

UNITED STATES  
DEPARTMENT OF THE INTERIOR  
BUREAU OF LAND MANAGEMENT

RECEIVED

FORM APPROVED  
Budget Bureau No. 1004-0135  
Expires March 31, 1993

SUNDRY NOTICES AND REPORTS ON WELLS

Do not use this form for proposals to drill or to deepen or reentry to a different reservoir  
Use "APPLICATION FOR PERMIT -" for such proposals

2003 MAY 23 11:10:49  
070 Farmington, NM

5. Lease Designation and Serial No.

SF-078146A

6. If Indian, Allottee or Tribe Name

7. If Unit or CA, Agreement Designation

8. Well Name and No.

Horton # 4

9. API Well No.

30-045-60074

10. Field and Pool, or Exploratory

Blanco Mesaverde

11. County or Parish, State

San Juan County  
New Mexico

SUBMIT IN TRIPLICATE

1. Type of Well

Oil Well  Gas Well  Other

2. Name of Operator

Hallador Petroleum Company (OGRID # 12672)

3. Address and Telephone No.

1600 Lincoln St, Suite 2700 (303) 839-5504 x-317  
Denver, CO 80264

4. Location of Well (Footage, Sec, T. R., M, or Survey Description)

Unit M, 990' FSL, 990' FWL, Sec 27, T32N - R12W

12. CHECK APPROPRIATE BOX(S) TO INDICATE NATURE OF NOTICE, REPORT, OR OTHER DATA

TYPE OF SUBMISSION

TYPE OF ACTION

Notice of Intent  
 Subsequent Report  
 Final Abandonment Notice

Abandonment  
 Recompletion  
 Plugging Back  
 Casing Repair  
 Altering Casing  
 Other

Change of Plans  
 New Construction  
 Non-Routine Fracturing  
 Water Shut-Off  
 Conversion to Injection  
 Dispose Water

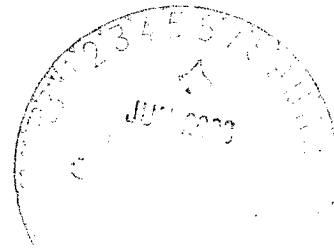
(Note: Report results of multiple completion on Well Completion or recompletion Report and Log Form)

13. Describe Proposed or Completed Operations (Clearly state all pertinent details, and give pertinent dates, including, estimated date of starting work.  
If well is directionally drilled give subsurface locations and measured and true vertical depths for all markers and zones of pertinent to this work.

REMEDIAL CEMENT REPAIR WORK WAS PERFORMED ON THIS WELL BEGINNING 03-24-2003.

PLEASE SEE THE ATTACHED SHEET FOR DETAILS.

HALLADOR CONTACT TIM LOVESETH (303) 839-5504 x-317



14. I hereby certify that the foregoing is true and correct

Signed: Thomas E. Mullins (for Hallador Petroleum Company)

Title: Engineering Manager

Date: 05-20-2003

This space for federal or state office use

Telephone: 303-839-5504 ACCEPTED FOR RECORD

Approved by: \_\_\_\_\_  
Conditions of approval if any

Title: \_\_\_\_\_

Date: JUN 03 2003

FARMINGTON FIELD OFFICE  
BY [Signature]

