

Submit 1 Copy To Appropriate District Office  
District I – (575) 393-6161  
1625 N. French Dr., Hobbs, NM 88240  
District II – (575) 748-1283  
811 S. First St., Artesia, NM 88210  
District III – (505) 334-6178  
1000 Rio Brazos Rd., Aztec, NM 87410  
District IV – (505) 476-3460  
1220 S. St. Francis Dr., Santa Fe, NM 87505

State of New Mexico  
Energy, Minerals and Natural Resources

Form C-103  
Revised August 1, 2011

OIL CONSERVATION DIVISION  
1220 South St. Francis Dr.  
Santa Fe, NM 87505

WELL API NO. 30-015-10328
5. Indicate Type of Lease STATE <input checked="" type="checkbox"/> FEE <input type="checkbox"/>
6. State Oil & Gas Lease No. OG-703
7. Lease Name or Unit Agreement Name WEST ARTESIA GRAYBURG UNIT <input checked="" type="checkbox"/>
8. Well Number 006
9. OGRID Number 274841
10. Pool name or Wildcat Artesia; Queen-Grayburg-San Andres

SUNDRY NOTICES AND REPORTS ON WELLS  
(DO NOT USE THIS FORM FOR PROPOSALS TO DRILL OR TO DEEPEN OR PLUG BACK TO A DIFFERENT RESERVOIR. USE "APPLICATION FOR PERMIT" (FORM C-101) FOR SUCH PROPOSALS.)

1. Type of Well: Oil Well ☐ Gas Well ☐ Other ☐ Injection Well ☒

2. Name of Operator

Alamo Permian Resources, LLC

3. Address of Operator

415 W. Wall Street, Suite 500, Midland, TX 79701

4. Well Location

Unit Letter G : 2310 feet from the N line and 1980 feet from the E line

Section 8 Township 18S Range 28E NMPM County EDDY

11. Elevation (Show whether DR, RKB, RT, GR, etc.)

12. Check Appropriate Box to Indicate Nature of Notice, Report or Other Data

NOTICE OF INTENTION TO:

PERFORM REMEDIAL WORK ☐ PLUG AND ABANDON ☐  
TEMPORARILY ABANDON ☐ CHANGE PLANS ☐  
PULL OR ALTER CASING ☐ MULTIPLE COMPL ☐  
DOWNHOLE COMMINGLE ☐

OTHER: CLEAN OUT, ADD PERFS, ACIDIZE

☒

SUBSEQUENT REPORT OF:

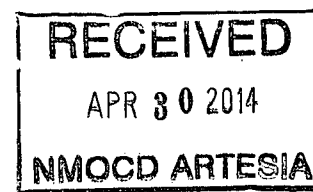
REMEDIAL WORK ☐ ALTERING CASING ☐  
COMMENCE DRILLING OPNS. ☐ P AND A ☐  
CASING/CEMENT JOB ☐

OTHER:

☐

13. Describe proposed or completed operations. (Clearly state all pertinent details, and give pertinent dates, including estimated date of starting any proposed work). SEE RULE 19.15.7.14 NMAC. For Multiple Completions: Attach wellbore diagram of proposed completion or recompletion.

SEE ATTACHED



I hereby certify that the information above is true and complete to the best of my knowledge and belief.

SIGNATURE Carie Stoker TITLE Regulatory Affairs Coordinator DATE 04/28/2014

Type or print name CARIE STOKER E-mail address: carie@stokeroilfield.com PHONE: 432.664.7659

APPROVED BY: T.C. Shepard TITLE "Geologist" DATE 4-29-2014

Conditions of Approval (if any):

ALAMO PERMIAN RESOURCES, LLC

**WAGU #006 WIW -- CLEAN-OUT, ADD PERFS, & ACIDIZE PROCEDURE**

1. MIRU.PU & BOP's. Be sure well is dead and blown down. Flow well back to WAGU Water Station inlet tank, if necessary, to flow well down prior to workover.
2. Unseat Model AD-1 tension Injection Packer set in well during last workover on well, April 5-7, 2011. Morning Report does not specify a depth the packer was set or amount of tension it was set in, but does show that 58 joints of 2-3/8" 4.7# J-55 IPC injection tubing was run in the well on 04/06/2011.

3. POOH with 2-3/8" 4.7# J-55 IPC internally-coated injection tubing and 5-1/2"x2-3/8" Model AD-1 tension injection packer and internally-coated injection tubing string. Visually inspect tubing, & injection packer while coming out of hole. Send Model AD-1 Injection Packer in for Repair/Replacement depending on condition.

