

UN ED STATES N. M. OIL & GAS. 1980
DEPARTMENT OF THE INTERIOR
GEOLOGICAL SURVEY HOBBS, NEW MEXICO 88240Form approved.
Budget Bureau No. 42-R355.5.

WELL COMPLETION OR RECOMPLETION REPORT AND LOG *

1a. TYPE OF WELL:		OIL WELL ☐	GAS WELL ☒	DRY ☐	Other _____		
b. TYPE OF COMPLETION:		NEW WELL ☒	WORK OVER ☐	DEEP-EN ☐	PLUG BACK ☐	DIFF. RESVR. ☐	Other _____
2. NAME OF OPERATOR						7. UNIT AGREEMENT NAME	
TOM BROWN, INC.						Middlebrook 3	
3. ADDRESS OF OPERATOR						9. WELL NO.	
P.O. Box 2608, Midland, Texas 79702						#1	
4. LOCATION OF WELL (Report location clearly and in accordance with any State requirements)*						10. FIELD AND POOL, OR WILDCAT	
At surface 1650' FWL & 1980' FSL, NE/4SW/4, Unit Letter K						Wildcat <i>Case also Gas</i>	
At top prod. interval reported below						11. SEC., T., R., M., OR BLOCK AND SURVEY OR AREA	
At total depth same						Sec. 3, T10S, R30E	
14. PERMIT NO. Dated 12-30-86						12. COUNTY OR PARISH Chaves	
DATE ISSUED 12-30-86						13. STATE N.M.	
15. DATE SPUDDED 12-31-86		16. DATE T.D. REACHED 2-8-87		17. DATE COMPL. (Ready to prod.) 3-7-87		18. REVISIONS (DF, BEB, RT, GR, ETC.)*	
20. TOTAL DEPTH, MD & TVD 10,688'		21. PLUG, BACK T.D., MD & TVD 9,627'		22. IF MULTIPLE COMPL., HOW MANY*		23. INTERVALS DRILLED BY 10 - 10688'	
24. PRODUCING INTERVAL(S), OF THIS COMPLETION—TOP, BOTTOM, NAME (MD AND TVD)*						25. WAS DIRECTIONAL SURVEY MADE	
7,430 - 7,460' (Abo)						NO	
26. TYPE ELECTRIC AND OTHER LOGS RUN						27. WAS WELL CORED	
Neutron/Density & Guard Log						NO	
28. CASING RECORD (Report all strings set in well)							
CASING SIZE		WEIGHT, LB./FT.		DEPTH SET (MD)		HOLE SIZE	
13-3/8"		68		455'		17"	
8-5/8"		32		2870'		12-1/4"	
5-1/2"		20 & 23		9697'		7-7/8"	
CEMENTING RECORD		AMOUNT PULLED					
450 sx Class "C"		-0-					
1420 sx 1t wt H.E.		-0-					
1800 sx Class C & H		-0-					
29. LINER RECORD							
SIZE		TOP (MD)		BOTTOM (MD)		SACKS CEMENT*	
2-7/8"		7,460'					
30. TUBING RECORD							
SIZE		DEPTH SET (MD)		PACKER SET (MD)			
2-7/8"		7,460'					
31. PERFORATION RECORD (Interval, size and number)							
7,430' - 7,460' (2 SPF, .41" holes)							
32. ACID, SHOT, FRACTURE, CEMENT SQUEEZE, ETC.							
DEPTH INTERVAL (MD)				AMOUNT AND KIND OF MATERIAL USED			
7430 - 7460'				6000 gal HCL & 2000 gal gel wtr			
33. PRODUCTION							
DATE FIRST PRODUCTION 3/7/87		PRODUCTION METHOD (Flowing, gas lift, pumping—size and type of pump) Flowing				WELL STATUS (Producing or shut-in) SI until P.L. connection	
DATE OF TEST 4-08-87		HOURS TESTED 24		CHOKE SIZE		PROD'N. FOR TEST PERIOD	
FLOW. TUBING PRESS. 1350		CASING PRESSURE 0		CALCULATED 24-HOUR RATE		OIL—BBL. 21	
GAS—MCF. 440		WATER—BBL. 0		OIL GRAVITY-API (CORR.) 54.1			
34. DISPOSITION OF GAS (Sold, used for fuel, vented, etc.)						TEST WITNESSED BY	
Vented until Pipe Line connection						Gene Carter	
35. LIST OF ATTACHMENTS							
State of New Mexico Form C-122 & AOF Curve. Copies of DST #1, 4, & 5 (2 & 3 mis-runs).							
36. I hereby certify that the foregoing and attached information is complete and correct as determined from all available records.							
SIGNED <i>Steve L. Thomson</i>		TITLE Operations Engineer				DATE 4/16/87	

