



west virginia department of environmental protection

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

Austin Caperton, Cabinet Secretary
www.dep.wv.gov

Friday, November 30, 2018
WELL WORK PERMIT
Horizontal 6A / New Drill

CHEVRON APPALACHIA, LLC
700 CHERRINGTON PARKWAY

CORAOPOLIS, PA 15108

Re: Permit approval for HAZLETT M05H
47-051-02096-00-00

This well work permit is evidence of permission granted to perform the specified well work at the location described on the attached pages and located on the attached plat, subject to the provisions of Chapter 22 of the West Virginia Code of 1931, as amended, and all rules and regulations promulgated thereunder, and to any additional specific conditions and provisions outlined in the pages attached hereto. Notification shall be given by the operator to the Oil and Gas Inspector at least 24 hours prior to the construction of roads, locations, and/or pits for any permitted work. In addition, the well operator shall notify the same inspector 24 hours before any actual well work is commenced and prior to running and cementing casing. Spills or emergency discharges must be promptly reported by the operator to 1-800-642-3074 and to the Oil and Gas Inspector.

Please be advised that form WR-35, Well Operators Report of Well Work is to be submitted to this office within 90 days of completion of permitted well work, as should form WR-34 Discharge Monitoring Report within 30 days of discharge of pits, if applicable. Failure to abide by all statutory and regulatory provisions governing all duties and operations hereunder may result in suspension or revocation of this permit and, in addition, may result in civil and/or criminal penalties being imposed upon the operators.

Per 35 CSR 4-5.2.g this permit will expire in two (2) years from the issue date unless permitted well work is commenced. If there are any questions, please feel free to contact me at (304) 926- 0450.

James A. Martin
Chief

Operator's Well Number: HAZLETT M05H
Farm Name: IRENE HAZLETT - LIFE
U.S. WELL NUMBER: 47-051-02096-00-00
Horizontal 6A New Drill
Date Issued: 11/30/2018

PERMIT CONDITIONS 4705102096

West Virginia Code § 22-6A-8(d) allows the Office of Oil and Gas to place specific conditions upon this permit. Permit conditions have the same effect as law. Failure to adhere to the specified permit conditions may result in enforcement action.

CONDITIONS

1. This proposed activity may require permit coverage from the United States Army Corps of Engineers (USACE). Through this permit, you are hereby being advised to consult with USACE regarding this proposed activity.
2. If the operator encounters an unanticipated void, or an anticipated void at an unanticipated depth, the operator shall notify the inspector within 24 hours. Modifications to the casing program may be necessary to comply with W. Va. Code § 22-6A-5a (12), which requires drilling to a minimum depth of thirty feet below the bottom of the void, and installing a minimum of twenty (20) feet of casing. Under no circumstance should the operator drill more than one hundred (100) feet below the bottom of the void or install less than twenty (20) feet of casing below the bottom of the void.
3. When compacting fills, each lift before compaction shall not be more than 12 inches in height, and the moisture content of the fill material shall be within limits as determined by the Standard Proctor Density test of the actual soils used in specific engineered fill, ASTM D698, Standard Test Method for Laboratory Compaction Characteristics of Soil Using Standard Effort, to achieve 95 % compaction of the optimum density. Each lift shall be tested for compaction, with a minimum of two tests per lift per acre of fill. All test results shall be maintained on site and available for review.
4. Operator shall install signage per § 22-6A-8g (6) (B) at all source water locations included in their approved water management plan within 24 hours of water management plan activation.
5. Oil and gas water supply wells will be registered with the Office of Oil and Gas and all such wells will be constructed and plugged in accordance with the standards of the Bureau for Public Health set forth in its Legislative rule entitled *Water Well Regulations*, 64 C.S.R. 19. Operator is to contact the Bureau of Public Health regarding permit requirements. In lieu of plugging, the operator may transfer the well to the surface owner upon agreement of the parties. All drinking water wells within fifteen hundred feet of the water supply well shall be flow tested by the operator upon request of the drinking well owner prior to operating the water supply well.
6. Pursuant to the requirements pertaining to the sampling of domestic water supply wells/springs the operator shall, no later than thirty (30) days after receipt of analytical data provide a written copy to the Chief and any of the users who may have requested such analyses.
7. 24 hours prior to the initiation of the completion process the operator shall notify the Chief or his designee.
8. During the completion process the operator shall monitor annular pressures and report any anomaly noticed to the chief or his designee immediately.
9. If any explosion or other accident causing loss of life or serious personal injury occurs in or about a well or well work on a well, the well operator or its contractor shall give notice, stating the particulars of the explosion or accident, to the oil and gas inspector and the Chief, within 24 hours of said accident.
10. During the casing and cementing process, in the event cement does not return to the surface, the oil and gas inspector shall be notified within 24 hours.

PERMIT CONDITIONS 4705102096

11. The operator shall provide to the Office of Oil and Gas the dates of each of the following within 30 days of their occurrence: completion of construction of the well pad, commencement of drilling, cessation of drilling, completion of any other permitted well work, and completion of the well. Such notice shall be provided by sending an email to DEPOOGNotify@wv.gov.



west virginia department of environmental protection

Office of Oil and Gas
601 57th Street
Charleston, WV 25304
(304) 926-0450 fax (304) 926-0452

Jim Justice, Governor
Austin Caperton, Cabinet Secretary
www.dep.wv.gov

**ORDER
ISSUED UNDER
WEST VIRGINIA CODE, CHAPTER 22, ARTICLE 6A**

TO: Chevron Appalachia, LLC
P.O. Box 611
Moon Township, PA 15108

DATE: November 27, 2018
ORDER NO.: 2018-W-12

INTRODUCTION

This Order (hereinafter "Order") is issued by the Office of Oil and Gas (hereinafter "OOG"), by and through its Chief, pursuant to the authority of W. Va. Code §§ 22-1-1, 22-6-1 and 22-6A-1 *et seq.*, to Chevron Appalachia, LLC (hereinafter "Operator"), collectively the "Parties."

FINDINGS OF THE CHIEF

In support of this Order, the Chief hereby finds the following:

1. OOG, an office within the West Virginia Department of Environmental Protection, is the agency with the duty and authority to execute and enforce W. Va. Code §22-6-1 and §22-6A-1 *et seq.*, and the rules and regulations promulgated thereunder.
2. Chevron Appalachia, LLC is a "person" as defined by W. Va. Code §22-6-1(n), with a corporate address as P.O. Box 611, Moon Township, Pennsylvania.
3. On August 3, 2018, Chevron Appalachia, LLC submitted well work permit applications identified as API#s 47-051-02092, 47-051-02093, 47-051-02094, 47-051-02095, 47-051-02096, 47-051-02097, 47-051-02099 and 47-051-02100. Then on August 7, 2018 Chevron Appalachia, LLC submitted well work permit applications identified as API#s 47-051-02107, 47-051-02108, 47-051-02109, 47-051-02110, 47-051-02111 and 47-051-02112. The proposed wells are to be located on the Hazlett Pad in Union District of Marshall County, West Virginia.
4. On August 3, 2018, Chevron Appalachia, LLC requested a waiver for Wetlands 1A, 3A, 3B and 4 outlined in Attachment 1, from well location restriction requirements in W. Va. Code §22-6A-12(b) for the well work permit applications identified as API#s 47-051-02092, 47-051-02093, 47-051-02094, 47-051-02095, 47-051-02096, 47-051-02097, 47-051-02099, 47-051-02100, 47-051-02107, 47-051-02108, 47-051-02109, 47-051-02110, 47-051-02111 and 47-051-02112. Wetlands 1A and 4 will be excluded from this waiver because they are more than 100' from the LOD of the pad.

CONCLUSIONS OF LAW

1. West Virginia Code §22-1-6(d) requires, in part, that “[i]n addition to other powers, duties and responsibilities granted and assigned to the secretary by this chapter, the secretary is authorized and empowered to... (3) Enter private lands to make surveys and inspections for environmental protection purposes; to investigate for violations of statutes or rules which the Office of Oil and Gas is charged with enforcing; to serve and execute warrants and processes; to make arrests; issue orders, which for the purposes of this chapter include consent agreements; and to otherwise enforce the statutes or rules which the Office of Oil and Gas is charged with enforcing.”
2. West Virginia Code §22-6A-2(a)(6) requires, in part, that “Concomitant with the broad powers to condition the issuance of well work permits, the secretary should also have broad authority to waive certain minimum requirements of this article when, in his or her discretion, such waiver is appropriate: *Provided*, That the secretary shall submit a written report of the number of waivers granted to the Legislature commencing January 1, 2013, and each year thereafter.”
3. West Virginia Code §22-6A-12(b) requires, in part, that “[n]o well pad may be prepared or well drilled within one hundred feet measured horizontally from any perennial stream, natural or artificial lake, pond or reservoir, or a wetland, or within three hundred feet of a naturally reproducing trout stream. No well pad may be located within one thousand feet of a surface or ground water intake of a public water supply. The distance from the public water supply as identified by the Office of Oil and Gas shall be measured as follows: (1) For a surface water intake on a lake or reservoir, the distance shall be measured from the boundary of the lake or reservoir. (2) For a surface water intake on a flowing stream, the distance shall be measured from a semicircular radius extending upstream of the surface water intake. (3) For a groundwater source, the distance shall be measured from the wellhead or spring. The Office of Oil and Gas may, in its discretion, waive these distance restrictions upon submission of a plan identifying sufficient measures, facilities or practices to be employed during well site construction, drilling and operations to protect the waters of the state. A waiver, if granted, shall impose any permit conditions as the secretary considers necessary.”

ORDER

West Virginia Code §22-6A-12(b) requires, in part, that “[n]o well pad may be prepared or well drilled within one hundred feet measured horizontally from any perennial stream, natural or artificial lake, pond or reservoir, or a wetland. The Office of Oil and Gas grants the request for a waiver for Wetlands 3A and 3B from well location restriction requirements in W. Va. Code §22-6A-12(b) for the well work permit applications identified as API#s 47-051-02092, 47-051-02093, 47-051-02094, 47-051-02095, 47-051-02096, 47-051-02097, 47-051-02099, 47-051-02100, 47-051-02107, 47-051-02108, 47-051-02109, 47-051-02110, 47-051-02111 and 47-051-02112. The Office of Oil and Gas hereby **ORDERS** that Chevron Appalachia, LLC shall meet the following site construction and operational requirements for the Hazlett Well Pad:

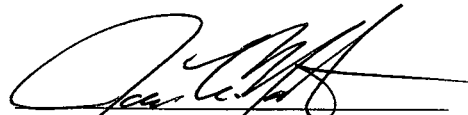
- a. A berm shall be constructed around the perimeter of the pad to contain any potential spills and storm water runoff. Berm is to be at least twenty-four inches (24”) in height;
- b. Erosion control blankets shall be installed on all slopes and down gradient locations of the pad as erosion and sediment controlling BMPs;
- c. Wetland 3A shall have both a compost filter sock trap and a layer of thirty two-inch (32”) compost filter sock to prevent any sediment from reaching the wetland from the well pad. This along with temporary and permanent vegetative cover will prevent sediment from reaching the wetland.
- d. Wetland 3B shall have two layers of eighteen-inch (18”) compost filter sock to prevent any sediment from reaching the wetland from the well pad. This along with temporary and permanent vegetative cover will prevent sediment from reaching the wetland.
- e. Disturbed areas not used for operations shall be seeded and mulched per the seeding tables in the WVDEP-OOG Erosion and Sediment Control Manual;
- f. Drill cuttings and associated drilling mud shall be disposed of in a permitted landfill;
- g. Waste generated by the flowback treatment systems shall be sent to offsite disposal at a permitted landfill;
- h. Weekly site inspections shall be conducted to monitor and maintain the integrity of the BMP storm water controls;
- i. Weekly storm water and spill prevention inspections shall be conducted focusing on storm water and spill prevention BMPs and maintenance of these BMPs;
- j. Inspections of the storm water and spill prevention measures shall be conducted after any major storm event defined as a half inch (½”) rain within any twenty-four (24) hour period;
- k. Pad inspections shall be conducted no less than once a week to identify and mitigate potential deficiencies;
- l. All records from inspections shall be maintained on site for the life of the project and be available upon request.

Thus ORDERED, the 27th day of November, 2018.

IN THE NAME OF THE STATE OF WEST VIRGINIA:

OFFICE OF OIL AND GAS
DEPARTMENT OF ENVIRONMENTAL PROTECTION
STATE OF WEST VIRGINIA

By:



JAMES A. MARTIN, CHIEF



May 3, 2018

West Virginia Department of Environmental Protection
Office of Oil and Gas
601 57th Street
Charleston, West Virginia 25304

Dear Reviewer:

Subject: Wetland Waiver Request
Chevron Appalachia, LLC
Hazlett Well Pad Project
Union District, Marshall County, West Virginia
CEC Project 164-755

1.0 INTRODUCTION

On behalf of Chevron Appalachia, LLC (Chevron), Civil & Environmental Consultants, Inc. (CEC) is submitting a Wetland Waiver Request pursuant to Chapter 22 Article 6A Section 12 of the West Virginia Code. Chevron is requesting a waiver to construct a natural gas well pad within 100 feet of three palustrine emergent wetlands and one palustrine scrub-shrub wetland for their proposed Hazlett Well Pad Project located in Union District, Marshall County, West Virginia.

Chevron is proposing to expand an existing natural gas well pad and widen the associated existing access road. The total limit of disturbance (LOD) for the project is approximately 18 acres. The waiver request form is included in Attachment A. The following figures are included in Attachment B: Site Location Map, Aquatics Impact Map, and Wetland Waiver Request Figure. The Erosion & Sediment Control (E&S) Plan is included in Attachment C. Existing wetlands and streams were delineated by qualified CEC biologists on May 23, 2017. The following section provides additional information as required by the waiver.

2.0 WETLAND WAIVER REQUEST

Question 1: Describe the proposed project location, including unique identifying names of all wetlands, and the names of perennial streams for which the waiver is sought.

The proposed Hazlett Well Pad Project is located off Grandview Road/WV-86 in Union District, Marshall County, West Virginia, east of the city of Glen Dale, as shown on the Site Location Map. The project's proposed LOD is located within 100 feet of three palustrine emergent wetlands and one palustrine scrub-shrub wetland, as shown on the Aquatic Impacts Map. The approximate distance of each wetland to the nearest boundary of the LOD is as follows:

- Wetland 1A – 0 linear feet; ✓
- Wetland 3A – 0 linear feet;
- Wetland 3B – 53 linear feet; and
- Wetland 4 – 1 linear foot. ✓

No perennial streams are located within 100 feet of the project LOD. A waiver is not being requested for the Wetlands 1B and 2 which are located entirely within the LOD. Chevron is requesting authorization from the U.S. Army Corps of Engineers (USACE) for impacts to these wetlands, impacts to the portions of Wetlands 1A and 3A within the LOD, and for impacts to three ephemeral unnamed tributaries to Little Grave Creek. A copy of the Application for Department of the Army Permit is included in Attachment D.

Question 2: Justify the proposed activity by describing alternatives to this project that were considered.

- a. Include a No-Action Alternative as to show “the future without the project”.*

The No-Action alternative represents “no alteration” of the existing environment, meaning the well pad and access road would not be expanded and no immediate environmental impacts would occur. Natural gas extraction would not occur at this site, and Chevron would be required to find an alternative site. This option is highly undesirable and would not fulfill the project’s purpose and need.

- b. Location alternatives must be shown.*

Due to the size of the proposed well pad, the steep topography of the surrounding area, and the location of the subsurface coal boundary, the current location of the proposed Hazlett Well Pad is the primary location desired by Chevron. Further, this project expands an existing well pad and access road. Siting the proposed well pad at an alternative location will likely result in additional earth and vegetation disturbance. Minor adjustments to the dimensions of the proposed well pad were made during the conceptual planning phase of the project; however, the current location of the well pad has remained unchanged due to the limitations listed above. The size of the well pad is optimized for the extraction and production equipment that will be set on the well pad. As such, minimizing the dimensions of the well pad beyond the dimensions provided is not feasible. The location of the well pad and LOD are shown on Figure 3 – Wetland Waiver Request Figure provided in Attachment B.

c. Must demonstrate why a one hundred foot buffer cannot be maintained.

Maintaining a 100-foot buffer from all on-site wetlands is not feasible due to topographic constraints and locations of the existing features. Two of the wetlands are located on the southwest side of the access road and two of the wetlands are located on the eastern side of the well pad. If the access road was shifted northeast, it would result in significantly more earth disturbance due to the steep topography. Similarly, if the well pad was shifted west to avoid the two wetlands, additional permanent stream impacts would occur on the western side of the pad.

The other alternative to meet the setback requirements would be a reduction in the project's footprint; however, the proposed design represents the minimum footprint required to meet the project's purpose and need. A reduction in the well pad's limits would mean the project could not be developed.

d. Describe how the proposed project is the least environmentally damaging practicable alternative.

The proposed Hazlett Well Site design represents the alternative which reduces permanent impacts to the greatest degree practicable. Shifting the proposed well pad east or west would create higher fill slopes and result in more disturbance to existing streams and wetlands.

Question 3: Identify sufficient measures, facilities or practices to be employed during well site construction, drilling and operations to protect waters of the state. This description should include all additional erosion and sediment control measures and devices that will be used.

