

REMEDIAL CEMENTING PROCEDURE
BOYD NO. 5
570' FNL & 1980' FEL
SEC. 23, T-22-S, R-37-E
DRINKARD & TUBB GAS FIELDS
LEA COUNTY, NEW MEXICO

August 6, 1975

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7. Establish circulation through the free pipe and cement the free pipe with Class "C" containing .6% Halad-22 (or Dowell equivalent) and 6% salt/sk. Amount of cement will be dependent on amount of free pipe as determined from the bond log. If circulation cannot be established contact Midland Engineering for alternate squeeze procedure.
8. Pull tubing out of retainer and above upper perforations, reverse out excess cement, and pull tubing.
9. WOC 24 hours. 8-12 hours after pumping cement, RU Cardinal and run a temperature log from above free pipe to retainer. Relay results to Midland Engineering and NMOC. After WOC 24 hours, test upper perforations to 1000 psi. If upper perforations do not hold 1000 psi, contact Midland Engineering for squeeze procedure.
10. RU reverse equipment. SIH w/bit and DC's on tubing and drill out retainer and cement. Test squeezed perforations to 1000 psi. If squeezed perforations won't hold 1000 psi, contact Midland Engineering. Pull tubing, DC's and bit.
11. Run tubing with RBP retrieving tool. Reverse sand off of RBP, displace drilling and workover fluids with 2% KCl water containing 1 gal./1000 gals. Morflo II, and pull tubing and RBP.
12. Run 2 3/8" tubing with the following downhole equipment (from bottom up).
 - (a) Tail pipe
 - (b) Model "D" seal assembly
 - (c) Baker Model "F" Seating Hipple with 1.78" seal bore run with blanking plug in place.
 - (d) Baker Model "S" Sliding Sleeve with 1.87" minimum I.D. run in open positionTie into Model "D" packer at 6145'.
13. Hipple up wellhead and swab Tubb zone to flow.
14. RU slick line unit. Run shifting tool and close sliding sleeve. Pull