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LORI WROTENBERY  
DIRECTOR, OIL AND GAS DIVISION  
LESLIE SAVAGE, P.G.  
ASSISTANT DIRECTOR, TECHNICAL PERMITTING

## RAILROAD COMMISSION OF TEXAS

### OIL AND GAS DIVISION

March 28, 2016

William K. Honker, P.E.  
United States Environmental Protection Agency, Region 6  
1445 Ross Avenue, Suite 1200  
Dallas, TX 75202-2733

Re: Aquifer Exemption Example  
Injection Wells Permitted in Post-Primacy Field  
Midway (2300 Oil) Field, Milam County

Dear Mr. Honker,

This letter is in response to your request for records for injection wells for which the injection interval may be defined as an underground source of drinking water (USDW) in a field that was discovered after the Environmental Protection Agency (EPA) granted primacy to the Railroad Commission for the Class II injection well program.

At the time of EPA's approval of the Commission's Class II program on April 19, 1982, EPA granted aquifer exemptions for all existing fields. As we have discussed, since that time, the Commission has issued Class II permits for injection wells in a handful of fields for which the injection interval and the producing interval is the same and the interval contains water with a total dissolved solids concentration of less than 10,000 mg/L. The permits include fluid source limits to ensure that only water from that producing interval will be re-injected into the interval. As requested, we have attached records relating to injection wells in such a field.

Commission records indicate that the Midway (2300 Oil) Field in Milam County was discovered on October 22, 1984, after the date of primacy. The Commission issued permits for two injection wells associated with enhanced oil recovery in the field, the Lee Roy Darby (12145) Lease Well #300 and the Roberts (14042) Lease Well #3. The applications indicated that bottomhole pressure in the injection wells were low. A review indicated that all production wells in the 1/2-mile area of review are completed in, and produce from, the Poth Formation or the shallower Wilcox and that casing in all of these wells is cemented from total depth to the surface. The depth to the base of underground source of drinking water (based solely on total dissolved solids concentration) is the base of the Poth formation at depths of between 2350 to 2500 feet. Water wells in the area are completed in the shallower Carrizo or Simsboro. No water wells are completed in the Poth formation at the base of the Wilcox.



Midway (2300 Oil) Field, Millam County  
March 28, 2016

In addition to the standard permit conditions, both permits include a condition that limits the source of the fluid that can be injected into the Poth Formation to fluids produced from the Poth Formation (a Fluid Source Limit). The permits also include requirements for weekly (at a minimum) monitoring of the tubing-casing annulus and annual mechanical integrity testing. And, the permits limit the injection volume to 80 barrels per day for the Roberts #3 and to 350 barrels of water per day for the Lee Roy Darby #300. These wells are in compliance with the permit conditions.

These injection wells pose little to no risk to underground sources of drinking water because of the characteristics of the reservoir, completion of wells in the area, and the conditions included in the injection well permits. This example illustrates that the Commission has an effective program that ensures protection of underground sources of drinking water.

Sincerely yours,

A handwritten signature in dark ink, appearing to read "David Hill", written in a cursive style.

David Hill, P.E., P.G., Manager  
UIC Program  
Oil and Gas Division

Attachments



ELIZABETH A. JONES, CHAIRMAN  
MICHAEL L. WILLIAMS, COMMISSIONER  
VICTOR G. CARRILLO, COMMISSIONER



RICHARD A. VARELA  
DIRECTOR, OIL AND GAS DIVISION  
STEVEN J. SENE  
ASSISTANT DIRECTOR, ENVIRONMENTAL SERVICES

# RAILROAD COMMISSION OF TEXAS

## OIL AND GAS DIVISION PERMIT TO INJECT FLUID INTO A RESERVOIR PRODUCTIVE OF OIL AND GAS

PROJECT NO. F 16946

3R-B OIL VENTURE  
P O BOX 775  
LULING TX 78648

Based on information contained in your application (Forms H-1 and H-1A) dated August 22, 2005, you are hereby authorized to use the following well to inject fluid into the Midway 2300 Oil Formation:

Roberts Lease, (14042), Well No. 3, Midway (2300 Oil) Field, Milam County,  
RRC District 01

