



west virginia department of environmental protection

Office of Oil and Gas
601 57th Street, S.E.
Charleston, WV 25304
Phone: (304) 926-0450; Fax: (304) 926-0452

Earl Ray Tomblin, Governor
Randy C. Huffman, Cabinet Secretary
www.dep.wv.gov

December 2, 2014

Danny E. Webb Construction, Inc.
Attn: Danny E. Webb
P.O. Box 267
Lochgelly, WV 25866

Re: Underground Injection Control (UIC)
Permit # UIC2D0190460 and UIC2D0190508

Dear Permittee:

Please find enclosed a **draft** permit for a Class II Underground Injection Control Permit. Be advised the thirty (30) day public notice period prescribed in Title 47, Series 13, Section 24.b.1 of the West Virginia Legislative Rules issued pursuant to the West Virginia Code Chapter 22, Article 11 has been published.

Please review the enclosed draft permit carefully and submit any comments promptly to this office.

The Public Information Office has placed an ad for public notice for you. Please contact the newspaper, *Fayette Tribune* at 304-469-3373 to obtain a certificate of the publication, and submit a copy by December 12, 2014. This should be sent to:

Office of Oil and Gas, DEP
601 57th Street, SE
Charleston, WV 25304
Attention: Thomas L. Bass, UIC Program

If there are no substantive comments to be addressed from the public notice, a permit will be issued soon after the thirty (30) day comment period. If you have any questions concerning this matter, you may contact me at 304.926.0499 ext. 1274 or by email at Thomas.l.bass@wv.gov.

Thomas L. Bass
Environmental Resource Program Manager

Enclosures as stated

Promoting a healthy environment.

UNDERGROUND INJECTION CONTROL PERMIT

For

Danny Webb Construction, Inc.

Number UIC2D0190460

DRAFT

**UNDERGROUND INJECTION CONTROL
AUTHORIZATION TO OPERATE A UIC INJECTION WELL
PERMIT NUMBER # UIC 2D0190460**

In compliance with provisions of the West Virginia Code, Chapter 22, Article 6, Article 11 and Article 12, as well as Legislative Rules, Title 47, Series 13 and Series 58, Title 47, Series 55, and Title 35 Series 1 and Series 4.

PERMITTEE

NAME	Danny Webb Construction Inc.	FACILITY TYPE	<u>Commercial</u>
ADDRESS	P.O. Box 267	WELL API #	<u>47-019-00460</u>
ADDRESS	Lochgelly, WV 25866	FIELD NAME	NA

is authorized by this permit to inject Class II fluids that are brought to the surface in connection with conventional oil or natural gas production and may be commingled with waste waters from gas plants which are an integral part of production operations, unless those waters are classified as a hazardous waste at the time of injection into the Weir Sandstone formation in accordance with the conditions set forth herein. The permitted injection depth shall be 2624 feet to 2698 feet. The injection well is located in Fayette County, 7.5' Beckwith Quadrangle. The coordinates for this injection well are:

UTM NAD 83 Northing 4207482 and UTM NAD 83 Easting 486627.

The maximum permitted wellhead injection pressure is established as 796 psi.

All references to West Virginia Regulations are to those that are in effect on the date that this permit becomes effective.

Any person who holds a permit shall pay an annual permit fee in accordance with the provisions of Title 47 Series 9 section 7 of the Legislative rule. The first annual permit fee shall be remitted to the Office of Oil and Gas one (1) calendar year from the date of permit issuance; subsequent annual permit fees shall be remitted on or before the anniversary date of the permit issuance. The annual permit fee for a Class II disposal well is twenty five dollars (\$25). The permit becomes void if the annual permit fee has not been paid within one hundred and eighty (180) days of the due date. The chief shall not reissue a permit until all annual permit fees due during prior terms of that permit have been paid in full.

Failure to pay the annual groundwater fee of \$75.00 for Class IID as required by the West Virginia Code, Chapter 22, Article 11, or 12, shall be cause for revocation of this permit. The annual permit fee is due on the anniversary date of permit issuance and shall be paid on the anniversary date of issuance of this permit.

