

NEW MEXICO OIL CONSERVATION COMMISSION
INITIAL WELL DELIVERABILITY TEST REPORT FOR 19 66

Form C122-A
 Revised 1-1-66

POOL NAME Basin	POOL SLOPE n = .75	FORMATION Dakota	COUNTY San Juan
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COMPANY Southern Union Production			WELL NAME AND NUMBER Maddox "D" Federal Com. No. 1		
UNIT LETTER G	SECTION 23	TOWNSHIP 30 North	RANGE 13 West	PURCHASING PIPELINE El Paso Natural Gas	
CASING O.D. - INCHES 4-1/2"	CASING I.D. - INCHES 4.052	SET AT DEPTH - FEET 6560	TUBING O.D. - INCHES 1-1/2	TUBING I.D. - INCHES 1.610	TOP - TUBING PERF. - FEET 6446
GAS PAY ZONE FROM 6336 TO 6498		WELL PRODUCING THRU CASING TUBING X		GAS GRAVITY .691	GRAVITY X LENGTH 4454
DATE OF FLOW TEST FROM 12-23-65 TO 12-31-65			DATE SHUT-IN PRESSURE MEASURED 8-9-65 I.P. Test		

PRESSURE DATA - ALL PRESSURES IN PSIA

(a) Flowing Casing Pressure (DWt)	(b) Flowing Tubing Pressure (DWt)	(c) Flowing Meter Pressure (DWt)	(d) Flow Chart Static Reading	(e) Meter Error (Item c - Item d)	(f) Friction Loss (a - c) or (b - c)	(g) Average Meter Pressure (Integr.) 504
(h) Corrected Meter Pressure (g + e) 504	(i) Avg. Wellhead Press. $P_t = (h + f)$ 504	(j) Shut-in Casing Pressure (DWt) 1917	(k) Shut-in Tubing Pressure (DWt) 1906	(l) P_c = higher value of (j) or (k) 1917	(m) Del. Pressure $P_d = 50$ % P_c 959	(n) Separator or Dehydrator Pr. (DWt) for critical flow only -

FLOW RATE CORRECTION (METER ERROR)

Integrated Volume - MCF/D 1149	Quotient of $\frac{\text{Item c}}{\text{Item d}}$ 1	$\sqrt{\frac{\text{Item c}}{\text{Item d}}}$	Corrected Volume Q = 1149 MCF/D
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WORKING PRESSURE CALCULATION

$(1 - e^{-s})$ 0.277	$(F_c Q_m)^2 (1000)$ 357,683	$R^2 = (1 - e^{-s}) (F_c Q_m)^2 (1000)$ 99,078	P_t^2 254,016	$P_w^2 = P_t^2 + R^2$ 353,094	$P_w = \sqrt{P_w^2}$ 594
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DELIVERABILITY CALCULATION

$D = Q \left[\frac{P_c^2 - P_d^2}{P_c^2 - P_w^2} \right]^n =$ 1149	$\left[\frac{2,755,208}{3,321,795} \right]^n =$ 0.8294	$\left[\frac{0.8294}{0.8691} \right]^n =$ 0.8691	999 MCF/D
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REMARKS:

SUMMARY

Item h	504	Psia
P_c	1917	Psia
Q	1149	MCF/D
P_w	594	Psia
P_d	959	Psia
D	999	MCF/D

Company Southern Union Production Company
 By Benny E. Bechtol
 Title Petroleum Engineer
 Witnessed By _____
 Company _____

- (3) New Mexico O.C.C.
 (1) El Paso Natural Gas Co., Proration Dept.,
 Box 1492, El Paso, Texas
 (1) Mr. H. L. Kendrick, Box 990, Farmington, N.M.

- (1) Mr. A. M. Wiederkehr
 (1) Mr. Bob McCrary, Proration Dept.
 (1) Mr. Paul J. Clote
 (1) File

