

- 045-06072

F. Loc. 1042/N; 1516/W Elev. 6459 GL Spd. 8-21-55 Comp. 9-18-55 TD 2280 PB
 Casing S. 8-5/8 @ 90 W 80 Sx. Int. @ W Sx. Pr. 5 1/2 @ 2215 W 100 Sx. T. 1 @ 2274
 Csg. Perf. Prod. Stim. Shot 122 2230 - 80
 SOF 2215-80 w/7200 GO, 12000 # snd ON EPG

I.P. 400 MCF/D After 3 Hrs. SICP 635 PSI After 16 Days GOR Grav. 1st Del. 11-30-55 s. MOI

TOPS	NITD	Well Log	TEST DATA							
Kirtland	C-103	Plat	X	Schd.	PC	Q	PW	PD	D	Ref. No.
Fruitland	C-104	Electric Log	X	5/23/68	273	10	210	218	9	X M
Pictured Cliffs	2210	C-122	X	5/11/70	243	1	184	194	1	
Cliff House	Ditr	Dfa		4/30/71	225	12	124	180	7	
Menefee	Datr	Dac		7/5/72	161	8	101	129	5	X M
Point Lookout	J.G. Turner 10/1/80 NIT Reemp. FRZ. col 12-8-90 Reemp w/ CIP @ 2214 Zone above 12-8-90 (1.00) 161.44			10/4/83	174	4	124	139	3	X M
Mancos										
Gallup										
Sanostee										
Greenhorn										
Dakota										
Morrison										
Entrada										
	IEPAG									

Ballard PC Co. S.J.S. 4 T 26N R 9W UC Oper. Meridian Oil Inc. Huerfanito U. No. 23



IN REPLY REFER TO:

UNITED STATES
DEPARTMENT OF THE INTERIOR
GEOLOGICAL SURVEY
P. O. Box 965
Farmington, New Mexico

May 25, 1955



J. Glenn Turner
Box 72^a
Farmington, New Mexico

Re: New Mexico 03491

Gentlemen:

Receipt is acknowledged of your "Notice of Intention to Drill" dated May 25, 1955 covering your well No. 23-4 Huerfanito Unit in NW¹ sec. 4, T. 26 N., R. 9 W., N. E. P. M., San Juan County, New Mexico, Ballard-Pictured Cliffs pool.

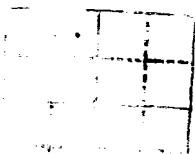
Your proposed work is hereby approved subject to compliance with the provisions of the "Oil and Gas Operating Regulations" revised May 25, 1942, a copy of which will be sent to you on request, and subject to the following conditions:

1. Drilling operations so authorized are subject to the attached sheet for general conditions of approval.
2. Furnish copies of all logs.

Very truly yours,

P. T. McGrath
District Engineer

PTMcGrath:ac



UNITED STATES
DEPARTMENT OF THE INTERIOR
GEOLOGICAL SURVEY



TO THE DIRECTOR, GEOLOGICAL SURVEY
WASHINGTON, D. C.
FROM THE DISTRICT COMMISSIONER, DISTRICT 3
OIL CONSERVATION COMMISSION
SUBJECT: [Illegible]

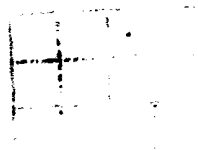
Enclosed for the Bureau are two copies of a report
on the oil resources of the [Illegible] area.

Very truly yours,
[Illegible Signature]

Very truly yours,
[Illegible Signature]

E. T. [Illegible]
District Commissioner

Enclosure



X		

(SUBMIT IN TRIPPLICATE)

UNITED STATES
DEPARTMENT OF THE INTERIOR
GEOLOGICAL SURVEY

Land Office New Mexico
Lease No. 03491
Unit NW 1/4

SUNDRY NOTICES AND REPORTS ON WELLS

NOTICE OF INTENTION TO DRILL <u>XXXX</u>	SUBSEQUENT REPORT OF WATER SHUT-OFF
NOTICE OF INTENTION TO CHANGE PLANS	SUBSEQUENT REPORT OF SHOOTING OR ACIDIZING
NOTICE OF INTENTION TO TEST WATER SHUT-OFF	SUBSEQUENT REPORT OF ALTERING CASING
NOTICE OF INTENTION TO RE-DRILL OR REPAIR WELL	SUBSEQUENT REPORT OF RE-DRILLING
NOTICE OF INTENTION TO SHOOT OR ACIDIZE	SUBSEQUENT REPORT OF ABANDONMENT
NOTICE OF INTENTION TO PULL OR ALTER CASING	SUPPLEMENTARY WELL HISTORY
NOTICE OF INTENTION TO ABANDON WELL	

(INDICATE ABOVE BY CHECK MARK NATURE OF REPORT, NOTICE, OR OTHER DATA)

RECEIVED
MAY 25 1955
U. S. GEOLOGICAL SURVEY
FARMINGTON, NEW MEXICO

May 25, 1955, 19

Esmeralda Unit
Well No. 23-1 is located 1042 ft. from N line and 1516 ft. from W line of sec. 4

NW 1/4 Sec. 4 26 N. 9 W. N. M. P. M.
(1/4 Sec. and Sec. No.) (Twp.) (Range) (Meridian)

Ballard Pictured Cliffs San Juan County New Mexico
(Tract) (County or Subdivision) (State or Territory)

The elevation 6159 above sea level is 6159 ft. (Ungraded ground)

DETAILS OF WORK

(State names of and expected depths to objective sands; show sizes, weights, and lengths of proposed casings; indicate mudlogging jobs, cementing points, and all other important proposed work)

Propose to spud with cable tools; then drill with rotary tools to the top of the Pictured Cliffs Formation - expected between 1,900 feet and 2,200 feet below surface. Completion with cable tools - and sand oil fracturing or shooting with solidified nitro glycerin as conditions warrant.