Non-compliance with the terms of this permit shall be cause for revocation of Certification under the terms of Chapter 22, Article 12, and revocation of the permit under Chapter 22, Article 11 of the West Virginia Code.

This permit and its authorization to inject shall remain in effect for five (5) years from the date of issuance of the final permit provided all terms of the permit are met.

James Martin, Chief
Office of Oil and Gas

PART I

A. REAPPLICATION

If the permittee wishes to continue an activity regulated by this permit after the expiration date of this permit, the permittee must submit an administratively complete application for a new permit at least 180 days before this permit expires.

B. IMMEDIATE REPORTING

The permittee shall report any noncompliance which may endanger health or the environment immediately after becoming aware of the circumstances by using the WVDEP Emergency Spill Number, 1-800-642-3074. Written submission shall also be provided within five (5) days of the time the permittee becomes aware of the circumstances. The written submission shall contain a description of the noncompliance and its cause; the period of noncompliance, including exact dates and times, and if the noncompliance has not been corrected, permittee shall provide the anticipated time it is expected to continue; and the steps taken or planned to be taken to reduce, eliminate, and prevent reoccurrence of the noncompliance.

C. RIGHT OF APPEAL

Notice is hereby given of your right to appeal the terms and conditions of this permit by which you are aggrieved to the State Environmental Quality Board by filing a NOTICE OF APPEAL on the form prescribed by such Board for this purpose, with the Board, in accordance with the provisions of Chapter 22 Article 11, Section 21 of the code of West Virginia within thirty (30) days after the date of receipt of the above permit.

D. EFFECT OF PERMIT

The permittee is allowed to engage in underground injection in accordance with the conditions of this permit based on an approved permit application. The underground injection activity authorized by this permit shall not allow or cause the movement of any fluid into any subsurface area other than that which is specified, described, and shown on maps included in the application and may not cause a violation of any primary drinking water regulation or any health-based limit promulgated under 40 CFR Chapter 1, Part 141, amended June 1991, of the Code of Federal Regulations, or of any water quality standard promulgated by the State Environmental Quality Board. Any underground injection activity not authorized in this permit is prohibited. Compliance with the terms of this permit does not constitute a defense to any action brought under Part C and the imminent and substantial endangerment provisions in Part D of the Safe Drinking Water Act (SDWA) or any other common or statutory law for any breach of any other applicable legal duty.

E. PERMIT ACTIONS

1. This permit can be modified, revoked and reissued or terminated for cause specified in Chapter 22, Article 11 (hereafter §22-11), and Chapter 22 Article 12 (hereafter §22-12) of the West Virginia Code, and Title 47, Series 13 (hereafter §47-13) of the Legislative Rules. The filing of a request by the permittee for a permit modification, revocation and reissuance, suspension or revocation, or notification of planned changes or anticipated noncompliance, does not stay any permit condition.

2. Transfer of Permits.

This permit is not transferable to any person unless notice is first provided to the Office of Oil and Gas and the permittee complies with requirements of 47 CSR 13-13.17. The Office of Oil and Gas may require modification or revocation and reissuance of the permit to change the name of the permittee and incorporate such other requirements as may be necessary under the Safe Drinking Water Act (SDWA).

F. SEVERABILITY

The provisions of this permit are severable, and if any condition of this permit or the permittee's application or any provision of this permit to any person or circumstance is held invalid, such invalidity shall not affect other provisions or applications of other provisions of the permit and the remainder of this permit shall not be affected.

G. DURATION OF PERMIT

This permit and the authorization to inject are issued for a period of five (5) years unless terminated under Part I Section H paragraph 11 of this permit. However, when through no fault of the permittee the West Virginia Department of Environmental Protection does not issue a new permit with an effective date on or before the expiration date of the previous permit and the permittee has submitted a timely administratively complete application as required in Part I section A of this permit, which is a complete application for a new permit, the expired permit shall continue to remain fully effective and enforceable.

