

UNITED STATES
DEPARTMENT OF THE INTERIOR
GEOLOGICAL SURVEY

SUBMIT IN DUPLICATE*

(See other in-
structions on
reverse side)Form approved.
Budget Bureau No. 42-R355.6.

WELL COMPLETION OR RECOMPLETION REPORT AND LOG *

1a. TYPE OF WELL: OIL WELL ☒ GAS WELL ☐ DRY ☐ Other _____		5. LEASE DESIGNATION AND SERIAL NO. NM-02402	
b. TYPE OF COMPLETION: NEW WELL ☐ WORK OVER ☐ DEEP-EN ☐ PLUG BACK ☐ DIFF. RESVR. ☐ Other _____		6. IF INDIAN, ALLOTTEE OR TRIBE NAME - - -	
2. NAME OF OPERATOR Atlantic Richfield Company		7. UNIT AGREEMENT NAME - - -	
3. ADDRESS OF OPERATOR 501 Lincoln Tower Bldg., 1860 Lincoln St., Denver, Colorado 80295		8. FARM OR LEASE NAME Chacon Federal	
4. LOCATION OF WELL (Report location clearly and in accordance with any State requirements)* At surface (SW NW) 1650' FNL & 800' FWL of Section 33 At top prod. interval reported below Approximately Same At total depth Approximately Same		9. WELL NO. 2	
14. PERMIT NO. 30-039-21580		13. STATE New Mexico	
15. DATE SPUDDED 6-6-78		12. COUNTY OR PARISH Rio Arriba	
16. DATE T.D. REACHED 6-21-78		13. STATE New Mexico	
17. DATE COMPL. (Ready to prod.) 7-13-78		19. ELEV. CASINGHEAD -	
18. ELEVATIONS (DF, RKB, RT, GR, ETC.)* 7050' GR, 7064' RKB		20. TOTAL DEPTH, MD & TVD 7533'	
21. PLUG, BACK T.D., MD & TVD 7420'		22. IF MULTIPLE COMPL., HOW MANY* - - -	
23. INTERVALS DRILLED BY - - -		24. PRODUCING INTERVAL(S), OF THIS COMPLETION—TOP, BOTTOM, NAME (MD AND TVD)* 7146' to 7186' Dakota A Zone 7263' to 7273' Dakota B Zone	
25. WAS DIRECTIONAL SURVEY MADE No		26. TYPE ELECTRIC AND OTHER LOGS RUN Dual Inc. Form Dens.-Comp Neu-GR	
27. WAS WELL CORED No		28. CASING RECORD (Report all strings set in well)	
29. LINER RECORD		30. TUBING RECORD	
31. PERFORATION RECORD (Interval, size and number) 7146'-7186' w/2 jet shots/ft. Dakota A Zone 7263'-7273' w/1 jet shot /ft. Dakota B Zone		32. ACID, SHOT, FRACTURE, CEMENT SQUEEZE, ETC. DEPTH INTERVAL (MD) See Completion Record	
33.* PRODUCTION DATE FIRST PRODUCTION: 7-6-78 PRODUCTION METHOD (Flowing, gas lift, pumping—size and type of pump) Flowing DATE OF TEST: 7-13-78 HOURS TESTED: 24 CHOKE SIZE: 16/64" $\rightarrow$ PROD'N. FOR TEST PERIOD: 174 OIL—BBL.: 174 GAS—MCF.: 1745 WATER—BBL.: 25 GAS-OIL RATIO: 10,029:1 FLOW. TUBING PRESS.: 1350# CASING PRESSURE: 1585# CALCULATED 24-HOUR RATE: 174 OIL—BBL.: 174 GAS—MCF.: 1745 WATER—BBL.: 25 OIL GRAVITY-API (CORR.): 54.9°		34. DISPOSITION OF GAS (Sold, used for fuel, vented, etc.): To be sold when flow lines completed	
35. LIST OF ATTACHMENTS See back of page for completion record and Geological Tops.		36. I hereby certify that the foregoing and attached information is complete and correct as determined from all available records	
SIGNED <u>W. E. Taylor</u>		TITLE Operations Manager	
		DATE 7/21/78	