Authority is granted to inject in accordance with Statewide Rule 46 of the Railroad Commission of Texas and subject to the following special and standard conditions:

### SPECIAL CONDITIONS:

1. Fluid shall only be injected into strata in the subsurface depth interval from 2398 feet to 2402 feet.
2. The injection volume of salt water shall not exceed 80 barrels per day.
3. The maximum operating surface injection pressure shall not exceed 750 psig.
4. The authority to inject fluid is limited to the injection of salt water.
5. An annual annulus pressure test must be performed and the results submitted in accordance with the instructions of Form H-5.
6. The tubing-casing annulus pressure must be monitored at least weekly and reported annually on Form H-10 to the Commission's Austin Office.
7. Fluid injection is limited to waters produced from the Midway 2300 ft. Oil Field.

### STANDARD CONDITIONS:

1. Injection must be through tubing set on a packer.



2. The District Office must be notified 48 hours prior to:
  - a. running tubing and setting packer;
  - b. beginning any workover or remedial operation;
  - c. conducting any required pressure tests or surveys.
3. The wellhead must be equipped with a pressure observation valve on the tubing and for each annulus.
4. Prior to beginning injection and subsequently after any workover, an annulus pressure test must be performed. The test pressure must equal the maximum authorized injection pressure or 500 psig, whichever is less, but must be at least 200 psig. The test must be performed and the results submitted in accordance with the instructions of Form H-5.
5. The injection pressure and injection volume must be monitored at least monthly and reported annually on Form H-10 to the Commission's Austin office.
6. Within 30 days after completion, conversion to fluid injection, or any workover which results in a change in well completion, a new Form W-2 or G-1 must be filed in duplicate with the District Office to show the current completion status of the well. The date of the injection permit and the project number must be included on the new Form W-2 or G-1.
7. Written notice of intent to transfer the permit to another operator must be submitted to the Commission at least 15 days prior to the date the transfer will occur by filing Form P-4.
8. A well herein authorized cannot be converted to a producing well and have an allowable assigned without filing an amended Form W-1 and receiving Commission approval.
9. Unless other wise required by conditions of the permit, completion and operation of the well shall be in accordance with the information represented on the application (Forms H-1 and H-1A).
10. This permit will expire when the Form W-3, Plugging Record, is filed with the Commission.

Provided further that, should it be determined that such injection fluid is not confined to the approved strata, then the permission given herein is suspended and the fluid injection must be stopped until the fluid migration from such strata is eliminated.

APPROVED AND ISSUED ON October 20, 2005.

Steven J. Seni  
Steven J. Seni, Ph.D.  
Assistant Director for Environmental Services



# RAILROAD COMMISSION OF TEX. OIL AND GAS DIVISION

Form H - 1  
(Rev. 4-82)