Casing program: 90 feet of 8 1/2" and 5 1/2" cas. 2 1/2" casing. Circulate cement to surface, using at least 75 sacks of cement.

5-1/2" O.D. 11 1/2 J-55 seamless casing to be set on top of Pictured Cliffs formation, cemented with 100 sacks regular cement.

1 1/2" tubing to be set within 20 feet of total depth for production.

I understand that this plan of work must receive approval in writing by the Geological Survey before operations may be commenced.

J. Glenn Turner

Company Box 728 - Farmington, New Mexico.

Address (Home Office: 17th St. - Mercantile Bank Bldg.
Dallas, Texas.)

By

J. Leeson Neal
Agent in Farmington

Title

Company J. Glenn Turner

HUERFANITO UNIT

Lease HUERFANITO UNIT

Well No. HH 23-4

Sec. 4 T. 26 N R. 9 W N.M.P.M.

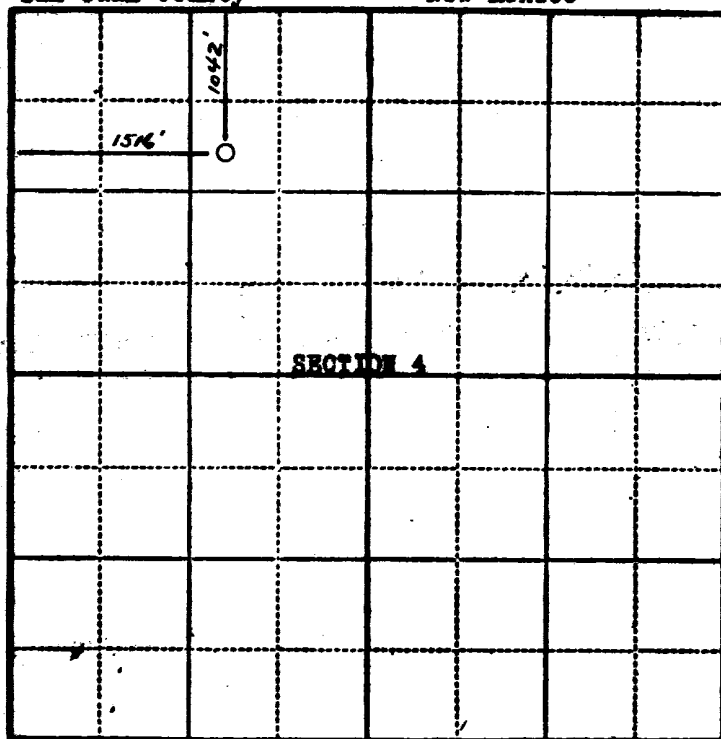
Location 1042 feet from North line:

1816 feet from West line.

Elevation: 6459 GL.

San Juan County

New Mexico



Scale—4 inches equal 1 mile.

This is to certify that the above plat was prepared from field notes of actual surveys made by me or under my supervision and that the same are true and correct to the best of my knowledge and belief.

Stephen H. Kinney

STEPHEN H. KINNEY
Registered Professional
Engineer and Land Surveyor

Surveyed May 11, 1955

RECEIVED
MAY 25 1955
U. S. GEOLOGICAL SURVEY
FARMINGTON, NEW MEXICO

NEW MEXICO OIL CONSERVATION COMMISSION
INITIAL POTENTIAL TEST-DATA SHEET

FORM C-122-B

This form must be used for reporting all pitot tube tests made in the State. It is particularly important that it be used for reporting Initial Potential Tests in the San Juan Basin as prescribed by Order No. R-333 and by the New Mexico Oil Conservation Commission Manual of Tables and Procedure for Initial Potential (Pitot Tube) Tests.

FOOL FORMATION
COUNTY DATE WELL TESTED

OPERATOR LEASE WELL NO.
1/4 SECTION: UNIT LETTER SEC. TWP. RGE.
CASING: " O.D. SET AT TUBING " WT. SET AT
PAY ZONE: FROM TO GAS GRAVITY: MEAS. EST.
TESTED THROUGH: CASING TUBING
TEST NIPPLE I.D. TYPE OF GAUGE USED ☐ (Spring) ☐ (Monometer)

OBSERVED DATA

SHUT IN PRESSURE: CASING TUBING: S. I. PERIOD
TIME WELL OPENED: TIME WELL GAUGED:
IMPACT PRESSURE: Working pressure on tubing
VOLUME (Table I) (a)
MULTIPLIER FOR PIPE OR CASING (Table II) (b)
MULTIPLIER FOR FLOWING TEMP. (Table III) (c)
MULTIPLIER FOR SP. GRAVITY (Table IV) (d)
AVE. BAROMETER PRESSURE AT WELLHEAD (Table V)
MULTIPLIER FOR BAROMETRIC PRESSURE (Table VI)
INITIAL POTENTIAL, MCF/24 Hrs. (a) x (b) x (c) x (d) x (e) =

WITNESSED BY:
COMPANY:
TITLE:

TESTED BY:
COMPANY:
TITLE:



1-15-53

UNITED STATES DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

It is hereby ordered that the following lands be reserved for the purpose of establishing a National Monument to be known as the "National Monument of the Department of the Interior" (Public Law 35-293) and that the Department of the Interior be authorized to acquire the lands and to take such action as may be necessary to carry out the purposes of this Act.

