Application and site evaluation for SWIW permit
Operator: K&H Partners LLC.
Well Name & Number: K&H Partners #2
Permit Number: New Well

Andrew,

Well stake GPS N39.23487/ W081.75710. Well site is located in a mixed forest woodland. Elevation 779'. The well site drains North East into an unnamed tributary then into Skunk Run. The existing surface facility for the K&H # 1, API #34-009-23821-00-00 is located at GPS N39.23578/ W081.75805. There are six water wells with in ½ mile of the K&H #2 well location.
Well log numbers: 288118, 465032,396966, 57315, 57319, and 57358.
I have attached a PDF with a topo map with the well stake location, K&H # 1 surface facility location and the 6 water well locations.

Jon Scott MRI 3
## Water Well Log and Drilling Report

**Ohio Department of Natural Resources**
**Division of Soil and Water**
**Phone: 614-265-6740  Fax: 614-265-6767**

**Well Log Number:** 288118

### ORIGINAL OWNER AND LOCATION

- **Original Owner Name:** HOBERT MORRIS
- **County:** ATHENS
- **Address:** CR 62
- **City:**
- **Location Number:** 13
- **Latitute:** 39.240514

### CONSTRUCTION DETAILS

- **Borehole Diameter:** 1:
  - 1: 3.56 in.
  - 2:
- **Casing Diameter:** 1: 5.63 in.
  - 2:
- **Casing Height Above Ground:**
- **Date of Completion:** 5/16/1983
- **Driller’s Name:** BOARD WATER WELL DRILLING
- **Screen Diameter:**
- **Type:**
- **Set Between:**
- **Gravel Pack Material/Size:**
- **Method of Installation:**
- **Grout Material/Size:**
- **Method of Installation:**

### WELL TEST DETAILS

- **Static Water Level:**
- **Drawdown:**
- **COMMENTS:**

### WELL LOG

<table>
<thead>
<tr>
<th>Formations</th>
<th>From</th>
<th>To</th>
</tr>
</thead>
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<td>68</td>
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<tr>
<td>WATER AT</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

### Associated Reports

- **Depth to Bedrock:**
- **Casing Thickness:** 1:
- **Well Use:**
- **Screen Length:**
- **Print Tips** (opens in new window)
- **Print This Page**  **Close**

- **Well log questions - Web site questions - Web policies**
**Well Log Number:** 465032

**ORIGINAL OWNER AND LOCATION**
- **Original Owner Name:** EARNEST SIMMONS
- **County:** ATHENS
- **Address:** CR 63

**City:**
- **Location Number:** 12.10
- **Latitude:** 39.238022

**CONSTRUCTION DETAILS**
- **Borehole Diameter:** 1:
- **Casing Diameter:** 1: 5.63 in.
- **Casing Height Above Ground:**
- **Date of Completion:** 10/11/1974
- **Driller's Name:** BOARD WATER WELL DRILLING
- **Screen Diameter:**
- **Type:**
- **Set Between:**
- **Gravel Pack Material/Size:**
- **Method of Installation:**
- **Grout Material/Size:**
- **Method of Installation:**

**WELL TEST DETAILS**
- **Static Water Level:** 38 ft.
- **Drawdown:** 4 ft.

**COMMENTS:**

**Formations**
- SAND
- SANDSTONE
- WATER AT

**WELL LOG**

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**Associated Reports**

- **Section Number:** 10
- **Lot Number:**
- **Zip Code:**
- **Location Area:**
- **Depth to Bedrock:**
- **Casing Thickness:** 1:
- **Well Use:**
- **Screen Length:**

[View Image of Original Well Log]
Well Log Number: 396968

ORIGINAL OWNER AND LOCATION
Original Owner Name: JAMES PERKINS
County: ATHENS
Address: 77 672
City: TROY
Location Number: 11
Latitude: 39.240414

CONSTRUCTION DETAILS
Borehole Diameter: 1:
2:
Casing Diameter: 1: 6 in.
2:
Casing Height Above Ground:
Date of Completion: 6/1/1971
Driller's Name: BOARD WATER WELL DRILLING
Screen Diameter:
Type:
Set Between:
Gravel Pack Material/Size:
Method of Installation:
Grout Material/Size:
Method of Installation:
Total Depth: 60 ft.

WELL TEST DETAILS
Static Water Level: 12 ft.
Drawdown: 48 ft.

