

N.M. Oil Cons. Div-Dist. 2
1301 S.W. Grand Avenue
Alamogordo, NM 88210
UNITED STATES DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENTFOR APPROVED
OMB NO. 1004-0137
Expires: December 31, 1991

5. LEASE DESIGNATION AND SERIAL NO.

NMNM26105

6. IF INDIAN, ALLOTTEE OR TRIBE NAME

7. UNIT AGREEMENT NAME

Pending

8. FARM OR LEASE NAME, WELL NO.

Liberty 24 Fed Com 1

9. API WELL NO.

30-015-33094 D2

10. FIELD AND POOL, OR WILDCAT

Cottonwood Draw; Upper Penn

11. SEC., T., R., M., OR BLOCK AND SURVEY
OR AREA

Sec. 24; T25S; R26E

12. COUNTY OR
PARISH

Eddy

13. STATE

NM

WELL COMPLETION OR RECOMPLETION REPORT AND LOG *

1a. TYPE OF WELL: OIL WELL ☐ GAS WELL ☒ DRY ☐ Other _____

b. TYPE OF COMPLETION:

NEW WELL ☒ WORK OVER ☐ DEEP-EN ☐ PLUG BACK ☐ DIFF. REVR. ☐ Other _____

2. NAME OF OPERATOR

Gruy Petroleum Management Co.

3. ADDRESS AND TELEPHONE NO.

P O Box 140907 Irving Tx. 75014-0907

4. LOCATION OF WELL (Report location clearly and in accordance with any State requirements)

At surface 1650' FNL & 1200' FWL

At top prod. interval reported below 1650' FNL & 1200' FWL

At total depth 1650' FNL & 1200' FWL

ACCEPTED FOR RECORD

NOV 17 2004
ALEXIS C. SWOBODA
PETROLEUM ENGINEER

14. PERMIT NO.

DATE ISSUED

15. DATE SPUDDED 01-29-04 16. DATE T.D. REACHED 04-04-04 17. DATE COMPL. (Ready to prod.) 10-18-04 18. ELEVATIONS (DF, RKB, RT, OR, ETC.)* 3272' GR 19. ELEV. CASINGHEAD

20. TOTAL DEPTH, MD & TVD 12300' 21. PLUG, BACK T.D., MD & TVD 12220' 22. IF MULTIPLE COMPL., HOW MANY* 23. INTERVALS DRILLED BY → All 24. PRODUCING INTERVAL(S), OF THIS COMPLETION—TOP, BOTTOM, NAME (MD AND TVD)* 10236' - 10409' Cottonwood Draw; Upper Penn Up casing 25. WAS DIRECTIONAL SURVEY MADE Yes

26. TYPE ELECTRIC AND OTHER LOGS RUN

Dual Spaced Neutron & DLL Microguard

27. WAS WELL CORED

No

28. CASING RECORD (Report all strings set in well)

CASING SIZE/GRADE	WEIGHT, LB./FT.	DEPTH SET (MD)	HOLE SIZE	TOP OF CEMENT, CEMENTING RECORD	AMOUNT PULLED
13 - 3/8" J-55	54.5 #	440'	17-1/2"	490 sx Prem Plus circ 150 sx to pit	
9-5/8" NS-110	40#	5750'	12-1/4"	1700 sx Inter C/PremPlus circ 80 sx to pit	
7" P-110	26#	10369'	8-3/4"	350 sx Int H/Sup H TOC 10103'	

29. LINER RECORD

SIZE	TOP (MD)	BOTTOM (MD)	SACKS CEMENT*	SCREEN (MD)	SIZE	DEPTH SET (MD)	PACKER SET (MD)
4-1/2"	10103'	12300'	235 sx Sup H		2 3/8"	10566'	10566'

30. TUBING RECORD

31. PERFORATION RECORD (Interval, size and number)

10236' - 10409' 6 SPF

32. ACID, SHOT, FRACTURE, CEMENT SQUEEZE, ETC.

DEPTH INTERVAL (MD)	AMOUNT AND KIND OF MATERIAL USED
10236' - 10409'	7500 gal 15% NEFE HCL
	20000 gal 15% Zonal Coverage