Approved: _____ Date: _____

Special Agent in Charge, Bureau of Land Management, Department of the Interior

TO: _____ FROM: _____

SUBJECT: _____

RE: _____

DATE: _____

BY: _____

FOR: _____

FILE NO. _____

ADDITIONAL DATA

DATE: _____

BY: _____

FOR: _____

(a) _____

(b) _____

(c) _____

(d) _____

OIL CONSERVATION COMMISSION

No. Copies Received _____

(iv) _____

(v) _____

(vi) _____

Operator _____

Santa Fe _____

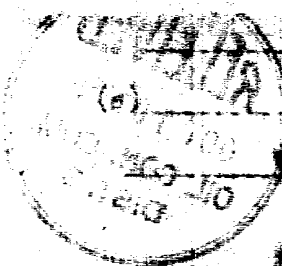
Production Office _____

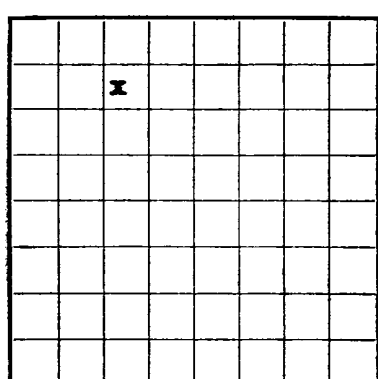
State Land Office _____

U. S. G. S. _____

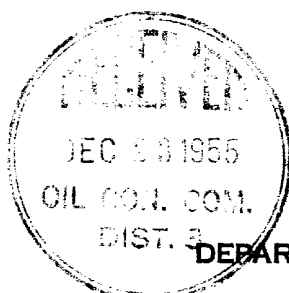
Transporter _____

File _____





LOCATE WELL CORRECTLY

UNITED STATES
DEPARTMENT OF THE INTERIOR
GEOLOGICAL SURVEYU. S. LAND OFFICE **New Mexico**
SERIAL NUMBER **03491**
LEASE OR PERMIT TO PROSPECT

LOG OF OIL OR GAS WELL

Company **J. Glenn Turner** Address **P. O. Box 728 - Farmington, New Mexico**
Lessor or Tract **Huerfania Unit** Field **Ballard P.C.** State **New Mexico**
Well No. **23-4** Sec. **4** T. **26-N** R. **9-W** Meridian **N.M.P.M.** County **San Juan**
Location **1042** ft. ³⁴_S of **N** Line and **1516** ft. ^E_W of **W** Line of **Sec. 4** Elevation **6467**
(Elevation above sea level)

The information given herewith is a complete and correct record of the well and all work done thereon so far as can be determined from all available records.

Signed **C. Hesson Neal**
Date **October 13, 1955** Title **C. Hesson Neal, Agent in Farmington**

The summary on this page is for the condition of the well at above date.

Commenced drilling **August 21, 1955**, 19 Finished drilling **Sep. 17, 1955**, 19

OIL OR GAS SANDS OR ZONES

(Denote gas by G)

No. 1, from **2209** to **2280 (G)** No. 4, from _____ to _____
No. 2, from _____ to _____ No. 5, from _____ to _____
No. 3, from _____ to _____ No. 6, from _____ to _____

IMPORTANT WATER SANDS

No. 1, from _____ to _____ No. 3, from _____ to _____
No. 2, from _____ to _____ No. 4, from _____ to _____

CASING RECORD

Size casing	Weight per foot	Threads per inch	Make	Amount	Kind of shoe	Cut and pulled from	Perforated		Purpose
							From—	To—	
8-5/8"	24	8 rd. thd.	J-55	90.5'	None				Surface
5-1/2"	11	8 rd. thd.	J-55	2230'	Halliburton				Production
1 1/2"	4.2	8 rd. thd.	J-55	2280'	Halliburton				Production

MUDDING AND CEMENTING RECORD

Size casing	Where set	Number sacks of cement	Method used	Mud gravity	Amount of mud used
8-5/8"	100'	80	Halliburton	Mostly water	
5-1/2"	2215'	100	Halliburton	Mostly water	

PLUGS AND ADAPTERS

Heaving plug—Material _____ Length _____ Depth set _____
Adapters—Material _____ Size _____

SHOOTING RECORD

Size	Shell used	Explosive used	Quantity	Date	Depth shot	Depth cleaned out
				9/15/55	2230-2280	2280

On **9/17/55** sand oil treated with **7700** gallons diesel oil and **12,000** sand from **2215' - 2280'**. Flashed with **2300** gallons. Breakdown pressure **950** psi. Injection **19.5** BPM.

TOOLS USED

Rotary tools were used from **100** feet to **2215** feet, and from _____ feet to _____ feet
Cable tools were used from **0** feet to **100** feet, and from **2215** feet to **2280** feet
Potential Test taken **Oct. 6, 1955** DATES **Shut in for Potential Test**
Put to producing **September 18, 1955**, 19

The production for the first 24 hours was _____ barrels of fluid of which _____% was oil; _____% emulsion; _____% water; and _____% sediment. Gravity, °Bé. _____

If gas well, cu. ft. per 24 hours **400 MCF/Day** (3 hour test) Gallons gasoline per 1,000 cu. ft. of gas _____Rock pressure, lbs. per sq. in. **635 psig.**

EMPLOYEES

Huerfania Drilling Co., Inc., Driller _____, Driller
_____, Driller _____, Driller

FORMATION RECORD

FROM—	TO—	TOTAL FEET	FORMATION
0	1305	1305	Sand & Shale
1305	1475	170	Sand
1475	2075	600	Sand, Shale Breaks
2070	2209	139	Sand, Shale & Coal
2209	2280	71	Sand

Top. Pictured Cliffs **2209**

FOLD MARK

[OVER]

10-43094-3

LOCALIZATION RECORD—CONTINUED

ISSUE OR PERMIT TO PROSPECT
SERIAL NUMBER
U.S. GEOLOGICAL SURVEY
New Mexico

UNITED STATES
DEPARTMENT OF THE INTERIOR
GEOLOGICAL SURVEY

LOG OF OIL OR GAS WELL

LOCATE WELL CORRECTLY

Date October 13, 1952
 Signed _____
 Title C. Gordon Neal, Agent in Charge
 The information given herewith is a complete and correct record of the well and all work done thereon
 Location 1012 ft. S. of N. Line and 120 ft. E. of W. Line of Sec. 11 of W. Line of Sec. 11
 Well No. 23-1 Sec. 1, T. 26-N, R. 9-W Meridian
 Lessor or Tract Heartland Unit
 Company J. Glenn Turner
 Address P. O. Box 128 - Farmington, New Mexico
 State New Mexico Field Ballard P.C. County San Juan Elevation 5000

Commenced drilling _____, 1955 _____
 Finished drilling _____, 1955 _____
 The summary on this page is for the condition of the well at above date.