## APPLICATION TO INJECT FLUID INTO A RESERVOIR PRODUCTIVE OF OIL OR GAS

1. Field Name (as per current location schedule - including reservoir, if applicable) <u>Midway 3300' Oil</u>	2. RRC District <u>1</u>
3. Operator <u>32-B Oil Venture</u>	4. County <u>MILAM</u>
5. Lease Name(s) and RRC Lease Number(s) <u>Lease 1 (14042)</u>	6. Reservoir Discovery Date <u>1984</u>
7. Have any injection permits been granted previously to any operator in this reservoir? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No If answer to this question is "NO", ALL OPERATORS IN THE RESERVOIR MUST BE NOTIFIED OF THIS APPLICATION, and copies of notification attached hereto.	
8. Check the appropriate block(s): <input checked="" type="checkbox"/> New Project or <input type="checkbox"/> Expansion of Previous Authority to Add Either: <input type="checkbox"/> New Lease(s) or <input type="checkbox"/> Additional Well(s) on Same Lease(s) Initial Authority Dated _____ by <input type="checkbox"/> Administrative Action or <input type="checkbox"/> Hearing, Order No. _____	
RESERVOIR AND FLUID DATA ON ENTIRE RESERVOIR	
9. Name of Reservoir <u>Midway 3300' Oil</u>	10. Estimated Productive Area of Entire Reservoir (acres) <u>100 ±</u>
11. Composition (sand, limestone, dolomite, etc.) <u>SAND</u>	12. Type of Structure (Include cross-section and structural maps.) <u>Faults</u>
13. Subsea Depth of Oil-Water Contact (ft.) <u>900</u>	14. Subsea Depth of Gas-Oil Contact (ft.) <u>300 ±</u>
15. Original Bottom Hole Pressure (psig) <u>200 ±</u>	16. Current Bottom Hole Pressure (psig) <u>100 ±</u>
17. Was a Gas Cap Present Originally? <u>No</u>	18. Is a Gas Cap Present Now? <u>No</u>
19. Ratio of Gas Cap Volume to Oil Zone Volume <u>N/A</u>	20. Saturation Pressure (psig) <u>RRC OF TEXAS</u>
21. Formation Volume Factor Original: <u>1.0</u> Current: <u>1.0</u>	22. Type Drive During Primary Production <u>Water</u>
RESERVOIR AND FLUID DATA	
23. Number of Productive Acres in Lease(s) <u>3.5</u>	24. Average Depth to Top of Pay (ft.) <u>2396</u>
25. Number of Productive Acres in Lease(s) within Project Area <u>3.5</u>	26. Average Horizontal Permeability (mds) <u>2396</u>
27. Average Horizontal Permeability (mds)	28. Connate Water Saturation (% of pore space) <u>41 AUSTIN TX</u>
29. Average Porosity (%) <u>28</u>	30. Gravity of Oil (deg. API) <u>28</u>
31. Viscosity (cP @ 60 °F) <u>28</u>	
PRODUCTION HISTORY OF RESERVOIR	
32. Date First Well Completed on Lease(s) <u>1984</u>	33. Stage of Primary Depletion of Project Area <u>41 AUSTIN TX</u>
34. Current Average Gas-Oil Ratio (SGP/bbl) <u>2</u>	35. Current Water Production (% of total fluid production or bbls./day) <u>75</u>
36. Current Number of Producing Wells on Each Lease in Project Area <u>3</u>	37. Current Average Daily Oil Production per Well (bbls./day/well) <u>5.2</u>
38. Cumulative Oil Production to Date from Lease(s) (bbls.)	39. SUBMIT ATTACHED SHEET(S) GIVING THE OIL, GAS, & WATER PRODUCTION BY YEARS SINCE DISCOVERY & TOTALS FOR THE LAST 4 YEARS, GIVE THESE FIGURES BY MONTHS.
TYPE OF INJECTION PROJECT AND RESULTS EXPECTED	
40. Type of Injection Project (Check the appropriate block(s)) <input checked="" type="checkbox"/> Waterflood, <input type="checkbox"/> Miscible Displacement, <input type="checkbox"/> Thermal Recovery, <input type="checkbox"/> Pressure Maintenance, <input type="checkbox"/> Other _____ (specify) _____	
41. Current Estimated Oil Saturation (% of pore space) <u>1</u>	42. Estimated Residual Oil Saturation at Abandonment (% of pore space) <u>1</u>
43. Estimated Original Oil-in-Place (bbls.) <u>1</u>	44. Estimated Ultimate Additional Oil that will be Recovered as a Direct Result of Injection (bbls.) <u>Not known</u>
INJECTION DATA	
45. Type of Injection Fluid (Check the appropriate block(s)) <input type="checkbox"/> Salt Water, <input checked="" type="checkbox"/> Brackish Water, <input type="checkbox"/> Fresh Water, <input type="checkbox"/> Gas, <input type="checkbox"/> Air, <input type="checkbox"/> LPG, <input type="checkbox"/> Other _____ (specify) _____	
46. Source of Injected Fluid(s) (formation(s) and depth(s) in ft.) <u>Production Midway 3300' Oil 3396' bbls.</u>	47. Injection Pattern and Spacing <u>10 AC.</u>
48. Total Number of Injection Wells to be Approved in this Application <u>1</u>	49. Estimated Maximum Daily Rate of Injection per Well (bbls./day/well) <u>20</u>
50. Total Estimated Maximum Daily Rate of Injection for All Wells in this Application, (bbls./day) <u>20</u>	51. Maximum Injection Pressure to be Used. (psig) <u>200 ±</u>
52. LIST COMPLETE INJECTION WELL DATA ON FORM H-1A AND ATTACH.	

