

ARCO 34.1407 %

DATE 2/14/86
AUTH NO. Well Name and No. EMPIRE Abo Unit "N" #12 (OW) Location 1615.68' FNL
AND 330' FEL, SEC 10, T-18-S, R-27-E, Eddy Co., NM ^{FEDERAL} Drilled 1960Type of Job REPAIR CASING Field EMPIRE (Abo)TD 6143' PBD 6115 DATUM 15.45' RKB Elevation KB 3528 By: T. DAY

Wellhead Information

Casing Information:	Size	Weight	Grade	Set @	Sx Cmt	Top
Surface	<u>8 5/8"</u>	<u>24 #</u>	<u>J-55</u>	<u>1471'</u>	<u>770</u>	<u>0'</u>
Intermediate						
Producing	<u>4 1/2"</u>	<u>9.5 #</u>	<u>J-55</u>	<u>6143'</u>	<u>135</u>	<u>5540' (Calc)</u>
Liner						

Present Perfs: From 6043' To 6080' Holes 74 Stimulation Acid
 From To Stimulation

Present Open Hole: Size From To Stimulation

Tubing Data: Size 2 3/8" Wt. 4.7 # Grade J-55 Thd EU E 8rd Btmd @ 6087'
 Jts. 195 Misc 2 3/8" SN @ 6086'

Packer Depth Tension Comp
 Tbg Anchor

Miscellaneous: * Oil was noted leaking to surface outside the 8 5/8" csg on 4/85. The 8 5/8" x 4 1/2" ANN is open and has no pressure. The 4 1/2" x 2 3/8" ANN hold ± 600 psi while pmpg. Gas bubbles have also been seen @ the surface while the unit is pmpg.

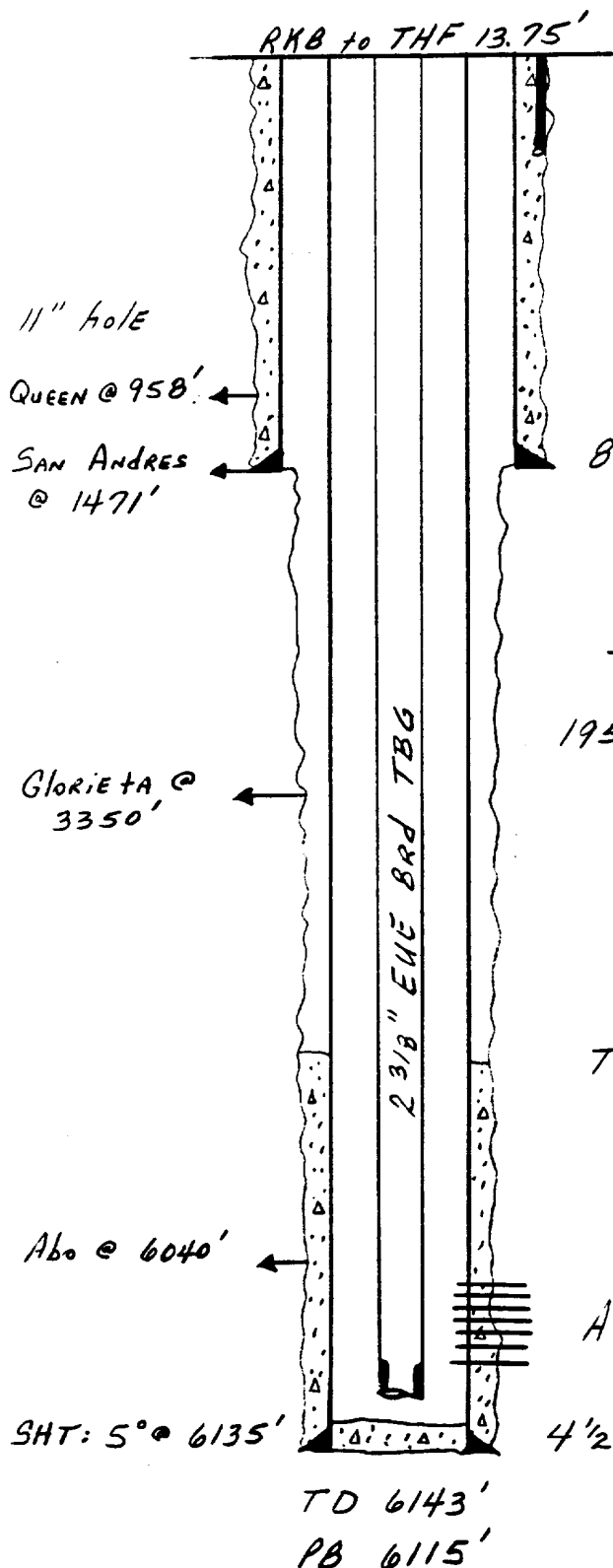
PROCEDURE

- circ's to surface, omit steps 4 - 7).
4. Run Free Pipe log f/ 5800' to surface to determine TOC.
5. Perf 4 1/2" csg w/ 4 shots off Free Pipe log to est circ to surf.
6. RIH w/ 4 1/2" FBRC pkr on 2 3/8" WS. Set pkr above sqz holes. PA to 500 psi. Attempt to est circ to surface via 8 5/8" x 4 1/2" ann w/ MXP 2000 psi. Circ annulus fluids to TT as free oil was noted at the surface behind the 8 5/8" csg. POH w/ pkr.
7. RIH w/ 4 1/2" CR on WS. Set CR above sqz holes. PA to 500 psi. Cement the 8 5/8" x 4 1/2" ann to surface as needed w/ MXP 2000 psi. Upon cmt rtns @ the surface, close the 8 5/8" x 4 1/2" valve and sqz ± 50 sx cmt into the formation behind the 8 5/8" csg w/ MXP 2000 psi. Fill cellar @ surface w/ cmt. POH w/ stinger.
8. RIH w/ 3 7/8" bit, 3" DC's on WS. DO cmt inside 4 1/2" csg and test to 500 psi. Re-sqz if needed.
9. Wash and off BOP. POH w/ bit.

General Purpose Worksheet

Subject	EMPIRE Abo Unit "N" #12 (OW)		Page No.	1	Of	1
File	REPAIR CASING		By	T. DAY		Date 2/14/86 ♥

PRESENT STATUS



CURRENT Prod: 42 BOPD 51 MCFG 9 BW
 * Cellar dug out in 12/78 & 8 5/8" CS9 WAS wrapped w/ sheet metal. Cellar filled w/ cmt.
 * Oil was noted leaking to surface outside the 8 5/8" CS9 (4/85) - 8 5/8" x 4 1/2" ANN HAS NO PRESSURE ON IT - 4 1/2" x 2 3/8" ANN holds ± 600 psi while pmpg.

8 5/8" 24# CS9 @ 1471' w/ 770 SX cmt
 (TOC @ SURFACE via 1" Top Job w/ 70 SX cmt)

Completion Assembly

RKB CORRECTION	+ 13.75
195 Jts 2 3/8" 4.7# J-55 EUE BRD TBG	6072.00
2 3/8" EUE BRD SN @ 6086'	0.95
CA btmd @	6086.70

TOC behind 4 1/2" CS9 @ 5540' using 30% EXCESS

Abo perfs 6043-6080' (74 - 0.32" holes)

4 1/2" 9.5# CS9 @ 6143' w/ 135 SX cmt

TD 6143'
 PB 6115'