EXHIBIT "B"

SAN JUAN 29-7 UNIT

RIO ARRIBA COUNTY, NEW MEXICO

GEOLOGIC REPORT

DAKOTA PRODUCING INTERVAL

PROPOSED FOURTH AND FIFTH EXPANSIONS

OF THE DAKOTA PARTICIPATING AREA

EL PASO NATURAL GAS COMPANY

y: Yelly Director

Reservoir Engineering Dept.

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INTRODUCTION

The San Juan 29-7 Unit is located in the northeast quadrant of the San Juan Basin and is composed of 22,500.14 surface acres. The unit boundaries are contained within Township 29 North and Range 7 West.

Within the San Juan 29-7 Unit the "Dakota Producing Interval" has been tested by ten wells, all of which are interpreted to be capable of producing unitized substances in commercial quantities. The "Dakota Producing Interval" as defined by the New Mexico Oil Conservation Commission in Rule 25, Order No. R-1670-C, is "...from the base of the Greenhorn limestone to a point 400 feet below the base of the said formation and consisting of the Graneros formation, the Dakota formation, and the productive upper portion of the Morrison formation."

Included as a part of this report are two maps entitled Exhibit "C". Exhibit "C", Figure No. 1 shows the subsurface structure of the "Dakota Producing Interval" as reflected by using the base of the Greenhorn limestone as the mapping horizon and mean sea level as the datum plane. The present structural control indicates a gentle northeast, or basinward, dip. However, the accumulation of hydrocarbons in this unit, as well as the San Juan Basin in general, is primarily stratigraphically rather than structurally controlled. Exhibit "C", Figure No. 2 is an isopachous map showing the number of feet of net reservoir sandstone which is interpreted to be present within the "Dakota Producing Interval." A detailed discussion of the lithology and stratigraphy of the Dakota interval in the general area of the San Juan 29-7 Unit may be found in geologic reports which have been previously submitted for Dakota Participating area expansions in the San Juan 29-6 Unit, San Juan 28-6 Unit, and the San Juan 28-7 Unit.

Also included with this report as Exhibit "D", Table No. 1 is a tabulation of the San Juan 29-7 Unit Dakota gas production. This tabulation shows by well the absolute open flow potential, date of first delivery into the pipeline, cumulative production to January 1, 1978, production by months for 1978 through November 1978, 1978 annual production to December 1, 1978 and cumulative production to December 1, 1978. The San Juan 29-7 Unit has produced a cumulative total of 2,257,701 Mcf of gas from the "Dakota Producing Interval" as of December 1, 1978.

PROPOSED FOURTH EXPANSION OF THE DAKOTA PARTICIPATING AREA

Effective Date: November 1, 1978

The Proposed Fourth Expansion of the Dakota Participating Area is based upon the completion of the San Juan 29-7 Unit No. 113 well by El Paso Natural Gas Company, the Unit operator. This well is located 945 feet from the north line and 2,300 feet from the east line, Section 29, T-29-N, R-7-W, Rio Arriba County, New Mexico.

On November 20, 1978 the San Juan 29-7 Unit No. 113 well, on after frac gauge for sizing equipment only, flowed at the rate of 1714 Mcf/D. Shut-in pressures were 2642 psia casing and 2642 psia tubing.

Proposed Expanded Acreage

Township 29 North, Range 7 West

Section 29: E/2

The subject well produces from the sandstone development within the Graneros shale and from the Dakota "A" and "B" zones, all of which correlate with the producing zones in adjacent areas. The proposed expanded acreage is inferred to be capable of producing unitized substances in commercial quantities from the abovementioned sand zones. Exhibit "C", Figure No. 2 shows the net reservoir sand which is interpreted to be present under the acreage proposed for admission to the Dakota Participating Area by the Fourth Expansion.

PROPOSED FIFTH EXPANSION OF THE DAKOTA PARTICIPATING AREA

Effective Date; December 1, 1978

The proposed Fifth Expansion of the Dakota Participating Area is based upon the completion of the San Juan 29-7 Unit No. 114 well by El Paso Natural Gas Company, the Unit Operator. This well is located 2020 feet from the south line and 1470 feet from the west line, Section 33, T-29-N, R-7-W, Rio Arriba County, New Mexico.

On December 21, 1978 the San Juan 29-7 Unit No. 114 well, on after frac gauge for sizing equipment only, flowed at the rate of 1120 Mcf/D. Shut-in pressures were 2537 psia casing and 2240 psia tubing.

Proposed Expanded Acreage

Township 29 North, Range 7 West

Section 32: E/2 Section 34: All Section 35: All

The subject well produces from the sandstone development within the Graneros shale and from the Dakota "A" and "B" zones, all of which correlate with the producing zones in adjacent areas. Sections 34 and 35 are included within the Proposed Fifth Expansion since they are directly offset to the south by producing wells in Sections 10, 11 and 12 of the adjoining San Juan 28-7 Unit on the south. The recently completed SJU 28-7 No. 247 well in Section 11, T-28-N, R-7-W, had an average deliverability of 913 Mcf/D for its first 96 days of production. In addition, the east boundary of Section 35 is offset by a producing well in Section 36. The proposed expanded acreage is inferred to be capable of producing unitized substances in commercial quantities from the abovementioned sand zones. Exhibit "C", Figure No. 2 shows the net reservoir sand which is interpreted to be present under the acreage proposed for admission to the Dakota Participating Area by the Fifth Expansion.

EXHIBIT **D**

TABLE NO. 1

SAN JUAN 29-7

RIO ARRIBA COUNTY, NEW MEXICO

VOLUMES IN MCF AT 15.025 PSIA AND 60 REGREES F.

12-1-76 CUM PROD	0 0 3 98 351817 37 318825 15 494841 13 604528 14 145331 237112	94 2257701
1 7. PR 30	24398 0 24398 17337 53613 75213 112074 196391	548294
* ^ 0 N	3053 3053 1711 4785 7256 4637 8926	96101
٠٢ ت	9 1846 1341 5739 6735 3977 9048	46354
SEPT.	0 2714 1483 5224 6564 4795 10108	45749
A U6.	0 1990 1570 4524 6735 5003 10914	42793
TION JULY	0 2251 1838 4925 6862 5477 11625	50191
978 WONTHLY FRODUCTION HAY JUNE	1730 1730 1222 4304 6818 5753 17085	42346
978 MONTH	0 1186 11724 4810 6993 7890 8736	53286
APR.	1342 2087 2087 7103 4635	44068
MAR.	1882 980 980 697 12569	51830
FEB.	0 2323 1733 6185 6811 8320 11641	57529
. AM.	0 3401 1648 1648 7059 12127 14017	68047
1-1-72 CUM PP00	327419 327419 298488 441236 529315 58971 33257	1709401
DATE OF ADF FIRST MCF/D DELIVERY	1714* 1120* 1206* 8456 677 06/29 4845 73.09/21 4845 73.09/21 1841* 77710/27 11445* 77711/03	TOTALS
WELL NAME AND NO.	SJ 29-7 UNIT #113 SJ 29-7 UNIT #114 SJ 29-7 UNIT #110 SJ 29-7 UNIT #100 SJ 29-7 UNIT #106 SJ 29-7 UNIT #106 SJ 29-7 UNIT #105 SJ 29-7 UNIT #110 SJ 29-7 UNIT #110	"After frec gauge