OIL OR GAS SANDS OR ZONES

(Derivats das by G)

No. 1, from	to	SSS (25)	No. 4, from	to
No. 2, from	to		No. 5, from	to
No. 3, from	to		No. 6, from	to

IMPORTANT WATER SANDS

$N_{\text{I, 1}} \rightarrow$ to $N_{\text{I, 2}}$ $N_{\text{I, 3}} \rightarrow$ to $N_{\text{I, 4}}$
 $N_{\text{I, 5}} \rightarrow$ to $N_{\text{I, 6}}$ $N_{\text{I, 7}} \rightarrow$ to $N_{\text{I, 8}}$

CASING RECORD

Size casing per foot	Weight per foot	Threads per inch	Make	Amount	Kind of shoe	Cut and pulled from	From— To—	Purported purpose
----------------------------	--------------------	---------------------	------	--------	--------------	---------------------	--------------	----------------------

It is of the greatest importance to have a complete history of the well. Please state in detail the dates of redrilling, together with the reasons for such redrilling. If there were any changes made in the casing, state fully, and if any changes were made in the well, give the size and location. If the well has been dynamited, give date, size, position, and number of charges exploded. If any logs on property were and where test logs were made, state location, date, and name of person used, position, and results of pumping test.

HISTORY OF OIL OR GAS WELL

MUDDING AND CEMENTING RECORD

Where used	Number sacks of cement	Method used	Mud gravity	Amount of mud to be used
100'	80	Half Burton	Mostly water	
252'	100	Half Burton	Mostly water	

CONFIDENTIAL

Heaving plug—Material	Height	Depth see
Heaving plug—Material	Height	Depth see

SHOOTING RECORD

Site	Spill used	Extractions used	Quantity	Date	Depth & ref	Depth cleaned out
					07/14/19 0550-0600	0550

On 9/17/52 and 11/10/52, the following information was obtained from the Bureau of the Census, Washington, D.C.:

TOOLS USED

Rotary tools were used from	100	feet to	2275	feet and from	feet to	2380
Cable tools were used from	0	feet to	100	feet and from	2275	feet to 2380

DATE

<p>The production for the first 24 hours was</p> <p>_____ barrels of fluid of which _____ was oil; _____</p>	<p>Put to producing _____</p> <p>September 18, 1922 _____</p>
--------------------------------------------------------------------------------------------------------------	---------------------------------------------------------------

1

[illegible]

11

Western Electric Co.	Inc. Driller	EMPLOYEES	Driller
----------------------	--------------	-----------	---------

FORMATION RECORD

FROM-	TO--	TOTAL FEET	FORMATION
0	1502	1502	Sand & Gravel
1302	1472	170	Sand
1472	5022	800	Sand, Gravel, Shale, Limestone
5020	5202	182	Sand, Gravel & Coal
5200	5280	80	Sand

ROSS & TIDEL CONSULTING .COM

FORMATION RECORD—Continued

FROM	TO	TOTAL FEET	[OVER]	FORMATION
				12-4304-3

NEW MEXICO
OIL CONSERVATION COMMISSION

Gas Well Plat

Date October 15, 1955
J. Glenn Turner Huerfanito Unit 23-4
Operator Lease Well No.
Name of Producing Formation Pictured Cliffs Pool Ballard P. C.

No. Acres Dedicated to the Well 160
Indicate land status and show ownership Federal - New Mexico #03491
SECTION 4 TOWNSHIP 26-N RANGE 9-W

	I		

RECEIVED
OCT 17 1955
OIL CON. COM.
DIST. 3

I hereby certify that the information given above is true and complete to the best of my knowledge.

Name C. Beeson Neal
Position Agent in Farmington
Representing J. Glenn Turner
Address P. O. Box 728 - Farmington, New Mexico

(over)

OIL CONSERVATION COMMISSION
HARRISBURG OFFICE

CONSERVATION
ATTN: DIRECTOR OF

No. 0-105 3

[Faint, illegible markings]

1. The first step is to identify the problem or question that needs to be answered. This involves understanding the context and the specific requirements of the task.

[illegible]

1. The first step in the process is to identify the problem or issue that needs to be addressed. This involves gathering information and understanding the context of the problem.

0-9

12

1960

[Faint, illegible markings]

100

1200

[illegible]

[Faint, illegible handwritten notes]

[Faint, illegible markings]

100

NEW MEXICO OIL CONSERVATION COMMISSION
Santa Fe, New Mexico

REQUEST FOR ~~WELL~~ - (GAS) ALLOWABLE

New Well
~~Recompletion~~

This form shall be submitted by the operator before an initial allowable will be assigned to any completed Oil or Gas well. Form C-104 is to be submitted in QUADRUPLICATE to the same District Office to which Form C-101 was sent. The allowable will be assigned effective 7:00 A.M. on date of completion or recompletion, provided this form is filed during calendar month of completion or recompletion. The completion date shall be that date in the case of an oil well when oil is delivered into the stock tanks. Gas must be reported on 15.025 psia at 60° Fahrenheit.

Farmington, New Mexico October 15, 1955

(Place)

(Date)

WE ARE HEREBY REQUESTING AN ALLOWABLE FOR A WELL KNOWN AS:

J. Glenn Turner

Huerfanito Unit

23-4

NE

NW

Unit C
(Company or Operator)

26-W

(Lease)

Ballard P. C.

Pool

San Juan
(Unit)

County. Date Spudded Aug. 21, 1955, Date Completed September 18, 1955

Please indicate location:

	X		

Elevation 6467 Total Depth 2280, P.B. -

Top oil/gas pay 2209 Top of Prod. Form Pictured Cliffs

Casing Perforations: -None or

Depth to Casing shoe of Prod. String

Natural Prod. Test

based on bbls. Oil in

Test after acid or shot BOPD

Based on bbls. Oil in Hrs. Mins.