- 3-24-2003 | Rode Key Energy Rig # 40 from Farmington yard. Well producing 65 MCFD. Notified BLM of impending remedial cement work. Raise Derrick & Rig up. Lock out Tag out well and meter. Kill tubing with 80bbls of water. Both casing valves are inoperable. ND Bonnet & Adaptor. Bolts in poor condition. Back out hanger studs, NU BOPE & Rig Floor. Continue attempt to blow down Casing. Strip tubing hanger into rubber and equalize 240# casing pressure through rubber. Flow to pit. Blow down well. Lay down 164 Jts of 2-3/8" tubing. 1 full perf jt & 1 - 3' perf sub. No nipple. MU 6-1/4" bit & scraper, 1jt & string float. PU & GIH w/ 60 jts, 1920' of new 2-3/8' 4.7# J-55 tubing. Secure well overnight.
- 3-25-2003 | 240# Casing Pressure, Blow down well. Finish picking up 2-3/8" new production tubing, & GIH w/ 6-1/4" Bit & Scraper. Work scraper last 300' above liner top. Tag Liner. COOH w/ Bit & Scraper, from liner top @ 4638', to last stand w/ inline check. Kill well through tubing 60 bbls water, install 2-1/16" gate valve on top of open 3" LP gate valve. Kill well through casing, 30 bbls water, pull Scraper & bit & LD same. MU & GIH w/ 7" model G RBP, while pumping 20 bbls water. Continue in hole, set RBP. RBP ser @ 4566'. Open Bradenhead 60# pressure, steady flow gas to pit. Load casing with 180 +/- bbls water & Pressure Test Casing to 500 psi. Good test. Spot 35 gals sand on top of RBP, displace with 15 bbls. water. COOH w/RBP setting tool from 4566'. RU Blue Jet. RIH w/ 3-1/8" Squeeze Gun. Perf 4 holes @ 2456', POOH. RD Blue Jet. PU 7" Cement retainer & GIH to 2430'. RU BJ Services. PT BJ Lines to 3500 psi. Pump 15 bbls to clear retainer. Set retainer @ 2430'. Test tubing to 2500 psi. Place 500 psi on Annulus. Establish rate below retainer w/ 30bbls water @ 2 BPM 700 psi, SD. Monitor flow off of Bradenhead, no change. Change Squeeze. Batch mix 7 bbls of 14.5 ppg, 1.43 yield, 39.3 ft3, 27 sxs cement, displace 8.5 bbls to retainer @ 2 BPM, SD, ISIP 300 psi, sting out of retainer, reverse out w/ 15 bbls, 2.5 bbls good cement. COOH w/ 37 stands of 2-3/8", secure well till AM.
- 3-26-2003 | ND Stripping Head, RU Blue Jet. Run GR-CCL-CBL from 2422' to surface winder 500 psi. Significant cement present from 2100' to surface, top of cement @ 400'. Pump 40 bbls fresh water down bradenhead in attempt to modify log character. Repeat GR-CCL-CBL from 1220' to surface. No character change. Run Audio-CCL log from 2422' to surface. Blue Jet perforate 2nd set of squeeze 4 holes @ 1945'. POOH. RD Blue Jet. NU stripping head. PU 7" cement retainer, GIH on 2-3/8" tubing, Place retainer @ 1937'. RU BJ Services. PT BJ to 3500#, clear retainer w/ 8 bbls. Set retainer at 1937', PT tubing 2500#, 500# on annulus. Pump 5 bbls water, no circulation. SD. Batch mix cement to 14.5 ppg, 1.43 yield, pump 50 sxs (70.1 ft3), 12.5 bbls cement. Displace 6 bbls, SD. Holding pressure. Pump last 1.25 bbls @ 0.5 bpm 300#. Sting out of retainer, reverse 2 bbls cement to pit. RD BJ. COOH w/ 2-3/8" from 1937', LD stinger, close blinds & secure well until AM.
- 3-27-2003 | Tally six - 3-1/8" Drill Collars. BH pressure 66 psi. SICP = zero. MU 6-1/4" WO bit, Sic 3-1/8" DCs, X-O. GIH w/ 53 jts 2-3/8 tubing. Tag up on cement and retainer. PU & RU power swivel. Dill on cement retainer, progress 1.5', recovery cement, some metal, all of rubber, progress is slow. Hang back power swivel. COOH w/ tubing & DCs. RU magnet on sand line with 1 jt of 2-3/8" tubing. RIH on sand line. Tag 2431', POOH. No recovery of any metal or slips. Secure well location. Wind steady @ 30+ MPH.
- 3-28-2003 | BH 66 psi. PU Smith Jetted 6-1/4" WO bit, Boot Basket, & GIH w/ DC's & 2-3/8" tubing. RU Power Swivel. Drill remaining cement retainer. Dill 32' of good cement. Pressure test casing to 500 psi. Hold 15 minutes, good test. Hang back power swivel. GIH 7 more stands. Tag @ 2430'. Dill on cement retainer, making 1.5 feet. Hang back power swivel. COOH 7 stands above the 1st squeeze. Drain pumps and line. Secure well location.
- 3-29-2003 | COOH w/ 2-3/8" & DCs. Empty boot basket, significant metal recovered. RU to run magnet on sand line. RIH w/ magnet. POOH, recover large piece of metal, which was slowing drilling progress. GIH w/ original 6-1/4" WO bit, empty boot basket, DCs, & 2-3/8". RU rig pump and lines. RU power swivel. Drill out 32' of cement and remains of retainer. Run 1 stand additional. Circulate hole clean. Pressure test casing to 350 psi. Hold pressure 15 min, good test. Lay down power swivel. COOH w/ 2-3/8". LD 6 DCs and boot basket on float. Secure well location.