COMMENTS:

Well Log

<table>
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<tr>
<th>Formation</th>
<th>From</th>
<th>To</th>
</tr>
</thead>
<tbody>
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<td>15</td>
</tr>
<tr>
<td>STONE</td>
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<td>60</td>
</tr>
</tbody>
</table>

Depth to Bedrock:
Casing Thickness: 1:
2:
Well Use:
Screen Length:

Associated Reports

Printing Tips (opens in new window)
Print This Page  Close
Water Well Log and Drilling Report
Ohio Department of Natural Resources
Division of Soil and Water
Phone: 614-265-6740 Fax: 614-265-6767

Well Log Number: 57315

ORIGINAL OWNER AND LOCATION
Original Owner Name: O. B. DAVIS
County: ATHENS
Address:
City:
Location Number: 100
Latitude: 39.230536

CONSTRUCTION DETAILS
Borehole Diameter: 1:
2:
Casing Diameter: 1: 8 in.
2:
Casing Height Above Ground:
Date of Completion: 7/27/1990
Driller's Name:
Screen Diameter:
Type:
Set Between:
Gravel Pack Material/Size:
Method of Installation:
Grout Material/Size:
Method of Installation:
WELL TEST DETAILS
Static Water Level:
Drawdown:
COMMENTS:

Formations
SOIL
SANDSTONE
WATER AT

Township: TROY
State: OH
Location Map Year: 1945
Longitude: -81.763496

Borehole Depth: 1: 69 ft.
2:
Casing Length: 1: 23 ft.
2:
Aquifer Type: SANDSTONE
Total Depth: 80 ft.

Slot Size:
Material:
Vol/Wt Used:
Placed:
Vol/Wt Used:
Placed:

Test Rate:
Test Duration:

WELL LOG

From To
0 23
23 80
55

View Image of Original Well Log

Section Number: 10
Lot Number:
Zip Code:
Location Area:

Depth to Bedrock:
Casing Thickness: 1:
2:

Well Use:
Screen Length:

Associated Reports

Printing Tips (opens in new window)
Print This Page Close

Well log questions - Web site questions - Web policies
Well Log Number: 57319

ORIGINAL OWNER AND LOCATION
Original Owner Name: JESS SMITH
County: ATHENS
Address:
City:
Location Number: 12.20
Latitude: 39.239550

CONSTRUCTION DETAILS
Borehole Diameter: 1: 5.63 in.
2: 5.63 in.

Casing Diameter: 1: 5.63 in.
2: 5.63 in.

Casing Height Above Ground: Date of Completion: 10/10/1995
Driller's Name:
Screen Diameter:
Type:
Set Between:
Gravel Pack Material/Size:
Method of Installation:
Grout Material/Size:
Method of Installation:

WELL TEST DETAILS
Static Water Level:
Drawdown:
COMMENTS:

Formations
SOFT SOIL
SOFT SAND
SOLID SANDSTONE

Township: TROY
State: OH
Location Map Year: 1981
Longitude: -81.749578

Borehole Depth: 1: 66 ft.
2: 66 ft.

Casing Length: 1: 41 ft.
2: 41 ft.

Aquifer Type: SANDSTONE
Total Depth: 66 ft.

Slot Size:
Material:
Vol/Wt Used:
Placed:
Vol/Wt Used:
Placed

Test Rate:
Test Duration:

From | To
-----|-----
0   | 37
37  | 37
37  | 66

Depth to Bedrock:
Casing Thickness: 1:
Well Use:
Screen Length:

Associated Reports

Printing Tips (opens in new window)
Print This Page  Close

Well log questions - Web site questions - Web policies
Well Log Number: 57358

ORIGINAL OWNER AND LOCATION
Original Owner Name: R. HEATHERLY
County: ATHENS
Address:
City:
Location Number: 78
Latitude: 39.243259
CONSTRUCTION DETAILS
Borehole Diameter: 1:
2:
Casing Diameter: 1: 5.63 in.
2:
Casing Height Above Ground:
Date of Completion: 7/15/1949
Driller's Name:
Screen Diameter:
Type:
Set Between:
Gravel Pack Material/Size:
Method of Installation:
Grout Material/Size:
Method of Installation:
WELL TEST DETAILS
Static Water Level:
Drawdown:
COMMENTS:
Formations
CLAY
SANDSTONE

Township: TROY
State: OH
Location Map Year: 1945
Longitude: -81.759771

Borehole Depth: 1: 165 ft.
2:
Casing Length: 1: 48 ft.
2:
Aquifer Type: SHALE & SANDSTONE
Total Depth: 165 ft.
Slot Size:
Material:
Vol/Wt Used:
Placed:
Vol/Wt Used:
Placed:
Test Rate:
Test Duration:

Depth to Bedrock:
Casing Thickness: 1:
2:
Well Use:
Screen Length:

WELL LOG
From
0
40
165

Associated Reports

Printing Tips (opens in new window)
Print This Page  Close

Well log questions - Web site questions - Web policies
August 16th, 2013

Mr. Jeff D. Harper  
K & H Partners, LLC.  
P.O. Box 1366  
Parkersburg, WV 26102

RE: Public Notification for SWIW application, Athens County, Troy Twp., new well, K & H Partners #2 injection well

Dear Mr. Harper:

As outlined in Rule 1501: 9-3-06 (H) (1) of the Ohio Administrative Code, please consider this letter as notification from the Division for you to proceed with the public notice. Enclosed, please find a copy of the notice you will need to have run in the newspaper of general circulation in the county of the proposed injection well. The public notice must be run for no less than five consecutive days. After running this notice in the newspaper, please send me the original proof-of-publication from the newspaper as soon as possible.

If you have any questions regarding this matter, please feel free to contact me at (614) 265-6673.

Sincerely,

Andrew Adgate, Geologist  
UIC Section  
Division of Oil and Gas Resources Management  
2045 Morse Road, F-2  
Columbus, Ohio 43229-6693

Cc: File

2045 Morse Rd • Columbus, OH 43229-6693 • ohiodnr.com
PUBLIC NOTICE

K & H Partners, LLC, P.O. Box 1366, Parkersburg, WV 26102, (304) 863-8867 is applying to permit a well for the injection of brine water produced in association with oil and natural gas. The location of the proposed injection well is the K & H Partners #2, Fraction 5, Troy Township, Athens County, Ohio. The proposed well will inject into the Ohio Shale through Big Lime at a depth of 2000 to 4100 feet. The average injection is estimated to be 3000 barrels per day. The maximum injection pressure is estimated to be 460 psi. Further information can be obtained by contacting K & H Partners, LLC, or the Division of Oil and Gas Resources Management. The address of the Division is: Ohio Department of Natural Resources, Division of Oil and Gas Resources Management, 2045 Morse Road, Building F-2, Columbus, Ohio 43229-6693, (614) 265-6922. For full consideration, all comments and objections must be received by the Division, in writing, within fifteen calendar days of the last date of this published legal notice.
TO: Jon Scott, Mineral Resources Inspector
FROM: Andrew Adgate, Geologist
SUBJECT: Application and site evaluation for SWIW permit
DATE: August 7th, 2013

The Division of Oil and Gas Resources Management has received an application for the proposed saltwater injection well as described below:

OPERATOR: K & H Partners, LLC.
WELL NAME & NUMBER: K & H Partners #2
PERMIT NUMBER: New well
LOCATION: 358' SL & 1957' WL of Sec 10, Fraction 5, Troy Twp., Athens County
PROPOSED INJECTION ZONE: Ohio Shale
DATE RECEIVED: July 22nd, 2013

Please inspect proposed site and evaluate for any potential water wells or surface bodies of water within close proximity that would require any additional permit conditions for the construction of the SWIW surface facilities. Please e-mail me a copy of the site inspection report with any recommendations.
<table>
<thead>
<tr>
<th>Permit Number</th>
<th>Casing/Cement Program</th>
<th>Well Log and/or Method of Plug</th>
</tr>
</thead>
<tbody>
<tr>
<td>New Well</td>
<td>1 3/8&quot; - 65' cemented to surface</td>
<td></td>
</tr>
<tr>
<td></td>
<td>9 5/8&quot; - 8 7/8&quot; c/2 135 skrs</td>
<td></td>
</tr>
<tr>
<td></td>
<td>7&quot; - 2001' c/2 282 skrs</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Not Drilled Permit Expired</td>
<td></td>
</tr>
</tbody>
</table>

**NOTE:** Proposed injection well should be circumscribed with appropriate radius and all wells clearly labeled and identified. A legend depicting color code is required.
1. Applicant: K&H Partners, LLC.
   Address: P.O. Box 1366, Parkersburg, WV 26102
   Phone: 304-863-8867