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

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 POROSITY 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

FORMATION	TOP	BOTTOM	DESCRIPTION, CONTENTS, ETC.	38.	GEOLOGIC MARKERS	NAME	MEAS. DEPTH	TOP	TRUE VENT. DEPTH
No Cores or Drill Stem Tests.									
Drld out DV Tool @ 3130', CO to 7420', tstd. csg. to 4000' psi, Jet Perf. Dakota B Zone w/2 jet shots/ft 7263'-7273' Frac. w/47,100 gals. trtd. wtr., 38,500# 40-60 sd. wtr. contained 2#/1000 gal. fric. red. +15#/1000 gals. fld loss add. BD press. 3000#. Drld B. P. @ 7220' Jet Perf. Dakota A Zone 7146'-7186' frac. w/87000 gals. 1% KCL wtr. w/2#/1000 gal fric. red. 15#/1000 gals fluid loss additive 80,000# 20/40 sd. 2400 psi, avg. TP 2600 psi, max. TP 2880 psi avg. rate 45 BPM Avg. press. 2700#, Max. Press. 3470# I. R. 40 BPM Set BP @ 7220' fric. Dakota-A Zone 7146-7186' w/87000 gals. 1% KCL wtr. contain. 2#/1000 gals. fric. red. 15#/1000 gals. fld loss add. + 80,000# 20/40 sd. Frac. BD press. 2400# max. press. 2880# I. R. 45 BPM @ 2600 #, ISP 1710#, 15" = 1150#. Ran 2-3/8" tbg. w/bit Drilled out BP @ 7220' CO to 7420'. Landed tbg. @ 7070' KB. Jet perf. 2-3/8" tbg. above fit. 7060-7065' w/2 shots per ft. SI for test, well started flwg. after 18 1/2 hrs. thru 25/64" choke.									
COMPLETED OILWELL 7-13-78 flwd. 174 BO, 25 BW, 1745 MCF in 24 hrs. thru 16/64" choke. from Dakota A and B Zones.									
						Ojo Alamo	2625'		
						Kirtland	2677'		
						Fruitland	2828'		
						Pictured Cliffs	2978'		
						Lewis	3060'		
						Cliff House	4565'		
						Menefee	4905'		
						Pt. Lookout	5080'		
						Mancos	5273'		
						Greenhorn	7067'		
						Graneros	7130'		
						Dakota A	7145'		
						Dakota B	7260'		
						Dakota Silt	7315'		
						Burro Canyon	7425'		
						Morrison	7522'		
						(all measurements from RKB)			

