



NEW MEXICO ENERGY, MINERALS
& NATURAL RESOURCES DEPARTMENT

OIL CONSERVATION DIVISION
2040 South Pacheco Street
Santa Fe, New Mexico 87505
(505) 827-7131

July 25, 1996

McKay Oil Corporation
P.O. Box 2014
Roswell, New Mexico 88202-2014

Attn: Mr. Bill J. Milstead

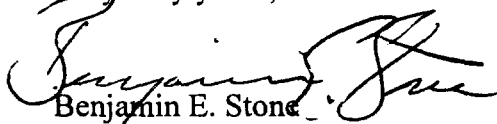
Re: Recent Request for Amendment to SWD-460.

Dear Mr. Milstead:

In order to process your request, please furnish the Division with a copy of the C-101 - Application to Drill, Re-enter, Deepen or Plug-back and a copy of the C-103 - Sundry Notice, both of which should have been filed when the well was worked over and deepened to its present depth. Additionally, if any wells have been drilled within a one-half mile area of review, please supply a new map indicating such as well as construction information on any new wellbore.

As soon as this information is received, I will expedite the continued processing of your request for the interval extension and the pressure increase.

Very truly yours,


Benjamin E. Stone
Petroleum Engineering Specialist

/BES

McKay Oil Corporation

ROY L. MCKAY, PRESIDENT

MAILING ADDRESS: P.O. BOX 2014 ROSWELL, N.M. 88202 • TELEPHONE 505 / 623 - 4735

STREET ADDRESS: ONE MCKAY PLACE ROSWELL, N.M. 88201 • FAX NO. 505 / 624 - 2202

OIL
&
GAS

JUL 24 1996

July 23, 1996

State Of New Mexico
Oil Conservation Division
2040 S. Pacheco
Santa Fe, New Mexico 87505

ATTENTION: Mr. David R. Catanach

REFERENCE: Administrative Order SWD-460
Charolette McKay Fed. #1SWD
South Dagger Draw Field
Eddy County, New Mexico

Gentlemen:

McKay Oil is reviewing its files concerning the referenced well and have discovered a discrepancy in the records which hopefully can be handled simply and efficiently.

The referenced order SWD-460 designates the injection zone for the well to be approximately 9,690 feet to 10,300 feet. The total depth of the well is approximately 10,478 feet leaving a discrepancy of approximately 178 feet. The well's total depth is still in the Devonian Formation. McKay Oil requests the OCD either amend OCD's Administrative Order SWD-460 to reflect the total depth of the well to be approximately 10,478 feet, or issue a letter to McKay Oil stating that the OCD does not construe the additional 178 feet in depth to be outside the depth constraints of the order.

Additionally, McKay Oil recently conducted a Step-rate Injection Test on the referenced well, a copy is attached for your review. The test indicated that the well could handle increased wellhead pressure up to 4,000 psi. We hereby request that Order SWD-460 be amended to allow for wellhead pressure of 4,000 psi.

We thank you for your cooperation in this matter and your immediate attention is greatly appreciated. If any questions should arise please feel free to contact Mr. Roy L. McKay at (505) 623-4735.

Very truly yours,

MCKAY OIL CORPORATION



Bill J. Minstead
Vice President - Land & Legal

WEST-TEST, INC.