DATA ON PROPOSED PROJECT AREA

APPLICANT MUST COMPLY WITH THE INSTRUCTIONS AND SIGN CERTIFICATION ON REVERSE SIDE

229624




### INSTRUCTIONS (H-1)

1. File the original application, including all attachments, with the Director of Underground Injection Control, Railroad Commission of Texas, P. O. Drawer 12967, Capitol Station, Austin, Texas 78711. File one copy of the application and its attachments with the appropriate District Office.
2. Attach complete electrical log or similar well log of one of the proposed injection wells. Attach any other logging and testing data available for the well such as cement bond logs.
3. (a) For a new project, attach a map with surveys marked showing the location and depth of all wells of public record within a one-quarter ( $\frac{1}{4}$ ) mile radius of the project area.  
(b) For an expansion of a previous authority, attach a map with surveys marked showing the location and depth of all wells of public record within one-quarter ( $\frac{1}{4}$ ) mile radius of the additional wells, unless such data previously has been submitted for the project.  
(c) For those wells in 3(a) or 3(b) that penetrate the top of the injection interval, attach a table of wells showing the dates drilled and their present status. Identify any abandoned well which available data indicate is unplugged or improperly plugged. The Director of Underground Injection Control may adjust or waive this data requirement in accordance with provision of the "Area of Review" section of Statewide Rule 46.
4. Attach a letter from the Texas Department of Water Resources for a well within the project area stating the depth to which usable quality ground water occurs.
5. Attach Form H-1A showing each injection well to be used in the project. Up to three wells can be listed on each H-1A Form.
6. Attach Form H-7, Fresh Water Data Form, for a new injection project that includes the use of fresh water. An updated H-7 must be attached to Form H-1 for an expansion of a previously authorized fresh water injection project unless the fresh water is purchased from a commercial supplier, public entity, or from another operator.
7. (a) Attach a plat of lease(s) showing producing wells, injection wells, offset wells, and identifying ownership of all surrounding leases.  
(b) (1) Send a copy of the application to the surface owner, the offset operators, and to the county and city clerk of the county and city in which the well is located. If this is the initial application for fluid injection authority for this reservoir, send copies of the application to all operators in the reservoir. Attach a signed statement indicating the date the copies of the application were mailed or delivered and the names and addresses of the persons to whom copies were sent.  
(2) Attach an affidavit of publication signed by the publisher that notice of the application has been published in a newspaper of general circulation in the county where the wells will be located. Notice instructions and forms may be obtained from the Commission's Austin Office or the District Offices.  
(c) No public hearing will be held on this application unless an affected person or local government requests a public hearing. Any such request for a public hearing shall be in writing and contain: (1) the name, mailing address, and phone number of the person making the request; and (2) a brief description of how the protestant would be adversely affected by the granting of the application. If the Commission determines that a valid protest has been received, or that a public hearing would be in the public interest, a hearing will be held after the issuance of proper and timely notice of the hearing by the Commission. If no protest is received within fifteen (15) days of publication or receipt in Austin of the application, the application may be processed administratively.

#### CERTIFICATE

I declare under penalties prescribed in Sec. 91.143, Texas Natural Resources Code, that I am authorized to make this report, that this report was prepared by me or under my supervision and direction, and that data and facts stated therein are true, correct, and complete, to the best of my knowledge.

 Signature  
Name of Person (Type or Print) Tenay Abbitts Title Palmer  
Telephone Number 830-895-9633 Date 8-22-05



FORM H-1A  
4-52  
INJECTION WELL DATA  
(Attach to Form H-1)

9



# UIC APPLICATION REVIEW TIMELINE

RECEIVED DATE 8-23-05

INITIALS DATE

1a. INITIAL ADMIN REVIEW SM 9-1-05  
1b. INITIAL TECH REVIEW AP 9-8-05  
1c. COMPLETE OR RAD SENT (CIRCLE ONE) 9-8-05

IF NOT COMPLETE

30 DAY NO RESPONSE RAD SM 10-12-05

RETURNED

2a. 2<sup>ND</sup> SUBMITTAL SM 10-12-05

2b. 2<sup>ND</sup> ADMIN REVIEW SM 10-12-05  
2c. 2<sup>ND</sup> TECH REVIEW AP 10-15-05  
2d. COMPLETE OR RAD SENT (CIRCLE ONE)