302.27, Cmtc w/45 sx 17' & 25' cut, 1/2" @ 300'. 75 RPM, all
3:00 am 6/7. Gd circ. Circ'd 10 blbs cmt to pit. 1/2" @ 300'. 75 RPM, all
wt. Mud: 9#, vis 40. B#1, 12-1/4", 0-319', 319' in 4-1/2 hrs. \$ 14,460
6/08/78 1394 Drlg. 70 RPM, 45M#. Mud: 8.6#, vis 44, WL 54, FC 2/32, Ph 9, Pv 20, solids 2%,
oil 6%. B#2, 7-7/8", Sm., DT, in @ 319' & drlg, 1075' in 10 hrs. \$ 29,770
6/09/78 2445 Drlg. 1-3/4" @ 1669'. 60 RPM, 35M#. Mud: 8.9#, vis 42, WL 4.6, FC 1/32, Sd
1/2%, Ph 8.6, Pv 16, Gels 5/10, Yld 10, oil 7%, solids 6%. B#2, 7-7/8", Sm.,
DT, 319-1669', 1350' in 15 hrs. B#3, 7-7/8", Sm., F-2, in @ 1669' & drlg, 776'
in 16-3/4 hrs. \$ 43,920
6/10/78 3035 Drlg. 1-1/2" @ 2475', 1" @ 2980'. 60 RPM, 35M#. Mud: 8.9#, vis 44, WL 4.4,
FC 2/32, Sd 1/2%, Ph 8.5, Pv 14, Yld 15, Gels 1/5, solids 10%. B#3, 7-7/8", Sm.,
F-2, 1669-2989', 1320' in 32-1/2 hrs. B#4, 7-7/8", Sec., S-84F, in @ 2989' &
drlg, 46' in 2-3/4 hrs. \$ 53,375
6/11/78 3742 Drlg. 60 RPM, 35M#. Mud: 8.8#, vis 44, WL 4.0, FC 2/32, Sd 1/2%, Ph 7.5, Pv 15,
Yld 9, Gels 0/2, solids 11%, oil 7%. B#4, 7-7/8", Sec., S-84F, in @ 2989' &
drlg, 753' in 26-1/2 hrs. \$ 64,335
6/12/78 4335 Drlg. 60 RPM, 38M#. Mud: 8.9#, vis 44, WL 4, FC 2/32, Sd 1/2%, Ph 7.5, Pv 19,
Yld 9, Gels 1/6, solids 11%, oil 10%, B#4, 7-7/8", Sec., S-84F, in @ 2989' &
drlg, 1346' in 50-1/4 hrs. \$ 74,900
6/13/78 4734 Drlg. 1/2" @ 4567'. 60 RPM, 40M#. Mud: 8.8#, vis 46, WL 4.4, FC 2/32, Sd
1/2%, Ph 7.5, Pv 15, Yld 15, Gels 1/6, solids 11%, oil 10%. B#4, 7-7/8", Sec.,
S-84F, 2989-4567', 1578' in 62 hrs. B#5, 7-7/8", Sec., S-84F, in @ 4567' &
drlg, 167' in 7-1/2 hrs. \$ 81,825
6/14/78 5240 Drlg. 60 RPM, 40M#. Mud: 8.9#, vis 44, WL 4, FC 2/32, Sd 2%, Ph 7, Pv 15, Yld
25, Gels 3/12, solids 12%, oil 10%. B#5, 7-7/8", Sec., S-84F, in @ 4567' &
drlg, 673' in 31-1/4 hrs. \$ 90,110
6/15/78 5797 Drlg. 60 RPM, 38M#. Mud: 8.8#, vis 50, WL 4, FC 2/32, Sd .75%. B#5, 7-7/8",
Sec., S-84F, in @ 4567' & drlg, 1229' in 55 hrs. \$ 98,400
6/16/78 6160 Drlg. 60 RPM, 40M#. Mud: 8.8#, vis 43, WL 4.6, FC 2/32, Sd 1/4%. B#5, 7-7/8",
Sec., S-84F, in @ 4567', out @ 5924', 1357' in 58-3/4 hrs. B#6, 7-7/8", Sm.,
F-2, in @ 5924' & drlg, 236' in 12-1/2 hrs. \$105,885
6/17/78 6585 Drlg. 60 RPM, 40M#. Mud: 8.8#, vis 42, WL 6.6, FC 2/32, Sd 1/2%, B#6, 7-7/8",
Sm., F-2, in @ 5924' & drlg, 661' in 36-3/4 hrs. \$114,360
6/18/78 7025 Drlg. 60 RPM, 40M#. Mud: 8.8#, vis 47, WL 8.0, FC 2/32. B#6, 7-7/8", Sm.,
F-2, in @ 5924' & drlg, 1101' in 59-1/2 hrs. \$123,305
6/19/78 7289 Trip in for bit. 60 RPM, 40M#. Mud: 8.8#, vis 46, WL 6, FC 2/32, Sd 2%, Pv 18,
Yld 7, Gels 6/16. B#6, 7-7/8", Sm., F-2, 5924-7289', 1365' in 78 hrs. B#7,
7-7/8", Hughes, X-55, in @ 7289'. \$129,260
6/20/78 7355 Drlg. T.I.H. Wsh 30' to btm. 45 RPM, 45M#. Mud: 8.8#, vis 48, WL 6, FC 2/32,
Sd 2%, Ph 7.5, Pv 15, Yld 5, Gels 1/5, solids 12%, oil 7%. B#7, 7-7/8", Hughes,
X-55, in @ 7289' & drlg, 66' in 21-1/4 hrs. \$132,430