Have 2-3/8" workstring on location – DO NOT USE internally-coated tubing string from well as workstring during workover.

4. Run in hole with 4-3/4" mill tooth skirted rock bit and 5-1/2" rotating casing scraper on 2-3/8" workstring and clean out wellbore to PBTD at approximately 2,293'. PBTD is shown to be at 2,293' in prior workover in December 1981.

Catch samples of any material recovered from well and send to Tech Management for chemical analysis. Note any bridges or hard streaks in report. While at TD, circulate hole clean using clean produced water from WAGU Water Injection Station. POOH.

REMEMBER: Paraffin has been encountered in offset wells, WAGU #008 and WAGU #09. If excessive paraffin is encountered, either pour 10 gal diesel down tubing and cut paraffin from tubing string with paraffin knife – pouring additional 5 gal diesel down tubing every knife run; or circulate well with hot water and paraffin solvent chemicals to clean paraffin out of tubing string and casing. Paraffin, iron sulfide, sand, rust, and scale have been recovered in WAGU wells while cleaning out to bottom.

5. **Current Perforations:** 2,012' – 2,277' (263' Overall interval) – 42' of perforations (110 holes).  
**Planned New Perforations:** 2,012' – 2,277' (265' Overall interval) – 107' of perforations (214 holes).  
**Total Perforations after W/O:** 2,012'-2,277' (265' Overall Interval) – 107' of perforations (324 holes).

See Wellbore Diagram for perforations detail – updated 04/24/2014.

6. RU Logging Company and run GRN/CCL log for perforating correlation from PBTD to base of Surface Casing at 426'. Have log emailed in to Pat Seale ([pseale@alamioresources.com](mailto:pseale@alamioresources.com)) and Tom Fekete ([jordanrubicon@msn.com](mailto:jordanrubicon@msn.com)) upon completion of logging, in order for correlation of GRN/CCL log to original open-hole log run in well for perforating.

7. Perforate the WAGU #006 WIW well over the following **13 intervals** using 3-1/8" Hollow-Carrier slick perforating guns with 19-grain charges:

Interval No.	Perf Interval		No. of Ft	SPF	No. of Perfs
	Top	Bottom			
1	2,012'	2,019'	7'	2	14
2	2,042'	2,050'	8'	2	16
3	2,060'	2,067'	7'	2	14
4	2,076'	2,084'	8'	2	16
5	2,092'	2,100'	8'	2	16
6	2,114'	2,130'	16'	2	32
7	2,138'	2,144'	6'	2	12
8	2,154'	2,164'	10'	2	20
9	2,177'	2,182'	5'	2	10
10	2,190'	2,196'	6'	2	12
11	2,206'	2,210'	4'	2	8
12	2,220'	2,230'	10'	2	20
13	2,246'	2,258'	12'	2	24
<b>TOTALS</b>			<b>107'</b>		<b>214</b>

8. Acidize Perforated Intervals using **Rock Salt for Diversion of acid during Job**.  
**Acid Job Total: 10,000 gal 15% NEFE HCl** (93.5 gal/ft of perfs – 30.9 gal/perf) with acid booster, anti-sludge, paraffin solvent, scale inhibitor, and demulsifiers, **pumped at 4.0-5.0 BPM**.

Trip in hole with rental 5-1/2"x2-1/8" retrievable treating packer on workstring. Set packer above perforations at approximately 1,950'. Acidize the perforations in 4 Stages using Rock Salt as diverting agent between Stages:

**STAGE 1:** **SPOT 265 gal of 15% NEFE HCl (6.3 bbls)** across Perfs from 2,012'-2,277'.  
Pick up packer and set at +/- 1,950'.  
**ACIDIZE with 2,735 gal 15% NEFE HCl (65.1 bbls) + additives, increasing pump rate after breakdown to 4.0-5.0 BPM.**

**PUMP 400# ROCK SALT** in WAGU produced water as Diverting Agent between Stages.

**STAGE 2:** **PUMP 3,000 gal 15% NEFE HCl ACID (71.4 bbls) + additives at 4.0-5.0 BPM.**

**PUMP 400# ROCK SALT** in WAGU produced water as Diverting Agent between Stages.

**STAGE 3:** **PUMP 2,000 gal 15% NEFE HCl ACID (47.6 bbls) + additives at 4.0-5.0 BPM.**

**PUMP 400# ROCK SALT** in WAGU produced water as Diverting Agent between Stages.

**STAGE 4:** **PUMP 2,000 gal 15% NEFE HCl ACID (47.6 bbls) + additives at 4.0-5.0 BPM.**

Pump +/- 15.7 Bbls WAGU produced water to displace acid to bottom of perforations.