H. GENERAL REQUIREMENTS

1. **Duty to Comply.** The permittee must comply with all conditions of this permit. Any permit noncompliance may constitute a violation and be grounds for enforcement action, permit suspension, revocation, reissuance, modification, denial of a permit renewal application. (47 CSR 13-13.12.a) Copies of UIC Program regulations (§22-11) may be obtained from the West Virginia Legislature's Web Site <http://www.legis.state.wv.us/WVCODE/Code.cfm>, and (47 CSR 13) may be obtained from the West Virginia Secretary of State's Web Site at <http://www.sos.wv.gov/>.
2. **Duty to Reapply.** If the permittee wishes to continue activity regulated by this permit after the expiration date of this permit, the permittee must apply for a new permit as required in Part I section A of this permit as well as obtain a new permit.
3. **Duty to Halt or Reduce Activity Not a Defense.** It shall not be a defense for a permittee in an enforcement action that it would have been necessary to halt or reduce the permitted activity in order to maintain compliance with the conditions of this permit.
4. **Duty to Mitigate.** The permittee shall take all reasonable steps to minimize or correct any adverse impact on health of persons or the environment resulting from noncompliance with this permit.
5. **Proper Operation and Maintenance.** The permittee shall at all times properly operate and maintain all facilities, systems of treatment and control, and related equipment which are installed or used by the permittee to achieve compliance with the conditions of this permit. Proper operation and maintenance includes effective performance, adequate funding, adequate operator staffing and training, adequate security at the facility to prevent unauthorized access, adequate laboratory and process controls, including appropriate quality assurance procedures. This provision requires the operation of back-up or auxiliary facility or similar systems only when necessary to achieve compliance with the conditions of this permit.

6. **Duty to Provide Information.** The permittee shall furnish to the Director within a reasonable time, any information which the Director may request to determine whether cause exists for modifying, revoking and reissuing, or revoking this permit, or to determine compliance with this permit. The permittee shall also furnish to the Director, upon request, copies of records required to be kept by this permit. If the permittee becomes aware of any incomplete or incorrect information in the permit application or subsequent report(s), the permittee shall promptly submit information addressing these deficiencies to the Director.
7. **Inspection and Entry.** The permittee shall allow the Director, or an authorized representative, upon the presentation of credentials and other documents as may be required by law to:
 - a. Enter upon the permittee's premises where a regulated facility or activity is located or conducted, or where records must be kept under the conditions of this permit;
 - b. Have access to and copy, at reasonable times, any records that must be kept under the conditions of this permit;
 - c. Inspect at reasonable times any facilities, equipment (including monitoring and control equipment), practices, or operations regulated or required under this permit; and
 - d. Sample or monitor, at reasonable times, for the purposes of assuring permit compliance for any substances or parameters at any location.
8. **Penalties.** Any person who violates a permit requirement is subject to civil penalties, criminal penalties, fines and other enforcement actions under §22-11 and §22-12.
9. **Signatory Requirements.** Only a duly authorized person may sign documents and reports associated with this permit.
 - a. All reports required by this permit and other information requested by the Director shall be signed as follows:
 - (1) For a corporation, by a responsible corporate officer of at least the level of vice-president;
 - (2) For a partnership or sole proprietorship, by a general partner or the proprietor, respectively; or
 - (3) For a Municipality, State, Federal, or other public agency by either a principal executive or a ranking elected official.
 - b. A duly authorized representative of the official designated in paragraph a. above may also sign only if:
 - (1) The authorization is made in writing by a person described in paragraph a. above;
 - (2) The authorization specifies either an individual or a position having responsibility for the overall operation of the regulated facility or activity, and;
 - (3) The written authorization is submitted to, and approved by, the Director.