6/21/78 7533 Circ & cond hole f/logs. 45 RPM, 40M#. Mud: 8.9#, vis 75, WL 5, FC 2/32, Sd
2%, Ph 7.5, Pv 18, Yld 7, Gels 2/7, solids 11%, oil 7%. B#7, 7-7/8", Hughes,
X-55, 7289-7360', 71' in 22-1/4 hrs. B#8, 7-7/8", Sm., F-45, in @ 7360' & drlg,
173' in 15-1/4 hrs. \$137,150
6/22/78 7533 TD - LD DP. Ran SP-DIL CNL-FDC, integrated Sonic logs. WLTD 7534', DTD 7533'.
Log Tops: Dakota A 7138', Dakota B 7258', Dakota Silt 7312', Dakota C 7344',
Curro Canyon 7420', Morrison 7522'. Dakota A est 27' prod interval - por 8%
SW 37-54%, positive gas effect. Dakota B est 13' prod interval - por 7%, SW
56%, positive gas effect. 1" @ 7500'. Mud: 8.9#, vis 70, WL 4, Ph 7.5, oil 6%.
B#8, 7-7/8", Sm., F-45, 7360-7533', 173' in 15-1/4 hrs. \$157,215
6/23/78 7533 TD - RD & MO. PU & ran 180 jts 5-1/2" csg 17# & 15.5# K-55 8rd Rge 3 ST&C.
Csg tally: 34 jts 17#, 1482.72'; 146 jts 15.5#, 6048.58' (6' f/FC, GD & DV
tool). Total 7537.30', set @ 7530'KB (KB to GR 14'). Cmt'd in 2 stages: 1st
stage 130 sx 50/50 Poz 4% gel, 2/10% HR-4, 3/4% CFR-2, fol w/120 sx CI "B".
PD 7 pm 6/22/78. Circ 3 hrs between stages. 2nd stage 135 sx 50/50 Poz 4% gel
6-1/2# gilsonite/sx, 3/4% CFR-2, fol w/135 sx CI "B". PD 10:45 pm 6/22. Pmpd
500 gal mud flush ahead of both stages. Cent @ 7520' & on top of jts #2, 4, 6,
7, 7, 8, 9, 10, 12, 14 & #103, 105, 107 & 109. DV tool set @ 3130'KB. FC @
7487'. Rig rel 12:00 midnight 6/22/78. \$210,415
6/24&25 7533 TD - Clearing location.
6/26-7/01 7533 TD - WO completion
7/02/78 7533 TD - Prep to run CBL w/var dens. MI & RU Aztec Well Serv. Ran csg scraper &
bit. Drld stage collar @ 3130' & WIH to 7420'. Tstd csg to 4000#, OK. Displ'd
hole w/1% KCl wtr. Spotted 250 gal 15% MCA acid & POH.
7/03/78 7533 TD - Mixing KCl wtr to kill well. Ran CBL & GR Corr f/7420-6740', logging
tool failed, no cmt tops, 70-75% bonding across Dakota. Jet perf'd Dakota "B"
7263-7273', 2 shots/ft. Frac w/47,100 gals trtd wtr & 38,500# 40-60 sd, wtr
contained 2#/1000 gal friction reducer & 15#/1000 gal fld loss add. Brk dn
press 3000#, avg 2700#, max 3470#. IR 40 BPM, ISD 1400#, 5 min 780#, 10 min
1000#, 15 min 990#. Surf press this am 1175#. Flwg some gas & wtr thru ch.
Ran Halli BP, collar locator failed @ 7200'. Std pull BP, truck brk dn. Hung
up BP & setting tool @ 3130'. Well kicking gassey wtr. Tried to set BP, pld
out of rope socket. Ran Bowen OS, jars & 4 DCs on 2-3/8" tbg. BP would work
dn but would not come up. Pld setting tool & rec'd same. Ran 4-3/4" bit. Drld
BP & CO to 7250'.
7/04/78 7533 TD - Running tbg w/bit. Killed well w/KCl wtr. Pld tbg & bit. Set Speedi
Drill BP @ 7220' to blank off Dakota "B" zone 7263-73'. Tstd BP w/4000#, OK.
Jet perf'd Dakota "B" zone 7263-73'. Tstd BP w/4000#, OK. Jet perf'd Dakota
"A" 7146-7186' w/1 hole/ft. Frac trtd this zone w/87,000 gals 1% KCl wtr
containing 2#/1000 gal friction reducer, 15#/1000 gals fld loss add & 80,000#