As part of the well pad permitting process, an E&S Plan has been prepared for the Hazlett Well Pad project which stipulates implementations to reduce soil erosion, compaction, and sedimentation of receiving streams and wetlands. The following measures will be implemented as part of the E&S Plan to protect the existing wetlands and streams:

- Compost filter sock traps will be positioned downslope of larger drainage areas and upslope of the existing wetlands and/or ephemeral streams;
- Compost filter socks will be positioned downslope of smaller drainage areas and upslope of the existing wetlands and/or ephemeral streams;
- Orange construction fence will be erected along the edge of the LOD to clearly mark and help protect the wetlands from being impacted during construction operations;

- Erosion control blanket will be placed on slopes greater than 3 Horizontal to 1 Vertical (3H:1V) to limit erosion and promote vegetative growth;
- Riprap aprons will be constructed at the outfalls of pipes to dissipate runoff;
- Disturbed areas within the LOD shall be stabilized within 21 days of construction activity temporarily or permanently ceasing; and
- One ephemeral stream (UNT 3 to Little Grave Creek) located within the LOD will be realigned and restored to approximate original dimensions downgradient of the proposed fill slope toe-key outlet drain and lined with riprap.

Question 4: Provide mapping, plans, specifications and design analysis for the preferred alternative to the project.

- a. Specify in writing what additional controls, measures, devices, monitoring, etc. will be used to protect wetlands and/or perennial streams for which the waiver is sought.*

Refer to the E&S Plan and details in Attachment C for locations of erosion control measures, specifications on installation and maintenance requirements, and the construction sequence.

3.0 CLOSING

We appreciate your review of this Wetland Waiver Request. Please contact Mallory Owens at 724-327-5200 or mowens@cecinc.com if you have any questions or require additional information.

Respectfully submitted,

CIVIL & ENVIRONMENTAL CONSULTANTS, INC



Sarah V. Parker
Assistant Project Manager



Mallory A. Owens, M.S.
Project Manager

SVP:MAO/jg/hm
Enclosures

cc: Jenny Hayes, Chevron Appalachia, LLC (PDF only)

L-164755.May3/P

ATTACHMENT A

WETLAND AND PERENNIAL STREAM WAIVER REQUEST FORM

11/3/14

Wetland and Perennial Stream Waiver Request

API Number: _____

Operator's Well Number: _____

Well Operator: Chevron Appalachia, LLC

Well Number: _____ Well Pad Name: Hazlett Well Pad

County, District, Quadrangle of Well Location: Marshall County, Union District, Moundsville Quad

Answer the questions below to request a waiver from West Virginia Department of Environmental Protection for any wetlands or perennial streams which lie within one hundred feet of proposed project Limit of Disturbance (LOD), which includes any erosion and sediment control devices to be used.

This waiver shall be requested pursuant to Chapter 22 Article 6A Section 12 of West Virginia Code, which states:

§22-6A-12(b) No well pad may be prepared or well drilled within one hundred feet measured horizontally from any perennial stream, natural or artificial lake, pond or reservoir, or a wetland, or within three hundred feet of a naturally reproducing trout stream. No well pad may be located within one thousand feet of a surface or ground water intake of a public water supply. The distance from the public water supply as identified by the department shall be measured as follows:

- (1) For a surface water intake on a lake or reservoir, the distance shall be measured from the boundary of the lake or reservoir.
- (2) For a surface water intake on a flowing stream, the distance shall be measured from a semicircular radius extending upstream of the surface water intake.
- (3) For a groundwater source, the distance shall be measured from the wellhead or spring.

The department may, in its discretion, waive these distance restrictions upon submission of a plan identifying sufficient measures, facilities or practices to be employed during well site construction, drilling and operations to protect the waters of the state. A waiver, if granted, shall impose any permit conditions as the secretary considers necessary.

§22-6A-12(c) Notwithstanding the foregoing provisions of this section, nothing contained in this section prevents an operator from conducting the activities permitted or authorized by a Clean Water Act Section 404 permit or other approval from the United States Army Corps of Engineers within any waters of the state or within the restricted areas referenced in this section.

11/3/14

Wetland and Perennial Stream Waiver Request

API Number: _____

Operator's Well Number: _____

Answer in the space provided, or use additional pages as necessary to fully answer the questions below:

- 1. Describe the proposed project location, including unique identifying names of all wetlands, and the names of perennial streams for which the waiver is sought.**

Please refer to Section 2.0, Question 1 of the letter.

- 2. Justify the proposed activity by describing alternatives to this project that were considered.**

- a. Include a No-Action Alternative as to show "the future without the project"
- b. Location Alternatives must be shown
- c. Must demonstrate why a one hundred foot buffer cannot be maintained
- d. Describe how the proposed project is the least environmentally damaging practicable alternative

Please refer to Section 2.0, Question 2 of the letter.

11/3/14

Wetland and Perennial Stream Waiver Request

API Number: _____

Operator's Well Number: _____

- 3. Identify sufficient measures, facilities or practices to be employed during well site construction, drilling and operations to protect the waters of the state. This description should include all additional erosion and sediment control measures and devices that will be used.**

Please refer to Section 2.0, Question 3 of the letter.

- 4. Provide mapping, plans, specifications and design analysis for the preferred alternative to the project.**
 - a. Specify in writing what additional controls, measures, devices, monitoring, etc. will be used to protect these wetlands and/or perennial streams for which the waiver is sought.

Please refer to Section 2.0, Question 4 of the letter.

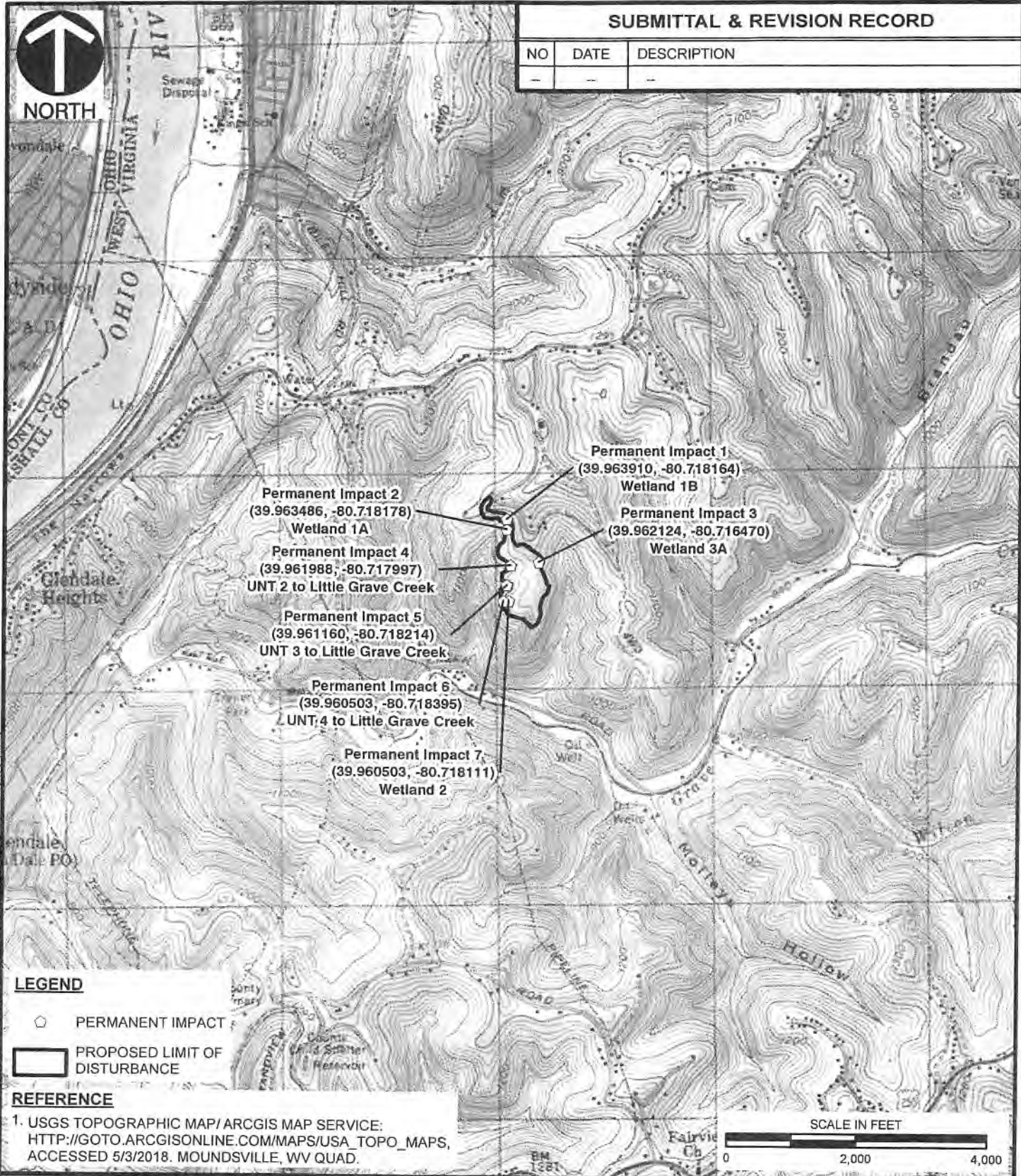
ATTACHMENT B
FIGURES



NORTH

SUBMITTAL & REVISION RECORD

NO	DATE	DESCRIPTION
-	-	-



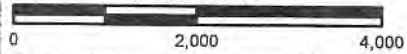
LEGEND

- PERMANENT IMPACT
- PROPOSED LIMIT OF DISTURBANCE

REFERENCE

1. USGS TOPOGRAPHIC MAP/ARCGIS MAP SERVICE:
[HTTP://GTO.ARCGISONLINE.COM/MAPS/USA_TOPO_MAPS](http://gto.arcgis.com/maps/usa_topo_maps),
 ACCESSED 5/3/2018. MOUNDSVILLE, WV QUAD.

SCALE IN FEET



Civil & Environmental Consultants, Inc.

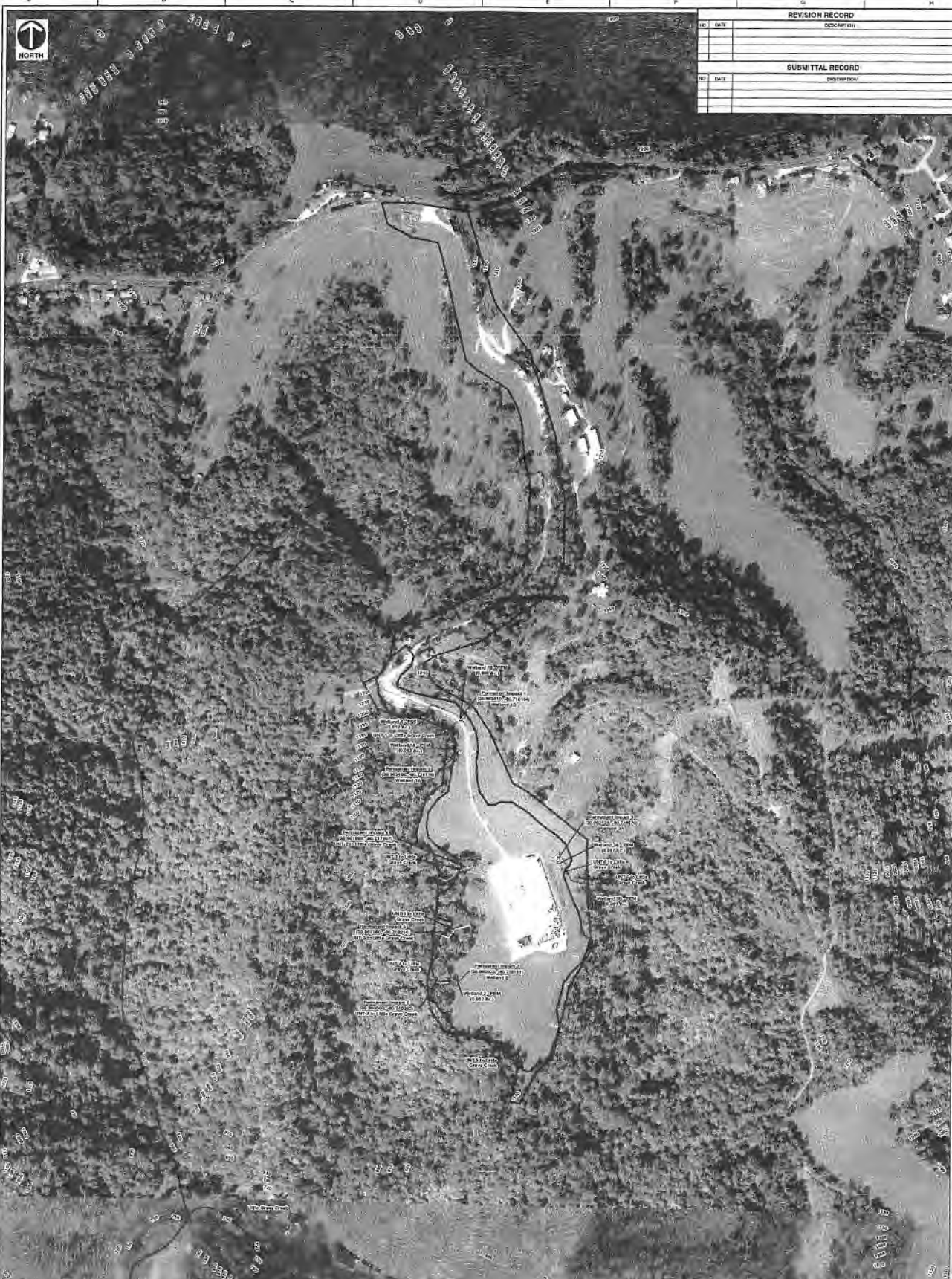
4000 Triangle Lane, Suite 200 - Export, PA 15632
 724-327-5200 • 800-899-3610
www.cecinc.com

CHEVRON APPALACHIA, LLC
 HAZLETT WELL PAD
 UNION DISTRICT,
 MARSHALL COUNTY, WEST VIRGINIA

SITE LOCATION MAP

DRAWN BY:	KMC	CHECKED BY:	SVP	APPROVED BY:	PAK*	FIGURE NO:	1
DATE:	05/03/2018	SCALE:	1" = 2,000'	PROJECT NO:	164-755	* Hand signature on file	

P:\2018\164-755-GIS\Map\F05 MW\164755_EC05_FIG 1 SITE LOC MAP.mxd 5/3/2018 8:33 AM (kcolajrzi)



REVISION RECORD	
NO.	DATE
SUBMITTAL RECORD	
NO.	DATE

LEGEND	
PERMANENT IMPACT	WETLAND CONTINUES BEYOND DELINEATION BOUNDARY
PROPOSED STREAM IMPACT	PROPOSED WETLAND IMPACT
EPHEMERAL STREAM	WETLAND - PEM
INTERMITTENT STREAM	WETLAND - PWS
WV NHD STREAM	PROPOSED LIMIT OF DISTURBANCE
	DELINEATION BOUNDARY
	INDEX CONTOUR

- REFERENCES**
1. USGS NATIONAL HYDROGRAPHY DATASET FOR WEST VIRGINIA, 2012
 2. RWIS CLEARING GUIDE, 19 CONTOURS AND PROFILE, WV DNR, 2009
 3. ESI WORLD MAPSERY / ARCOS MAP SERVICE HTTP://GOTO.ARCOSONLINE.COM/ARVY WORLD MAPSERY, ACCESSED 5/30/18, MAPSERY DATE: 2015

NOTES

1. THE WETLAND AND STREAM DELINEATION WAS CONDUCTED BY CIVIL & ENVIRONMENTAL CONSULTANTS, INC. ON 05/23/2017.
2. CIVIL & ENVIRONMENTAL CONSULTANTS, INC. CONDUCTED THE WETLAND DELINEATION IN A MANNER CONSISTENT WITH THE CRITERIA CONTAINED IN THE 1987 U.S. ARMY CORPS OF ENGINEERS WETLANDS DELINEATION MANUAL (REVISED MANUAL) AND THE 2012 REGIONAL SUPPLEMENT TO THE MANUAL (REVISED SUPPLEMENT) FOR THE EASTERN MOUNTAINS AND PIEDMONT REGION, VERSION 2.0 (2012 REGIONAL SUPPLEMENT), AND WITH THE LEVEL OF CARE AND DUE DILIGENCE ORDINARILY EXERCISED BY MEMBERS OF THE ENVIRONMENTAL CONSULTING PROFESSION PRACTICING COMPETENTLY UNDER SIMILAR CONDITIONS IN THE LOCALITY OF THE PROJECT. IT MUST BE RECOGNIZED THE WETLAND DELINEATION WAS BASED ON FIELD OBSERVATIONS AND CIVIL & ENVIRONMENTAL CONSULTANTS' PROFESSIONAL INTERPRETATION OF THE CRITERIA IN THE 1987 MANUAL AND THE 2012 REGIONAL SUPPLEMENT. WETLAND DETERMINATIONS MAY CHANGE SUBSEQUENT TO CIVIL & ENVIRONMENTAL CONSULTANTS' DELINEATION BASED ON CHANGES TO REGULATORY CRITERIA, CHANGES TO DRAINAGE, AND OTHER HUMAN ACTIVITIES AND/OR LAND DISTURBANCES.