Gas Well Potential 400 MCF/Day (3 hour test)

Size choke in inches 2" I.D. Test Nipple

Shut in for potential and pipe line connection

Date first oil run to tanks or gas to Transmission system: Sep. 18, 1955

Transporter taking Oil or Gas: El Paso Natural Gas Co.

Casing and Cementing Record

Size Feet Sax

8-5/8"	90.5'	80
5-1/2"	2207	100
1" Tubing	2268'	None

Remarks: will take gas from this well when connections are completed.

I hereby certify that the information given above is true and complete to the best of my knowledge.

Approved: OCT 17 1955, 19

OIL CONSERVATION COMMISSION

By: A. R. Kendrick

Title: PETROLEUM ENGINEER DIST. NO. 3

By: J. Glenn Turner
(Company or Operator)

Title: C. Beeson Neal, Agent in Farmington
Send Communications regarding well to:

Name: C. Beeson Neal

Address: P.O. Box 728 - Farmington, New Mexico

OIL CONSERVATION COMMISSION	
AZTEC DISTRICT OFFICE	
No. Copies Received	4
DISTRIBUTION	
Mr. Tolson	1
Mr. E. A. Tamm	1
Mr. Clegg	1
Mr. Glavin	
Mr. Ladd	
Mr. Nichols	
Mr. Rosen	
Mr. Tracy	
Mr. Carson	1
Mr. Egan	
Mr. Gurnea	
Mr. Hendon	
Mr. Pennington	
Mr. Quinn	
Mr. Nease	
Mr. Gandy	

NEW MEXICO OIL CONSERVATION COMMISSION
Santa Fe, New Mexico

It is necessary that Form C-104 be approved before this form can be approved an an *initial* allowable be assigned to any completed Oil or Gas well. Submit this form in QUADRUPLICATE.

CERTIFICATE OF COMPLIANCE AND AUTHORIZATION
TO TRANSPORT OIL AND NATURAL GAS

Company or Operator J. Glenn Turner Lease Huerfanito Unit
17th flr.-Mercantile Bank Bldg.
Address P. O. Box 728 - Farmington, New Mexico Dallas 1, Texas.
(Local or Field Office) (Principal Place of Business)
Unit C, Well(s) No. 23-4, Sec. 4, T. 26-N, R. 9-W, Pool. Ballard P. C.
County San Juan Kind of Lease: U. S. Government - New Mexico #03491
If Oil well Location of Tanks Not an oil well
Authorized Transporter El Paso Natural Gas Company Address of Transporter
Farmington, New Mexico El Paso, Texas
(Local or Field Office) (Principal Place of Business)
Per cent of Oil or Natural Gas to be Transported 100 Other Transporters authorized to transport Oil or Natural Gas
from this unit are None

REASON FOR FILING: (Please check proper box)

NEW WELL ☒ CHANGE IN OWNERSHIP ☐
CHANGE IN TRANSPORTER ☐ OTHER (Explain under Remarks) ☐

REMARKS:

El Paso Natural Gas Company will take gas from this well when connections are completed.

The undersigned certifies that the Rules and Regulations of the Oil Conservation Commission have been complied with.

Executed this the 15th day of October, 19 55

Approved Oct 17 1955, 19.....

OIL CONSERVATION COMMISSION

By C. E. Kendrick

Title PETROLEUM ENGINEER DIST. NO. 3

J. GLENN TURNER

By C. Beeson Neal

Title Agent in Farmington

[illegible]

NEW MEXICO OIL CONSERVATION COMMISSION
GAS WELL TEST DATA SHEET - - SAN JUAN BASIN

(TO BE USED FOR FRUITLAND, PICTURED CLIFFS, MESAVERDE, & ALL DAKOTA
EXCEPT BARKER DOME STORAGE AREA)

Pool BELLARD Formation PICTURED CLIFFS County SAN JUAN
Purchasing Pipeline EL PASO NATURAL GAS COMPANY Date Test Filed 2-3-56
Operator J. CLINE THOMAS Lease INDUSTRIAL UNIT Well No. 23-4
Unit 6 Sec. 4 Twp. 24N Rge. 9E Pay Zone: From 2210 To 2220
Casing: OD 8-1/2" WT. 145 Set At 2215 Tubing: OD 1" WT. 1.75 T. Perf. 2214-49
Produced Through: Casing 2 Tubing _____ Gas Gravity: Measured 0.650 Estimated _____
Date of Flow Test: From 12-17-55 To 12-24-55 * Date S.I.P. Measured 12-1-55
Meter Run Size 4.037 Orifice Size 0.375 Type Chart 24, 25 Type Taps Flange

OBSERVED DATA

Flowing casing pressure (Dwt) _____ psig + 12 = _____ psia (a)
Flowing tubing pressure (Dwt) _____ psig + 12 = _____ psia (b)
Flowing meter pressure (Dwt) _____ psig + 12 = _____ psia (c)
Flowing meter pressure (meter reading when Dwt. measurement taken):
Normal chart reading _____ psig + 12 = _____ psia (d)
Square root chart reading (_____) ² x spring constant _____ = _____ psia (d)
Meter error (c) - (d) or (d) - (c) _____ ± _____ = _____ psi (e)
Friction loss, Flowing column to meter:
(b) - (c) Flow through tubing: (a) - (c) Flow through casing _____ = _____ psi (f)
Seven day average static meter pressure (from meter chart):
Normal chart average reading 247 psig + 12 = 259 psia (g)
Square root chart average reading (_____) ² x sp. const. _____ = _____ psia (g)
Corrected seven day avge. meter press. (p_f) (g) + (e) _____ = _____ psia (h)
P_t = (h) + (f) _____ = _____ psia (i)
Wellhead casing shut-in pressure (Dwt) 635 psig + 12 = 647 psia (j)
Wellhead tubing shut-in pressure (Dwt) _____ psig + 12 = _____ psia (k)
P_c = (j) or (k) whichever well flowed through _____ = _____ psia (l)
Flowing Temp. (Meter Run) 37 °F + 460 _____ = 497 °Abs (m)
P_d = 1/2 P_c = 1/2 (l) _____ = _____ psia (n)