IF NOT COMPLETE

30 DAY NO RESPONSE RAD \_\_\_\_\_

RETURNED

3a. 3<sup>RD</sup> SUBMITTAL \_\_\_\_\_  
3b. 3<sup>RD</sup> ADMIN REVIEW \_\_\_\_\_  
3c. 3<sup>RD</sup> TECH REVIEW \_\_\_\_\_  
3d. PERMIT OR DENIAL (CIRCLE ONE) \_\_\_\_\_

4a. PROTEST RECEIVED \_\_\_\_\_  
4b. NOTICE SENT (Doc 4) \_\_\_\_\_  
4c. HEARING REQUEST \_\_\_\_\_  
4d. TRANSMITTAL SENT \_\_\_\_\_

23946





23946

1000

Amendment (circle) Interval Volume Pressure Fluid Type Other

Y/N H-1 and H-1A or W14.

Y/N Commercial Well

### Commercial Letter Sent to Operator

(Y) N\_ Completion Data 12/5 3 201

note on RAD PKR@2350

Y / N \_\_\_\_\_ TNRCC Letter \_\_\_\_\_  
Y / N \_\_\_\_\_ AOR Map \_\_\_\_\_

Y/N AOR Map

⑤ N\_AOR Table

### Y/N\_ Pressure Increase Calculations

Y/N Step Rate Test

Y/N Plat

**Y/N Signed Statement Listing Names and Addresses**

✓X N Operators of active wells within 1/2 mile notified 9-12-05

☒ N Surface Owner(s)

Y/N Adjacent Surface Owner(s)

**X/N County Clerk**

**Affidavit of Publication**

X/N\_ City Clerk

NYN Newspaper Clipping Dubo 9-1-05

Y/N Fresh Water Questionnaire

Date Fresh Water Transmittal sent to JNRCC

Date Response Received from TNRC:

X/N Form H-7

## Y/N Fresh Water Chemical Analysis

**Y/N Fresh Water Rights Plat**

$$\frac{Y}{N} \text{ Electric Log}$$

**Comments:**

[illegible]



# ADMINISTRATIVE AND TECHNICAL REVIEW

TRACKING NUMBER 23946

☒ Initial Review  
☐ 2<sup>nd</sup> Submittal  
☐ 3<sup>rd</sup> Submittal

New ☒  
 Amend ☐

UTIL ☒  
 Log ☒  
 Create Visiflow History ☒

P5 ☒  
 P4 ☐

Amendment (circle) Interval Volume Pressure Fluid Type Other

☒ N E-1 and E-1A or W14

☒ N Commercial Well

Commercial Letter Sent to Operator

☒ N Completion Data NEED complete data - records padler depth

☒ N TNRC Letter

☒ N AOR Map

☒ N AOR Table

None

☒ N Pressure Increase Calculations

☒ N Step Rate Test

☒ N Plat

☒ N Signed Statement Listing Names and Addresses

☒ N Operators of active wells within 1/2 mile Need to Notify Petro Delta

☒ N Surface Owner(s) Is Leonard Roberts the SO

☒ N Adjacent Surface Owner(s)

☒ N County Clerk

☒ N City Clerk

☒ N Affidavit of Publication

☒ N Newspaper Clipping

☒ N Fresh Water Questionnaire

Date Fresh Water Transmittal sent to TNRC

Date Response Received from TNRC

☒ N Form H-7

☒ N Fresh Water Chemical Analysis

☒ N Fresh Water Rights Plat

☒ N Electric Log

Comments:

NEED cont. Records  
padler depth



ELIZABETH A. JONES, CHAIRMAN  
MICHAEL L. WILLIAMS, COMMISSIONER  
VICTOR G. CARRELLIO, COMMISSIONER



RICHARD A. VARELA  
DIRECTOR, OIL AND GAS DIVISION  
STEVEN J. SEINI  
ASSISTANT DIRECTOR, ENVIRONMENTAL SERVICES

## RAILROAD COMMISSION OF TEXAS

### OIL AND GAS DIVISION SECOND REQUEST October 12, 2005

3RB OIL VENTURE  
P O BOX 775  
LULING TX 78648

Application will be returned  
if requested information is  
not received within 30 days.