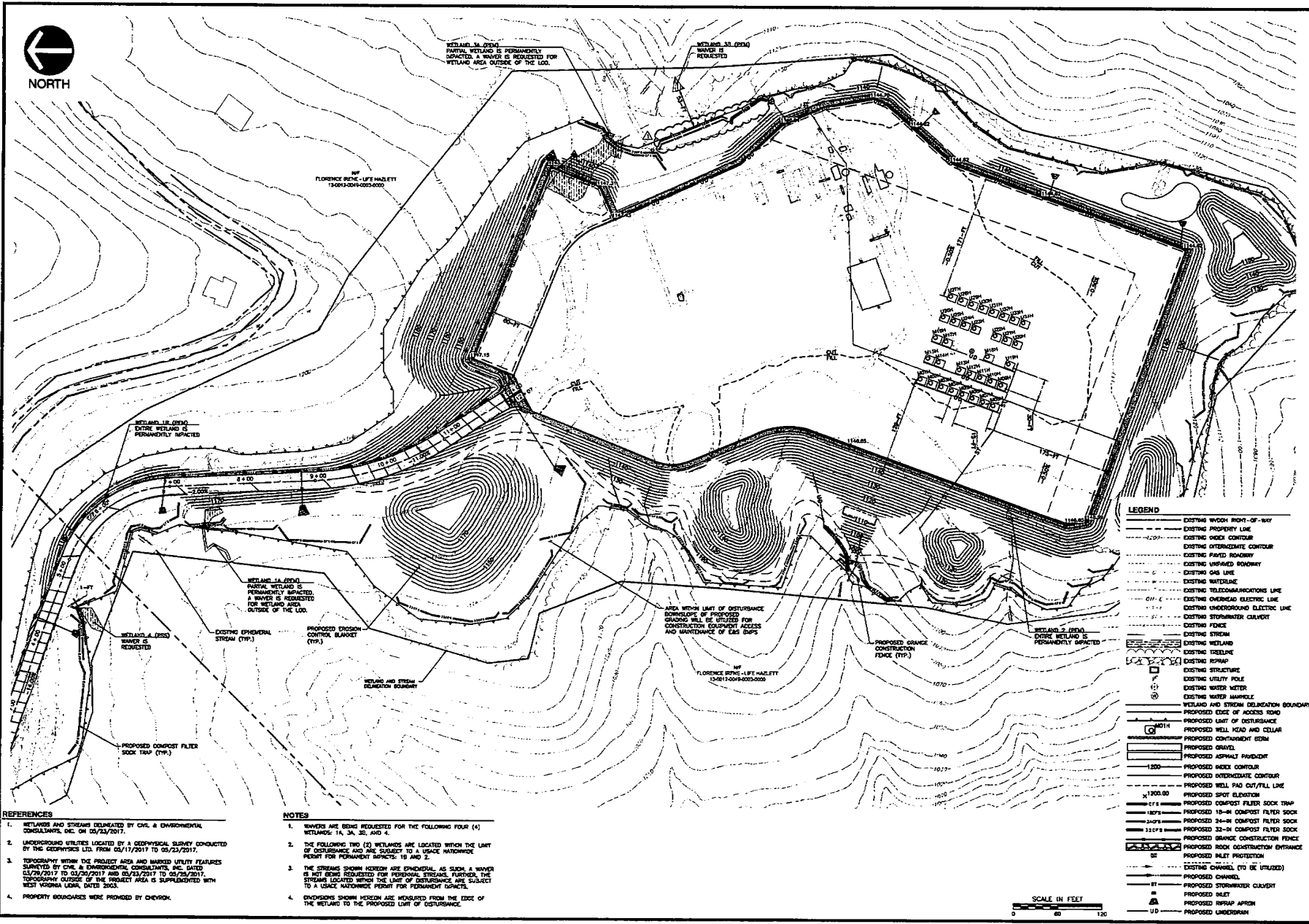
CEC
Civil & Environmental Consultants, Inc.
 4000 Triangle Lane, Suite 200 - Export, PA 15602
 PH: 724-237-0500 • FAX: 724-237-0501
 www.cecinc.com

CHEVRON APPALACHIA, LLC
HAZLETT WELL PAD
UNION DISTRICT,
MARSHALL COUNTY, WEST VIRGINIA

DESIGNED BY	KMC	CHECKED BY	BWP	APPROVED BY	PKL*
DATE	08/03/2018	SCALE	1" = 200'	PROJECT NO.	184735
PROJECT NO.					184735



*PKL is a registered Professional Engineer in the State of Pennsylvania, License No. PE-000184735



ATTACHMENT C
EROSION AND SEDIMENT CONTROL PLAN

ATTACHMENT D

APPLICATION FOR DEPARTMENT OF THE ARMY PERMIT

17. DIRECTIONS TO THE SITE

From I-70 W, continue onto I-470 W, following signs for Columbus. Take Exit 1 for US 250 S/WV-2 S toward Moundsville. Drive 0.5 mile, turn left, and use the right 2 lanes to merge onto US-250 S/WV-2 S via the ramp to Moundsville. Drive 5.1 miles, and turn left onto 21st Street and then right onto Marshall Street. Marshall Street turns slightly left and becomes 23rd Street and then Riley Hill Road. Drive approximately 1 mile, and turn left onto WV-86 N/Grandview Road. Drive 0.5 mile, and turn right onto Markey Lane/CR-10.

18. Nature of Activity (Description of project, include all features)

Chevron Appalachia, LLC is proposing to expand an existing natural gas well pad site and widen the associated existing access road. The proposed limit of disturbance (LOD) is approximately 26 acres. The proposed project area includes an existing well pad and access road, residential areas, upland hay field, and wooded hillslopes. The project will require fill to be placed in 0.101 acre of palustrine emergent (PEM) wetlands and 288 linear feet of ephemeral streams.

19. Project Purpose (Describe the reason or purpose of the project, see instructions)

The purpose of the project is to construct a natural gas well pad and access road for shale operations.

USE BLOCKS 20-23 IF DREDGED AND/OR FILL MATERIAL IS TO BE DISCHARGED

20. Reason(s) for Discharge

The construction of the facility will require the placement of fill material into three unnamed tributaries (UNTs) to Little Grave Creek and four palustrine emergent (PEM) wetlands. These permanent impacts are associated with grading activities for expansion of the well pad and access road. Underdrains are being installed beneath the proposed fill slopes to maintain stream flow.

21. Type(s) of Material Being Discharged and the Amount of Each Type in Cubic Yards:

Type Amount in Cubic Yards	Type Amount in Cubic Yards	Type Amount in Cubic Yards
390 CY of earthen material into wetlands	80 CY of earthen material into streams	N/A

22. Surface Area in Acres of Wetlands or Other Waters Filled (see instructions)

Acres 0.101 acre of PEM wetlands
or
Linear Feet 288 linear feet of ephemeral streams

23. Description of Avoidance, Minimization, and Compensation (see instructions)

Chevron analyzed numerous on-site configurations for the siting of the facility, and the proposed site plan represents the layout which minimizes impacts to the furthest extent while still meeting the project's purpose and need. Grading was minimized to avoid impacts to UNTs 1, 5, 6, and 7 to Little Grave Creek and Wetlands 3B and 4. Orange construction fencing will be installed around the downstream portions of UNTs 1, 2, 3, and 6 to Little Grave Creek to avoid additional impacts.

24. County: Boone, of no other (see attached map) (If YES DESCRIBE THE COMPLETED WORK)

25. Addresses of Adjoining Property Owners, Lessees, Etc. Whose Property Adjoins the State-owned Property (List all addresses, including street names)

a. Address- See attached map.

City - State Zip

b. Address

City - State Zip

c. Address

City - State Zip

d. Address

City - State Zip

e. Address

City - State Zip

26. List of Other Certificates or Approvals/Denials received from other Federal, State or Local Agencies for Work Described in This Application.

AGENCY	TYPE APPROVAL*	IDENTIFICATION NUMBER	DATE APPLIED	DATE APPROVED	DATE DENIED
WVDNR OLS	Right of Entry	Not yet assigned	December 2017	Pending	
WVDEP	Horizontal 6A Well P	Not yet assigned	Pending	Pending	

* Would include but is not restricted to zoning building and flood plain permits

27. Application is hereby made for permit or permits to authorize the work described in this application. I certify that this information in this application is complete and accurate. I further certify that I possess the authority to undertake the work described herein or am acting as the duly authorized agent of the applicant

Jenny Hayes
SIGNATURE OF APPLICANT

1-15-18
DATE

Mahony A. Owens
SIGNATURE OF AGENT

1/15/18
DATE

The Application must be signed by the person who desires to undertake the proposed activity (applicant) or it may be signed by a duly authorized agent if the statement in block 11 has been filled out and signed.

18 U.S.C. Section 1001 provides that Whoever in any manner within the jurisdiction of any department or agency of the United States knowingly and willfully falsifies, conceals or covers up any trick, scheme, or disguises a material fact or makes any false, fictitious or fraudulent statements or representations or makes or uses any false writing or document knowing same to contain any false, fictitious or fraudulent statements or entry, shall be fined not more than \$10,000 or imprisoned not more than five years or both.

4705102096

STATE OF WEST VIRGINIA
DEPARTMENT OF ENVIRONMENTAL PROTECTION, OFFICE OF OIL AND GAS
WELL WORK PERMIT APPLICATION

1) Well Operator: Chevron Appalachia, LLC 49449935 Marshall Union Moundsville, WV
Operator ID County District Quadrangle

2) Operator's Well Number: 5H Well Pad Name: Hazlett

3) Farm Name/Surface Owner: Hazlett Public Road Access: CR 10 Markey Lane

4) Elevation, current ground: 1148' Elevation, proposed post-construction: 1144'

5) Well Type (a) Gas Oil _____ Underground Storage _____

Other _____

(b) If Gas Shallow Deep _____

Horizontal

6) Existing Pad: Yes or No Yes *JW 5/29/18*

7) Proposed Target Formation(s), Depth(s), Anticipated Thickness and Expected Pressure(s):
Marcellus, 6150' below GL, Marcellus is 50' thick with a pore pressure gradient of 0.64 psi/ft

8) Proposed Total Vertical Depth: 6,170'

9) Formation at Total Vertical Depth: Marcellus

10) Proposed Total Measured Depth: 12,658'

11) Proposed Horizontal Leg Length: 5,812'

12) Approximate Fresh Water Strata Depths: 541' below GL

13) Method to Determine Fresh Water Depths: Based on the deepest water well within 3 mile radius

14) Approximate Saltwater Depths: Potential for Brine in Burgoon @ 1696' below GL

15) Approximate Coal Seam Depths: Pittsburgh Coal top 624' below GL

16) Approximate Depth to Possible Void (coal mine, karst, other): Possible Void in abandoned Glendale Mine @ 624' below GL

17) Does Proposed well location contain coal seams directly overlying or adjacent to an active mine? Yes _____ No

(a) If Yes, provide Mine Info: Name: _____
Depth: _____
Seam: _____
Owner: _____

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18)

CASING AND TUBING PROGRAM

TYPE	Size (in)	New or Used	Grade	Weight per ft. (lb/ft)	FOOTAGE: For Drilling (ft)	INTERVALS: Left in Well (ft)	CEMENT: Fill-up (Cu. Ft.)/CTS
Conductor	30"	New			50'	50'	CTS
Fresh Water	20"	New	J-55	94	591'	591'	CTS
Coal	13-3/8"	New	J-55	54.5	724'	724'	CTS
Intermediate	9-5/8"	New	L-80	40	2,116'	2,116'	CTS
Production	5-1/2"	New	P-110	20	12,658'	12,658'	2,616' (500' below 9-5/8" shoe)
Tubing							
Liners							

JN 5/29/18

TYPE	Size (in)	Wellbore Diameter (in)	Wall Thickness (in)	Burst Pressure (psi)	Anticipated Max. Internal Pressure (psi)	Cement Type	Cement Yield (cu. ft./k)
Conductor	30"	36"					
Fresh Water	20"	26"	0.438"	2,110		Class A	1.2
Coal	13-3/8"	17-1/2"	0.38"	2,730	400	Class A	1.19
Intermediate	9-5/8"	12-3/8" to 12-1/4"	0.395"	5,750	500	Class A	1.19
Production	5-1/2"	8-1/2" to 8-3/4"	0.361"	14,360	2050	Class A, G, or H	1.25
Tubing							
Liners							

PACKERS

Kind:				
Sizes:				
Depths Set:				

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19) Describe proposed well work, including the drilling and plugging back of any pilot hole:

Drill vertical depth to the Marcellus at an estimated total vertical depth of approximately 6,170'. Drill horizontal leg.

20) Describe fracturing/stimulating methods in detail, including anticipated max pressure and max rate:

Frac with 400,000 lb. sand with 9,525 bbl fluid per stage; anticipated maximum pressure is 9,400 and anticipated max rate in BPM is 100

21) Total Area to be disturbed, including roads, stockpile area, pits, etc., (acres): _____

22) Area to be disturbed for well pad only, less access road (acres): _____

23) Describe centralizer placement for each casing string:

Surface: (1) on shoe track w/ stop collar & (1) per jt to surface; Intermediate: (1) on shoe track w/ stop collar & (1) per 3 jts; Production String: (1) centralizer every jt from TMD to planned TOC & (1) every other joint from planned TOC to surface.

24) Describe all cement additives associated with each cement type:

For the Water String the blend will contain class A cement, 3% CaCl₂, and flake. The coal will contain class A cement, 3% CaCl₂, Salt, and flake. The intermediate will contain class A cement, 3% CaCl₂, Salt, and flake. The Production cement will have a lead and tail cement. The lead will contain class A, G, or H cement, KCl, dispersant, suspension agent, and retarder. The tail will contain class A, G, or H cement, Calcium Carbonate, KCl, dispersant, de-foamer, suspension agent, and friction reducer.

25) Proposed borehole conditioning procedures:

Air sections ensured to be clean via air circulation once TD is reached. Fluid sections will be circulated a minimum of 2 bottoms up once casing point has been reached and until uniform mud properties are achieved.

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*Note: Attach additional sheets as needed.

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Cement Additives

The Water String the blend will contain class A cement, 3% CaCl₂, and flake.

The intermediate will contain class A cement, 10% CaCl₂, Salt, and flake.

The Production cement will have a lead and tail cement.

The lead will contain class A, G, or H cement, KCl, dispersant, suspension agent, and retarder.

The tail will contain class A, G, or H cement, Calcium Carbonate, KCl, dispersant, de-foamer, suspension agent, and friction reducer.

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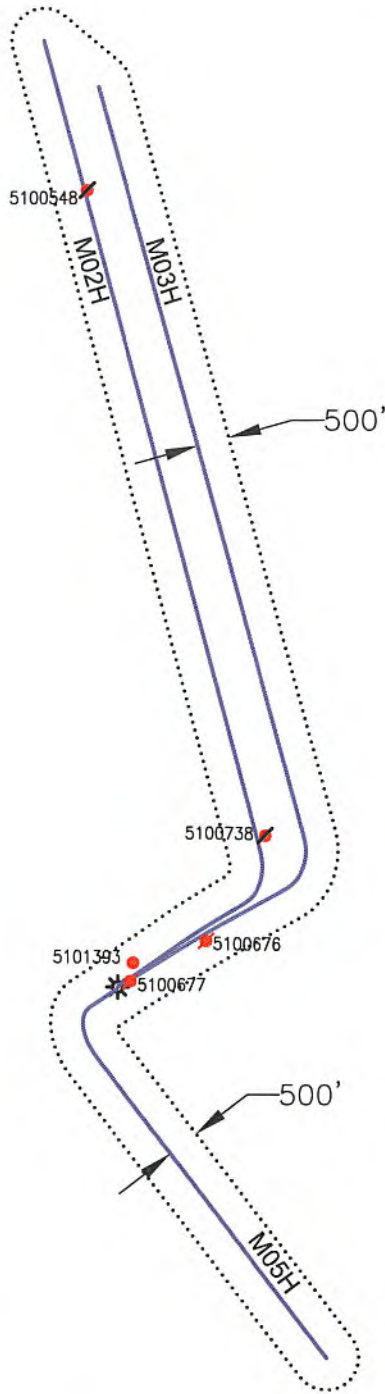
Hazlett M05H