Shut-in well and record Shut-In Pressures: Initial Shut-in; 5-minute S/I; 10-minute S/I; & 15-minute S/I.

Leave well Shut-in for 3 hours for acid to spend.

9. Open well up to flow back into water trucks on location initially. Take the first 2 truckloads of flow back to commercial disposal site. If well should continue to flow back – tie well in to flow back to the WAGU Water Station inlet tank until it dies. May need to put pulling unit rig on standby during these flowback times in order to keep workover costs down.
10. Release treating packer & POOH with packer and workstring. Have water truck on hand to kill well if it tries to come in during trip.
11. Trip in hole with 2-3/8" workstring with muleshoe on bottom & tag for fill. Circulate hole clean with water truck using Fresh Water in order to dissolve rock salt, and then circulate with clean produced water from the WAGU Water Station. POOH.
12. Run in hole with redressed/new Baker Model AD-1 2-3/8"x5-1/2" tension packer on 2-3/8" 4.7# J-55 IPC injection tubing string to +/- 1,950'. Pressure test 2-3/8" tubing going in hole to 5,000 psig.
13. Pump & circulate approx. 75 Bbls of packer fluid into tbg/csg annulus – get clear returns. Set Baker Model AD-1 tension packer above injection perfs.
14. ND BOP and NU injection wellhead.
15. Notify Richard Inge of NMOCD 24 hours in advance of running MIT on injection well.

Rig up pump truck with chart pressure recorder to be able to record on a 1-hour/1,000 psig chart for MIT Test. Pressure up on annulus to 500 psig with pump truck – Hold and record pressure for 1 hour (60 minutes) for MIT, or as directed by NMOCD.

Have NMOCD REPRESENTATIVE on-site as a WITNESS for the MIT, IF POSSIBLE. If representative is not available, have chart to send to NMOCD.

16. Run Injection Test on well using produced water from WAGU station and pump truck. Have pressure chart recorder on truck for test. Pump into well at the following rates, allowing pump in pressure to stabilize before going to next rate. Record pump-in rates, volumes pumped, initial pressure, and final pressure for each Test Rate. DO NOT EXCEED 1,500 psig pumping pressure during test – if 1,500 psig is reached do not attempt next rate. Test Rates:
  - 0.25 BPM
  - 0.50 BPM
  - 0.75 BPM
  - 1.00 BPM
  - 1.50 BPM
  - 2.00 BPM
17. Once NMOCD approves MIT test run, hook well up to injection line and begin water injection.

H. Patrick Seale  
April 24, 2014

# ALAMO PERMIAN RESOURCES, LLC

## WELLBORE DIAGRAM

Lease/Well No.: **WAGU No. 006 WIW**

ELEVATION, GL: 3,635 ft

Location: 2,310' FNL & 1,980' FEL  
UL: G, SEC: 8 T: 18 S, R: 28-E  
EDDY County, NM