- 3-31-2003 | RIH w/ magnet on sandline. POOH slowly with sandline and magnet. Recover small pieces of metal, nothing significant. RU tongs and PU retrieving head for RBP. GIH 36 stands to 2380'. Unload hole with air to pit. GIH an additional 34 stands, tagging sand fill at 4548'. RBP @ 4566' (18' of cover). RU Baker swivel and unload hole with air. Run soap sweeps. CO sand fill to RBP @ 4566', with air mist, run 5 bbl foam sweep. Shut off air. Pump 40 bbls water to equalize plug and provide cushion for release of plug. Release RBP, can move plug down, but plug is hanging approximately 20' above original depth. Pull up to 30K over string wt to attempt to release plug. Work to release RBP, easily released but does not pull above suspected casing collar at 4546'. Catches at the same spot each time. Reset RBP @ 4566'. COOH with setting tool. Secure well location.
- 4-1-2003 | SM. SICP zero. BH pressure zero. Spot 4 buckets sand on top of RBP @ 4566'. PU tampered mill and GIH on 2-3/8" tubing. RU power swivel. Wash and work mill through casing collar area at 4546' +/-, Absolutely no torque. Hang back swivel. COOH with tapered mill. No wear. GIH w/ retrieving head on 2-3/8" tubing above RBP. RU swivel. Unload hole and circulate hole clean with air, engage and release RBP. Pull into same tight spot. Appears to be a metal piece and not a casing problem. COOH with retrieving head. GIH w/ washover shoe, 4-1/2" boot basket and 2-3/8" tubing. RU power swivel. Unload hole with air obtain good circulation w/ air mist. Mill approximately 6" on top of RBP. Initially there was torque, torque went away after 15 min. Mill up metal on top of RBP. Pull above RBP and circulate clean with sweeps. Shut down air. LD one joint. Hang back swivel Shut-In and secure well location.
- 4-2-2003 | RU tongs, LD swivel. COOH w/ shoe, boot basket, and mill on 2-3/8". BD tools. Check boot basket, no recovery. GIH w/ retrieving head on 2-3/8" tubing above RBP. RU swivel. Circulate with air package down over RBP. Pump 80 bbls water during equalization and release of RBP. Release RBP, pull into same spot 20' above original setting depth, can go down okay, but not up. Continue attempt to pull RBP, Reset RBP @ 4566'. LD2 jts. COOH w/ 48 stands 2-3/8". Extremely windy, gusting to 45 MPH. Secure well location.
- 4-3-2003 | COOH w/ retrieving tool. PU Retrieving head, Six (6) 3-1/8" DCs, & Jars. GIH w/ 2-3/8" Tubing. PU Baker Swivel. Pump 30 bbls to equalize RBP. Engage RBP and Work Plug. Release RBP. Pull RBP to same tight spot. Set off Jars w/ 20K, Jar through collar. Repeat next 12 collars. COOH w/ RBP, RBP pulled 14K over for next 10 collars. Roughly correlates with Scraper work. Inspect RBP, No noticeable debris. Breakdown RBP. GIH w/ Six (6) DCs, and Lay Down Same. GIH w/ production tubing assembly as follows: Expendable Check, 1 jt 2-3/8", 1.78" SN, and 158 Jts 2-3/8" production tubing. Tag PBTD, No Fill at 5157'. Land 156 Jts Tubing @ 5099' SN @ 5066', Note Lock Down Pins Damaged, Could Not Remove Lockdown Pins left in the out position, Not holding hanger in place, Just Tubing weight. RD Floor, ND BOPE, NU WH. New 2-3/8" Bonnet & 2-1/16" Master Valve. RU Air Package to Tubing. Pump 5 bbls water, drop ball, and pump off check @ 700 psi. Continue circulating with Air at 700# to get well to unload. Well is flowing gas on casing, but has not unloaded. Continue pumping air down tubing to unload well. Still flowing gas on casing side but no water slug. Shut-In and Secure Well
- 4-4-2003 | SM. SICP=310 psi, SITP= 310 psi. Bradenhead = Zero. Flow Casing to Pit. RU Air and Unload well on casing (40 bbls approximately) to pit. Complete RD of equipment. Trucks return Auxiliary Equipment to Town. Flow Tubing & Casing to Pit to remove Air from gas stream. Casing flowing well, Tubing may be loading up. Attempt to manifold WH into existing line. Missing some short nipples. Call Roustabout Crew. Will Connect WH to sales Line on Saturday AM and close out Flowback Pit. RD & Release Rig to Farmington Yard.