200 24 1978
OIL OIL COM.
DIST. 3

7/05/78	7420	PB - SI. Ran 2-3/8" tbg w/bit. Drid out BP @ 7220' & CU to 7420'. Landed log @ 7070'. Instl'd Xmas tree. Jet perf'd 2-3/8" tbg above float 7060-6065' w/ 2 holes/ft. Opnd well to pit, flwd gas, some wtr & oil f/1 hr f/Dak. "A" perfs 7146-86' & Dakota "B" perfs 7263-73'. SI 5 a.m. 7/5/78. Rig rel 6 a.m. 7/5/78. SITP 1050#, SICP 1020#.
7/06/78	7420	PB - Will flw today to recover frac wtr. At 2:30 pm 7/5 SICP 1750#, TP 1350#. Hooked well to tst unit. Flwd well 2-1/2 hrs, all wtr. SI 5 pm 7/5/78.
7/7/78	7420	PB - Prep to tst. 18-1/2 hrs SICP 2015#, SITP 2010#. Strtd well flwg @ 11:30 am 7/6. 3 hr flw tst 25/64" ch, oil rate 8.5 BPH = 204 BOPD. Frac wtr rate 336 BPD, gas vol 2636 MCFPD. FTP 1150#, FCP 1450#.
7/8/78	7420	PB - Well SI to repair equip. 7/7 8 hr SITP 2250#, SICP 2250#. Strtd flwg well @ 11:15 a.m. on 20/64" ch. Froze off @ wellhead ch. Worked w/equip till 3:00 p.m. Test 3:00 pm - 4:00 pm, 8.7 B0, 32 bbl frac wtr to pit. Gas rate 2791 MCFD. Note: In total 4-3/4 hrs, flwg & SI, produced 33 B0 to tk. Oil gravity 54.9° @ 60°. Wtr dump valve cut out. SI to repair.
7/9/78	7420	PB - Prep to SD a/c Sunday. Repaired separator dump valve.
7/10/78	7420	PB - SD a/c Sunday.
7/11/78	7420	PB - Strtd 24 hr tst. SICP 2250#, SITP 2250#. 3 hr flw tst, 3000 MCFPD, 9 BOPH, 4-1/2 BWPH. End of 3 hr tst, CP 1780#, TP 1415#, ch 20/64".
7/12/78	7420	PB - Flwg f/tst.
7/13/78	7420	PB - Flwg f/tst.
7/14/78	7420	PB - COMPLETED OIL WELL 7/13/78. Flwd 174 bbls, 54.9° API Corr gvty @ 60°F oil & 25 BWPD & 1745 MCFD thru 16/64" ch in 24 hrs f/Dakota "A" perfs 7146-86' & Dakota "B" perfs 7263-73'. Lowest prod. poss 7273'. FTP 1350#, FCP 1585#. \$296,415