2. Property Owner: 888 5
   Address: P.O. Box 1366, Parkersburg, WV 26102
   Phone: 304-863-8867

3. TYPE OF WELL:
   - Oil & Gas
   - Stratigraphic Test
   - Solution Mining
   - Annular Disposal
   - Water Supply

4. IS THE WELL LOCATION OR PRODUCTION FACILITY(S) WITHIN AN URBANIZED AREA AS DEFINED BY 1509.01(Y)? Yes

5. MAIL PERMIT TO: Jeff Harper
   P.O. Box 1366
   Parkersburg, WV 26102

6. COUNTY: Athens
7. CIVIL TOWNSHIP: Troy
8. SECTION: 10
9. LOT: 9
10. FRACTION: 5
11. QTR TWP: 11
12. TRACT/ALLOT: 
13. WELL #: 2
14. LEASE NAME: K&H Partners, LLC.
15. PROPOSED TOTAL DEPTH: 4990
16. PROPOSED GEOLOGICAL FORMATION(S): Ohio Shale
17. DRILLING UNIT ACRES: 49.467
18. IF PERMITTED PREVIOUSLY: API #: 
   OWNER: 
20. SOURCE(S) OF GROUND-AND/OR SURFACE WATER USED IN PRODUCTION OPERATION:
   - Watershed: Lake Erie
   - Ohio River
   Estimated Withdrawal Rate (gal/day):
   Estimated Total Volume (gal):
   If Recycled Water – Estimated Total Volume (gal):

21. EMERGENCY TELEPHONE NUMBERS: (closest to well site):
   - Fire: 911
   - Medical: 911

22. MEANS OF INGRESS & EGRESS:
   - Road: Athens County Road 63

23. ROAD USE FOR A HORIZONTAL WELL:
   - Maintenance Agreement Attached
   - Non-agreement Affidavit Attached

24. ARE THE SURFACE RIGHTS OWNED BY STATE OF OHIO?
   - Agency Name: No

25. ATTACH LANDOWNER ROYALTY LISTINGS

26. PROPOSED CASING AND CEMENTING PROGRAM

<table>
<thead>
<tr>
<th>Type Casing</th>
<th>Borehole Diameter (in)</th>
<th>Borehole Depth (ft)</th>
<th>Casing Diameter (in)</th>
<th>Casing Depth (ft)</th>
<th>Cement Volume (barrels)</th>
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<tr>
<td>Drive Pipe</td>
<td>15 1/4</td>
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<td>65</td>
<td>55</td>
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<tr>
<td>Conductor</td>
<td>12 1/4</td>
<td>360</td>
<td>9 3/8</td>
<td>349</td>
<td>135</td>
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<tr>
<td>Surface</td>
<td>8 3/4</td>
<td>2010</td>
<td>7</td>
<td>2000</td>
<td>282</td>
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</tbody>
</table>

Liner

Formation
- Surficial
- Penns and shales
- Ohio Shale

Zone Tested or Produced (Y if Yes)
- No

Hydraulic Fracturing (Y if Yes)
- No

 Washington, D.C.

I, the undersigned, being first duly sworn, depose and state under penalties of law, that I am authorized to make this application. That this application was prepared by me or under my supervision and direction, and that the facts stated herein are true, correct, and complete, to the best of my knowledge.

I, the undersigned, further depose and state that I am the person who has the right to drill on the tract or drilling unit and to drill into and produce from a pool and to appropriate the oil or gas that I produce therefrom either for myself or others as described in this application. And furthermore, the undersigned, being duly sworn, depose and state at this time that I am not liable for any final nonappealable order of a court for damage to streams, roads, highways, bridges, culverts, or drainage ways pursuant to Section 5577.12 of the Ohio Revised Code (ORC). I, the undersigned, further depose and state that all reserves required by 5509.06 (A) (9) ORC for this application have been duly provided by me. If applying for a permit to plug and abandon a well, I hereby certify that the written notices, as required in Section 5509.13, ORC, have been given.

I further depose and state that I hereby agree to conform with all provisions of Chapter 5509, ORC, and Chapter 1509, OAC, and all orders and conditions issued by the Chief, Division of Oil and Gas Resources Management.

Signature of Owner/Authorized Agent
Name (Type or Print) Jeff Harper
Title C.O.O.

If signed by Authorized Agent, a certificate of appointment of agent must be on file.

Sworn to and subscribed before me this the 15th day of July, 2013.

Commissioner Notary Public
Before this application can be processed, an Authority and Organization Form (Form 9), indicating the exact owner name on this form, and proof of compliance with the surety and insurance requirements of Chapter 1509.07, Ohio Revised Code, must be on file with the Division of Oil and Gas Resources Management. The signature of owner/authorized agent must correspond with the signature(s) listed on the Form 9 on file with the Division.