FLOW RATE CALCULATION

$$Q = \text{(integrated)} \times \left(\frac{\sqrt{(c)}}{\sqrt{(d)}} = \frac{\text{_____}}{\text{_____}} = \text{_____} \right) = \text{_____ MCF/da}$$

DELIVERABILITY CALCULATION

$$D = Q \times \left[\frac{P_c^2 - P_d^2}{P_c^2 - P_w^2} \right]^n = \frac{312,433}{351,330}^n \times 0.908 = 24 \text{ MCF/da.}$$

SUMMARY

P_c = 647 psia
Q = 24 Mcf/day
P_w = 351 psia
P_d = 351 psia
D = 24 Mcf/day

Company J. CLINE THOMAS
By Michael T. Starks
Title Engineer
Witnessed by _____
Company _____

* This is date of completion test.
* Meter error correction factor

REMARKS OR FRICTION CALCULATIONS

GL	(1-e ^{-s})	(F _c Q) ²	(F _c Q) ² (1-e ^{-s}) R ²	P _t ² (Column 1)	P _t ² + R ²	P _w
			Friction negligible			

From 2210 Chart 071-005-01 Q = (100) 24 (100)

OK



OIL CONSERVATION COMMISSION

AZTEC DISTRICT OFFICE

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	NO. FURNISHED	
Operator		
Santa Fe	<u>1</u>	
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State Land Office		
U. S. G. S.	<u>1</u>	
Transporter		
File	<u>1</u>	<input checked="" type="checkbox"/>

NEW MEXICO OIL CONSERVATION COMMISSION
SANTA FE, NEW MEXICO

Form C-110
Revised 7/1/55

(File the original and 4 copies with the appropriate district office)

CERTIFICATE OF COMPLIANCE AND AUTHORIZATION
TO TRANSPORT OIL AND NATURAL GAS

Company or Operator J. Glenn Turner Lease Huerfanito Unit

Well No. 23-4 Unit Letter C S 4 T26N R9W Pool Ballard P.C.

County San Juan Kind of Lease (State, Fed. or Patented) Federal

If well produces oil or condensate, give location of tanks: Unit S T R

Authorized Transporter of Oil or Condensate El Paso Natural Gas Products Co.

Address _____

(Give address to which approved copy of this form is to be sent)

Authorized Transporter of Gas El Paso Natural Gas Co.

Address Box 997, Farmington, N.M.

(Give address to which approved copy of this form is to be sent)

If Gas is not being sold, give reasons and also explain its present disposition:

Reasons for Filing: (Please check proper box) New Well _____ ()

Change in Transporter of (Check One): Oil () Dry Gas () C'head () Condensate ()

Change in Ownership _____ (x) Other _____ ()

Remarks: _____ (Give explanation below)

This well was originally drilled by J. Glenn Turner as the Huerfanito Unit #23-4 and El Paso Natural Gas has purchased this well. This well is within the limits of the Huerfanito Unit; therefore, J. Glenn Turner will remain the operator.

The undersigned certifies that the Rules and Regulations of the Oil Conservation Commission have been complied with.

Executed this the 6 day of February 19 56

By [Signature]

Approved [Signature] 19 56

Title Petroleum Engineer

OIL CONSERVATION COMMISSION

Company El Paso Natural Gas Company

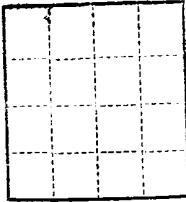
By [Signature]

Address Box 997, Farmington, New Mexico

Title ROLEUM ENGINEER DIST. NO. 3
Oil and Gas Inspector Dist. 23

John H. H. H. H.

OIL CONSERVATION COMMISSION		
AZTEC DISTRICT OFFICE		
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Mr. [illegible]	1	
Mr. [illegible]	1	
Mr. [illegible]	1	
Mr. [illegible]	2	
Mr. [illegible]	1	✓



(SUBMIT IN TRIPLICATE)

UNITED STATES
DEPARTMENT OF THE INTERIOR
GEOLOGICAL SURVEY

Land Office **New Mexico**
Lease No. **03491**
Unit **Buerfanito Unit**

SUNDRY NOTICES AND REPORTS ON WELLS

NOTICE OF INTENTION TO DRILL.....	SUBSEQUENT REPORT OF WATER SHUT-OFF.....	
NOTICE OF INTENTION TO CHANGE PLANS.....	SUBSEQUENT REPORT OF SHOOTING OR ACIDIZING.....	
NOTICE OF INTENTION TO TEST WATER SHUT-OFF.....	SUBSEQUENT REPORT OF ALTERING CASING.....	
NOTICE OF INTENTION TO RE-DRILL OR REPAIR WELL.....	SUBSEQUENT REPORT OF RE-DRILLING OR REPAIR.....	
NOTICE OF INTENTION TO SHOOT OR ACIDIZE.....	SUBSEQUENT REPORT OF ABANDONMENT.....	
NOTICE OF INTENTION TO PULL OR ALTER CASING.....	SUPPLEMENTARY WELL HISTORY.....	X
NOTICE OF INTENTION TO ABANDON WELL.....		

(INDICATE ABOVE BY CHECK MARK NATURE OF REPORT, NOTICE, OR OTHER DATA)

February 3, 1956

Well No. **23-4** is located **1042** ft. from **N** line and **1516** ft. from **E** line of sec. **4**

Section 4 **26S** **9N** **124M**
($\frac{1}{4}$ Sec. and Sec. No.) (Twp.) (Range) (Meridian)
Ballard P.C. **San Juan** **New Mexico**
(Field) (County or Subdivision) (State or Territory)

The elevation of the derrick floor above sea level is **6469** ft.