Permit#		Ground Level Elev. (ft above SL):		1144					
Clay Twp, Marshall Co, WV		**All depths below reference GL**							
5/16/2018 7:47									
DRILLING FLUID / BIT TYPE / TFA	CENTRALIZER PROGRAM	CASING SIZE / FORMATION	DEPTH		WELLHEAD DESIGN FMC UH-S 13 5/8"	HOLE SIZE (IN)	HOLE DEPTH (FT)	CASING SPECS	CEMENT PROGRAM
			MD (FT)	TVD (FT)					
Core Barrel / Auger	2 Blowspring per Jt	30" Conductor	50	50	INC AZM	36	50	Conductor 30" 118.2# X-42 29.25 Minimum 40 ft from GL or at least 10 ft into bedrock	Grout to Surface
Air DRIL with Mist and additives / 2" Hammer	Bow Spring: (1) on shoe track w/ stop collar & (1) per ft over coupling to surface.	20" Casing	591	591		26	621	Surface Casing 20" 94# J-55 BTC 0.438" Wall Coupling OD (in) 21,000 ID (in) 19,124 Drift ID (in) 18,837 Burst (psi) 2,110 Collapse (psi) 520 Yield (Jt Strength 1,000 lbs) 1,402 Capacity (bb/ft) 0.3553 Annulus (bb/ft) 0.2581	Surface Blend (Class A) Cement to surface 30% Excess
Air DRIL with Mist and additives	Bow Spring: (1) on shoe track w/ stop collar & (1) per ft over coupling (1) installed 100 ft from surface Basket Placement Secured w/ (2) lock rings above and (1) below	Basket Placement Top of Coal Deepest Coal	724	724		17.50	754	Coal String 13-3/8" 54.5# J-55 BTC 0.380" Wall Coupling OD (in) 14,375 ID (in) 12,615 Drift ID (in) 12,459 Burst (psi) 2,730 Collapse (psi) 1,130 Yield (Jt Strength 1,000 lbs) 853	Intermediate I Blend (Class A) Cement grout to surface Shoe Job Vol. (50% Excess) Grout Job Vol. (100% Excess)
Air DRIL with Mist and additives	Bow Spring: (1) on shoe track w/ stop collar & (1) per 3 Jts over coupling	9-5/8" Casing	2,116	2,116		12.25	2,176	Intermediate Casing 9-5/8" 40# L-80IC BTC 0.395" Wall Coupling OD (in) 10,625 ID (in) 8,835 Drift ID (in) 8,679 Burst (psi) 5,750 Collapse (psi) 3,080 Yield (Jt Strength 1,000 lbs) 916	Intermediate II Blend (Class A) Cement to surface 30% Excess
	Surface - TOC (1) per every other jt TOC-Curve KOP (1) per jt of csg Curve KOP-TMD (1) per jt of csg 10' Marker Jt of Csg 100' above KOP	KOP						Production Casing 5-1/2" 20# P110EC DW/C-1S-Plus .361" Wall Coupling OD (in) 6,300 ID (in) 4,778 Drift ID (in) 4,683 Burst (psi) 14,360 Collapse (psi) 12,090 Yield (Jt Strength 1,000 lbs) 729	Production Lead Slurry (Class A, G, H) Cement top approximately 500' below 9-5/8" shoe
Planned MW: 11.5ppg SBM - 12.5ppg SBM	Float Equip. (2) Jts of Csg Float Equip.	Est. BHT deg. F 5-1/2" Casing	12,658	144 6,170		8.50	12,673		Production Tail Slurry (Class A, G, H)

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Blue Mountain Inc.
 10125 MASON DIXON HIGHWAY
 BURTON, WV 26562
 PHONE: (304) 662-6486

PREPARED FOR:
 CHEVRON APPALACHIA, LLC
 700 CHERRINGTON PARKWAY
 CORAOPOLIS, PA 15108

LEGEND

- WELL LOCATION
- ACTIVE WELL
- PLUGGED WELL
- ABANDON WELL

HAZLETT
AREA OF REVIEW MAP
MARSHALL COUNTY
UNION DISTRICT
WEST VIRGINIA

TOPO QUAD: MOUNDSVILLE, WV
 SCALE: 1" = 3000'
 DATE: MARCH 13, 2018

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Well ID	Prior Operator On Record	Operator - DEP	Status	Latitude	Longitude	Vertical TD	Producing Formation	Producing Zones NOT Perforated
47-051-00548	PAGE, PREBLE & BOWER INC.	PAGE, PREBLE & BOWER INC.	PLUGGED	39.994422	-80.719818	UNKNOWN	BEREA SANDSTONE	UNKNOWN
47-051-00738	MID-CON PETROLEUM CO., INC	MID-CON PETROLEUM CO., INC	PLUGGED	39.967281	-80.709460	1100'	COW RUN SANDSTONE	UNKNOWN
47-051-01393	CHIEF OIL & GAS LLC	CHEVRON APPALACHIA LLC	ACTIVE	39.961821	-80.716665	6250'	MARCELLUS SHALE	UNKNOWN
47-051-00677	COLEMAN, C R	UNIVERSAL MINERAL, INC.	ABANDONED	39.961040	-80.716806	3100'	GORDON SANDSTONE	UNKNOWN
47-051-00676	COLEMAN, C R	UNIVERSAL MINERAL, INC.	ABANDONED	39.962782	-80.712662	3100'	GORDON SANDSTONE	UNKNOWN

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WW-9
(5/16)

API Number 4705-102096
Operator's Well No. Hazlett 5H

STATE OF WEST VIRGINIA
DEPARTMENT OF ENVIRONMENTAL PROTECTION
OFFICE OF OIL AND GAS
FLUIDS/ CUTTINGS DISPOSAL & RECLAMATION PLAN

Operator Name Chevron Appalachia, LLC OP Code 49449935

Watershed (HUC 10) Short Creek - Ohio River Quadrangle Moundsville, WV 7.5'

Do you anticipate using more than 5,000 bbls of water to complete the proposed well work? Yes No

Will a pit be used? Yes No

If so, please describe anticipated pit waste: _____

Will a synthetic liner be used in the pit? Yes No If so, what ml.? _____

Proposed Disposal Method For Treated Pit Wastes:

- Land Application (if selected provide a completed form WW-9-GPP)
- Underground Injection (UIC Permit Number _____)
- Reuse (at API Number at next anticipated well)
- Off Site Disposal (Supply form WW-9 for disposal location)
- Other (Explain _____)

Will closed loop system be used? If so, describe: Yes, we will be utilizing multiple open/closed top tanks

Drilling medium anticipated for this well (vertical and horizontal)? Air, freshwater, oil based, etc. Air to KOP. SBM from KOP to TMD

-If oil based, what type? Synthetic, petroleum, etc. Synthetic

Additives to be used in drilling medium? Barite, fluid loss, emulsifiers, rheological control

Drill cuttings disposal method? Leave in pit, landfill, removed offsite, etc. Removed offsite

-If left in pit and plan to solidify what medium will be used? (cement, lime, sawdust) N/A

-Landfill or offsite name/permit number? Short Creek Landfill/SWF-1034/WV0109517 and Arden Landfill/#100172

Permittee shall provide written notice to the Office of Oil and Gas of any load of drill cuttings or associated waste rejected at any West Virginia solid waste facility. The notice shall be provided within 24 hours of rejection and the permittee shall also disclose where it was properly disposed.

I certify that I understand and agree to the terms and conditions of the GENERAL WATER POLLUTION PERMIT issued on April 1, 2016, by the Office of Oil and Gas of the West Virginia Department of Environmental Protection. I understand that the provisions of the permit are enforceable by law. Violations of any term or condition of the general permit and/or other applicable law or regulation can lead to enforcement action.

I certify under penalty of law that I have personally examined and am familiar with the information submitted on this application form and all attachments thereto and that, based on my inquiry of those individuals immediately responsible for obtaining the information, I believe that the information is true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine or imprisonment.

Company Official Signature Jenny Hayes
Company Official (Typed Name) Jenny Hayes
Company Official Title Permitting Team Lead

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Subscribed and sworn before me this 2nd day of August, 2018
Laura Savage Notary Public

Commonwealth of Pennsylvania
County of Allegheny

My commission expires September 17, 2018

Commonwealth of Pennsylvania - Notary Seal
Laura Savage, Notary Public
Allegheny County
My commission expires September 17, 2018
Commission number 1285773
Member, Pennsylvania Association of Notaries

Proposed Revegetation Treatment: Acres Disturbed 15.4 Prevegetation pH Per soils testing report

Lime 3 Tons/acre or to correct to pH unless otherwise noted in soils report

Fertilizer type 10-20-20

Fertilizer amount 300 lbs/acre

Mulch 3, 5 for winter stabilization Tons/acre

Seed Mixtures

Temporary

Permanent

Seed Type lbs/acre

Seed Type lbs/acre

See Attached

See Attached

Attach:

Maps(s) of road, location, pit and proposed area for land application (unless engineered plans including this info have been provided). If water from the pit will be land applied, provide water volume, include dimensions (L, W, D) of the pit, and dimensions (L, W), and area in acres, of the land application area.

Photocopied section of involved 7.5' topographic sheet.

Plan Approved by: _____

Comments: _____

Title: Oil + Gas Inspector

Date: 5/18/18

Field Reviewed? () Yes () No

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4705 02096

SEED MIXTURE				
Temporary			Permanent	
Seed Type		Lbs/Acre	Seed Type	Lbs/Acre
Annual Ryegrass	or	50	Hayfield, Pastureland, & Cropland	
Winter Wheat		75	Orchard Grass	80
			Timothy	80
			Birdsfoot – Trefoil	20
			Ladino Clover	20

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Chevron

**Appalachian LLC
WV Well Site Safety Plan
Pad: Hazlett Pad A
Well # M05H**

**28 Timmi Lane
Glen Dale, WV 26038
Glen Dale District
Marshall County, WV**

JN 7/19/18

**Access Point – [39.964486°N, 80.719328°W]
Well Site – [39.961756°N, 80.717081°W]
Marshall County, West Virginia**

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WATER SUPPLY EXHIBIT 4705102096 HAZLETT PAD A BATCH #1



Source: Esri, DigitalGlobe, GeoEye, Earthstar Geographics, CNES/Airbus DS, USDA, USGS, AeroGRID, IGN, and the GIS User Community

LOT OWNERS

Label	Owner	TM	Label	Owner	TM	Label	Owner	TM	Label	Owner	TM
A	KEY GLADYS E - LIFE	25-13 12002700000000	N	OTTE MICHAEL P	25-13 12003100000000	AB	CALISSIE TIMOTHY J	25-13 12005000050000	AO	OTTE HUBERT C ET AL	25-13 12004300000000
B	OTTE MARK DOUGLAS ET UX	25-13 12005000040000	O	OTTE HUBERT CHAS & JANE E	25-13 12003200010000	AC	KIDNEY JARROD S & TIMMI L	25-13 12005000060000	AP	HAZLETT IRENE - LIFE	25-13 12004700000000
C	OTTE MICHAEL P & DENISE A	25-13 12003500010000	P	OTTE MARK D	25-13 12003300000000	AD	MAST LEVI E ET AL	25-13 12005100000000	AQ	KOSKI TEDDY F & EMMA IANE	25-13 12004800030000
D	ANGEL ADAM S JR	25-13 11006100000000	Q	OTTE MARK D & KELLY J	25-13 12003500000000	AE	MCCLINTOCK LARRY L & ALICIA S	25-14 10016000400000	AR	RHODES LISA & NORMAN L	25-13 12004800040000
E	LEACH CHARLES L JR	25-13 12005000070000	R	GLENDALE CITY OF	25-13 12004400000000	AF	YODER ELI A ET AL	25-14 10016000000000	AS	YODER ELI A ET AL	25-14 10016000100000
F	CALISSIE TIMOTHY J ET UX	25-13 12005000020000	S	GLEN DALE TOWN OF	25-13 12004500000000	AG	KOSKI TEDDY F ET UX	25-14 10017000000000	AT	YODER ELI A ET AL	25-14 10016000200000
G	KIDNEY JARROD S & TIMMI L	25-13 12005000080000	T	HAZLETT IRENE - LIFE	25-13 12004600010000	AH	SPRINGER BARBARA K	25-13 12005000010000	AU	NGUYEN LAMSON N ET UX	25-14 10016000300000
H	KURELAC PATRICIA A	25-13 12003600000000	U	HAZLETT FLORENCE IRENE LIFE	25-13 12004600010000	AI	VOELLINGER JOHN & LORI	25-13 12005000090000	AV	SPRINGER BARBARA K	25-14 10016000500000
I	REILLY JOHN WILLIAM III ET AL	25-13 12001400000000	V	HAZLETT IRENE - LIFE	25-13 12004900000000	AJ	LINZY LINDA A	25-13 12004800020000	AW	LINZY LINDA A	25-14 10017000000000
J	HAZLETT FLORENCE IRENE - LIFE	25-13 12004900030000	W	HAZLETT MICHAEL C - LIFE	25-13 12004900010000	AK	VICKERS MARY E EST	25-13 12004800000000	AX	MARSHALL COUNTY PARK & REC	25-13 30002000000000
K	OTTE HUBERT CHAS & JANE E	25-13 12003200000000	X	HAZLETT MICHAEL C - LIFE	25-13 12004900020000	AL	VICKERS THOMAS D & JANET E	25-13 12004800010000	AY	MARSHALL COUNTY PARK & REC	25-13 30002000000000
L	BURCH LESTER M ET UX	25-13 12002600000000	Y	CALISSIE TIMOTHY J ET UX	25-13 12005000000000	AM	ROBINSON GARY A	25-13 12004300010000	AZ	OTTE HUBERT C ET AL	25-13 30002000000000
M	OTTE THOMAS L ET AL - LIFE	25-13 12002800000000	AA	CALISSIE TIMOTHY J ET UX	25-13 12005000030000	AN	RICHARDS CHRISTINE	25-13 12004200010000	Z	OTTE HUBERT C ET AL	25-14 30003000000000

Surface Owner: IRENE HAZLETT
 Oil/Gas Owner: IRENE HAZLETT
 Well Operator: CHEVRON APPALACHIA, LLC
 Address: 700 CHERRINGTON PARKWAY
CORAOPOLIS, PA 15108
 Phone: 724-564-3700

County: MARSHALL
 Township: GLEN DALE, WV
 Surveyor: SERVICES, INC.
 Address: 301 COMMERCE PARK DR
CRANBERRY TOWNSHIP, PA 16066
 Phone: 800-267-2549

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 WV Department of Environmental Protection
 Office

NOTICE: THE INTENT OF THIS EXHIBIT IS TO IDENTIFY EXISTING WATER SUPPLIES IN THE VICINITY OF A PROPOSED GAS WELL, AND IS NOT A COMPLETE BOUNDARY SURVEY. PROPERTY LINES AND OWNER INFORMATION WERE OBTAINED FROM DEEDS, TAX RECORDS, AERIAL PHOTOGRAPHY, GIS, AND FIELD SURVEYED EVIDENCE.

L:\projects\chevron\pds\unit\water\source\hazlett\pad_a\hazlett_pad_a_viewer\supply\exhibit.mxd - Scale: 1:15,840 - 3/15/2018 2:26:01 PM - J.Lauro - NAD 1983 StatePlane West Virginia North FIPS 4701 Feet



Water Supply Exhibit
Hazlett Pad A Batch #1

4705

No.	WATER PURVEYOR	SUPPLY	ELEV.	ADDRESS	PHONE #
1	VICKERS THOMAS D & JANET E	Creek	766	1526 LITTLE GRAVE CREEK DRIVE	304-845-4568
2	OTTE, MICHAEL; OTTE, MARK; OTTE, HUBERT & JANE; KEY, GLADYS	Spring	1,167	224 MARKEY HILL LANE	304-232-0478
3	KEY GLADYS E - LIFE	Spring	1,179	1875 GLEN DALE HIGHTS ROAD	304-312-1408
4	OTTE, MICHAEL; OTTE, MARK; OTTE, HUBERT & JANE; KEY, GLADYS	Spring	1,169	224 MARKEY HILL LANE	304-232-0478
5	OTTE MICHAEL P & DENISE A	Spring	1,192	26 JOHN DEERE DRIVE	304-312-9337
6	OTTE, MICHAEL; OTTE, MARK; OTTE, HUBERT & JANE; KEY, GLADYS	Spring	1,173	224 MARKEY HILL LANE	304-232-0478
7	OTTE MICHAEL P & DENISE A	Spring	1,199	26 JOHN DEERE DRIVE	304-312-9337
8	MCCLINTOCK LARRY L & ALICIA S	Well	718	1456 LITTLE GRAVE CK DRIVE	304-810-0571
9	OTTE MICHAEL P	Well	1,349	26 JOHN DEERE DRIVE	304-312-9337
10	REILLY JOHN WILLIAM III ET AL	Well	1,160	80 RED FARM LANE	304-233-7824

No.	SUPPLY COORDINATES	M01H	M02H	M03H	M04H	M05H	M06H	M07H	M08H
1	39°57'23.25240"N 80°43'11.50320"W	1,736	1,721	1,706	1,691	1,676	1,661	1,646	1,631
2	39°58'00.68520"N 80°43'06.23640"W	2,204	2,217	2,231	2,244	2,258	2,271	2,285	2,299
3	39°58'02.65440"N 80°43'17.77080"W	2,655	2,665	2,676	2,687	2,697	2,708	2,719	2,730
4	39°58'05.77200"N 80°43'11.60400"W	2,787	2,800	2,812	2,825	2,838	2,850	2,863	2,876
5	39°58'07.12560"N 80°42'53.30160"W	2,935	2,950	2,965	2,980	2,995	3,010	3,025	3,040
6	39°58'11.03880"N 80°43'12.64800"W	3,324	3,337	3,350	3,362	3,375	3,388	3,401	3,413
7	39°58'11.79480"N 80°42'54.45000"W	3,376	3,391	3,406	3,421	3,435	3,450	3,465	3,480
8	39°57'23.72400"N 80°43'40.66680"W	3,328	3,317	3,307	3,296	3,285	3,274	3,263	3,253
9	39°58'07.43880"N 80°43'00.60240"W	2,877	2,891	2,906	2,920	2,934	2,949	2,963	2,978
10	39°58'15.08160"N 80°43'50.22120"W	5,185	5,191	5,198	5,205	5,211	5,218	5,225	5,231

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Office of Oil and Gas
AUG 3 2018
WV Department of
Environmental Protection

*ELEVATIONS SHOWN ARE INTERPOLATED FROM LIDAR TOPO AND SUPPLY COORDINATES ARE FROM OTHERS.