All information requested on this form must be provided unless exempted by the instructions below. Incomplete applications may be returned to the applicant. An application for a permit requires the following:

1. Drill, Reopen, Deepen and Plug Back an Oil and Gas Well (non-urban valid for 24 months; urban valid for 12 months)
   a. Original and two (2) copies of Application for a Permit (Form 1);
   b. Original and four (4) copies of an Ohio registered surveyor's plat;
   c. Original and one (1) copy of the Restoration Plan (Form 4);
   d. Reopen, deepen, plug back and convert will require three (3) copies of the Well Completion Record (Form 8);
   e. $500.00 check or money order payable to the Division of Oil and Gas Resources Management and;
   f. If requesting an expedited review, an additional $250 fee is required; and an Oil & Gas Affidavit (if the proposed well location is in a coal-bearing township).
   g. For an urbanized area, new well drilling permit, the fee is as follows: $500 for a township with a population up to 9,999; $750 for a township with a population of 10,000 to 14,999; $1,000 for a township with a population exceeding 15,000; and $1,000 for all municipal corporations regardless of population.
   h. For mandatory pooling, an additional $5,000.

2. Reissue or Revised Location
   a. Same as above: 1(a), (b), (c), (d), (f);
   b. $250 check or money order payable to the Division of Oil and Gas Resources Management.

3. Plug and Abandon (valid for 24 months)
   a. Original copy of Application for a Permit (Form 1);
   b. Two (2) copies of the Ohio registered surveyor's plat originally filed, or modified, if available;
   c. Three (3) copies of the Well Completion Record (Form 8) if available; if there is no Well Completion Record on file with the Division, provide any information that is available;
   d. $250 check or money order payable to the Division of Oil and Gas Resources Management;
   e. If requesting an expedited review, an additional $500 fee is required.

4. Drill, Reissue, Reopen, Deepen, Plug Back or Convert a Well to Saltwater Injection
   a. Same as above: 1(a), (b), (c), (d); and
   b. $1,000 check or money order payable to the Division of Oil and Gas Resources Management.

5. Temporary Inactive (valid for 12 months)
   a. Original and one (1) copy of Application for a Permit (Form 1);
   b. A map, on a scale not smaller than four hundred feet to the inch, that shows the location of the well and the tank battery, that includes the latitude and longitude of the well;
   c. A written statement that demonstrates all of the following: 1) the well is of future utility, 2) the applicant has a viable plan to use the well within a reasonable period of time, and 3) the well poses no threat to the health or safety of persons, property or the environment;
   d. For first application, $100 check or money order payable to the Division of Oil and Gas Resources Management;
   e. For first renewal, $250 check or money order payable to the Division of Oil and Gas Resources Management;
   f. For subsequent renewals, $500 check or money order payable to the Division of Oil and Gas Resources Management; additional bonding may be required.

Item 1. Permit holder's name - as it appears on Form 9. Indicate the type of or combination of activities to be permitted.

Item 2. Indicate owner number; if the owner number is not known, please contact the Division.

Item 3. Indicate the type of well for which the application is being submitted.

Item 4. An "urbanized area" is a municipal corporation or a township that has an unincorporated population of more than five thousand, as defined under Section 1509.01(1) of the Ohio Revised Code. Notice must be provided by regular mail to the owner of each parcel of real property that is located within five hundred feet of the surface location of the well, and to either the executive authority of the municipal corporation or the board of township trustees (see 1509.06 (A) (9)).

Item 5. Provide name, address, city, state and zip code where the permit is to be mailed.

Items 6-12. Indicate drilling location.

Items 13-17. Provide requested information.

Item 18. Complete when application is for a permit to reopen, reissue, plug back, convert, or plug and abandon.

Item 19. Indicate type of tools that may be used.

Item 20. Indicate sources and volume of water to be used in drilling and completion operations.

Item 21. Indicate fire and medical department emergency telephone numbers closest to the well site.

Item 22. List all county, township, and/or municipal roads, streets and highways by name or number that applicant anticipates to use as means of ingress and egress to and from the well site.

Item 23. Attach a copy of an agreement entered into for road use maintenance or an affidavit of non-agreement.

Item 24. Complete if surface rights are owned by the State of Ohio.

Item 25. Attach a list showing the names and addresses of all landowner royalty interest holders. Names must coincide with those shown on the designated unit or subject tract on the surveyor's plat.