DETAILS OF WORK

(State names of and expected depths to objective sands; show sizes, weights, and lengths of proposed casings; indicate mudding jobs, cementing points, and all other important proposed work)

This well was originally drilled by J. Glenn Turner as the Buerfanito Unit #23-4 and El Paso Natural Gas has purchased this well. This well is within the limits of the Buerfanito Unit; therefore, J. Glenn Turner will remain the operator.



I understand that this plan of work must receive approval in writing by the Geological Survey before operations may be commenced.

Company **El Paso Natural Gas Company**

Address **Box 997**
Farmington, New Mexico

By **D. C. Johnston**
Title **Petroleum Engineer**

NEW MEXICO OIL CONSERVATION COMMISSION
SANTA FE, NEW MEXICO

Form C-110
Revised 7/1/55

(File the original and 4 copies with the appropriate district office)

CERTIFICATE OF COMPLIANCE AND AUTHORIZATION
TO TRANSPORT OIL AND NATURAL GAS

Company or Operator El Paso Natural Gas Company Lease Huerfanito Unit
Well No. 23-4 Unit Letter C S 4 T 26N R 9W Pool Ballard P. C.
County San Juan Kind of Lease (State, Fed. or Patented) Federal
If well produces oil or condensate, give location of tanks: Unit S T R
Authorized Transporter of Oil or Condensate El Paso Natural Gas Products Company
Address _____
(Give address to which approved copy of this form is to be sent)
Authorized Transporter of Gas El Paso Natural Gas Company
Address Box 997, Farmington, New Mexico
(Give address to which approved copy of this form is to be sent)
If Gas is not being sold, give reasons and also explain its present disposition:

Reasons for Filing: (Please check proper box) New Well _____ ()
Change in Transporter of (Check One): Oil () Dry Gas () C'head () Condensate ()
Change in Ownership _____ () Other _____ (X)
Remarks: _____ (Give explanation below)

This well was originally drilled by J. Glenn Turner as the Huerfanito Unit #23-4.
El Paso Natural Gas Co. has purchased this well with name changed to the El Paso Natural
Gas Huerfanito Unit #23-4. El Paso Natural Gas Company is the operator.

The undersigned certifies that the Rules and Regulations of the Oil Conservation Commission have been complied with.

Executed this the 14th day of January 19 58

Approved _____ 21 1958 19

OIL CONSERVATION COMMISSION

By Original Signed Emery C. Arnold

Title Oil and Gas Inspector Dist. #3.

By Original Signed F. H. WOOD JAN 21 1958
Title Petroleum Engineer
OIL CON. COM.
DIST. 3

Company El Paso Natural Gas Company

Address Box 997

Farmington, New Mexico

OIL CONSERVATION COMMISSION	
AZTEC DISTRICT OFFICE	
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By	2
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Transporter	
File	✓

NEW MEXICO OIL CONSERVATION COMMISSION
Santa Fe, New Mexico

(Form C-104)
Revised 7/1/57

REQUEST FOR (OIL) - (GAS) ALLOWABLE

New Well
Recompletion

This form shall be submitted by the operator before an initial allowable will be assigned to any completed Oil or Gas well. Form C-104 is to be submitted in QUADRUPLICATE to the same District Office to which Form C-101 was sent. The allowable will be assigned effective 7:00 A.M. on date of completion or recompletion, provided this form is filed during calendar month of completion or recompletion. The completion date shall be that date in the case of an oil well when new oil is delivered into the stock tanks. Gas must be reported on 15.025 psia at 60° Fahrenheit.

Farmington, New Mexico January 14, 1958
(Place) (Date)

WE ARE HEREBY REQUESTING AN ALLOWABLE FOR A WELL KNOWN AS:

El Paso Natural Gas Co. Huerfanito Unit, Well No. 23-4, in NE $\frac{1}{4}$ NW $\frac{1}{4}$,
(Company or Operator) (Lease)

C, Sec. 4, T. 26N, R. 9W, NMPM., Ballard P. C. Pool
Unit Letter
San Juan

County. Date Spudded. 8-21-55 Date Drilling Completed 9-17-55

Elevation 6467 Total Depth 2280 PBD

Top Oil/Gas Pay 2215' Name of Prod. Form. Pictured Cliffs

PRODUCING INTERVAL - 2215 - 2280

Perforations

Open Hole 65 Depth Casing Shoe 2215 Depth Tubing 2268

OIL WELL TEST -

Natural Prod. Test: _____ bbls. oil, _____ bbls water in _____ hrs, _____ min. Size _____ Choke

Test After Acid or Fracture Treatment (after recovery of volume of oil equal to volume of Choke
load oil used): _____ bbls. oil, _____ bbls water in _____ hrs, _____ min. Size _____

GAS WELL TEST -

Natural Prod. Test: _____ MCF/Day; Hours flowed _____ Choke Size _____

Method of Testing (pitot, back pressure, etc.): _____

Test After Acid or Fracture Treatment: 400 MCF/Day; Hours flowed 3

Choke Size _____ Method of Testing: _____

Acid or Fracture Treatment (Give amounts of materials used, such as acid, water, oil, and sand): 125 qts. SNG; 7700 gal. oil and 12,000# sand.

Casing Tubing Date first new
Press. _____ Press. _____ oil run to tanks _____

Oil Transporter El Paso Natural Gas Products Co.

Gas Transporter El Paso Natural Gas Company

Remarks: This well was originally drilled by J. Glenn Turner as the Huerfanito Unit #23-4.
El Paso Natural Gas has purchased this well with name changed to the El Paso Natural Gas
Huerfanito Unit #23-4. El Paso Natural Gas Co. is the operator.

I hereby certify that the information given above is true and complete to the best of my knowledge.