RE: Application for Fluid Injection Permit (Form H-1 and H-1A)  
Midway (2300 Oil) Field, Roberts (14042) Lease, Well No. 3, Milam County, Texas,  
District 01

Our initial administrative and technical reviews indicate deficiencies that will need to be corrected in order to complete your application.

OK ✓ According to Railroad Commission records, Petro Delta is an operator of active wells within ½ mile of your well. Provide notification of this application by sending them a copy of the application Form H-1 and H-1A (*front & back*) and provide a signed statement indicating the date that a copy of this application was mailed or delivered, including recipient's name and address.

✓ Is Leonard Roberts the surface owner of your lease? If yes, provide a statement of confirmation. If no, please notify the surface owner of your lease with a copy of the front and back of Forms H-1 and H-1A and submit a signed statement indicating their name, address and date of notification.

✓ Notice of the application must be published for one day, at your expense, in a newspaper of general circulation in the county where the well will be located. Furnish a clipping of the published notice, plus a sworn affidavit from the newspaper giving the date on which the notice was published and stating that the newspaper is of general circulation in the pertinent county.

Please visit our website at  
<http://www.rrc.state.tx.us/divisions/og/uic/manual/HTML/noti-r46.htm> to obtain the format for publication. Click on the highlighted "notice" and "affidavit".

✓ Please provide the packer depth. The packer depth was not included on Item 14 of Form H-1A.

W-15 ✓ Please provide cementing documentation (Form W-2, Form W-15, Cementing Affidavit, Bond logs, etc...) to verify that the 5-1/2 inch long string is cemented to the surface. Our calculations show the top of cement at 440 ft.

*UIC permitting procedures can also be found at <http://www.rrc.state.tx.us/divisions/og/uic/manual/HTML/index.html>.*



- ✓ • For those wells that penetrate the top of the injection interval attach a table of wells showing the date drilled and their current status. If the status of a well is plugged and the total depth of the plugged well is deeper than the proposed top of injection/disposal, provide a copy of the plugging report. [Refer to item 3 of H-1 instructions]

Please respond to this letter in its entirety, if possible. The Texas Administrative Code, Title 16, Part 1, Chapter 1, Rule 201 states that an applicant may make no more than two supplemental filings to complete an application. If, after two supplemental submissions, the application is still incomplete, the division or section shall administratively deny the application.

Please submit the requested information (in writing) to Underground Injection Control, Railroad Commission of Texas, P.O. Box 12967, Austin, TX 78711. Submittals are reviewed in the order they are received. Until both the administrative and technical reviews are concluded, it is not possible to determine if the application is complete. If you have any questions, you may call Susan Moore at 512-463-6815 or e-mail [susan.moore@trc.state.tx.us](mailto:susan.moore@trc.state.tx.us). For technical questions call Monty Newton 512-475-4655 or e-mail [monty.newton@trc.state.tx.us](mailto:monty.newton@trc.state.tx.us) When calling please refer to Tracking Number 23946.



VICTOR G. CARILLO, CHAIRMAN  
MICHAEL L. WILLIAMS, COMMISSIONER  
ELIZABETH A. JONES, COMMISSIONER



RICHARD A. VARELA  
DIRECTOR, OIL AND GAS DIVISION  
STEVEN J. SEVI  
ASSISTANT DIRECTOR, ENVIRONMENTAL SERVICES

# RAILROAD COMMISSION OF TEXAS

## OIL AND GAS DIVISION

September 8, 2005

3RB OIL VENTURE  
P O BOX 775  
LULING TX 78648

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Midway (2300 Oil) Field, Roberts (14042) Lease, Well No. 3, Millam County, Texas,  
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- For those wells that penetrate the top of the injection interval attach a table of wells showing the date drilled and their current status. If the status of a well is plugged and the total depth of the plugged well is deeper than the proposed top of injection/disposal, provide a copy of the plugging report. [Refer to item 3 of H-1 instructions]

Please respond to this letter in its entirety, if possible. The Texas Administrative Code, Title 16, Part 1, Chapter 1, Rule 201 states that an applicant may make no more than two supplemental filings to complete an application. If, after two supplemental submissions, the application is still incomplete, the division or section shall administratively deny the application.