FIELD: ARTESIA: QN-GB-SA

LEASE No.: State: OG-703

Spudded: 6/24/1964

API No.: 30-015-10328

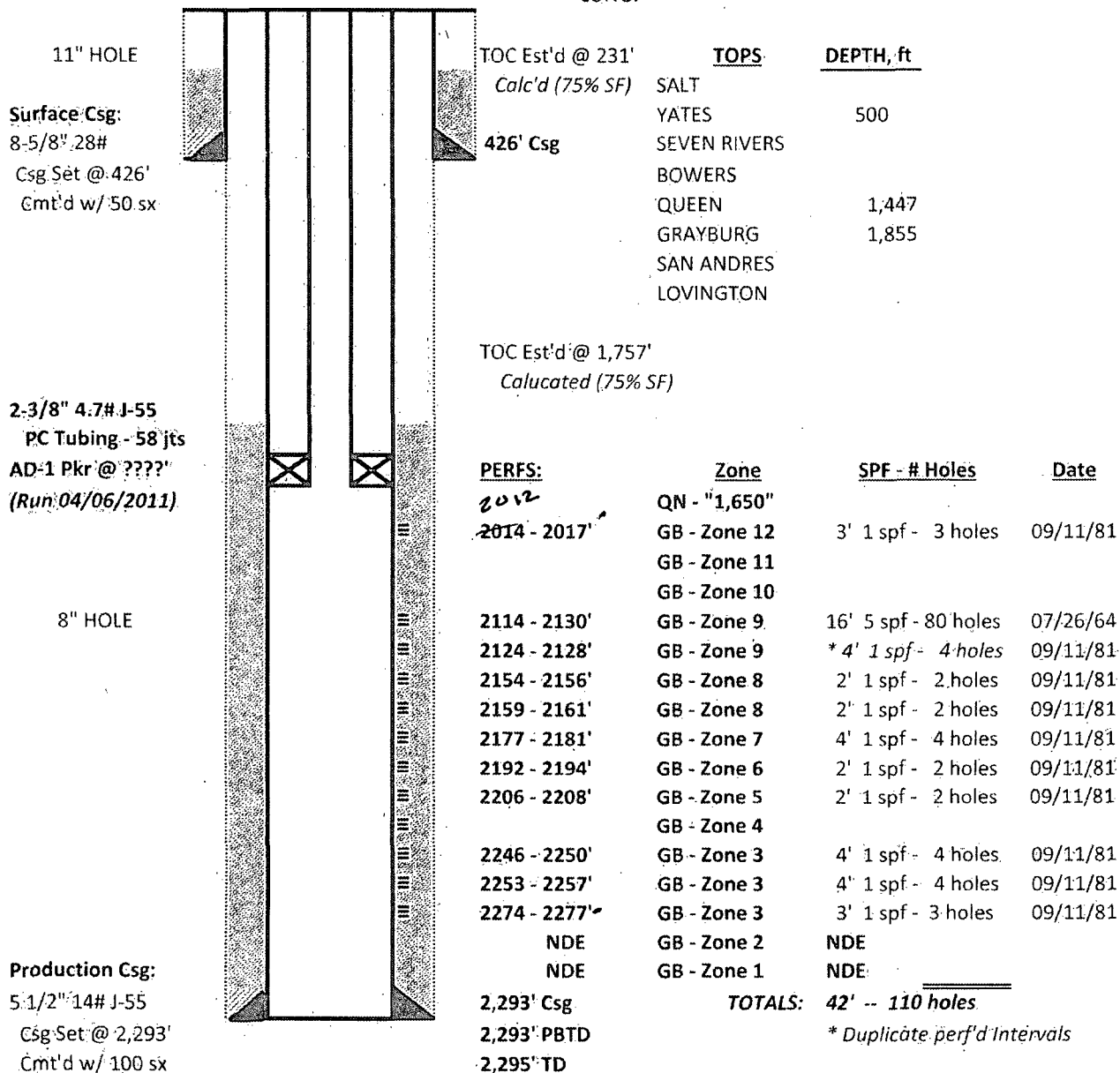
Drig Stopped: 7/20/1964

Completed: 7/23/1964

### CABLE TOOLS

LAT:

LONG:



### Cumulative Prod. (03/31/14):

OIL 5.636 MBO  
GAS 17.674 MMCF  
WATER 0.000 MBW  
INJECT. 770.634 MBW

Originally Drilled as the Marathon State #1 by Kincaid & Watson Drilling Company  
Renamed WAGU Tract 7 #6 - 03/21/68.  
Initial Water Injection: 11/09/68 through perfs 2114-2130' in GB - Zone 9 (Upper Metex).

HPS: 04/24/2014

**WAGU No.006 WIW**

**WELL PERFORATION, ACID JOB, FRAC JOB, & WELL TEST DETAILS**

PERFS			ACID JOB(S)			FRAC JOB(S)						INITIAL POTENTIAL TEST			
TOP	BOTTOM	ZONE	DATE	ACID GALS	ACID TYPE	DATE	FRAC FLUID GALS	FLUID TYPE	SAND LBS	SAND SIZE	REMARKS	TEST DATE	OIL BOPD	GAS MCFD	WATER BWPD
2,114	2,130	Grayburg									Pre-Frac Test	7/22/1964	1	0	0
2,114	2,130	Grayburg				7/23/1964	35,885	Gelled Oil	75,000	20/40	Flowing	8/1/1964	40	0	0
2,014	2,017	Grayburg	9/12/1981	2,000	15% NEFE HCl				42' of perfs		110 perfs	WIW			
2,114	2,130	Grayburg							47.6 gal/ft of perfs		18.2 gal/perf				
2,154	2,156	Grayburg													
2,159	2,161	Grayburg													
2,177	2,181	Grayburg													
2,192	2,194	Grayburg													
2,206	2,208	Grayburg													
2,246	2,250	Grayburg													
2,253	2,257	Grayburg													
2,274	2,277	Grayburg													