33. PRODUCTION

DATE FIRST PRODUCTION		PRODUCTION METHOD (Flowing, gas lift, pumping—size and type of pump)				WELL STATUS (Producing or shut-in)	
10-18-04		Flowing				Producing	
DATE OF TEST	HOURS TESTED	CHOKE SIZE	PROD'N. FOR TEST PERIOD	OIL—BBL.	GAS—MCF.	WATER—BBL.	GAS-OIL RATIO
10-18-04	24	21/64	→	-0-	208	-0-	N/A
FLOW, TUBING PRESS.	CASING PRESSURE	CALCULATED 24-HOUR RATE	OIL—BBL.	GAS—MCF.	WATER—BBL.	OIL GRAVITY-API (CORR.)	
NA	500	→	-0-	208	-0-	NA	

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

Sold

TEST WITNESSED BY

NOV 19 2004

35. LIST OF ATTACHMENTS

NM C-122, Electric logs and Inclination Summary previously submitted with Morrow completion.

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

SIGNED

Zero Farris

TITLE

Manager Operations Administration

DATE

11-11-04

*(See Instructions and Spaces for Additional Data on Reverse Side)

Title 18 U.S.C. Section 1001, makes 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.

37. SUMMARY OF POROUS ZONES: (Show all important zones of porosity and contents thereof; cored intervals; and all drill-stem, tests, including depth interval tested, cushion used, time tool open, flowing and shut-in pressures, and recoveries):

38. GEOLOGIC MARKERS

FORMATION	TOP	BOTTOM	DESCRIPTION, CONTENTS, ETC.	NAME	TOP	
					MEAS. DEPTH	TRUE VERT. DEPTH
				Bone Springs	5130	
				Wolfcamp	8620	
				Cisco	10230	
				Strawn	10430	
				Atoka	10663	
				Morrow	11320	

Submit in duplicate to
appropriate district office.
See Rule 401 & Rule 1122

State of New Mexico
Energy Minerals and Natural Resources
Oil Conservation Division
2040 South Pacheco
Santa Fe, NM 87505

Form C-122
Revised October, 1999

MULTIPOINT AND ONE POINT BACK PRESSURE TEST FOR GAS WELL

Operator Gruy Petroleum				Lease or Unit Name Liberty Fed Com			
Type Test <input checked="" type="checkbox"/> Initial <input type="checkbox"/> Annual <input type="checkbox"/> Special						Test Date	Well No. 1
Completion Date 10/18/2004		Total Depth 12300		Plug Back TD 12220		Elevation	Unit Ltr - Sec - TWP - Rge
Csg. Size 7" / 4 1/2"	Wt. 26# 11.8	d 6.27 / 4.0	Set At 10369 / 12300	Perforations: From: 10236 To: 10409		County Eddy	
Tbg. Size 2 7/8 2 3/8	Wt. 6.5 / 4.7	d 2.44 / 1.99	Set At 9996 / 10566	Perforations: From: To:		Pool	
Type Well-Single-Bradenhead-G.G. or G.O. <u>Multiple</u>				Packer Set At 10566		Formation	
Producing Thru CASING		Reservoir Temp. 162	Mean Annual Temp. 60	Baro. Press. - P _a 13.2		Connection SALES	
L 10236	H 10236	Gg 0.658	%CO ₂ 0.522	%N ₂ 0.63	%H ₂ S 0	Prover 0	Meter Run 4.026
						Taps FLG	

FLOW DATA				TUBING DATA				CASING DATA		Duration of Flow
No.	Prover Line Size	Orifice x Size	Press p.s.i.g.	Diff. h _w	Temp.	Press p.s.i.g.	Temp.	Press p.s.i.g.	Temp.	
SI								972		
1		4.026 x .625	453	15.1	87			500		24 HRS.
2										
3										
4										
5										