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Susan Moore:

Enclosed you will find everything that  
was ask for to complete the application for  
the injection well permit.

The only thing is the depth of the packer  
which is 2350'. I didn't have any more H/A  
forms to make a new application. So if you would  
please insert the 2350' setting of packer on the original  
H/A.

Thank you very much

Dean Williams



RAILROAD COMMISSION OF TEXAS

September 8, 2005

3RB OIL VENTURE  
P O BOX 775

08G-ENV SVCS  
AUSTIN TX

Our initial administrative and technical reviews indicate deficiencies that will need to be corrected in order to complete your application.

- His application was  
 Had McKeeny

- 27

- 

Figure 1

- 2350  
015

UIC



- OK ✓
- For those wells that penetrate the top of the injection interval attach a table of wells showing the date drilled and their current status. If the status of a well is plugged and the total depth of the plugged well is deeper than the proposed top of injection/disposal, provide a copy of the plugging report. [Refer to item 3 of H-1 instructions]

Please respond to this letter in its entirety, if possible. The Texas Administrative Code, Title 16, Part 1, Chapter 1, Rule 201 states that an applicant may make no more than two supplemental filings to complete an application. If, after two supplemental submissions, the application is still incomplete, the division or section shall administratively deny the application.

Please submit the requested information (in writing) to Underground Injection Control, Railroad Commission of Texas, P.O. Box 12967, Austin, TX 78711. Submittals are reviewed in the order they are received. Until both the administrative and technical reviews are concluded, it is not possible to determine if the application is complete. If you have any questions, you may call Susan Moore at 512-463-6815 or e-mail [susan.moore@rrc.state.tx.us](mailto:susan.moore@rrc.state.tx.us). For technical questions call Monty Newton 512-475-4655 or e-mail [monty.newton@rrc.state.tx.us](mailto:monty.newton@rrc.state.tx.us) When calling please refer to Tracking Number 23946.

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RRC OF TEXAS  
OCT 12 2005  
O&G - ENV SVCS  
AUSTIN, TX



Cementation Fill in shaded areas  
Operation Fill in other items.

# RAILROAD COMMISSION OF TEXAS

Oil and Gas Division

300 W.15  
Cementing Report  
Re 4143  
31-045

1 Operator's Name (As shown on Form P-5, Organization Report) <b>3-RB OIL VENTURES</b>	2 RRC Operator No.	3 RRC District No.	4 County of Well S
5 Field Name (Wildcat or exactly as shown on RRC records) <b>MIDWAY</b>	6 API No. <b>42-</b>	7 Drilling	8 Well No.
9 Lease Name <b>ROBERTS</b>	10 Rule 37 Case No.	11 No. Lease Gas (D) No.	12 Well No. <b>3</b>

CASING CEMENTING DATA	SURFACE CASING	INTER-MEDIATE CASING	PRODUCTION CASING		MULTI-TAP CEMENTING	ACE ACCESS
			Single String	Multiple Parallel Strings		
12 Cementing Date			10-05-07			
13 •Orbited hole size			7 7/8			
•Eol 3 wash or hole enlargement.			50			
14 Size of casing (in. O.D.)			54			
15 Top of liner (ft.)						
16 Setting depth (ft.)			2606			
17 Number of centralizers used			15			
18 Hrs waiting on cement before drill out						
19 API cement used. No. of sacks			290			
Class			H			
Additives			8% Gel w/ 3% salt w/ 1% Cellulose			
No. of services			102			
Class			H			
Additives			2% Gel w/ 5% salt w/ 1% Cellulose			
No. 1 service						
Class						
Additives						
3rd Slurry						
20 Slurry pumped			556.8			
Height (ft.)			3273			
Volume (cu. ft.)			129.5			
Height (ft.)			747.4			
Volume (cu. ft.)						
Height (ft.)						
Volume (cu. ft.)			687.3			
Height (ft.)			3951.1			
Total						
21 Was cement circulated to approved surface of bottom of casing outside casing?			yes			

REMARKS

2 Balls. Cement Returns.

OVER



Return each W-1 with plat, application fee, and W-1 Compliance Certificate (W-1c). Make a check or money order payable to the State Treasurer of Texas.