- c. If an authorization under paragraph (b) of this section is no longer accurate because a different individual or position has responsibility for the overall operation of the facility, a new authorization satisfying the requirements of paragraph (b) of this section must be submitted to the Director prior to or together with any reports, information or applications to be signed by an authorized representative.
 - d. Any person signing a document under paragraph (b) of this section shall make the following certification: (47 CSR 13-13.11.d) "I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person(s) who manage the system, or those persons directly responsible for gathering the information, the information submitted is to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations."
10. **Property Rights.** Issuance of this permit does not convey property rights or mineral rights of any sort or any exclusive privilege; nor does it authorize any injury to persons or property, any invasion of other private rights, any infringement of State or local law or regulations, or any exclusive privilege.
11. **Permit Actions.** This permit may be modified, revoked and reissued, suspended, or revoked for cause. The filing of a request by the permittee for a permit modification, revocation and reissuance, suspension or revocation, or notification of planned changes or anticipated noncompliance, does not stay any permit condition.
12. **Confidentiality of Information.**
 - a. In accordance with 47 CSR 13-13.21, any information submitted to the State pursuant to this rule may be claimed as confidential by the submitter. Any such claim must be asserted at the time of submission in the manner prescribed on the application form or instructions or, in the case of other submissions, by stamping the words "CONFIDENTIAL BUSINESS INFORMATION" on each page containing such information. If no claim is made at the time of submission, the State may make the information available to the public without further notice.
 - b. Claims of confidentiality for the following information will be denied:
 - i. The name and address of any permit applicant or permittee.
 - ii. Information which deals with the existence, absence, or level of contaminants in drinking water.
13. **Monitoring Reports.** Monitoring results shall be reported at the intervals specified elsewhere in this permit.
14. **Compliance schedules.** Reports of compliance or noncompliance with, or any progress reports on, interim and final requirements contained in any compliance schedule of this permit shall be submitted no later than thirty (30) days following each schedule date.
15. **Other information.** Where a permittee becomes aware that he/she failed to submit any relevant facts in a permit application, or submitted incorrect information in a permit application or in any report to the Director, he/she shall promptly submit such facts or information.

16. State or Federal Laws. Nothing in this permit shall be construed to preclude the institution on any legal action or relieve the permittee from any responsibilities, liabilities, or penalties established pursuant to any State or Federal law or regulation.

PART II

A. RECORD RETENTION

1. Required Records. The permittee shall retain records of all monitoring information, including all calibration and maintenance records and all original strip chart recordings for continuous monitoring instrumentation, copies of all reports required by this permit, and records of all data used to complete the application for this permit, for a period of at least three (3) years from the date of the sample, measurement, report or application. This period may be extended by request of the Director at any time.
2. Disposal of Records. The permittee shall retain records in accordance with 47 CSR 13.12.j.2.

B. MONITORING REQUIREMENTS

1. Samples and measurements taken for the purpose of monitoring shall be representative of the monitored activity. The method used to obtain a representative sample of the fluid to be analyzed and the procedure for analysis of the sample shall be in accordance with test procedures approved under 40 CFR 136.3 unless otherwise approved by the Chief. The permittee shall identify the types of tests and methods used to generate the monitoring data.
2. All environmental measurements required by the permit, including, but not limited to, measurements of pressure, temperature, mechanical integrity, and chemical analyses shall be done in accordance with state guidance on quality assurance. All analysis must be performed by a West Virginia certified laboratory.
3. Records of monitoring information shall include:
 - a. The date, exact place, and time of sampling or measurements;
 - b. The individual(s) who performed the sampling or measurements;
 - c. The date(s) analysis(es) were performed;
 - d. Individual(s) who performed the analyses;
 - e. The analytical techniques or methods used; and
 - f. The results of such analyses. (47 CSR 13-13.12.j.3)
4. The permittee shall monitor all the casing annuli with pressure sensitive devices or with such a method as approved or required by the Office of Oil and Gas to allow early detection of any leaks from the injection zone or casing. The Permittee shall also daily monitor injection pressure, volumes, and rates. This information shall be reported monthly using the Office of Oil and Gas electronic WR-40 Form. Submittal shall be through the current WVDEP Electronic Submittal System (ESS).
5. Within thirty (30) days of permit issuance date, the permittee shall designate stream monitoring points adjacent to the injection well facility. These monitoring points, one upstream and one downstream of the injection wells' location shall be sampled for the parameters listed in Table 1 on a nine (9) month schedule and reported to the WVDEP Office of Oil and Gas.