Item 26. Complete proposed casing and cementing program. Indicate zone to be produced and/or hydraulically fractured.
SUPPLEMENT TO APPLICATION
PERMIT FOR A SALTWATER INJECTION WELL (Form 210)
Ohio Department of Natural Resources, Division of Oil and Gas Resources Management
2045 Morse Road, Building F-2, Columbus, Ohio 43229-8693

AREA OF REVIEW. An application for a saltwater injection well (SWIW) will be evaluated on the basis of an "area of review" surrounding the proposed well. The area of review for wells, in which injection of greater than two hundred (200) barrels per day is proposed, shall be the area circumscribed by a circle with the center point at the location of the injection well and a radius of one-half mile. The area of review for wells, in which a maximum injection of two hundred (200) barrels per day or less is proposed, shall be the area circumscribed by a circle with the center point at the location of the injection well and a radius of one-quarter mile.

31. PROPOSED INJECTION ZONE
Geological Formation:
Injection Interval: From: 3000' 26-80' AHA Feet to 4100' 26-80' AHA
Geologic description of injection zone: Shale
Composition of Proposed Fluids to be Injected: (Check all that apply)
☑ Brine  ☑ Flow-Back  ☐ Drilling Fluids  ☐ Other Approved Fluids

32. WELL CONSTRUCTION AND OPERATION
A. Description of the proposed casing and cement program for new wells, or of the casing, cementing or sealing with prepared clay for existing wells to be converted: (Tab to next line to continue)

B. Proposed method for testing the casing: (Tab to next line to continue)
Pressure Test After Each Stage Of Casing.

C. Description of the proposed method for completion and operation of the injection well: (Tab to next line to continue)
Open Hole Completion And Standard Salt Water Injection.

D. Description of the proposed unloading, surface storage, and spill containment facilities: (Tab to next line to continue)
K&H #1 Unloading And Containment Facility Will Be Used For K&H #2 Well.
Description Provided As Attachment

33. PROPOSED INJECTION VOLUMES
A. Indicate the estimated amount of saltwater to be injected into the proposed injection well per day:
AVERAGE: 3,000 Bbl  MAXIMUM: 4,000 Bbl

B. Indicate the method to be used to measure the actual daily injection pressure:
Silversmith Measurement Software With Totalizer Metering Devices.

34. PROPOSE INJECTION PRESSURES
A. Indicate the estimated pressure to be used for injection of saltwater into the proposed injection well:
AVERAGE: 0 Psi  MAXIMUM: 1460 psi

35. PROPOSED CORRECTIVE ACTION
Explain any corrective action proposed for wells penetrating the proposed injection formation or zone within the area of review:
No wells within 1/2 mile of the proposed well location.
36. **MAP.** Each application for a permit shall be accompanied by a map or maps showing and containing the following information:

A. The subject tract of land on which the proposed injection well is to be located.

B. The location of the proposed injection well on the subject tract established by an Ohio registered surveyor showing the distances in feet from the proposed well site to the boundary lines on the subject tract;

C. The geographic location of all wells, penetrating the formation proposed for injection regardless of status, within the area of review;

D. All holders of the land owner's royalty interest of record, or holders of the severed oil and gas mineral estates of record in the subject tract;

E. All owners or operators of wells producing from or injecting into the same formation proposed as the injection formation.

37. **SCHEMATIC DRAWING OF SUBSURFACE CONSTRUCTION.** Label the schematic drawing below indicating size and setting depth of surface casing, intermediate (if any) and production casings; amount of cement used, measured or calculated tops of cement; size and setting depth of tubing; type and setting depth of packer; geologic name of injection zone showing top and bottom of injection interval. If the proposed input well design is substantially different from the schematic below, attach on a separate sheet a schematic of your proposal labeled with the above information.

38. Public notice of an application for an enhanced recovery project is required by law. In addition, the applicant must submit, on an attached sheet, a list of the names and address(es) of those persons required to receive personal notice in accordance with Rule 1501:9-5-05(E)(1), of the Ohio Administrative Code.

After submitting the application, and after a determination by the Division that it is complete as required by the rules of the Division, a legal notice must be published by the applicant in a newspaper of general circulation in the area of review. The legal notice must contain the information described in Rule 1501:9-5-05(E)(1) of the Ohio Administrative Code. A copy of the notice must be delivered to all owners or operators of wells within the area of review producing from or injecting into the same formation proposed as the injection formation. Proof of publication, publication date, and an oath as to the delivery to those entitled to receive personal notice under this method must be filed with the Division within thirty (30) days after the Division determines that the application is complete.

In addition, notice of all applications for enhanced recovery projects will be published in the Division's Weekly Circular.