Approved JAN 21 1958, 19____

El Paso Natural Gas Company
(Company or Operator)

By: Original Signed F. H. WOOD
(Signature)

Title Petroleum Engineer
Send Communications regarding well to:

Name E. S. Oberly

Address Box 997, Farmington, New Mexico

OIL CONSERVATION COMMISSION
Original Signed By

By: A. R. KENDRICK

Title PETROLEUM ENGINEER DIST. NO. 3

OIL CONSERVATION COMMISSION		
AZTEC DISTRICT OFFICE		
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	NO.	
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Santa Fe	<u>1</u>	
Exploration Office	<u>1</u>	
State Land Office		
U. S. G. S.		
Transporter		
File	<u>1</u>	✓

CURRENT RECORDS:

Schultz State #6-16	M-16-29-10
Schultz State #7-2	L-2-29-10
Schultz State #8-16	A-16-29-10
Schultz State #10-2	I-2-29-10
Sellers #1-A	E-30-30-10
Sellers #2-A	A-30-30-10
Sellers #3-A	M-30-30-10
Seymour State #1	C-36-30-11
Stewart #1-A	D-32-30-10
Storey #2-B	L-11-30-11
Storey #5-B	O-11-30-11
Storey #1-C	O-22-28-9
Storey #2-C	P-27-28-9
Storey #6-C	A-22-28-9
Storey #7-C	B-27-28-9
Sunray #1-A	A-15-30-10
Sunray #3-D	M-21-30-10
Sunray #2-E	L-9-30-10
Sunray #2-F	H-1-29-10
Sunray #1-J	M-7-30-10
Texas Pacific Pooled Unit #1	I-16-30-10
Turner #1-A	K-34-31-11
Warren #2-A	A-23-28-9
Wright Pooled Unit #1	I-16-28-9

CHANGE TO:

Schultz Com B #6	C-104 Required
Schultz Com C #7	C-104 Required
Schultz Com D #8	C-104 Required
Schultz Com E #10	C-104 Required
Sellers A #1	
Sellers A #2	
Sellers A #3	
Seymour Com #1	C-104 Required
Stewart A Com #1	C-104 Required
Storey B #2	
Storey B #5	
Storey C #1	
Storey C #2	
Storey C #6	
Storey C #7	
Sunray A #1	
Sunray D #3	
Sunray E #2	
Sunray F #2	
Sunray J #1	
Texas Pacific Com #1	C-104 Required
Turner A #1	
Warren A #2	
Wright A Com #1	C-104 Required

Ballard Pictured Cliffs Pool:

Ballard #7	E-15-26-9	Huerfano Unit NP #150	C-104 Required
Ballard #8	H-15-26-9	Huerfano Unit NP #151	C-104 Required
Ballard #9	O-15-26-9	Huerfano Unit NP #152	C-104 Required
Ballard #10	L-15-26-9	Huerfano Unit NP #153	C-104 Required
Bolack #6-C	J-31-27-8	Bolack C #6	
Bolack #2-E	G-1-23-6	Bolack E #2	
Bolack #4-E	I-1-23-6	Bolack E #4	
Canyon Largo Unit #15	C-30-25-7	Canyon Largo Unit NP #15	C-104 Required
Canyon Largo Unit #63	O-9-25-7	Canyon Largo Unit NP #63	C-104 Required
Canyon Largo Unit #78	E-15-25-7	Canyon Largo Unit NP #78	C-104 Required
Cuccia State #1	I-32-27-8	Cuccia Com #1	C-104 Required
Cuccia State #3	M-32-27-8	Cuccia Com A #3	C-104 Required
Graham #1-A	A-24-25-8	Graham A #1	
Hamilton State #6	G-32-26-7	Hamilton Com C #6	C-104 Required
Hamilton State #7	C-32-26-7	Hamilton Com D #7	C-104 Required
Hamilton State #9	O-2-25-8	Hamilton Com E #9	C-104 Required
Harvey State #1	I-16-25-7	Canyon Largo Unit NP #136	C-104 Required
Harvey State #2	C-16-25-7	Canyon Largo Unit NP #137	C-104 Required
Harvey State #6	A-16-25-7	Canyon Largo Unit NP #138	C-104 Required
Harvey State #7	M-16-25-7	Canyon Largo Unit NP #139	C-104 Required
Harvey State #8	L-32-25-6	Canyon Largo Unit NP #140	C-104 Required
Huerfanito Unit #11-1	A-1-26-9	Huerfanito Unit #11	
Huerfanito Unit #12-1	D-1-26-9	Huerfanito Unit #12	
Huerfanito Unit #13-1	N-1-26-9	Huerfanito Unit #13	
Huerfanito Unit #14-1	O-1-26-9	Huerfanito Unit #14	
Huerfanito Unit #15-2	A-2-26-9	Huerfanito Unit #15	
Huerfanito Unit #16-2	D-2-26-9	Huerfanito Unit #16	
Huerfanito Unit #17-2	N-2-26-9	Huerfanito Unit #17	
Huerfanito Unit #18-2	O-2-26-9	Huerfanito Unit #18	
Huerfanito Unit #19-3	H-3-26-9	Huerfanito Unit #19	
Huerfanito Unit #20-3	E-3-26-9	Huerfanito Unit #20	
Huerfanito Unit #21-3	O-3-26-9	Huerfanito Unit #21	
Huerfanito Unit #22-4	H-4-26-9	Huerfanito Unit #22	
Huerfanito Unit #23-4	C-4-26-9	Huerfanito Unit #23	
Huerfanito Unit #24-4	K-4-26-9	Huerfanito Unit #24	
Huerfanito Unit #25-4	P-4-26-9	Huerfanito Unit #25	
Huerfanito Unit #26-33	P-33-27-9	Huerfanito Unit #26	
Huerfanito Unit #27-34	M-34-27-9	Huerfanito Unit #27	

cc: El Paso Natural Gas Co. (3)
Southern Union Gas Co.
Southern Union Gathering Co.
Oil Conservation Commission, Santa Fe, N.M.
U.S. Geological Survey

APPROVED

E. S. Oberly
El Paso Natural Gas Co.
Effective 11-1-65