BHL is located on topo map 4,765 feet south of Latitude: 39° 57' 30"
 SHL is located on topo map 14,318 feet south of Latitude: 40° 00' 00"

- NOTES:
1. There are no water wells or developed springs within 250' of proposed well.
 2. Proposed well is greater than 100' from perennial stream, wetland, pond, reservoir or lake.
 3. There are no native trout streams within 300' of proposed well.
 4. Proposed well is greater than 1000' from surface groundwater intake or public water supply.
 5. It is not the purpose or intention of this plat to represent surveyed locations of the surface or mineral parcels depicted hereon. The location of the boundary lines, as shown, are based on record deed descriptions, field evidence found and/or tax map position, unless otherwise noted.
 6. There are no existing buildings within 625' of proposed well.

SEE PAGE 2 FOR SURFACE OWNERS AND LESSORS



LINE	BEARING	DISTANCE
R1	N 32°08'19" W	181.41'
R2	N 45°29'42" W	150.23'
R3	N 68°08'11" W	153.17'
R4	N 40°15'40" W	945.91'
R5	N 01°50'16" W	1266.06'
R6	S 84°19'15" E	1167.94'

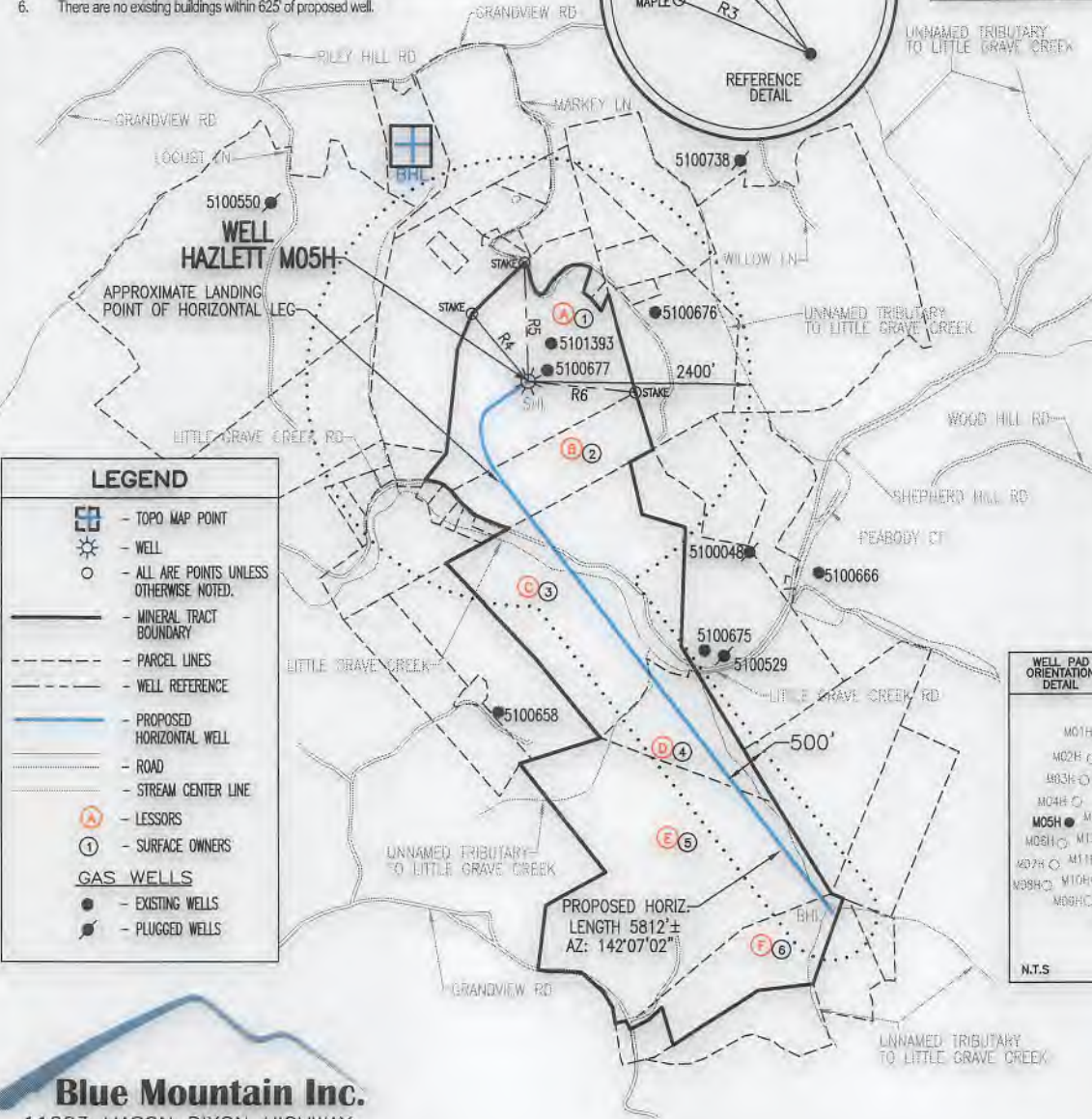


BHL is located on topo map 10,915 feet west of Longitude: 80° 40' 00"
 SHL is located on topo map 2,578 feet west of Longitude: 80° 42' 30"

SURFACE HOLE LOCATION (SHL)
 UTM 17-NAD83(M)
 N:4423432.961
 E:524125.443
 NAD83, WV NORTH
 N:534348.274
 E:1627222.668

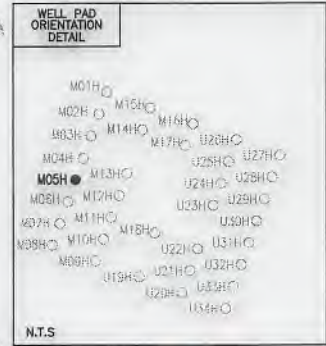
APPROX. LANDING POINT
 UTM 17-NAD83(M)
 N:4423101.61
 E:524039.46
 NAD83, WV NORTH
 N:533265.659
 E:1626922.325

BOTTOM HOLE LOCATION (BHL)
 UTM 17-NAD83(M)
 N:4421722.29
 E:525150.10
 NAD83, WV NORTH
 N:528678.461
 E:1630491.234



LEGEND

- TOPO MAP POINT
- WELL
- ALL ARE POINTS UNLESS OTHERWISE NOTED.
- MINERAL TRACT BOUNDARY
- PARCEL LINES
- WELL REFERENCE
- PROPOSED HORIZONTAL WELL
- ROAD
- STREAM CENTER LINE
- LESSORS
- SURFACE OWNERS
- GAS WELLS
- EXISTING WELLS
- PLUGGED WELLS



Blue Mountain Inc.
 11023 MASON DIXON HIGHWAY
 BURTON, WV 26562
 PHONE: (304) 662-6486

FILE #: HAZLETT M05H
 DRAWING #: HAZLETT M05H
 SCALE: 1" = 2000'
 MINIMUM DEGREE OF ACCURACY: 1/2500
 PROVEN SOURCE OF ELEVATION: U.S.G.S. MONUMENT THOMAS 1498.81'

I, THE UNDERSIGNED, HEREBY CERTIFY THAT THIS PLAT IS CORRECT TO THE BEST OF MY KNOWLEDGE AND BELIEF AND SHOWS ALL THE INFORMATION REQUIRED BY LAW AND THE REGULATIONS ISSUED AND PRESCRIBED BY THE DEPARTMENT OF ENVIRONMENTAL PROTECTION.

Signed: *George D. Six*
 R.P.E.: _____ L.L.S.: P.S. No. 2000



(+) DENOTES LOCATION OF WELL ON UNITED STATES TOPOGRAPHIC MAPS WVDEP
 OFFICE OF OIL & GAS
 601 57TH STREET
 CHARLESTON, WV 25304

WELL TYPE: Oil Waste Disposal Production Deep Gas Liquid Injection Storage Shallow

WATERSHED: SHORT CREEK-OHIO RIVER ELEVATION: 1148.00'

COUNTY/DISTRICT: MARSHALL / UNION QUADRANGLE: MOUNDVILLE, WV 7.5'

SURFACE OWNER: IRENE HAZLETT-LIFE ACREAGE: 77.24±
 OIL & GAS ROYALTY OWNER: DONALD BOYD YOHO, KELLY ANN MEASE, ZANE EDWARD NEILSEN, NANCY A. BAKER, LARRY JOHN MCCrackEN, PATRICIA ANN MCCrackEN, ROBERT JAY MCCrackEN, FLORENCE HAZLETT ET AL ACREAGE: 382.807±

DRILL CONVERT DRILL DEEPER REDRILL FRACTURE OR STIMULATE PLUG OFF OLD FORMATION
 PERFORATE NEW FORMATION PLUG & ABANDON CLEAN OUT & REPLUG OTHER CHANGE

(SPECIFY): _____

TARGET FORMATION: MARCELLUS ESTIMATED DEPTH: TVD: 6,200'± TMD: 12,657.61'±

WELL OPERATOR: CHEVRON APPALACHIA, LLC DESIGNATED AGENT: KENNETH E. TAWNEY
 Address: 700 CHERRINGTON PARKWAY Address: 500 LEE STREET, EAST SUITE 1600
 City: CORAOPOLIS State: PA Zip Code: 15108 City: CHARLESTON State: WV Zip Code: 25301-3202

DATE: MAY 09, 2018
 OPERATOR'S WELL #: HAZLETT M05H
 API WELL #: 47 51 02096
 STATE COUNTY PERMIT

HAZLETT

M05H

PAGE 2 OF 2

	LESSOR	DIST-TM/PAR
A	DONALD BOYD YOHO	13-12/49
	KELLY ANN MEASE	
	ZANE EDWARD NEILSEN	
	NANCY A. BAKER	
	LARRY JOHN MCCrackEN	
	PATRICIA ANN MCCrackEN	
	ROBERT JAY MCCrackEN	
	FLORENCE HAZLETT ET AL	
B	RICHARD JOSEPH OTTE	13-12/47
	CAROLINE PENTZIEN	
	PATRICIA GAIL FOSTER	
	NANCY JEAN CUNNINGHAM	
	REBECCA ANN YOHO	
	HUBERT C. OTTE ET UX	
	MICHAEL P. OTTE	
	MARK DOUGLAS OTTE	
C	RICHARD JOSEPH OTTE	14-3/2
	CAROLINE PENTZIEN	
	PATRICIA GAIL FOSTER	
	NANCY JEAN CUNNINGHAM	
	REBECCA ANN YOHO	
	HUBERT C. OTTE ET UX	
	MICHAEL P. OTTE	
	MARK DOUGLAS OTTE	
D	RICHARD JOSEPH OTTE	14-3/2.1
	CAROLINE PENTZIEN	
	PATRICIA GAIL FOSTER	
	NANCY JEAN CUNNINGHAM	
	REBECCA ANN YOHO	
	HUBERT C. OTTE ET UX	
	MICHAEL P. OTTE	
	MARK DOUGLAS OTTE	
E	RICHARD JOSEPH OTTE	14-3/53
	CAROLINE PENTZIEN	
	PATRICIA GAIL FOSTER	
	NANCY JEAN CUNNINGHAM	
	REBECCA ANN YOHO	
	HUBERT C. OTTE ET UX	
	MICHAEL P. OTTE	
	MARK DOUGLAS OTTE	
F	CHARLES RICHARD WILSON	14-3/45

	SURFACE OWNER	DIST-TM/PAR
1	IRENE HAZLETT - LIFE	13-12/49
2	IRENE HAZLETT - LIFE	13-12/47
3	HUBERT C. OTTE ET AL	14-3/2
4	HUBERT C. & JANE E. OTTE	14-3/2.1
5	HUBERT C. & JANE E. OTTE	14-3/53
6	CHARLES RICHARD WILSON	14-3/45

SURFACE HOLE LOCATION (SHL)
UTM 17-NAD83(M)
N:4423432.961
E:524125.443
NAD83, WV NORTH
N:534348.274
E:1627222.668

APPROX. LANDING POINT
UTM 17-NAD83(M)
N:4423101.61
E:524039.46
NAD83, WV NORTH
N:533265.659
E:1626922.325

BOTTOM HOLE LOCATION (BHL)
UTM 17-NAD83(M)
N:4421722.29
E:525150.10
NAD83, WV NORTH
N:528678.461
E:1630491.234

MAY 09, 2018

WW-6A1
(5/13)

Operator's Well No. Hazlett M05H

**INFORMATION SUPPLIED UNDER WEST VIRGINIA CODE
Chapter 22, Article 6A, Section 5(a)(5)
IN LIEU OF FILING LEASE(S) AND OTHER CONTINUING CONTRACT(S)**

Under the oath required to make the verification on page 1 of this Notice and Application, I depose and say that I am the person who signed the Notice and Application for the Applicant, and that –

- (1) the tract of land is the same tract described in this Application, partly or wholly depicted in the accompanying plat, and described in the Construction and Reclamation Plan;
- (2) the parties and recordation data (if recorded) for lease(s) or other continuing contract(s) by which the Applicant claims the right to extract, produce or market the oil or gas are as follows:

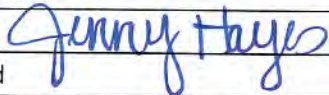
Lease Name or Number	Grantor, Lessor, etc.	Grantee, Lessee, etc.	Royalty	Book/Page
See Attached				

**Acknowledgement of Possible Permitting/Approval
In Addition to the Office of Oil and Gas**

The permit applicant for the proposed well work addressed in this application hereby acknowledges the possibility of the need for permits and/or approvals from local, state, or federal entities in addition to the DEP, Office of Oil and Gas, including but not limited to the following:

- WV Division of Water and Waste Management
- WV Division of Natural Resources WV Division of Highways
- U.S. Army Corps of Engineers
- U.S. Fish and Wildlife Service
- County Floodplain Coordinator

The applicant further acknowledges that any Office of Oil and Gas permit in no way overrides, replaces, or nullifies the need for other permits/approvals that may be necessary and further affirms that all needed permits/approvals should be acquired from the appropriate authority before the affected activity is initiated.

Well Operator: Chevron Appalachia, LLC
 By: Jenny Hayes 
 Its: Permitting Team Lead

