Morris R. Antweil

OIL OPERATOR P. O. Box 2010 Hobbs, New Mexico 88240

February 28, 1984

Energy & Minerals Department Oil Conservation Division P. O. Box 2088 Santa Fe, New Mexico 87501

<u>RE</u>: Application to Downhole Commingle Morris R. Antweil No. 1 Eggbert Section 8-T20S-R38E Lea County, New Mexico

Gentlemen:

Morris R. Antweil respectfully requests Administrative Approval for an exception to Rule 303-A to permit the commingling downhole of the production from the West Nadine Blinebry and the West Nadine Drinkard oil pools in the above captioned well. This well is located at 1980' from the north line and 660' from the east line of Section 8-T20S-R38E, N.M.P.M. In support of this request, the following facts are presented:

1) The most recent tests on the respective zones are:

Drinkard:	8-18-83	16.3 bbls oil, 6 bbls water and 218 MCF gas during 24 hour test. Perforations: 6914'-6968' (18 holes)
Blinebry:	2-16-84	19.2 bbls oil, 6 bbls water and 64.6 MCF gas during 24 hour test. Perforations: 6086'-6393' (21 holes)

2) The Drinkard section is currently not producing, being isolated by a bridge plug at 6595'. All production at the present is from the Blinebry perforations.

3) Both producing zones require artificial lift and were tested separately using a rod pumping installation.

4) Surface commingling of the produced fluids did not result



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in the formation of any precipitates. Analysis of the produced waters is as follows:

	Blinebry	Drinkard
Resistivity Specific Gravity pH Calcium Magnesium Chlorides Sulfates Bicarbonates Soluble Iron	.072 @ 74°F 1.092 6.8 8500 960 80000 2300 120 nil	.063 @ 74°F 1.109 6.8 8400 1680 97000 2400 95 nil
Soluble Hou	****	

5) Neither zone produces more water than the combined oil limit of 40 bbls per day.

6) Commingling of the produced crudes does not result in a decrease in value with respect to the separate streams. The Blinebry crude is averaging 35.3° API at 60°F while the Drinkard crude averages 32.9° API at 60°F. Combination of these two oils at a ratio of 54.1% Blinebry and 45.9% Drinkard results in a mixture of 34.2° API. This oil would at present prices have a value of \$29.88/bbl while the separate streams would have a price of \$29.87/bbl when weighted for the mixing ratio above.

7) Ownership of the zones is common and is all private ownership.

8) Commingling will not jeopardize the efficiency of any future secondary recovery operations. No such operations are underway or planned at the present.

9) A plat showing the well, proration unit and surrounding ownership is attached.

10) Copies of Division Form C-116 are attached showing results of 24 hour tests.

11) A resume of the completion and production history of the well is attached.

12) The estimated bottom hole pressures for the two zones are:

Drinkard 1680 psi Estimated from swabbing fluid levels. Blinebry 2100 psi Estimated from swabbing fluid levels.



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13) The proposed allocation of production is as follows based on the above captioned 24 hour tests:

	0i1	Gas	Water
Blinebry	54.1%	22.9%	50%
Drinkard	45.9%	77.1%	50%

14) All operators in Section 8 and the offset operator in Section 9 have been furnished a copy of this application by certified mail. A distribution list is included.

Morris R. Antweil, therefore, requests approval be given administratively to commingle the Blinebry and Drinkard production from this well downhole.

Respectfully submitted,

MORRIS R. ANTWEIL

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Jerry Hillard

JH:prb



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Amerada Hess Corporation P. O. Box 2040 Tulsa, Oklahoma 74102

Crown Central Petroleum Corporation 731 West Wadley Building K-Suite 200 Midland, Texas 79701

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Tamarack Petroleum Company, Inc. P. O. Box 2046 Midland, Texas 79702

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MORRIS R. ANTWEIL NO. 1 EGGBERT COMPLETION HISTORY

- Perforated Drinkard interval 6914'-6968' (18 holes). 4-20-81
- 4-21-81 Acidized with 5000 gals. 15% acid.
- Swabbed 1.5 BO & .25 BW per hour. 4-22-81
- Fractured with 25,000 gals. gelled water and 20,000 4-23-81 pounds sand.
- 4-27-81 Swabbed .5 BO & 1.5 BW per hour.
- 5-01-81 Set pumping unit. Started pumping.
- 5-11-81 Pumped 10 BO & 8 BWPD.
- Treated with 18,000 gals. gelled water and 15,000 gals. 6-03-81 28% acid.
- Potential tested 82.08 BO, 8 BW & 120 MCF gas per day. 7-07-81 GOR 1462.

Monthly	Production	Drinkard	Interval			
	81		82		83	
	0i1	Gas	Oil	Gas	Oil	Gas
Jan Feb Mar Apr May June July Aug Sept Oct Nov	295 910 1318 972 927 1482 1323	571 1628 1410 3765 4104	1039 994 1042 952 927 910 867 849 769 746 552 625	5006 5038 5761 5753 6438 7059 7035 7016 6630 6487 6116 5759	605 533 576 511 547 492 475 504	5329 5219 5763 5263 6266 6481 6957 3697
Dec	1282	4926	020	21.22		

Perforated Blinebry interval 6086'-6393' (21 holes). 8-16-83 Acidized with 5000 gals. 15% acid. Swabbed 1 bb1 fluid with 5% oil cut per hour. 8-17-83

- 8-18-83
- Fracture treated in stages with packer and bridge plug: 8-19-83 6362½'-6393' 20,000 gals. gelled water and 20,300# sand, 6086'-6199½' 33,000 gals. & 37,300# sand staged with ball sealers.
- 8-23-83 Started pump testing all perfs.
- Pumped 37 BO & 36 BW. 9-07-83
- Started pumping lower zone 63621/2'-6393'. 9-10-84
- Pumped 12.74 BO & 3 BW. 9-19-83
- Started pumping middle zone 6176'-6199½'. 9-21-83
- Pumped 25.5 BO & 18 BW. 9-29-83

Tested for communication between perfs 6176'-61992' 9-30-83 and 6086'-6105'. Test was positive.

- Started pumping all perforations. 10-04-83
- Potential tested 30.18 BO, 18 BW and 106.50 MCF gas 10-15-83 per day. GOR 3529.



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MORRIS R. ANTWEIL NO. 1 EGGBERT COMPLETION HISTORY PAGE 2

Monthly	Production 83	Blinebry	Interval
	0i1	Gas	
Sept Oct Nov Dec	842 818 630 603	2389 2694 2029 1882	
Jan	84 Oil 512	Gas 2124	



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Subject Well No. 1 Eggbert 1980' FNL & 660' FEL Section 8-T20S-R38E

MORRIS R. ANTWEIL

NADINE AREA LEA COUNTY, NEW MEXICO





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GAS-OIL RATIO TESTS

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No well will be assigned an allowable greater than the amount of oil produced on the official test. During gas-oil ratio test, each well shall be produced at a rate not exceeding the top unit allowable for the pool in which well is located by more than 25 percent. Operator is encouraged to take advantage of this 25 percent tolerance in order that well can be assigned; Increased allowables when authorized by the Commission. Gas volumes must be reported in MCF measured at a pressure base of 15,025 psia and a temperature of 60° F. Specific gravity base will be 0.60. Report casing pressure in lieu of tubing pressure for any well producing through casing. Mail original and one copy of this report to the district office of the New Mexico Oil Conservation Commission in accordance with Rule 301 and appropriate pool rules.	TEB 24 1984	Eggbert	LEASE NAME		Address P. O. Box 2010 Hobbs,	MORRIS R. ANTWEIL
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