6. The permittee shall sample, analyze and record the nature of all the injected fluid for the parameters listed in TABLE 1 below at the initiation of the injection operation and upon request by the Chief or whenever the operator observes or anticipates a change in the injection fluid.

TABLE 1

-pH	-Manganese
-Specific Gravity	-Total Dissolved Solids
-Barium	-Hydrogen Sulfide
-Specific Conductance	-Sodium
-Iron	-Alkalinity
-Magnesium	-Hardness
-Chloride	-Total Organic Carbon (TOC)
-Dissolved Oxygen	

7. Any analysis of specific gravity greater than 1.2 and any analysis of TOC greater than 250.0 mg/L shall be reported to the Chief within twenty-four (24) hours of the results.
8. The permittee shall maintain a record (manifest) of every load of fluid received. The record shall include the hauler's name and signature, the operator's name and signature, API number for the well the fluid was collected or the location from where the load was obtained, the volume of the load and whether the load of fluid delivered was a split load. If the load was a split load, each operator's name and location shall be listed and, if possible, the volumes of fluid received from each operator documented. This information shall be maintained on the Class II disposal manifest attached to this permit and maintained at the facility.
9. A wellhead pressure gauge shall be installed and maintained on the injection tubing to facilitate inspection and ensure compliance of maximum injection pressures as approved on Oil and Gas Form WR-37. A daily reading of the injection pressure shall be taken and reported on Form WR-40.
10. All pipeline(s) associated with the approved injection activity shall be tested for integrity at least once every five (5) years and the results reported on Form WR-37 to the Office of Oil and Gas.
11. The permittee shall conduct a mechanical integrity test at a minimum frequency of once every five (5) years per 35CSR4-7.7.b. The permittee shall notify the Director of his or her intent to conduct a mechanical integrity test at within twenty-four (24) hours prior to such demonstration. The permittee must submit a WR-37 Form with each mechanical integrity test along with a copy of any test chart(s). Upon failure of a mechanical integrity test or expiration of the five-year mechanical integrity test regulatory period, the permittee shall cease operation/injection and shut-in the well immediately until successfully repaired, tested or permanently plugged and abandoned per regulation. Corrective action for repairs shall be completed and approved by the Office of Oil and Gas and be conducted within ninety (90) days of the failure date. If repaired, the well must be re-tested and an updated WR-37 Form must be submitted to the Office of Oil and Gas for approval.
12. In addition to the above requirement, a mechanical integrity test demonstration shall be conducted whenever protective casing or tubing is removed from the well, the packer is replaced or resealed, or a well failure is evident. The permittee may continue operation only if he or she has successfully demonstrated to the Director the mechanical integrity of the permitted well. The permittee shall cease injection operations if a loss of mechanical integrity becomes evident or if mechanical integrity cannot be demonstrated.
13. Failure to meet the specified terms of this permit, are grounds for revocation of this permit by the Office of Oil and Gas.