Address to:  
Railroad Commission of Texas  
Oil and Gas Division, Drilling Permits  
P.O. Box 12967  
Austin, Texas 78711-2967

# RAILROAD COMMISSION OF TEXAS Oil and Gas Division

Application for Permit to Drill, Deepen, Plug Back, or Re-Enter

File a copy of W-1 and plat in RRC District Office

Read Instructions on Back

EFFECTIVE SEPT. 1, 1991, PERMIT APPLICATION FEE WILL VARY  
ACCORDING TO THE TOTAL DEPTH SHOWN IN ITEM NO. 9 BELOW.  
0-2000' - \$100, 2001' - 4000' - \$125,  
4001' - 9000' - \$150, 9001' or deeper - \$200

Rev. 9/1/91

Purpose of filing (mark appropriate boxes): <input checked="" type="checkbox"/> Drill <input type="checkbox"/> Deepen (below casing) <input type="checkbox"/> Deepen (within casing) <input type="checkbox"/> Plug Back <input type="checkbox"/> Re-Enter <input type="checkbox"/> Horizontal <input type="checkbox"/> Directional Well <input type="checkbox"/> Sidetrack <input type="checkbox"/> Amended Permit (enter permit no. at right & explain fully in Remarks)				Enter here, API No. <b>42-331-33534</b> If assigned: Permit No.	
1. Operator's Name (exactly as shown on Form P-5, Organization Report) <b>3R-B Oil Venture</b>		3. RRC Operator No. <b>953641</b>	4. RRC District No. <b>1</b>	5. County of Well Site <b>Milam</b>	
2. Address (including city and zip code) <b>P.O. Box 775 Luling, Tex. 78648</b>		6. Lease Name (32 spaces maximum) <b>Roberts</b>		7. RRC Lease/ID No. <b>Unassigned</b>	8. Well No. <b>3</b>
		9. Total Depth <b>2500</b>		Rule 37 Case No.	
10. Location • Section _____ Block _____ Survey <b>JAMES SHIELDS</b> • This well is to be located <b>6</b> miles in a <b>SSR</b> direction from <b>Rockdale, Texas</b> which is the nearest town in the county of the well site.					
11. Distance from proposed location to nearest lease or unit line <b>150</b> ft.					
12. Number of contiguous acres in lease, pooled unit, or unitized tract <b>35</b> (OUTLINE ON PLAT.)					
13. Distance from proposed location to nearest lease or unit line (if directional well, show also projected bottom-hole location): • Lease/Unit <b>650' WLL - 150' WLL</b> • Survey/Section <b>650' HST - 190' SSR</b>					
14. Is this a pooled unit? FWL FSL Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> (Attach Form P-12 and certified plat.)					
15. Is this wellbore subject to Statewide Rule 36 (hydrogen sulfide area)? Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>					
16. Do you have the right to develop the minerals under any right-of-way that crosses, or is contiguous to, this tract? Yes <input checked="" type="checkbox"/> No <input type="checkbox"/> If not, and if the well requires a Rule 37 or 38 exception, see Instructions for Rule 37.					
17. Remarks <b>Field has 10AC. Options - Spacing</b>					
18. I certify that information stated in this application is true and complete, to the best of my knowledge. Signature <b>Jerry Robbins</b> Name and title of operator's representative <b>Jerry Robbins, Owner</b> Date: <b>8-29-01</b> yr. mo. day Tel.: <b>830-825-9633</b> Area Code Number • RRC Use Only •					

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AUG 29 2001  
OIL & GAS DIVISION  
AUSTIN, TEXAS

#66923

513120

79  
GULF-PH



331-33534-3

Surface - W-15

-440 TOC calc

PT | TCAM

$$\text{yield} = \frac{486 \text{ vol}}{392 \text{ sics}} = 1.75 (\text{wgt})$$

RU600 2300 —

516  
(28)

2500

2398  
2402

4.344  
392  
1.15

1  
2061

TOC 440