RATE OF FLOW CALCULATIONS							
No.	COEFFICIENT (24 Hour)	$\sqrt{h_w P_m}$	Pressure P _m	Flow Temp. Factor Ft.	Gravity Factor F _g	Super Compress Factor F _{pv}	Rate of Flow Q. Mcfd
1							208
2	TOTAL	FLOW	METER				
3							
4							
5							

No.	P _r	Temp. R	T _r	Z	Gas Liquid Hydrocarbon Ratio	DRY GAS	Mcf bbl.
1					A.P. I. Gravity of Liquid Hydrocarbons	DRY	Deg.
2					Specific Gravity Separator Gas	0.658	XXXXXXX
3	TOTAL	FLOW	METER		Specific Gravity Flowing Fluid	XXXXXX	G MIX = .698
4					Critical Pressure	670	P.S.I.A.
5					Critical Temperature	375	R. P.S.I.A.

P _c 985.2 P _{c2} 970.6			
No.	P _t ²	P _w	P _w ²
1		513.2	263.4
2			
3			
4			
5			

(1) $\frac{P_c^2}{P_c^2 - P_w^2} = 1.372$

AOF = Q $\left[\frac{P_c^2}{P_c^2 - P_w^2} \right]^n = 0.285$

(2) $\left[\frac{P_c^2}{P_c^2 - P_w^2} \right]^n = 1.372$

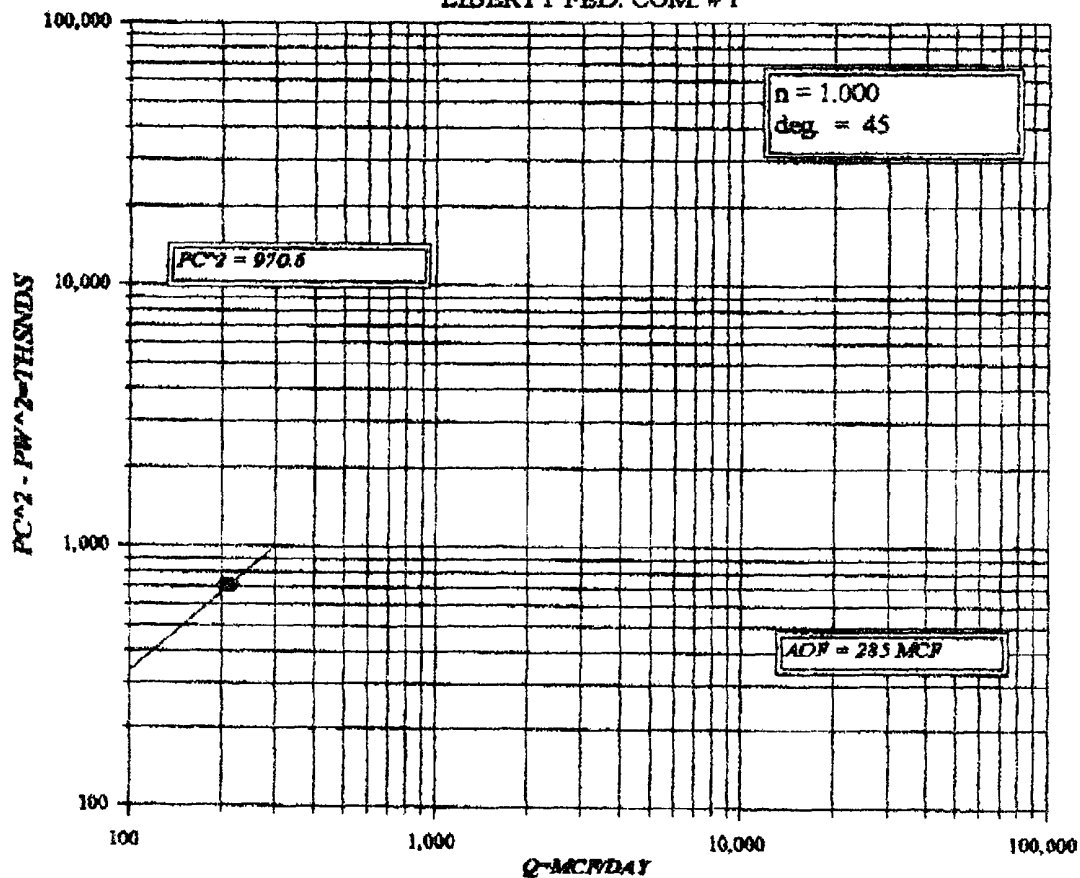
Absolute Open Flow	285	Mcf @ 15.025	Angle of Slope 0:	45	Slope, n:	1
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Remarks: * NO LIQUID DURING TEST