C. **REPORTING AND NOTIFICATION REQUIREMENTS**

1. **Anticipated Noncompliance.** The permittee shall give advance notice to the Director of any planned changes in the permitted facility or activity which may result in noncompliance with permit requirements.
2. **Other Noncompliance.** The permittee shall report all instances of noncompliance not reported under paragraphs Part I Section B, and Part II Section C Paragraph 3 of this permit, at the time monitoring reports are submitted. The report shall contain the information listed in Part I Section B of this permit. The permittee shall report all other instances of noncompliance in writing within ten (10) days of the time the permittee becomes aware of the circumstances. The reports shall contain the information listed in this permit.
3. **Planned Changes.** The permittee shall give notice to the Chief as soon as possible of any planned significant physical alterations, additions to the permitted facility, and/or any significant changes planned in the operation of the facility.
4. **Cessation of Injection Activity.** Any well which is not in use for a period of twelve (12) consecutive months shall be presumed to have been abandoned and shall promptly be plugged by the operator in accordance with the provisions in Chapter 22, Article 6 Section 24 of the West Virginia Code unless the operator furnishes satisfactory proof to the director that there is a bona fide future use for such well.
5. **Report on Permit Review.** Within thirty (30) days of receipt of this permit, the permittee shall report to the Chief that he or she has read and understands and accepts all terms and conditions of the permit.
6. **Twenty-four (24) Hour Reporting.**
 - a. The permittee shall report to the Chief any noncompliance which may endanger human health or the environment. Such report shall be provided orally (phone number 1-304-926-0450 or 1-800-642-3074) within twenty-four (24) hours from the time the permittee becomes aware of the circumstance. The following shall be included as information which must be reported orally within 24 hours:
 - i. Any monitoring or other information which indicates that any contaminant may cause an endangerment to an underground source of drinking water (USDWs).
 - ii. Any non-compliance with a permit condition or malfunction of the injection system which may cause fluid migration into or between the USDWs, or failure of mechanical integrity test demonstrations.
 - b. A written submission shall also be provided within five (5) days of the time the permittee becomes aware of the circumstances. Written submission shall contain a description of the noncompliance and its cause; the period of noncompliance, including exact dates and times, and if the noncompliance has not been corrected, the anticipated time it is expected to continue; steps taken or planned to reduce, eliminate, and prevent reoccurrence of the noncompliance.

PART III

A. OPERATING REQUIREMENTS

1. **Injection Fluid.** The permittee shall not inject any hazardous substances, as defined by 40 CFR 261, or any other fluid, other than the fluids produced solely in association with oil and gas production operations.
2. Any production well within the permitted Area of Review of this disposal well which does not have cemented production casing shall be plugged immediately upon becoming inactive. Any temporary inactive well shall be monitored at a frequency and by a method prescribed by the Office of Oil and Gas upon notice by the permittee of such activity. Any well shut-in more than one (1) year shall be considered Abandoned.
3. Injection between the outermost casing protecting underground sources of drinking water and the well bore is prohibited, as is injection into any USDW.
4. **Corrective Action.** The applicant must satisfy the requirement of the Office of Oil and Gas regarding any corrective action needed on all known wells penetrating the injection zone within the area of review. This must be done in a manner which satisfies the requirements of 47CSR 13-13.9.
5. Any production well within the area of review which does not have cemented production casing shall be plugged immediately upon becoming inactive. Any temporary inactive well shall be monitored at a frequency and by a method prescribed by the Office of Oil and Gas upon notice by the permittee of such activity. Any well shut-in more than one (1) week shall be considered inactive.
6. Permittee shall designate by letter to the Office of Oil and Gas, any third party hauler proposed to be used for the transportation of fluids to the facility. The third party hauler may not commence transportation of fluids to the facility until approved by the Office of Oil and Gas.
7. **Facility Security.** The gate on the access road to the site shall be closed and locked at all times when there is not a company representative at the facility. Security cameras shall be installed in key areas and inspected to be in working condition on a regular basis. All structure door, valves, storage areas shall be secured and locked anytime a company representative is not at the facility. The facility shall be fenced within thirty (30) days of the effective date of this permit. During the life of this permit all gates and access points shall be secured and locked while no representative is at the facility. All visitors and trucks must check in at the main office upon arriving at the facility, trucks shall not be allowed to off load without the proper paperwork and documentation.