*(See Instructions and Spaces for Additional Data on Reverse Side)

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INSTRUCTIONS

General: This form is designed for submitting a complete and correct well completion report and log on all types of lands and leases to either a Federal agency or a State agency, or both, pursuant to applicable Federal and/or State laws and regulations. Any necessary special instructions concerning the use of this form and the number of copies to be submitted, particularly with regard to local, area, or regional procedures and practices, either are shown below or will be issued by, or may be obtained from, the local Federal and/or State office. See instructions on items 22 and 24, and 33, below regarding separate reports for separate completions.

If not filed prior to the time this summary record is submitted, copies of all currently available logs (drillers, geologists, sample and core analysis, all types electric, etc.), formation and pressure tests, and directional surveys, should be attached hereto, to the extent required by applicable Federal and/or State laws and regulations. All attachments should be listed on this form, see item 35.

Item 4: If there are no applicable State requirements, locations on Federal or Indian land should be described in accordance with Federal requirements. Consult local State or Federal office for specific instructions.

Item 18: Indicate which elevation is used as reference (where not otherwise shown) for depth measurements given in other spaces on this form and in any attachments. **Items 22 and 24:** If this well is completed for separate production from more than one interval zone (multiple completion), so state in item 22, and in item 24 show the producing interval, or intervals, top(s), bottom(s) and name(s) (if any) for only the interval reported in item 33. Submit a separate report (page) on this form, adequately identified, for each additional interval to be separately produced, showing the additional data pertinent to such interval.

Item 29: "Sacks Cement": Attached supplemental records for this well should show the details of any multiple stage cementing and the location of the cementing tool. **Item 33:** Submit a separate completion report on this form for each interval to be separately produced. (See instruction for items 22 and 24 above.)

37. SUMMARY OF POROUS ZONES: SHOW ALL IMPORTANT ZONES OF POROSITY AND CONTENTS THEREOF; CORED INTERVALS; AND ALL DRILL-STEM TESTS, INCLUDING DEPTH INTERVAL TESTED, CUSHION USED, TIME TOOL OPEN, FLOWING AND SHUT-IN PRESSURES, AND RECOVERIES				38. GEOLOGIC MARKERS			
FORMATION	TOP	BOTTOM	DESCRIPTION, CONTENTS, ETC.	NAME	MEAS. DEPTH	TOP	TRUE VERT. DEPTH
San Andres	2800	3550	Wtr	Rustler	970		970
Abo	7430	7490	Oil & Gas	Yates	1585		1585
Morrow	9500	9570	Gas	San Andres	2800		2800
Devonian	10090	10300	Wtr	Glorietta	4182		4182
				Abo	6520		6520
				Hueco	7512		7512
				Miss.	9570		9570
				Devonian	10090		10090
				Granite Wash	10570		10570
				Granite	10670		10670

