLIFFS	3786'	
						CLIFFHOUSE	6000'	
						POINT LOOKOUT	6217'	
						MANCOS	6738'	
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