

Form C-104
Supersedes Old C-104 and C-104A
Effective 1-1-65

SANTA FE
FILE
U.S.G.S.
LAND OFFICE
TRANSPORTER
OIL
GAS
OPERATOR
PRORATION OFFICE

NEW MEXICO OIL CONSERVATION COMMISSION
REQUEST FOR ALLOWABLE
AND
RECEIVED
AUTHORIZATION TO TRANSPORT OIL AND NATURAL GAS

NOV 03 1980

O. C. D.
ARTESIA, OFFICE

Mesa Petroleum Co.
Address
1000 Vaughn Building / Midland, Texas 79701

Reason(s) for filing (Check proper box)
New Well ☒ Change in Transporter of:
Recompletion ☐ Oil ☐ Dry Gas ☐
Change in Ownership ☐ Casinghead Gas ☐ Condensate ☐
Other (Please explain)

If change of ownership give name and address of previous owner

DESCRIPTION OF WELL AND LEASE

Lease Name: Antelope Federal
Well No.: 1
Pool Name, including Formation: Wildcat
Kind of Lease: State, Federal or Fee
Location: Unit Letter F, 1980 Feet From The NORTH Line and 1980 Feet From The WEST
Line of Section 22, Township 18S, Range 23E, NMPM, EDDY County

DESIGNATION OF TRANSPORTER OF OIL AND NATURAL GAS

Name of Authorized Transporter of Oil ☐ or Condensate ☒
Navajo Crude Oil Purchasing Co.
Address (Give address to which approved copy of this form is to be sent): P. O. Drawer 159 Artesia, NM 88210
Name of Authorized Transporter of Casinghead Gas ☐ or Dry Gas ☒
Northern Natural Gas Co.
Address (Give address to which approved copy of this form is to be sent): P. O. Box 2300 Midland, Texas 79702
If well produces oil or liquids, give location of tanks: Unit F, Sec. 22, Twp. 18, Rge. 23
Is gas actually connected? Yes
When: 11-13-80 (Estimated)

If this production is commingled with that from any other lease or pool, give commingling order number:

COMPLETION DATA

Designate Type of Completion - (X)
Oil Well ☐ Gas Well ☒ New Well ☒ Workover ☐ Deepen ☐ Plug Back ☐ Same Res'v. ☐ Diff. Res'v. ☐
Date Spudded: 2-28-80
Date Compl. Ready to Prod.: 5-18-80
Total Depth: 4825'
P.B.T.D.: 4728'
Pool: Undesignated
Name of Producing Formation: ABO
Top Oil/Gas Pay: 4568'
Tubing Depth: 4514'
Perforations: 4568'-----4597'
Depth Casing Shoe: 4824'

TUBING, CASING, AND CEMENTING RECORD

HOLE SIZE	CASING & TUBING SIZE	DEPTH SET	SACKS CEMENT
17 1/2"	13 3/8"	300'	100 Thix/325 "C"
12 1/4"	8 5/8"	1507'	500 HLW/200 "C"
7 7/8"	4 1/2"	4824'	410 HLW/525 "H"
Inside 4 1/2" csg)	2 3/8"	4514'	

TEST DATA AND REQUEST FOR ALLOWABLE
OIL WELL

(Test must be after recovery of total volume of load oil and must be equal to or exceed top allowable for this depth or be for full 24 hours)

Date First New Oil Run To Tanks
Date of Test
Producing Method (Flow, pump, gas lift, etc.)
Length of Test
Tubing Pressure
Casing Pressure
Choke Size
Actual Prod. During Test
Oil - Bbls.
Water - Bbls.
Gas - MCF

AS WELL

Actual Prod. Test - MCF/D: 271
Length of Test: 4
Bbls. Condensate/MMCF: 0
Gravity of Condensate: DRY
Testing Method (pilot, back pr.): BACK PRESSURE
Tubing Pressure: 868
Casing Pressure: 876
Choke Size: 3/4"

CERTIFICATE OF COMPLIANCE

XC: NMOC (6), TLS, MEC, PARTNERS, JBH, JWH, FILE

I hereby certify that the rules and regulations of the Oil Conservation Commission have been complied with and that the information given above is true and complete to the best of my knowledge and belief.