4705102096

Hazlett Unit #5H - MARC - BATCH 1 MLS - FINAL

QLS NO	% Owned	Plat ID	Parcel	Lessor	Lessee	Royalty	Book/Page	Assignment #1	Assignment #2	Assignment #3	Assignment #4
934442	6.25%	1	13-0012-0049-0000-0000	Yoho, Donald Boyd	Chevron U.S.A. Inc.	0.18	854/74	-	-	-	-
934443	6.25%	1	13-0012-0049-0000-0000	Mease, Kelly Ann	Chevron U.S.A. Inc.	0.18	859/86	-	-	-	-
934444	12.50%	1	13-0012-0049-0000-0000	Nelisen, Zane Edward	Chevron U.S.A. Inc.	0.18	848/632	-	-	-	-
934837	12.50%	1	13-0012-0049-0000-0000	Baker, Nancy A.	Chevron U.S.A. Inc.	0.18	911/615	-	-	-	-
934842	4.17%	1	13-0012-0049-0000-0000	McCracken, Larry John	Chevron U.S.A. Inc.	0.18	848/581	-	-	-	-
934843	4.17%	1	13-0012-0049-0000-0000	McCracken, Patricia Ann	Chevron U.S.A. Inc.	0.18	848/586	-	-	-	-
934846	4.17%	1	13-0012-0049-0000-0000	McCracken, Robert Jay	Chevron U.S.A. Inc.	0.18	848/591	-	-	-	-
951834	50.00%	1	13-0012-0049-0000-0000	Hazlett, Florence et al	Chevron U.S.A. Inc.	0.1875	949/19	-	-	-	-
951838	6.67%	2	13-0012-0047-0000-0000	Otte, Richard Joseph	Chevron U.S.A. Inc.	0.1875	939/130	-	-	-	-
951840	6.67%	2	13-0012-0047-0000-0000	Pentzien, Caroline	Chevron U.S.A. Inc.	0.1875	950/196	-	-	-	-
951841	6.67%	2	13-0012-0047-0000-0000	Foster, Patricia Gall	Chevron U.S.A. Inc.	0.1875	950/218	-	-	-	-
951842	6.67%	2	13-0012-0047-0000-0000	Cunningham, Nancy Jean	Chevron U.S.A. Inc.	0.1875	950/215	-	-	-	-
951843	6.67%	2	13-0012-0047-0000-0000	Yoho, Rebecca Ann	Chevron U.S.A. Inc.	0.1875	950/212	-	-	-	-
951844	33.33%	2	13-0012-0047-0000-0000	Otte, Hubert C. et ux	Chevron U.S.A. Inc.	0.1875	939/127	-	-	-	-
951846	16.67%	2	13-0012-0047-0000-0000	Otte, Michael P.	Chevron U.S.A. Inc.	0.1875	935/160	-	-	-	-
951847	16.67%	2	13-0012-0047-0000-0000	Otte, Mark Douglas	Chevron U.S.A. Inc.	0.1875	939/180	-	-	-	-
951838	6.67%	3	14-0003-0002-0000-0000	Otte, Richard Joseph	Chevron U.S.A. Inc.	0.1875	939/130	-	-	-	-
951840	6.67%	3	14-0003-0002-0000-0000	Pentzien, Caroline	Chevron U.S.A. Inc.	0.1875	950/196	-	-	-	-
951841	6.67%	3	14-0003-0002-0000-0000	Foster, Patricia Gall	Chevron U.S.A. Inc.	0.1875	950/218	-	-	-	-
951842	6.67%	3	14-0003-0002-0000-0000	Cunningham, Nancy Jean	Chevron U.S.A. Inc.	0.1875	950/215	-	-	-	-
951843	6.67%	3	14-0003-0002-0000-0000	Yoho, Rebecca Ann	Chevron U.S.A. Inc.	0.1875	950/212	-	-	-	-
951844	33.33%	3	14-0003-0002-0000-0000	Otte, Hubert C. et ux	Chevron U.S.A. Inc.	0.1875	939/127	-	-	-	-
951846	16.67%	3	14-0003-0002-0000-0000	Otte, Michael P.	Chevron U.S.A. Inc.	0.1875	935/160	-	-	-	-
951847	16.67%	3	14-0003-0002-0000-0000	Otte, Mark Douglas	Chevron U.S.A. Inc.	0.1875	939/180	-	-	-	-
951838	6.67%	4	14-0003-0002-0001-0000	Otte, Richard Joseph	Chevron U.S.A. Inc.	0.1875	939/130	-	-	-	-
951840	6.67%	4	14-0003-0002-0001-0000	Pentzien, Caroline	Chevron U.S.A. Inc.	0.1875	950/196	-	-	-	-
951841	6.67%	4	14-0003-0002-0001-0000	Foster, Patricia Gall	Chevron U.S.A. Inc.	0.1875	950/218	-	-	-	-
951842	6.67%	4	14-0003-0002-0001-0000	Cunningham, Nancy Jean	Chevron U.S.A. Inc.	0.1875	950/215	-	-	-	-
951843	6.67%	4	14-0003-0002-0001-0000	Yoho, Rebecca Ann	Chevron U.S.A. Inc.	0.1875	950/212	-	-	-	-
951844	33.33%	4	14-0003-0002-0001-0000	Otte, Hubert C. et ux	Chevron U.S.A. Inc.	0.1875	939/127	-	-	-	-
951846	16.67%	4	14-0003-0002-0001-0000	Otte, Michael P.	Chevron U.S.A. Inc.	0.1875	935/160	-	-	-	-
951847	16.67%	4	14-0003-0002-0001-0000	Otte, Mark Douglas	Chevron U.S.A. Inc.	0.1875	939/180	-	-	-	-
951838	6.67%	5	14-0003-0053-0000-0000	Otte, Richard Joseph	Chevron U.S.A. Inc.	0.1875	939/130	-	-	-	-
951840	6.67%	5	14-0003-0053-0000-0000	Pentzien, Caroline	Chevron U.S.A. Inc.	0.1875	950/196	-	-	-	-
951841	6.67%	5	14-0003-0053-0000-0000	Foster, Patricia Gall	Chevron U.S.A. Inc.	0.1875	950/218	-	-	-	-
951842	6.67%	5	14-0003-0053-0000-0000	Cunningham, Nancy Jean	Chevron U.S.A. Inc.	0.1875	950/215	-	-	-	-
951843	6.67%	5	14-0003-0053-0000-0000	Yoho, Rebecca Ann	Chevron U.S.A. Inc.	0.1875	950/212	-	-	-	-
951844	33.33%	5	14-0003-0053-0000-0000	Otte, Hubert C. et ux	Chevron U.S.A. Inc.	0.1875	939/127	-	-	-	-
951846	16.67%	5	14-0003-0053-0000-0000	Otte, Michael P.	Chevron U.S.A. Inc.	0.1875	935/160	-	-	-	-
951847	16.67%	5	14-0003-0053-0000-0000	Otte, Mark Douglas	Chevron U.S.A. Inc.	0.1875	939/180	-	-	-	-
867043	100.00%	6	14-0003-0045-0000-0000	Wilson, Charles Richard	NPAR, LLC	0.1875	696/82	24/382 AB Resources LLC & NPAR, LLC to Chief Exploration & Development, LLC & Radler 2000 Limited Partnership	25/105 Chief Exploration & Development LLC et al & Radler 2000 Limited Partnership to Chevron U.S.A. Inc.	756/332 NPAR, LLC to Chevron U.S.A. Inc.	-

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Office of Oil and Gas

NOV 27 2018

WV Department of
Environmental Protection



4705 1 02096

Mitchell G. Limbert
Land Representative, AMBU

March 21, 2018

West Virginia D.E.P.
Office of Oil & Gas
601 57th Street SE
Charleston, WV 25304-2345

RE: Hazlett 2H, 3H, 5H

To Whom It May Concern,

This letter is to confirm that Chevron U.S.A., Inc. has the rights to access minerals under any road along the above referenced laterals. If you should have any further questions or need additional documentation, please feel free to contact me.

Sincerely,

A handwritten signature in black ink, appearing to read "M G Limbert", written in a cursive style.

Mitchell G. Limbert
Land Representative

4705102096

STATE OF WEST VIRGINIA
DEPARTMENT OF ENVIRONMENTAL PROTECTION, OFFICE OF OIL AND GAS
NOTICE CERTIFICATION

Date of Notice Certification: 05/10/2018

API No. 47- _____
Operator's Well No. M05H
Well Pad Name: Hazlett

Notice has been given:

Pursuant to the provisions in West Virginia Code § 22-6A, the Operator has provided the required parties with the Notice Forms listed below for the tract of land as follows:

State: <u>West Virginia</u>	UTM NAD 83	Easting: <u>524125.443</u>
County: <u>Marshall</u>		Northing: <u>4423432.961</u>
District: <u>Union</u>	Public Road Access: <u>CR 10 Markey Lane</u>	
Quadrangle: <u>Moundsville, WV 7.5'</u>	Generally used farm name: <u>Hazlett</u>	
Watershed: <u>Short Creek - Ohio River</u>		

Pursuant to West Virginia Code § 22-6A-7(b), every permit application filed under this section shall be on a form as may be prescribed by the secretary, shall be verified and shall contain the following information: (14) A certification from the operator that (i) it has provided the owners of the surface described in subdivisions (1), (2) and (4), subsection (b), section ten of this article, the information required by subsections (b) and (c), section sixteen of this article; (ii) that the requirement was deemed satisfied as a result of giving the surface owner notice of entry to survey pursuant to subsection (a), section ten of this article six-a; or (iii) the notice requirements of subsection (b), section sixteen of this article were waived in writing by the surface owner; and Pursuant to West Virginia Code § 22-6A-11(b), the applicant shall tender proof of and certify to the secretary that the notice requirements of section ten of this article have been completed by the applicant.

<p>Pursuant to West Virginia Code § 22-6A, the Operator has attached proof to this Notice Certification that the Operator has properly served the required parties with the following:</p> <p>*PLEASE CHECK ALL THAT APPLY</p> <p><input type="checkbox"/> 1. NOTICE OF SEISMIC ACTIVITY or <input checked="" type="checkbox"/> NOTICE NOT REQUIRED BECAUSE NO SEISMIC ACTIVITY WAS CONDUCTED</p> <p><input type="checkbox"/> 2. NOTICE OF ENTRY FOR PLAT SURVEY or <input checked="" type="checkbox"/> NO PLAT SURVEY WAS CONDUCTED</p> <p><input checked="" type="checkbox"/> 3. NOTICE OF INTENT TO DRILL or <input type="checkbox"/> NOTICE NOT REQUIRED BECAUSE NOTICE OF ENTRY FOR PLAT SURVEY WAS CONDUCTED or</p> <p><input type="checkbox"/> WRITTEN WAIVER BY SURFACE OWNER (PLEASE ATTACH)</p> <p><input checked="" type="checkbox"/> 4. NOTICE OF PLANNED OPERATION</p> <p><input checked="" type="checkbox"/> 5. PUBLIC NOTICE</p> <p><input checked="" type="checkbox"/> 6. NOTICE OF APPLICATION</p>	<p>OOG OFFICE USE ONLY</p> <p><input type="checkbox"/> RECEIVED/ NOT REQUIRED</p> <p><input type="checkbox"/> RECEIVED</p> <p><input checked="" type="checkbox"/> RECEIVED/ NOT REQUIRED</p> <p><input checked="" type="checkbox"/> RECEIVED</p> <p><input checked="" type="checkbox"/> RECEIVED</p> <p><input checked="" type="checkbox"/> RECEIVED</p>
---	---

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Office of Oil and Gas
AUG 3 2018
WV Department of
Environmental Protection

Required Attachments:

The Operator shall attach to this Notice Certification Form all Notice Forms and Certifications of Notice that have been provided to the required parties and/or any associated written waivers. For the Public Notice, the operator shall attach a copy of the Class II Legal Advertisement with publication date verification or the associated Affidavit of Publication. The attached Notice Forms and Certifications of Notice shall serve as proof that the required parties have been noticed as required under West Virginia Code § 22-6A. Pursuant to West Virginia Code § 22-6A-11(b), the Certification of Notice to the person may be made by affidavit of personal service, the return receipt card or other postal receipt for certified mailing.

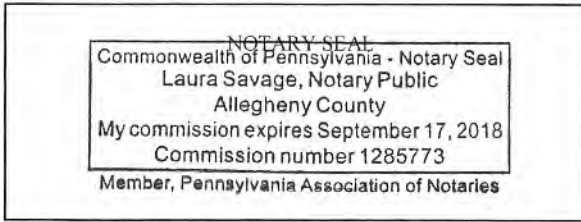
4705 02096

Certification of Notice is hereby given:

THEREFORE, I Jenny Hayes, have read and understand the notice requirements within West Virginia Code § 22-6A. I certify that as required under West Virginia Code § 22-6A, I have served the attached copies of the Notice Forms, identified above, to the required parties through personal service, by registered mail or by any method of delivery that requires a receipt or signature confirmation. I certify under penalty of law that I have personally examined and am familiar with the information submitted in this Notice Certification and all attachments, and that based on my inquiry of those individuals immediately responsible for obtaining the information, I believe that the information is true, accurate and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment.

Jenny Hayes

Well Operator:	<u>Chevron Appalachia, LLC</u>	Address:	<u>700 Cherrington Parkway</u>
By:	<u>Jenny Hayes</u>		<u>Coraopolis, PA 15108</u>
Its:	<u>Permitting Team Lead</u>	Facsimile:	<u>412-865-2403</u>
Telephone:	<u>412-865-1533</u>	Email:	<u>JZYK@chevron.com</u>



Commonwealth of Pennsylvania
County of Allegheny
Subscribed and sworn before me this 2nd day of August, 2018.
Laura Savage

Notary Public
My Commission Expires September 17, 2018

Oil and Gas Privacy Notice:

The Office of Oil and Gas processes your personal information, such as name, address and telephone number, as part of our regulatory duties. Your personal information may be disclosed to other State agencies or third parties in the normal course of business or as needed to comply with statutory or regulatory requirements, including Freedom of Information Act requests. Our office will appropriately secure your personal information. If you have any questions about our use or your personal information, please contact DEP's Chief Privacy Officer at depprivacyofficer@wv.gov.

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Office of Oil and Gas
AUG 3 2018
WV Department of
Environmental Protection

**STATE OF WEST VIRGINIA
DEPARTMENT OF ENVIRONMENTAL PROTECTION, OFFICE OF OIL AND GAS
NOTICE OF APPLICATION**

Notice Time Requirement: notice shall be provided no later than the **filing date of permit application.**

Date of Notice: 05/10/2018 **Date Permit Application Filed:** 8/2/18

Notice of:

- PERMIT FOR ANY WELL WORK
- CERTIFICATE OF APPROVAL FOR THE CONSTRUCTION OF AN IMPOUNDMENT OR PIT

Delivery method pursuant to West Virginia Code § 22-6A-10(b)

- PERSONAL SERVICE
- REGISTERED MAIL
- METHOD OF DELIVERY THAT REQUIRES A RECEIPT OR SIGNATURE CONFIRMATION

Pursuant to W. Va. Code § 22-6A-10(b) no later than the filing date of the application, the applicant for a permit for any well work or for a certificate of approval for the construction of an impoundment or pit as required by this article shall deliver, by personal service or by registered mail or by any method of delivery that requires a receipt or signature confirmation, copies of the application, the erosion and sediment control plan required by section seven of this article, and the well plat to each of the following persons: (1) The owners of record of the surface of the tract on which the well is or is proposed to be located; (2) The owners of record of the surface tract or tracts overlying the oil and gas leasehold being developed by the proposed well work, if the surface tract is to be used for roads or other land disturbance as described in the erosion and sediment control plan submitted pursuant to subsection (c), section seven of this article; (3) The coal owner, operator or lessee, in the event the tract of land on which the well proposed to be drilled is located [sic] is known to be underlain by one or more coal seams; (4) The owners of record of the surface tract or tracts overlying the oil and gas leasehold being developed by the proposed well work, if the surface tract is to be used for the placement, construction, enlargement, alteration, repair, removal or abandonment of any impoundment or pit as described in section nine of this article; (5) Any surface owner or water purveyor who is known to the applicant to have a water well, spring or water supply source located within one thousand five hundred feet of the center of the well pad which is used to provide water for consumption by humans or domestic animals; and (6) The operator of any natural gas storage field within which the proposed well work activity is to take place. (c)(1) If more than three tenants in common or other co-owners of interests described in subsection (b) of this section hold interests in the lands, the applicant may serve the documents required upon the person described in the records of the sheriff required to be maintained pursuant to section eight, article one, chapter eleven-a of this code. (2) Notwithstanding any provision of this article to the contrary, notice to a lien holder is not notice to a landowner, unless the lien holder is the landowner. W. Va. Code R. § 35-8-5.7.a requires, in part, that the operator shall also provide the Well Site Safety Plan ("WSSP") to the surface owner and any water purveyor or surface owner subject to notice and water testing as provided in section 15 of this rule.

Application Notice WSSP Notice E&S Plan Notice Well Plat Notice is hereby provided to:

SURFACE OWNER(s)

Name: Florence Irene Hazlett (Life Estate Interest)
Address: 648 Markey Hill Lane
Glen Dale, WV 26038

Name: Michael C. Hazlett (Remainder Interest)
Address: 648 Markey Hill Lane
Glen Dale, WV 26038

SURFACE OWNER(s) (Road and/or Other Disturbance)

Name: _____
Address: _____

Name: _____
Address: _____

SURFACE OWNER(s) (Impoundments or Pits)

Name: _____
Address: _____

COAL OWNER OR LESSEE

Name: Consol Mining Company, LLC
Address: 1000 Consol Energy Drive
Canonsburg, PA 15317

COAL OPERATOR

Name: _____
Address: _____

SURFACE OWNER OF WATER WELL AND/OR WATER PURVEYOR(s)

Name: See Attached
Address: _____

OPERATOR OF ANY NATURAL GAS STORAGE FIELD

Name: _____
Address: _____

*Please attach additional forms if necessary

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WV Department of
Environmental Protection

Notice is hereby given:

Pursuant to West Virginia Code § 22-6A-10(b), notice is hereby given that the undersigned well operator has applied for a permit for well work or for a certificate of approval for the construction of an impoundment or pit.

This Notice Shall Include:

Pursuant to W. Va. Code § 22-6A-10(b), this notice shall include: (1) copies of the application; (2) the erosion and sediment control plan required by section seven of this article; and (3) the well plat.

Pursuant to W. Va. Code § 22-6A-10(f), this notice shall include: (1) a statement of the time limits for filing written comments; (2) who may file written comments; (3) the name and address of the secretary for the purpose of filing the comments and obtaining additional information; and (4) a statement that the persons may request, at the time of submitting written comments, notice of the permit decision and a list of persons qualified to test water.

Pursuant to W. Va. Code R. § 35-8-5.7.a, the operator shall provide the Well Site Safety Plan to the surface owner and any water purveyor or surface owner subject to notice and water testing as provided in section 15 of this rule.

Pursuant to W. Va. Code R. § 35-8-15.2.c, this notice shall: (1) contain a statement of the surface owner's and water purveyor's right to request sampling and analysis; (2) advise the surface owner and water purveyor of the rebuttable presumption for contamination or deprivation of a fresh water source or supply; advise the surface owner and water purveyor that refusal to allow the operator to conduct a pre-drilling water well test constitutes a method to rebut the presumption of liability; (3) advise the surface owner and water purveyor of his or her independent right to sample and analyze any water supply at his or her own expense; advise the surface owner and water purveyor whether or not the operator will utilize an independent laboratory to analyze any sample; and (4) advise the surface owner and or water purveyor that he or she can obtain from the Chief a list of water testing laboratories in the subject area capable of and qualified to test water supplies in accordance with standard acceptable methods.

Additional information related to horizontal drilling may be obtained from the Secretary, at the WV Department of Environmental Protection headquarters, located at 601 57th Street, SE, Charleston, WV 25304 (304-926-0450) or by visiting www.dep.wv.gov/and-gas/pages/default.aspx.

