USGS Form 9-331 Smith Ranch Federal #1 12-4-80

- 9-20-80 Swb'd 10 hrs. Rec 92 bbls of muddy wtr w/lite blow of gas.
- 10-2-80 MIRUPU.
- 10-5-80 POH w/tbq.
- 10-7-80 Rec pkr & tailpipe assembly.
- WIH & set EZ-drill cmt ret @ 13,420'. RIH w/stinger assembly & spotted 75 sx Class "H" cmt containing 0.6% Halad 22-A, 0.4% CFR-2, & 5 lbs/sk KCL mixed @ 15.8 ppg w/1.2 Ft<sup>3</sup>/sk yield. Stung-in cmt ret & sqz'd to 6700 psi. Picked-up 8' & reversed-out 35 sx cmt. (sqz'd 28 sx thru perfs 13,534' to 13,544').
- 10-10-80 Drld cmt ret & firm cmt thru perf'd interval (13,534' to 13,544'). Tagged @ 13,600' PBTD.
- 10-11-80 RU Schlumberger. RIH w/4" csg gun & re-perf'd Lwr. Morrow Interval from 13,534' to 13,544' w/2 JSPF (21 holes total). RIH w/WL Otis WB Pkr & Tailpipe Assembly. Set pkr @ 13,486'. RD Schlumberger.
- 10-12-80 WIH w/Otis Guide Shoe & J-Latch Assembly on 425 jts of 2-7/8", 6.5#, N80, EUE 8RD tbg w/ABC-Modified Cplgs. Tested same to 9000 psig above slips. Latched-in Otis "WB" pkr @ 13,486' & landed tbg in 15 pts compression. NU Xmas Tree & tested same to 5000 psig. Tested 2-7/8" X 5-1/2" annulus to 1500 psig. RU & swb'd 4 hrs. Rec 50 BLW w/no show of gas. Lwr'd FL to 12,000' FS.
- 10-30-80 MIRUPU. RU Otis WL Unit & Lubricator. RIH & set Otis "N" Profile Plug in nipple @ 13,524'. RD Otis.
- 10-31-80 Loaded tbg w/10 ppg BW & tested "N" Profile Plug to 4000 psig. Held OK. Dumped 10' of sand on pkr @ 13,486'.
- 11-1-80 RU Schlumberger. RIH w/4" csg gun & perf'd Morrow Sand Interval from 13,455' to 13,464' w/2 JSPF (19 holes total).
- Perf'd from 13,334 to 13,339' (11 holes) and from 13,318' to 13,326' (17 holes) w/2 JSPF (total 28 holes). POH w/perf'g gun. RIH w/Otis "WB" WL set pkr & tailpipe assembly consisting of Pkr Plucker Extension, 2-7/8" X 8' tbg sub, X-nipple, 2-7/8" X 8' tbg sub, X-nipple & guide & set pkr @ 13,170'. RD Schlumberger. RIH w/seal assembly on 135 stds of 2-7/8" prod tbg. Tested same to 9000 psig above slips.
- FIH w/Otis guide shoe, seal assembly, and 2-7/8" N-80 tubing w/ABC cplgs, tested to 9000 psig above slips. Latched into Otis "WB" Pkr @ 13,170' & put 13,000# compression on tbg. Tested Xmas Tree to 5000 psig and annulus to 1500 psig, held OK. Swabbed estimated 88 bbls of water in 5 hrs. FL @ 10,500' down. Hade small amount of gas.
- Installed wellhead isolation tool & RU HOWCO. Tested surface lines to 9500 psig. Pressured 2-7/8" X 5-1/2" annulus to 850 psig. Treated Morrow perfs from 13,318 to 13,464' (47 holes) w/total of 4000 gals of Morrow Flo "BC" Acid & 4500 gals of Methyl Alcohol followed by 1000 gals of acid flushed w/treated 2% KCL wtr. Acidized perfs @ A.I.R. of 8 BPM w/8500 psig Avg. & 9150 psig Max. ISIP 5700 psig; 5" SIP 5190 psig; 10" SIP 5000 psig; 15" SIP 4850 psig. Total load to recover 283 BLW. RD HOWCO & isolation tool.