A SUBSIDIARY OF JOHN WEST ENGINEERING COMPANY

Hobbs, New Mexico

STEP RATE INJECTION TEST

CLIENT: MCKAY OIL COMPANY

DATE: MAY 23, 1996

WELL NAME: CHAROLETTE MCKAY FEDERAL SWD WELL NO. 1
EDDY COUNTY, NEW MEXICO

WO#: 96-14-0615

TUBING = 10.261

PACKER DEPTH = 9662

BHP GAUGE DEPTH = 10370

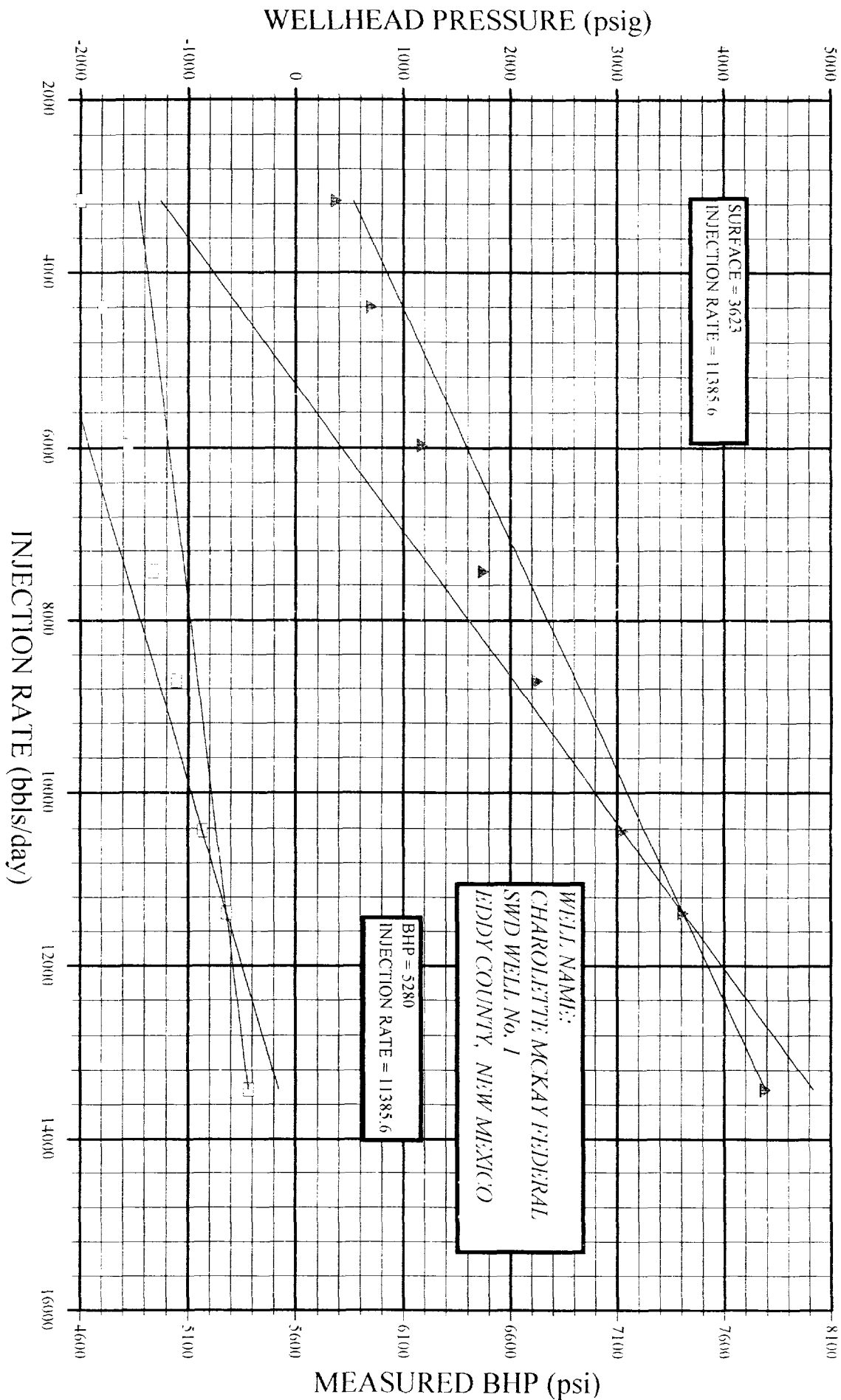
STEP NO. & REMARKS	TIME	(1) SURFACE TUBING PRESS. (psig)	(2) CUMMULATIVE VOL. INJECTED (bbls)	(3) INJECTION RATE (bbls/day)	(4) FRICTION HEAD LOSS (psi)	(5) CORRECTED TUBING PRESS. (psi) (1)-(4)	(6) INJECTION RATE (gpm) (3)/24.2057	(7) MEASURED BHP (psi)
	9:35							4429.1
	9:40	332.3	11.9	3427.2	327.282	5.0	99.96	4576.3
	9:45	364.7	22.5	3052.8	264.227	100.5	89.04	4594.2
1	9:50	378.4	33.0	3024.0	259.634	118.8	88.20	4603.4
				3168.0				
	9:55	695.9	48.3	4406.4	521.003	174.9	128.52	4687.4
	10:00	717.1	62.5	4377.6	514.721	202.4	127.68	4700.0
2	10:05	706.9	78.8	4406.4	521.003	185.9	128.52	4706.5
				4396.8				
	10:10	1182.1	100.0	6105.6	952.538	229.6	178.08	4804.1
	10:15	1165.8	120.7	5961.6	911.394	254.4	173.88	4818.0
3	10:20	1179.6	141.0	5846.4	879.080	300.5	170.52	4822.7
				5971.2				
	10:25	1725.9	166.8	7430.4	1369.801	356.1	216.72	4914.0
	10:30	1719.1	192.6	7430.4	1369.801	349.3	216.72	4933.8
4	10:35	1750.3	218.5	7459.2	1379.639	370.7	217.56	4940.0
				7440.0				
	10:40	2237.6	249.0	8784.0	1866.876	370.7	256.20	5022.1
	10:45	2263.9	279.1	8668.8	1821.834	442.1	252.84	5038.8
5	10:50	2255.1	309.3	8697.6	1833.047	422.1	253.68	5046.4
				8716.8				
	10:55	2878.5	344.6	10166.4	2446.494	432.0	296.52	5137.7
	11:00	2899.8	380.0	10195.2	2459.331	440.5	297.36	5158.9
6	11:05	3059.0	418.0	10944.0	2803.887	255.1	319.20	5168.0
				10435.2				
	11:10	3618.1	455.0	10656.0	2668.911	949.2	310.80	5251.7
	11:15	3650.7	495.7	11721.6	3183.542	467.2	341.88	5276.0
7	11:20	3623.1	536.6	11779.2	3212.543	410.6	343.56	5280.5

11385.6

STEP NO. & REMARKS	TIME	(1) SURFACE TUBING PRESS. (psig)	(2) CUMMULATIVE VOL. INJECTED (bbls)	(3) INJECTION RATE (bbls/day)	(4) FRICTION HEAD LOSS (psi)	(5) CORRECTED TUBING PRESS. (psi) (1) - (4)	(6) INJECTION RATE (gpm) (3)/34.2857	(7) MEASURED BHP (psi)
8	11:25	4499.0	582.5	13219.2	3976.622	522.4	385.56	5376.3
	11:30	4478.8	629.0	13392.0	4073.323	405.5	390.60	5388.5
	11:35	4391.9	676.5	13680.0	4236.859	155.0	399.00	5382.3
				13430.4				
	PUMP	MAXED	OUT					
FALLOFF	11:42	661.3				661.3		5120.6
	11:43	387.4				387.4		4904.6
	11:44	272.9				272.9		4772.2
	11:45	167.2				167.2		4685.5
	11:50	10.9				10.9		4534.9
	11:55							4503.0

STEP RATE INJECTION TEST

MCKAY OIL COMPANY



▲ RECORDED WELLHEAD PRES.

□ BOTTOM HOLE PRESSURE AT 10370 FEET