R. E. Mathis

R. E. MATHIS (Signature)

REGULATORY COORDINATOR

(Title)

October 31, 1980

(Date)

OIL CONSERVATION COMMISSION

APPROVED NOV 18 1980, 19

BY M. W. Mathis

TITLE OIL AND GAS INSPECTION

This form is to be filed in compliance with RULE 1104.
If this is a request for allowable for a newly drilled or deepened well, this form must be accompanied by a tabulation of the deviate tests taken on the well in accordance with RULE 111.
All sections of this form must be filled out completely for all wells on new and recompleted wells.
Fill out Sections I, II, III, and VI only for changes of owner, well name or number, or transporter or other such change of condition.

OIL CONSERVATION DIVISION

RECEIVED

DRAWER DB

NOV 17 1980

ARTESIA, NEW MEXICO

O. C. D.
ARTESIA OFFICE

NOTICE OF GAS CONNECTION

DATE 11-13-80

This is to notify the Oil Conservation Division that connection for the
purchase of gas from the Mesa Petroleum Company ✓, Antelope Fed. No. 1.
Operator Lease

F, 22-18-23, Wildcat, Abo, Northern Natural Gas,
Well Unit S. T. R. Pool Name of Purchaser

was made on November 13, 1980.
Date

Northern Natural Gas Company
Purchaser

Lowell P. Lund by LPR
Representative

Gas Contract Specialist
Title

cc: To Operator
Oil Conservation Division - Santa Fe
File

NEW MEXICO OIL CONSERVATION COMMISSION
MULTIPOINT AND ONE POINT BACK PRESSURE TEST FOR GAS WELL

Form C-122
Revised 9-1-65

RECEIVED

Type Test ☒ Initial ☐ Annual ☐ Special				Test Date 06-13-80		JUN 18 1980	
Company MESA PETROLEUM				Connection AIR		O. C. D.	
Pool WILDCAT				Formation ABO		ARTESIA, OFFICE	
Completion Date 05-18-80		Total Depth 4833		Plug back To 4728		Elevation 3936 GL	
Csg. Size 4 1/2		Wt. 10.5		Set At 4833		Perforations: From 4568 To 4697	
Tub. Size 2 3/8		Wt. 4.7		Set At 4514		Perforations: From To	
Type well - Single - Prodenhead - G.G. or G.O. Multiple SINGLE				Packer Set At -----		County EDDY	
Producing Thru T.B.G.		Reservoir Temp. °F 60		Baro. Press. - P _a 13.2		State NEW MEXICO	
L 4633		H 4633		G _g .860		% CO ₂ 10.006	
				% N ₂ 12.424		% H ₂ S	
				Prover		Meter Run 4"	
						Taps FLG.	

FLOW DATA						TUBING DATA		CASING DATA		Duration of Flow	
NO.	Prover Line Size	X	Orifice Size	Press. p.s.i.g.	Diff. h _w	Temp. °F	Press. p.s.i.g.	Temp. °F	Press. p.s.i.g.		Temp. °F
1.	4 X 1.000			450	2.5	105	1140		1147		72 HRS.
2.	4 X 1.000			450	4.0	107	1015		1030		1 HR.
3.	4 X 1.000			455	6.0	106	868		876		1 HR.
4.	4 X 1.000			455	7.0	104	630		710		1 HR.
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, Mgd
1.	4.753	34.03	463.2	.9594	1.078	1.043	174
2.	4.753	43.04	463.2	.9577	1.078	1.041	220
3.	4.753	53.00	463.2	.9585	1.078	1.042	271
4.	4.753	57.25	463.2	.9602	1.078	1.043	294
5.							

NO.	P _r	Temp. °R	T _r	Z	Gas Liquid Hydrocarbon Ratio	A.P.I. Gravity of Liquid Hydrocarbons	Specific Gravity Separator Gas	Specific Gravity Flowing Fluid	Critical Pressure	Critical Temperature
1.	.67	565	1.43	.920	dry		.860		687	394
2.	.67	567	1.44	.922						
3.	.68	566	1.44	.921						
4.	.68	564	1.43	.919						
5.										

NO.	P _r ²	P _w ²	P _r ² - P _w ²	(1) $\frac{P_r^2}{P_r^2 - P_w^2} =$	(2) $\left[\frac{P_r^2}{P_r^2 - P_w^2} \right]^n =$
1.	1160.2	1346.1	300.5	5.480	2.341
2.	1043.2	1088.3	558.3		
3.	889.2	790.7	855.9		
4.	723.2	523.0	1123.6		
5.					

Absolute Open Flow 407 Mgd @ 15.025		Angle of Slope 63.5		Slope, n .500	
Remarks:					
Approved By Commission:		Conducted By: DAVIS SERVICES INC.		Checked By: RICK PAGAN	