NEW MEXICO OIL CONSERVATION COMMISSION
MULTIPOINT AND ONE POINT BACK PRESSURE TEST FOR GAS WELL

Form C-122
Revised 9-1-65

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Type Test ☒ Initial ☐ Annual ☐ Special				Test Date 4/8/87																																																																																								
Company TOM BROWN, INC.				Connection																																																																																								
Pool Wildcat				Formation Abo																																																																																								
Completion Date 2/24/87		Total Depth 10,688'		Plug Back 9,627'																																																																																								
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Casing Size 5-1/2		Wt. 20 & 23		Set At 9697'																																																																																								
Tub. Size 2-7/8		Wt.		Set At 7460'																																																																																								
Type Well - Single - (Fradenhead - G.O. or G.O. Multiple) Single - Gas				Packer Set At																																																																																								
Producing Thru Abo				Reservoir Temp. °F																																																																																								
				Mean Annual Temp. °F																																																																																								
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L				H																																																																																								
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<table border="1" style="width:100%; border-collapse: collapse;"> <tr> <th colspan="5">FLOW DATA</th> <th colspan="2">TUBING DATA</th> <th colspan="2">CASING DATA</th> <th rowspan="2">Duration of Flow</th> </tr> <tr> <th>NO.</th> <th>Prover Line Size</th> <th>X</th> <th>Orifice Size</th> <th>Press. p.s.i.g.</th> <th>Diff. h_w</th> <th>Temp. °F</th> <th>Press. p.s.i.g.</th> <th>Temp. °F</th> <th>Press. p.s.i.g.</th> <th>Temp. °F</th> </tr> <tr> <td>SI</td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td>1850</td> <td></td> <td></td> <td></td> </tr> <tr> <td>1.</td> <td>2 x 1.000</td> <td></td> <td></td> <td>450</td> <td>16</td> <td>60</td> <td>1820</td> <td></td> <td></td> <td></td> </tr> <tr> <td>2.</td> <td>2 x 1.000</td> <td></td> <td></td> <td>450</td> <td>28</td> <td>60</td> <td>1784</td> <td></td> <td></td> <td></td> </tr> <tr> <td>3.</td> <td>2 x 1.000</td> <td></td> <td></td> <td>450</td> <td>33</td> <td>60</td> <td>1680</td> <td></td> <td></td> <td></td> </tr> <tr> <td>4.</td> <td>2 x 1.500</td> <td></td> <td></td> <td>485</td> <td>46</td> <td>60</td> <td>1630</td> <td></td> <td></td> <td></td> </tr> <tr> <td>5.</td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> </tr> </table>						FLOW DATA					TUBING DATA		CASING DATA		Duration of Flow	NO.	Prover Line Size	X	Orifice Size	Press. p.s.i.g.	Diff. h _w	Temp. °F	Press. p.s.i.g.	Temp. °F	Press. p.s.i.g.	Temp. °F	SI							1850				1.	2 x 1.000			450	16	60	1820				2.	2 x 1.000			450	28	60	1784				3.	2 x 1.000			450	33	60	1680				4.	2 x 1.500			485	46	60	1630				5.										
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RATE OF FLOW CALCULATIONS																																																																																												
NO.	Coefficient (24 Hour)	$\sqrt{h_w P_m}$	Pressure P _m	Flow Temp. Factor F _t	Gravity Factor F _g	Super Compress. Factor, F _{pv}	Rate of Flow Q, Mcfd																																																																																					
1	4.946	86.08	463.2	1.000	1.240	1.049	554																																																																																					
2	4.946	113.88	463.2	1.000	1.240	1.049	733																																																																																					
3	4.946	123.63	463.2	1.000	1.240	1.049	795																																																																																					
4	12.76	151.38	498.2	1.000	1.240	1.051	2517																																																																																					
5																																																																																												
NO.	P _t	Temp. °R	T _f	Z	Gas Liquid Hydrocarbon Ratio _____ Mcf/bbl. A.P.I. Gravity of Liquid Hydrocarbons _____ Deg. Specific Gravity Separator Gas _____ .650 Specific Gravity Flowing Fluid _____ XXXXX Critical Pressure _____ 670 _____ P.S.I.A. Critical Temperature _____ 375 _____ R																																																																																							
1	.69	520	1.39	.909																																																																																								
2	.69	520	1.39	.909																																																																																								
3	.69	520	1.39	.909																																																																																								
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1		1833.2	3360.6	110.9																																																																																								
2		1797.2	3230.0	241.5																																																																																								
3		1693.2	2867.0	604.5																																																																																								
4		1643.2	2700.1	771.4																																																																																								
5																																																																																												
Absolute Open Flow 11,300 Mcfd @ 15.025					Angle of Slope ° 45.0			Slope, n 1.000																																																																																				
Remarks:																																																																																												
Approved By Commission: _____ Conducted By: APEX COMPANY Calculated By: J. W. Chisum Checked By: _____																																																																																												

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