Approved By Division:	Conducted By: PRO WELL TESTING	Calculated By: MERV BUECKER	Checked By: MB
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GRUY PETROLEUM

LIBERTY FED. COM. # 1





Laboratory Services, Inc.

2609 West Marland
Hobbs, New Mexico 88240

Telephone: (505) 397-3713

FOR: Pro Well Testing & Wireline
P. O. Box 791
Hobbs, New Mexico 88241

SAMPLE:
IDENTIFICATION Liberty 24 Fed. #1
COMPANY: Gruy Petroleum
LEASE:
PLANT:

SAMPLE DATA: DATE SAMPLED 10/18/04 10:30 am
ANALYSIS DATE: 10/19/04
PRESSURE - PSIG 429
SAMPLE TEMP. °F 77
ATMOS. TEMP. °F

GAS (XX) LIQUID ()
SAMPLED BY: Bob Ray
ANALYSIS BY: Vickie Biggs

REMARKS:

COMPONENT ANALYSIS

COMPONENT	MOL PERCENT	GPM
Hydrogen Sulfide (H2S)		
Nitrogen (N2)	0.530	
Carbon Dioxide (CO2)	0.522	
Methane (C1)	87.044	
Ethane (C2)	7.572	2.020
Propane (C3)	2.097	0.576
I-Butane (IC4)	0.472	0.154
N-Butane (NC4)	0.590	0.186
I-Pentane (IC5)	0.262	0.096
N-Pentane (NC5)	0.188	0.068
Hexane Plus (C6+)	0.623	0.270
	100.000	3.370

BTU/CU.FT. - DRY 1148
AT 14.650 DRY 1145
AT 14.650 WET 1125
AT 14.73 DRY 1151
AT 14.73 WET 1131

MOLECULAR WT. 19.0879

SPECIFIC GRAVITY -
CALCULATED 0.658
MEASURED

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

State of New Mexico
Energy, Minerals and Natural Resources Department

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

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

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

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

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

WELL LOCATION AND ACREAGE DEDICATION PLAT

☐ AMENDED REPORT

API Number 30-015-33094	Pool Code	Pool Name Cottonwood Draw; Upper Penn
Property Code	Property Name LIBERTY 24 FEDERAL COM	Well Number 1
OGRID No. 162683	Operator Name GRUY PETROLEUM MANAGEMENT CO.	Elevation 3272'

Surface Location

UL or lot No.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
E	24	25-S	26-E		1650'	NORTH	1200'	WEST	EDDY

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 320	Joint or Infill N	Consolidation Code C	Order No.						

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

	<p>OPERATOR CERTIFICATION</p> <p>I hereby certify the the information contained herein is true and complete to the best of my knowledge and belief.</p> <p><u>Zeno Farris</u> Signature Zeno Farris Printed Name Manager Operations, Admin Title November 12, 2004 Date</p> <p>SURVEYOR CERTIFICATION</p> <p>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 supervision and that the same is true and correct to the best of my belief.</p> <p>August 07, 2003</p> <p>Date Surveyed Signature & Seal of Professional Surveyor Professional Surveyor August 11, 2003 Certificate No. RONALD J. EIDSON 3239 GARY EIDSON 12641</p>
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