The undersigned hereby agrees to comply with all provisions for an enhanced recovery project as required by Chapter 1501:9-5 of the Ohio Administrative Code. In addition, the undersigned deposes and says that s/he shall conform to all provisions of Section 1509.072 of the Ohio Revised Code, and to all orders and rules issued by the Chief, Division of Oil and Gas Resources Management.

Owner/Authorized Agent (Type or Print): Jeff D Harper

Signature of Owner/Authorized Agent:

Permanent Address of Home Office: 2130 Harris Highway Washington, Wv 26181

If signed by Authorized Agent, a certified copy of appointment of agent must be on file with the Division.

SWORN to and subscribed to me this 15th day of July, 2013.

Notary Public

Date Commission Expires
## RESTORATION PLAN (Form 4)
Division of Oil and Gas Resources
Ohio Department of Natural Resources

**RECEIVED**

### 1. DATE OF APPLICATION: 15-Jul-13

### 2. OWNER NAME, ADDRESS, & TELEPHONE NO.:
K&H Partners, LLC.
2130 Harris Highway
Washington, WV 26181
304-863-8867

### 3. API #: 

### 4. WELL #: 

### 5. LEASE NAME: K&H Partners

### 6. PROPERTY OWNER: K&H Partners, LLC.

### 7. COUNTY: Athens

### 8. CIVIL TOWNSHIP: Troy

### 9. SECTION: 9, 10

### 10. LOT: 

### 11. CURRENT LAND USE:
- [ ] Cropland
- [ ] Commercial
- [ ] Pasture
- [ ] Idle Land
- [ ] Wetlands
- [ ] Recreational
- [ ] Residential
- [ ] Industrial
- [ ] Unreclaimed strip mine
- [ ] Woodland: Broadleaf
- [ ] Needletike

### 12. SLOPE GRADIENT & LENGTH DETERMINED FROM:
- [ ] Ground Measurement
- [ ] U.S. Geological Survey Topographical Maps
- [ ] Other: (explain)

### 13. TYPE OF FALL VEGETAL COVER:
- [ ] Little or no vegetal cover
- [ ] Short grasses
- [ ] Tall weeds or short brush (1 to 2 ft.)
- [ ] Brush or bushes (2 to 6 ft.)
- [ ] Agricultural crops
- [ ] Trees with sparse low brush
- [ ] Trees with dense low brush

### 14. SOIL & RESOLING MATERIAL AT WELLSITE:
- [ ] Stockpile and protect topsoil to be used when preparing seedbed
- [ ] Use of soil additives (e.g., lime, fertilizer)
- [ ] No resoling planned
- [ ] Proposed alternative

### 15. DISPOSAL PLAN FOR TREES AND TREE STUMPS:
- [ ] No trees disturbed
- [ ] Haul to landfill
- [ ] Cut into firewood
- [ ] Sell to lumber
- [ ] Bury with landowner's approval company
- [ ] Mulch small trees and branches, erosion control
- [ ] Use for wildlife habitat with landowner approval
- [ ] Proposed alternative

### 16. SURFACE AND SUBSURFACE DRAINAGE FACILITIES:
- [ ] No existing drainage facilities for removal of surface and/or subsurface water
- [ ] Tile drainage system underlying land to be disturbed
- [ ] Drain pipe(s) underlying land to be disturbed
- [ ] Surface drainage facilities on land to be disturbed

### 17. TYPE OF WELL:
- [ ] Oil
- [ ] Gas
- [ ] Other

### 18. STEEPEST SLOPE GRADIENT CROSSING SITE:
- [ ] 0 to 2% 
- [ ] 2.1 to 8%
- [ ] 8.1 to 10%
- [ ] 10.1 to 24%
- [ ] greater than 24%

### 19. LENGTH OF STEEPEST SLOPE CROSSING SITE:
- [ ] 1 to 100 ft.
- [ ] 101 to 200 ft.
- [ ] 201 to 400 ft.
- [ ] greater than 400 ft.