B. PLUGGING AND ABANDONMENT

1. Any well which is not in use for a period of twelve consecutive months shall be presumed to have been abandoned and shall promptly be plugged by the operator in accordance with the provisions of Chapter 22, Article 6, of the West Virginia Code unless the operator furnishes satisfactory proof to the director that there is a bona fide future use for such well.
2. Prior to well plugging the permittee shall apply for and receive a plugging permit from the Office of Oil and Gas to plug and abandon the well in accordance with an approved plugging and abandonment plan.
3. Plugging and abandonment shall be conducted in a manner to prevent movement of fluids into or between underground sources of drinking water.

PART IV

A. SITE SPECIFIC CONDITIONS

1. **Appendix A: Specific operational conditions.**
2. **Appendix H: Groundwater Protection Plan (GPP) The GPP shall be maintained and updated as necessary to protect groundwater quality.**

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APPENDIX A Injection Well Form

1) GEOLOGIC TARGET FORMATION <u>Weir Sandstone</u>	
Depth <u>2624</u>	Feet (top) <u>2698</u>
Feet (bottom) <u>3248</u>	
2) Estimated Depth of Completed Well, (or actual depth of existing well): <u>3248</u> Feet	
3) Approximate water strata depths:	Fresh <u>180</u> Feet Salt <u>1022</u> Feet
4) Approximate coal seam depths:	<u>700'</u>
5) Is coal being mined in the area?	Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>
6) Virgin reservoir pressure in target formation <u>725</u> psig	Source <u>State Completion Repots</u>
7) Estimated reservoir fracture pressure <u>2586</u>	psig (BHFP)
8) MAXIMUM PROPOSED INJECTION OPERATIONS:	
Injection rate (bbl/hour)	<u>120</u>
Injection volume (bbl/day)	<u>2880</u>
Injection pressure (psig)	<u>790</u>
Bottom hole pressure (psig)	<u>2109</u>
9) DETAILED IDENTIFICATION OF MATERIALS TO BE INJECTED, INCLUDING ADDITIVES:	
Oil and Gas waste fluids (produced fluids and flowback) corrosion inhibitor, bacteria control, HCl sticks	
Temperature of injected fluid: (°F)	<u>Ambient temperature</u>
10) FILTERS (IF ANY)	
Fluids shall be filtered through first a hydraulic centrifuge removing heavy particulate matter, then a 50 micron bag type followed by a 20 micron cartridge filter and finally a 5 micron cartridge housing	
11) SPECIFICATIONS FOR CATHODIC PROTECTION AND OTHER CORROSION CONTROL	
Anode bags shall be installed on all subsurface lines with corrosion inhibitor administered at a rate of .25 gallon per thousand or equivalent.	

APPENDIX A (cont.)

12. Casing and Tubing Program

TYPE	Size	New or Used	Grade	Weight per ft. (lb/ft)	FOOTAGE: For Drilling	INTERVALS: Left in Well	CEMENT: Fill-up (Cu. Ft.)
Conductor	13 3/8		H-40	52	145	145	
Fresh Water	9 5/8		K-55	36	648	648	
Coal							
Intermediate 1	7		K-55	23	1853	1853	
Intermediate 2							
Production	4 1/2		K-55	11.6	3248	3248	
Tubing	2 3/8		K-55	4.7	2652	2592	
Liners							

TYPE	Wellbore Diameter	Casing Size	Wall Thickness	Burst Pressure	Cement Type	Cement Yield (cu. ft./sk)	Cement to Surface ? (Y or N)
Conductor		13 3/8	.330	1730			Y
Fresh Water		9 5/8	.352	3520			Y
Coal							
Intermediate 1		7	.317	4360			Y
Intermediate 2							
Production		4 1/2	.250	5350			N
Tubing	4	2 3/8	.190	7700			N/A
Liners							

PACKERS	Packer #1	Packer #2	Packer #3	Packer #4
Kind:	Compression			
Sizes:	2 3/8" x 4"			
Depths Set:	2575			

APPENDIX H

GROUNDWATER PROTECTION PLAN

Facility Name: North Hills Plant

County: Fayette

Facility Location:

Postal Service Address:	P.O. Box 267 Lochgelly WV, 25866
Latitude and Longitude:	38.014943 / -81.152326

Contact Information:

Person:	Todd A. Huey
Phone Number:	(724) 840-7695
E-mail Address:	toddhuey76@gmail.com

Date: 05-28-2014

1. A list of all operations that may contaminate the groundwater.

Heavy truck traffic, off loading of trucks into tank battery, fluid containment and transport lines, pumps and filtering equipment and chemical storage areas. (spills, leaks, erosion)

2. A description of procedures and facilities used to protect groundwater quality from the list of potential contaminant sources above.

Access roads must be kept in good condition in order to minimize potential erosion, trucks shall off load in a contained area utilizing the "buddy system" to ensure that proper techniques and safety measure are employed. All lines, primary, secondary containments, sumps, equipment and storage capacities shall be checked/reported daily and monitored throughout the work shift. Spill kits shall be kept on the site, inventoried and readily available to all employees in the event of a spill or release.

3. List procedures to be used when designing and adding new equipment or operations.

All equipment or facility upgrades or changes shall be done so to provide adequate protection and prevention of any incidental discharges or releases. Before any changes, replacements and or repairs are preformed a "JSA" shall be completed along with a potential incident evaluation in order to address any any safety issues or potential environmental impacts.

4. Summarize all activities at your facility that are already regulated for groundwater protection.

Trucks off load in a contained area to minimize the chance of a potential spills / releases, primary and secondary containments are in place around areas of fluid storage and equipment.

5. Discuss any existing groundwater quality data for your facility or an adjacent property.

The current ground water data from the AOR is for surface water in the area, below average ph, no traces of BTEX, MBAS or oil & grease Dissolved solids appear to be on the higher side along with the iron.

6. Provide a statement that no waste material will be used for deicing or fill material on the property unless allowed by another rule.

Under no circumstance shall any fluids or waste materials be used in or around the facility for anything operation. Waste materials shall be disposed of in accordance with all regulatory guidelines.

7. Describe the groundwater protection instruction and training to be provided to the employees. Job procedures shall provide direction on how to prevent groundwater contamination.

Safety and job training shall be given to all employees on a quarterly basis or to new hires at the start of the job covering the following. Areas of awareness, inspection procedures, startup shutdown procedures, repair replacement procedures, material and waste handling, PPE, MSDS location and understanding, Spill Prevention, Preparedness and Contingency Plans, Emergency Response Plans, JSA's to be completed before the start of a task that could result in an incident.

8. Include provisions for inspections of all GPP elements and equipment. Inspections must be made quarterly at a minimum.

Inspections of all GPP elements shall be completed on a daily basis and monitored throughout the work shift.

Signature: *Alamy Well*

Date: *June 5-14*

RIGHT OF APPEAL

Notice is hereby given of your right to appeal the terms and conditions of this permit of which you are aggrieved to the Environmental Quality Board by filing a NOTICE OF APPEAL, on the form prescribed by such Board for this purpose, in accordance with the provisions of Section 21, Article 11, Chapter 22 of the Code of West Virginia within thirty (30) days after the date of receipt of this permit.

Underground Injection Control Permit

CERTIFICATION DOCUMENT

West Virginia Department of Environmental Protection
Office of Oil and Gas

Permit Id: 2D0190460

Permit Name: Danny Webb Construction, Inc.

In accordance with Part II, Reporting and Notification Requirements, I hereby certify that I have read and am personally familiar with all the terms and conditions of this permit.

I understand that the underground injection of any waste streams other than those provided for in this permit is strictly prohibited. I understand that failure to pay the Annual Permit Fee or any other associated fees required by West Virginia Code, Chapter 22, Articles 11 and 12 shall be cause for revocation of this Permit. I further understand that reporting is required, and noncompliance with the terms of this permit will be cause for revocation of the permit and subject me to significant penalties including the possibility of fines and imprisonment.

Signature

Name and Title (Type or Print)

Date