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Department of Environmental Protection

Well Location Restrictions

Pursuant to W. Va. Code § 22-6A-12, Wells may not be drilled within two hundred fifty feet measured horizontally from a water well or developed spring used for human or domestic animal consumption. The center of well pads may not be located within six hundred twenty-five feet of an occupied dwelling structure, or a building two thousand five hundred square feet or larger used to house or shelter dairy cattle or poultry husbandry. This limitation is applicable to those wells, developed springs, dwellings or agricultural buildings that existed on the date a notice to the surface owner of planned entry for surveying or staking as provided in section ten of this article or a notice of intent to drill a horizontal well as provided in subsection (b), section sixteen of this article was provided, whichever occurs first, and to any dwelling under construction prior to that date. This limitation may be waived by written consent of the surface owner transmitted to the department and recorded in the real property records maintained by the clerk of the county commission for the county in which such property is located. Furthermore, the well operator may be granted a variance by the secretary from these distance restrictions upon submission of a plan which identifies the sufficient measures, facilities or practices to be employed during well site construction, drilling and operations. The variance, if granted, shall include terms and conditions the department requires to ensure the safety and protection of affected persons and property. The terms and conditions may include insurance, bonding and indemnification, as well as technical requirements. (b) No well pad may be prepared or well drilled within one hundred feet measured horizontally from any perennial stream, natural or artificial lake, pond or reservoir, or a wetland, or within three hundred feet of a naturally reproducing trout stream. No well pad may be located within one thousand feet of a surface or ground water intake of a public water supply. The distance from the public water supply as identified by the department shall be measured as follows: (1) For a surface water intake on a lake or reservoir, the distance shall be measured from the boundary of the lake or reservoir. (2) For a surface water intake on a flowing stream, the distance shall be measured from a semicircular radius extending upstream of the surface water intake. (3) For a groundwater source, the distance shall be measured from the wellhead or spring. The department may, in its discretion, waive these distance restrictions upon submission of a plan identifying sufficient measures, facilities or practices to be employed during well site construction, drilling and operations to protect the waters of the state. A waiver, if granted, shall impose any permit conditions as the secretary considers necessary. (c) Notwithstanding the foregoing provisions of this section, nothing contained in this section prevents an operator from conducting the activities permitted or authorized by a Clean Water Act Section 404 permit or other approval from the United States Army Corps of Engineers within any waters of the state or within the restricted areas referenced in this section. (d) The well location restrictions set forth in this section shall not apply to any well on a multiple well pad if at least one of the wells was permitted prior to the effective date of this article. (e) The secretary shall, by December 31, 2012, report to the Legislature on the noise, light, dust and volatile organic compounds generated by the drilling of horizontal wells as they relate to the well location restrictions regarding occupied dwelling structures pursuant to this section. Upon a finding, if any, by the secretary that the well location restrictions regarding occupied dwelling structures are inadequate or otherwise require alteration to address the items

examined in the study required by this subsection, the secretary shall have the authority to propose for promulgation legislative rules establishing guidelines and procedures regarding reasonable levels of noise, light, dust and volatile organic compounds relating to drilling horizontal wells, including reasonable means of mitigating such factors, if necessary.

Water Well Testing:

Pursuant to West Virginia Code § 22-6A-10(d), notification shall be made, with respect to surface landowners identified in subsection (b) or water purveyors identified in subdivision (5), subsection (b) of this section, of the opportunity for testing their water well. The operator shall provide an analysis to such surface landowner or water purveyor at their request.

Water Testing Laboratories:

Pursuant to West Virginia Code § 22-6A-10(i), persons entitled to notice pursuant to subsection (b) of this section may contact the department to ascertain the names and locations of water testing laboratories in the subject area capable and qualified to test water supplies in accordance with standard accepted methods. In compiling that list of names the department shall consult with the state Bureau for Public Health and local health departments. A surface owner and water purveyor has an independent right to sample and analyze any water supply at his or her own expense. The laboratory utilized by the operator shall be approved by the agency as being certified and capable of performing sample analyses in accordance with this section.

Rebuttable Presumption for Contamination or Deprivation of a Fresh Water Source or Supply:

W. Va. Code § 22-6A-18 requires that (b) unless rebutted by one of the defenses established in subsection (c) of this section, in any action for contamination or deprivation of a fresh water source or supply within one thousand five hundred feet of the center of the well pad for horizontal well, there is a rebuttable presumption that the drilling and the oil or gas well or either was the proximate cause of the contamination or deprivation of the fresh water source or supply. (c) In order to rebut the presumption of liability established in subsection (b) of this section, the operator must prove by a preponderance of the evidence one of the following defenses: (1) The pollution existed prior to the drilling or alteration activity as determined by a predrilling or prealteration water well test. (2) The landowner or water purveyor refused to allow the operator access to the property to conduct a predrilling or prealteration water well test. (3) The water supply is not within one thousand five hundred feet of the well. (4) The pollution occurred more than six months after completion of drilling or alteration activities. (5) The pollution occurred as the result of some cause other than the drilling or alteration activity. (d) Any operator electing to preserve its defenses under subdivision (1), subsection (c) of this section shall retain the services of an independent certified laboratory to conduct the predrilling or prealteration water well test. A copy of the results of the test shall be submitted to the department and the surface owner or water purveyor in a manner prescribed by the secretary. (e) Any operator shall replace the water supply of an owner of interest in real property who obtains all or part of that owner's supply of water for domestic, agricultural, industrial or other legitimate use from an underground or surface source with a comparable water supply where the secretary determines that the water supply has been affected by contamination, diminution or interruption proximately caused by the oil or gas operation, unless waived in writing by that owner. (f) The secretary may order the operator conducting the oil or gas operation to: (1) Provide an emergency drinking water supply within twenty-four hours; (2) Provide temporary water supply within seventy-two hours; (3) Within thirty days begin activities to establish a permanent water supply or submit a proposal to the secretary outlining the measures and timetables to be used in establishing a permanent supply. The total time in providing a permanent water supply may not exceed two years. If the operator demonstrates that providing a permanent replacement water supply cannot be completed within two years, the secretary may extend the time frame on case-by-case basis; and (4) Pay all reasonable costs incurred by the real property owner in securing a water supply. (g) A person as described in subsection (b) of this section aggrieved under the provisions of subsections (b), (e) or (f) of this section may seek relief in court... (i) Notwithstanding the denial of the operator of responsibility for the damage to the real property owner's water supply or the status of any appeal on determination of liability for the damage to the real property owner's water supply, the operator may not discontinue providing the required water service until authorized to do so by the secretary or a court of competent jurisdiction.

Written Comment:

Pursuant to West Virginia Code § 22-6A-11(a), all persons described in subsection (b), section ten of this article may file written comments with the secretary as to the location or construction of the applicant's proposed well work within thirty days after the application is filed with the secretary. All persons described in West Virginia Code § 22-6A-10(b) may file written comments as to the location or construction of the applicant's proposed well work to the Secretary at:

Chief, Office of Oil and Gas
Department of Environmental Protection
601 57th St. SE
Charleston, WV 25304
(304) 926-0450

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Such persons may request, at the time of submitting written comments, notice of the permit decision and a list of persons qualified to test water. **NOTE: YOU ARE NOT REQUIRED TO FILE ANY COMMENT.**

Time Limits and Methods for Filing Comments.

The law requires these materials to be served on or before the date the operator files its Application. You have **THIRTY (30) DAYS** after the filing date to file your comments. Comments must be filed in person or received in the mail by the Chief's office by the time stated above. You may call the Chief's office to be sure of the date. Check with your postmaster to ensure adequate delivery time or to arrange special expedited handling. If you have been contacted by the well operator and you have signed a "voluntary statement of no objection" to the planned work described in these materials, then the permit may be issued at any time.

Pursuant to West Virginia Code § 22-6A-11(c)(2), Any objections of the affected coal operators and coal seam owners and lessees shall be addressed through the processes and procedures that exist under sections fifteen, seventeen and forty, article six of this chapter, as applicable and as incorporated into this article by section five of this article. The written comments filed by the parties entitled to notice under subdivisions (1), (2), (4), (5) and (6), subsection (b), section ten of this article shall be considered by the secretary in the permit issuance process, but the parties are not entitled to participate in the processes and proceedings that exist under sections fifteen, seventeen or forty, article six of this chapter, as applicable and as incorporated into this article by section five of this article.

Comment Requirements

Your comments must be in writing and include your name, address and telephone number, the well operator's name and well number and the approximate location of the proposed well site including district and county from the application. You may add other documents, such as sketches, maps or photographs to support your comments.

Disclaimer: All comments received will be placed on our web site <http://www.dep.wv.gov/oil-and-gas/Horizontal-Permits/Pages/default.aspx> and the applicant will automatically be forwarded an email notice that such comments have been submitted. The applicant will be expected to provide a response to comments submitted by any surface owner, water purveyor or natural gas storage operator noticed within the application.

Permit Denial or Condition

The Chief has the power to deny or condition a well work permit. Pursuant to West Virginia Code § 22-6A-8(d), the permit may not be issued or be conditioned, including conditions with respect to the location of the well and access roads prior to issuance if the director determines that:

- (1) The proposed well work will constitute a hazard to the safety of persons;
- (2) The plan for soil erosion and sediment control is not adequate or effective;
- (3) Damage would occur to publicly owned lands or resources; or
- (4) The proposed well work fails to protect fresh water sources or supplies.

A permit may also be denied under West Virginia Code § 22-6A-7(k), the secretary shall deny the issuance of a permit if the secretary determines that the applicant has committed a substantial violation of a previously issued permit for a horizontal well, including the applicable erosion and sediment control plan associated with the previously issued permit, or a substantial violation of one or more of the rules promulgated under this article, and in each instance has failed to abate or seek review of the violation within the time prescribed by the secretary pursuant to the provisions of subdivisions (1) and (2), subsection (a), section five of this article and the rules promulgated hereunder, which time may not be unreasonable.

Pursuant to West Virginia Code § 22-6A-10(g), any person entitled to submit written comments to the secretary pursuant to subsection (a), section eleven of this article, shall also be entitled to receive from the secretary a copy of the permit as issued or a copy of the order modifying or denying the permit if the person requests receipt of them as a part of the written comments submitted concerning the permit application. Such persons may request, at the time of submitting written comments, notice of the permit decision and a list of persons qualified to test water.

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WW-6A
(8-13)

API NO. 47- _____ - _____
OPERATOR WELL NO. 05H
Well Pad Name: Hazlett

4705 02096

Notice is hereby given by:

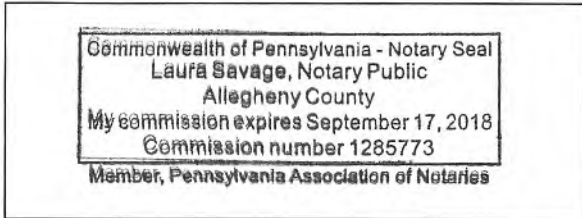
Well Operator: Chevron Appalachia, LLC
Telephone: 412-865-1533
Email: JZYK@chevron.com

Address: 700 Cherrington Parkway
Coraopolis, PA 15108
Facsimile: 412-865-2403

Oil and Gas Privacy Notice:

The Office of Oil and Gas processes your personal information, such as name, address and telephone number, as part of our regulatory duties. Your personal information may be disclosed to other State agencies or third parties in the normal course of business or as needed to comply with statutory or regulatory requirements, including Freedom of Information Act requests. Our office will appropriately secure your personal information. If you have any questions about our use or your personal information, please contact DEP's Chief Privacy Officer at depprivacyofficer@wv.gov.

Jenny Hayes



COMMONWEALTH OF PENNSYLVANIA
COUNTY OF ALLEGHENY

Subscribed and sworn before me this 9th day of May, 2018.

Laura Savage

Notary Public

My Commission Expires September 17, 2018

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Environmental Protection

4705102096

Attachment to WW-6A

API No. 47- _____ - _____

OPERATOR WELL NO. M05H

Well Pad Name: Hazlett

SURFACE OWNER

Name: Loretta Kay Wallace (Remainder Interest)
Address: 1485 Missy Court
Hamilton, OH 45013

COAL OWNER OR LESSEE

Name: Consol Mining Company, LLC
Address: 1000 Consol Energy Drive
Canonsburg, PA 15317

COAL OPERATOR

Name:
Address:

SURFACE OWNER OF WATER WELL AND/OR WATER PURVEYOR

Name: Thomas D & Janet E. Vickers
Address: 1526 Little Grave Creek Drive
Glen Dale, WV 26038

SURFACE OWNER OF WATER WELL AND/OR WATER PURVEYOR

Name:
Address:

SURFACE OWNER OF WATER WELL AND/OR WATER PURVEYOR

Name:
Address:

SURFACE OWNER OF WATER WELL AND/OR WATER PURVEYOR

Name:
Address:

SURFACE OWNER OF WATER WELL AND/OR WATER PURVEYOR

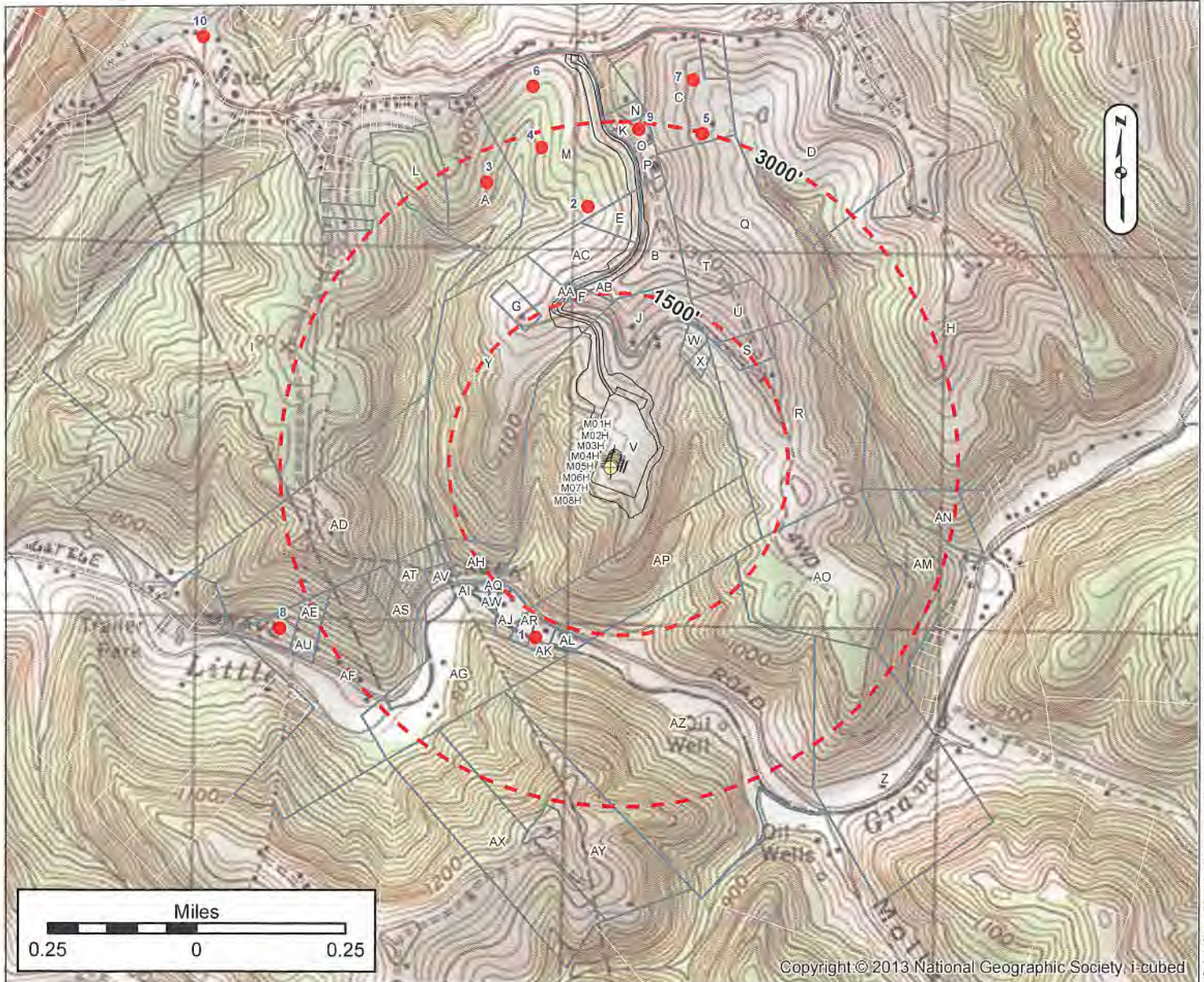
Name:
Address:

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WATER SUPPLY EXHIBIT HAZLETT PAD A BATCH #1