### 20. RESTORATION OF DRILLING HUTS: 
- [ ] Haul drilling fluids and fill pits
- [ ] Use steel circulating tanks
- [ ] Proposed alternative

### 21. BACKFILLING AND GRADING AT SITE:
- [ ] Construct diversions channeled to naturally established drainage systems
- [ ] Construct terraces across slopes
- [ ] Grade to approximate original contour
- [ ] Grade to minimize erosion & control offsite runoff
- [ ] Proposed alternative

### 22. VEGETATIVE COVER TO BE ESTABLISHED AT SITE:
- [ ] Seeding plan
- [ ] Sod
- [ ] Agricultural crops
- [ ] Trees and/or Bushes
- [ ] Proposed alternative

### 23. ADDITIONAL HOLES:
- [ ] Rat/Mouse, if used, will be plugged

### 24. PROPOSED OR CURRENT LENGTH OF ACCESS ROAD:
- [ ] 100 ft. or less
- [ ] 101 to 500 ft.
- [ ] 501 to 1500 ft.
- [ ] greater than 1500 ft.

### 25. CURRENT LAND USE PATH OF ACCESS ROAD:
- [ ] Cropland
- [ ] Pasture
- [ ] Commercial
- [ ] Idle land
- [ ] Wetlands
- [ ] Recreational
- [ ] Residential
- [ ] Unreclaimed strip mine
- [ ] Woodland: Broadleaf
- [ ] Needletike

---

**PITS MUST BE FILLED WITHIN TWO MONTHS AFTER COMMENCEMENT OF THE WELL AND WITHIN FOURTEEN DAYS AFTER COMMENCEMENT OF THE WELL IN AN URBANIZED AREA.**

Required by Section 1589.06 (A)(10), Ohio Revised Code -- Failure to submit may result in an assessment of criminal fines not less than $100.00 nor more than $2,000.00 or civil penalties not less than $4,000.00. 

DNR-744-7002 (Revised 04/2012)
<table>
<thead>
<tr>
<th><strong>26. SURFACING MATERIAL FOR ACCESS ROAD:</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td>☐ Gravel</td>
</tr>
<tr>
<td>☐ Brick and/or tile waste</td>
</tr>
<tr>
<td>☐ Slag</td>
</tr>
<tr>
<td>☐ Crushed stone</td>
</tr>
<tr>
<td>☐ No surfacing material to be used</td>
</tr>
<tr>
<td>☐ Proposed alternative</td>
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</tbody>
</table>

<table>
<thead>
<tr>
<th><strong>27. PATH OF ACCESS ROAD TO BE DETERMINED BY:</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td>☐ Landowner</td>
</tr>
<tr>
<td>☐ Contractor</td>
</tr>
<tr>
<td>☐ Existing access road</td>
</tr>
<tr>
<td>☐ Operator</td>
</tr>
</tbody>
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<thead>
<tr>
<th><strong>28. GRADING AND EROSION CONTROL PRACTICE ON ROAD:</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td>☐ Diversions</td>
</tr>
<tr>
<td>☐ Drains</td>
</tr>
<tr>
<td>☐ Open top culverts</td>
</tr>
<tr>
<td>☐ Culverting of road</td>
</tr>
<tr>
<td>☐ Pipe culverts</td>
</tr>
<tr>
<td>☐ Proposed alternative</td>
</tr>
<tr>
<td>☐ Filter strips</td>
</tr>
<tr>
<td>☐ Riprap</td>
</tr>
<tr>
<td>☐ Water breaks</td>
</tr>
</tbody>
</table>

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<thead>
<tr>
<th><strong>29. STEEPEST SLOPE GRADIENT ON ACCESS ROAD:</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td>☐ 0 to 5%</td>
</tr>
<tr>
<td>☐ 6 to 10%</td>
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<tr>
<td>☐ greater than 10%</td>
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</tbody>
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<thead>
<tr>
<th><strong>30. APPROXIMATE LENGTH OF STEEPEST SLOPE ON ROAD:</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td>☐ 0 to 100 ft.</td>
</tr>
<tr>
<td>☐ 101 to 200 ft.</td>
</tr>
<tr>
<td>☐ 201 to 400 ft.</td>
</tr>
<tr>
<td>☐ greater than 400 ft.</td>
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</tbody>
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<tr>
<th><strong>31. HAS LANDOWNER RECEIVED A COPY OF THIS RESTORATION PLAN?</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td>☐ Yes</td>
</tr>
<tr>
<td>☐ No</td>
</tr>
</tbody>
</table>

The undersigned hereby agrees to implement all restoration operations identified on this form, and conform to all provisions of Section 1509.072 of the Ohio Revised Code, and to all Orders and rules issued by the Chief, Division of Oil and Gas Resources Management.

Signature of Owner/Authorized Agent

Name (Typed or Printed)    Jeff Harper    Date    7/15/2013

RESTORATION PLAN MUST BE SUBMITTED TO THE DIVISION IN DUPLICATE.