4705 * 02096
GES



LOT OWNERS

Label	Owner	TM	Label	Owner	TM	Label	Owner	TM	Label	Owner	TM
A	KEY GLADYS E - LIFE	25-13 12002700000000	N	OTTE MICHAEL P	25-13 12003100000000	AB	CALISSIE TIMOTHY J	25-13 12005000050000	AD	OTTE HUBERT C ET AL	25-13 12004300000000
B	OTTE MARK DOUGLAS ET UX	25-13 12005000040000	O	OTTE HUBERT CHAS & JANE E	25-13 12003200010000	AC	KIDNEY JARROD S & TIMMI L	25-13 12005000060000	AP	HAZLETT IRENE - LIFE	25-13 12004700000000
C	OTTE MICHAEL P & DENISE A	25-13 12003500010000	P	OTTE MARK D	25-13 12003300000000	AD	MAST LEVI C ET AL	25-13 12005100000000	AQ	KOSKI TEDDY F & EMMA JANE	25-13 12004800030000
D	ANGEL ADAM S JR	25-13 11005100000000	Q	OTTE MARK D & KELLY J	25-13 12003500000000	AE	MCCLINTOCK LARRY L & AUCIA S	25-14 10016000400000	AR	RHODES LISA & NORMAN L	25-13 12004800040000
E	LEACH CHARLES L JR	25-13 12005000070000	R	GLENDALE CITY OF	25-13 12004400000000	AF	YODER ELI A ET AL	25-14 10016000000000	AS	YODER ELI A ET AL	25-14 10016000100000
F	CALISSIE TIMOTHY J ET UX	25-13 12005000020000	S	GLEN DALE TOWN OF	25-13 12004500000000	AG	KOSKI TEDDY F ET UX	25-14 10017000000000	AT	YODER ELI A ET AL	25-14 10016000200000
G	KIDNEY JARROD S & TIMMI L	25-13 12005000080000	T	HAZLETT IRENE - LIFE	25-13 12004600010000	AH	SPRINGER BARBARA K	25-13 12005000010000	AU	NGUYEN LAMSON N ET UX	25-14 10016000300000
H	KURELAC PATRICIA A	25-13 12003600000000	U	HAZLETT FLORENCE IRENE - LIFE	25-13 12004600010000	AI	VOELINGER JOHN & LORI	25-13 12005000090000	AV	SPRINGER BARBARA K	25-14 10016000500000
I	REILLY JOHN WILLIAM III ET AL	25-13 12001400000000	V	HAZLETT IRENE - LIFE	25-13 12004900000000	AJ	LINZY LINDA A	25-13 12004800020000	AW	LINZY LINDA A	25-14 10017000100000
J	HAZLETT FLORENCE IRENE - LIFE	25-13 12004900030000	W	HAZLETT MICHAEL C - LIFE	25-13 12004900010000	AK	VICKERS MARY E EST	25-13 12004800000000	AX	MARSHALL COUNTY PARK & REC	25-14 20008000000000
K	OTTE HUBERT CHAS & JANE E	25-13 12003200000000	X	HAZLETT MICHAEL C - LIFE	25-13 12004900020000	AL	VICKERS THOMAS D & JANET E	25-13 12004800010000	AY	MARSHALL COUNTY PARK & REC	25-14 20008000000000
L	BURCH LESTER M ET UX	25-13 12002600000000	Y	CALISSIE TIMOTHY J ET UX	25-13 12005000000000	AM	ROBINSON GARY A	25-13 12004300010000	AZ	OTTE HUBERT C ET AL	25-14 30003000000000
M	OTTE THOMAS L ET AL - LIFE	25-13 12002800000000	AA	CALISSIE TIMOTHY J ET UX	25-13 12005000030000	AN	RICHARDS CHRISTINE	25-13 12004200010000	Z	OTTE HUBERT C ET AL	25-14 30003000000000

Surface Owner: IRENE HAZLETT
 Oil/Gas Owner: IRENE HAZLETT
 Well Operator: CHEVRON APPALACHIA, LLC
 Address: 700 CHERRINGTON PARKWAY
CORAOPOLIS, PA 15108
 Phone: 724-564-3700

County: MARSHALL
 Township: GLEN DALE, WV
 Surveyor: SERVICES, INC.
 Address: 301 COMMERCE PARK DR
CRANBERRY TOWNSHIP, PA 16066
 Phone: 800-267-2549

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 WV Department of Environmental Protection

NOTICE: THE INTENT OF THIS EXHIBIT IS TO IDENTIFY EXISTING WATER SUPPLIES IN THE VICINITY OF A PHOTOGRAPHED GAS WELL, AND IS NOT A COMPLETE BOUNDARY SURVEY. PROPERTY LINES AND OWNER INFORMATION WERE OBTAINED FROM DEEDS, TAX RECORDS, AERIAL PHOTOGRAPHY, GIS, AND FIELD SURVEYED EVIDENCE.

4705102096

**STATE OF WEST VIRGINIA
DEPARTMENT OF ENVIRONMENTAL PROTECTION, OFFICE OF OIL AND GAS
NOTICE OF INTENT TO DRILL**

Pursuant to W. Va. Code § 22-6A-16(b), the Notice of Intent to Drill is only required if the notice requirements of W. Va. Code § 22-6A-10(a) have NOT been met or if the Notice of Intent to Drill requirement has NOT been waived in writing by the surface owner.

Notice Time Requirement: Notice shall be provided at least TEN (10) days prior to filing a permit application.
Date of Notice: 05/10/2018 **Date Permit Application Filed:** 8/2/18

Delivery method pursuant to West Virginia Code § 22-6A-16(b)

HAND DELIVERY CERTIFIED MAIL RETURN RECEIPT REQUESTED

Pursuant to W. Va. Code § 22-6A-16(b), at least ten days prior to filing a permit application, an operator shall, by certified mail return receipt requested or hand delivery, give the surface owner notice of its intent to enter upon the surface owner's land for the purpose of drilling a horizontal well: *Provided*, That notice given pursuant to subsection (a), section ten of this article satisfies the requirements of this subsection as of the date the notice was provided to the surface owner: *Provided, however*, That the notice requirements of this subsection may be waived in writing by the surface owner. The notice, if required, shall include the name, address, telephone number, and if available, facsimile number and electronic mail address of the operator and the operator's authorized representative.

Notice is hereby provided to the SURFACE OWNER(s):

Name: Loretta Kay Wallace (Remainder Interest)
Address: 1485 Missy Court
Hamilton, OH 45013

Name: _____
Address: _____

Notice is hereby given:

Pursuant to West Virginia Code § 22-6A-16(b), notice is hereby given that the undersigned well operator has an intent to enter upon the surface owner's land for the purpose of drilling a horizontal well on the tract of land as follows:

State:	<u>West Virginia</u>	UTM NAD 83	Easting:	<u>524125.443</u>
County:	<u>Marshall</u>		Northing:	<u>4423432.961</u>
District:	<u>Union</u>	Public Road Access:	<u>CR 10 Markey Lane</u>	
Quadrangle:	<u>Moundsville, WV 7.5'</u>	Generally used farm name:	<u>Hazlett</u>	
Watershed:	<u>Short Creek - Ohio River</u>			

This Notice Shall Include:

Pursuant to West Virginia Code § 22-6A-16(b), this notice shall include the name, address, telephone number, and if available, facsimile number and electronic mail address of the operator and the operator's authorized representative. Additional information related to horizontal drilling may be obtained from the Secretary, at the WV Department of Environmental Protection headquarters, located at 601 57th Street, SE, Charleston, WV 25304 (304-926-0450) or by visiting www.dep.wv.gov/oil-and-gas/pages/default.aspx.

Notice is hereby given by:

Well Operator: Chevron Appalachia, LLC
Address: 700 Cherrington Parkway
Coraopolis, PA 15108
Telephone: 412-865-2504
Email: slaird@chevron.com
Facsimile: 412-865-2403

Authorized Representative: _____
Address: _____
Telephone: _____
Email: _____
Facsimile: _____

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Environmental Protection

Oil and Gas Privacy Notice:

The Office of Oil and Gas processes your personal information, such as name, address and telephone number, as part of our regulatory duties. Your personal information may be disclosed to other State agencies or third parties in the normal course of business or as needed to comply with statutory or regulatory requirements, including Freedom of Information Act requests. Our office will appropriately secure your personal information. If you have any questions about our use or your personal information, please contact DEP's Chief Privacy Officer at depprivacyofficer@wv.gov.

**STATE OF WEST VIRGINIA
DEPARTMENT OF ENVIRONMENTAL PROTECTION, OFFICE OF OIL AND GAS
NOTICE OF PLANNED OPERATION**

Notice Time Requirement: notice shall be provided no later than the filing date of permit application.

Date of Notice: 05/10/2018 **Date Permit Application Filed:** 8/2/18

Delivery method pursuant to West Virginia Code § 22-6A-16(c)

- CERTIFIED MAIL
RETURN RECEIPT REQUESTED
- HAND
DELIVERY

Pursuant to W. Va. Code § 22-6A-16(c), no later than the date for filing the permit application, an operator shall, by certified mail return receipt requested or hand delivery, give the surface owner whose land will be used for the drilling of a horizontal well notice of the planned operation. The notice required by this subsection shall include: (1) A copy of this code section; (2) The information required to be provided by subsection (b), section ten of this article to a surface owner whose land will be used in conjunction with the drilling of a horizontal well; and (3) A proposed surface use and compensation agreement containing an offer of compensation for damages to the surface affected by oil and gas operations to the extent the damages are compensable under article six-b of this chapter. (d) The notices required by this section shall be given to the surface owner at the address listed in the records of the sheriff at the time of notice.

Notice is hereby provided to the SURFACE OWNER(s)
(at the address listed in the records of the sheriff at the time of notice):

Name: Loretta Kay Wallace (Remainder Interest)
Address: 1485 Missy Court
Hamilton, OH 45013

Name: _____
Address: _____

Notice is hereby given:

Pursuant to West Virginia Code § 22-6A-16(c), notice is hereby given that the undersigned well operator has developed a planned operation on the surface owner's land for the purpose of drilling a horizontal well on the tract of land as follows:

State: West Virginia
County: Marshall
District: Union
Quadrangle: Moundsville, WV 7.5'
Watershed: Short Creek - Ohio River

UTM NAD 83 Easting: 524125.443
Northing: 4423432.961
Public Road Access: CR 10 Markey Lane
Generally used farm name: Hazlett

This Notice Shall Include:

Pursuant to West Virginia Code § 22-6A-16(c), this notice shall include: (1) A copy of this code section; (2) The information required to be provided by W. Va. Code § 22-6A-10(b) to a surface owner whose land will be used in conjunction with the drilling of a horizontal well; and (3) A proposed surface use and compensation agreement containing an offer of compensation for damages to the surface affected by oil and gas operations to the extent the damages are compensable under article six-b of this chapter. Additional information related to horizontal drilling may be obtained from the Secretary, at the WV Department of Environmental Protection headquarters, located at 601 57th Street, SE, Charleston, WV 25304 (304-926-0450) or by visiting www.dep.wv.gov/oil-and-gas/pages/default.aspx.

Well Operator: Chevron Appalachia, LLC
Telephone: 412-865-2504
Email: slaird@chevron.com

Address: 700 Cherrington Parkway
Coraopolis, PA 15108
Facsimile: 412-865-2403

RECEIVED
Office of Oil and Gas
AUG 3 2018

Oil and Gas Privacy Notice:

The Office of Oil and Gas processes your personal information, such as name, address and telephone number, as part of our regulatory duties. Your personal information may be disclosed to other State agencies or third parties in the normal course of business or as needed to comply with statutory or regulatory requirements, including Freedom of Information Act requests. Our office will appropriately secure your personal information. If you have any questions about our use or your personal information, please contact DEP's Chief Privacy Officer at depprivacyofficer@wv.gov.

WV Department of Environmental Protection

STATE OF WEST VIRGINIA
DEPARTMENT OF ENVIRONMENTAL PROTECTION, OFFICE OF OIL AND GAS
VOLUNTARY STATEMENT OF NO OBJECTION

Instructions to Persons Named on Page WW-6A

The well operator named on page WW-6A is applying for a permit from the State of West Virginia to conduct oil or gas well work. Well work permits are valid for twenty-four (24) months. Please contact the listed well operator and the Office of Oil and Gas if you do not own any interest in the listed surface tract.

Comment and Waiver Provisions

Pursuant to West Virginia Code § 22-6A-11(a), all persons described in subsection (b), section ten of this article may file written comments with the secretary as to the location or construction of the applicant's proposed well work within thirty days after the application is filed with the secretary.

Pursuant to West Virginia Code § 22-6A-8(b) No permit may be issued less than thirty days after the filing date of the application for any well work except plugging or replugging; and no permit for plugging or replugging may be issued less than five days after the filing date of the application except a permit for plugging or replugging a dry hole: *Provided*, That if the applicant certifies that all persons entitled to notice of the application under the provisions of subsection (b), section ten of this article have been served in person or by certified mail, return receipt requested, with a copy of the well work application, including the erosion and sediment control plan, if required, and the well plat, and further files written statements of no objection by all such persons, the secretary may issue the well work permit at any time.

VOLUNTARY STATEMENT OF NO OBJECTION

I, _____, hereby state that I have read the Instructions to Persons Named on Page WW-6A and the associated provisions listed above, and that I have received copies of a Notice of Application, an Application for a Well Work Permit on Form WW-6A and attachments consisting of pages one (1) through ³ _____, including the erosion and sediment control plan, if required, and the well plat, all for proposed well work on the tract of land as follows:

State:	<u>West Virginia</u>	UTM NAD 83 Easting:	<u>524125.443</u>
County:	<u>Marshall</u>	UTM NAD 83 Northing:	<u>4423432.961</u>
District:	<u>Union</u>	Public Road Access:	<u>CR 10 Mackey Lane</u>
Quadrangle:	<u>Moundville, WV 7.5'</u>	Generally used farm name:	<u>Hazlett</u>
Watershed:	<u>Short Creek - Ohio River</u>		

I further state that I have no objection to the planned work described in these materials, and I have no objection to a permit being issued on those materials.

<p>*Please check the box that applies</p> <p><input checked="" type="checkbox"/> SURFACE OWNER</p> <p><input type="checkbox"/> SURFACE OWNER (Road and/or Other Disturbance)</p> <p><input type="checkbox"/> SURFACE OWNER (Impoundments/Pits)</p> <p><input type="checkbox"/> COAL OWNER OR LESSEE</p> <p><input type="checkbox"/> COAL OPERATOR</p> <p><input type="checkbox"/> WATER PURVEYOR</p> <p><input type="checkbox"/> OPERATOR OF ANY NATURAL GAS STORAGE FIELD</p>	<p>FOR EXECUTION BY A NATURAL PERSON</p> <p>Signature: <u>Irene Hazlett</u></p> <p>Print Name: <u>Irene Hazlett</u></p> <p>Date: <u>7-11-18</u></p>
	<p>FOR EXECUTION BY A CORPORATION, ETC.</p> <p>Company: _____</p> <p>By: _____</p> <p>Its: _____</p> <p style="text-align: right;">RECEIVED Office of Oil and Gas</p> <p>Signature: _____</p> <p>Date: <u>AUG 3 2018</u></p>

WV Department of
Environmental Protection

Oil and Gas Privacy Notice:

The Office of Oil and Gas processes your personal information, such as name, address and telephone number, as part of our regulatory duties. Your personal information may be disclosed to other State agencies or third parties in the normal course of business or as needed to comply with statutory or regulatory requirements, including Freedom of Information Act requests. Our office will appropriately secure your personal information. If you have any questions about our use or your personal information, please contact DEP's Chief Privacy Officer at depprivacyofficer@wv.gov.

STATE OF WEST VIRGINIA
DEPARTMENT OF ENVIRONMENTAL PROTECTION, OFFICE OF OIL AND GAS
VOLUNTARY STATEMENT OF NO OBJECTION

Instructions to Persons Named on Page WW-6A

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Pursuant to West Virginia Code § 22-6A-8(b) No permit may be issued less than thirty days after the filing date of the application for any well work except plugging or replugging; and no permit for plugging or replugging may be issued less than five days after the filing date of the application except a permit for plugging or replugging a dry hole: *Provided*, That if the applicant certifies that all persons entitled to notice of the application under the provisions of subsection (b), section ten of this article have been served in person or by certified mail, return receipt requested, with a copy of the well work application, including the erosion and sediment control plan, if required, and the well plat, and further files written statements of no objection by all such persons, the secretary may issue the well work permit at any time.

VOLUNTARY STATEMENT OF NO OBJECTION

I, Loretta K. Wallace, hereby state that I have read the Instructions to Persons Named on Page WW-6A and the associated provisions listed above, and that I have received copies of a Notice of Application, an Application for a Well Work Permit on Form WW-6A and attachments consisting of pages one (1) through 3, including the erosion and sediment control plan, if required, and the well plat, all for proposed well work on the tract of land as follows:

State:	<u>West Virginia</u>	UTM NAD 83	Easting:	<u>524125.443</u>
County:	<u>Marshall</u>		Northing:	<u>4423432.961</u>
District:	<u>Union</u>	Public Road Access:	<u>CR 10 Mackey Lane <u>Markey Lane</u></u>	
Quadrangle:	<u>Moundsville, WV 7.5'</u>	Generally used farm name:	<u>Hazlett</u>	
Watershed:	<u>Short Creek - Ohio River</u>			

I further state that I have no objection to the planned work described in these materials, and I have no objection to a permit being issued on those materials.

<p>*Please check the box that applies</p> <p><input type="checkbox"/> SURFACE OWNER</p> <p><input type="checkbox"/> SURFACE OWNER (Road and/or Other Disturbance)</p> <p><input type="checkbox"/> SURFACE OWNER (Impoundments/Pits)</p> <p><input type="checkbox"/> COAL OWNER OR LESSEE</p> <p><input type="checkbox"/> COAL OPERATOR</p> <p><input type="checkbox"/> WATER PURVEYOR</p> <p><input type="checkbox"/> OPERATOR OF ANY NATURAL GAS STORAGE FIELD</p>	<p>FOR EXECUTION BY A NATURAL PERSON</p> <p>Signature: <u>Loretta K. Wallace</u></p> <p>Print Name: <u>Loretta K. Wallace</u></p> <p>Date: <u>June 24, 2018</u></p>
	<p>FOR EXECUTION BY A CORPORATION, ETC.</p> <p>Company: _____</p> <p>By: _____</p> <p>Its: _____</p> <p>Signature: _____</p> <p>Date: _____</p>

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Oil and Gas Privacy Notice:

The Office of Oil and Gas processes your personal information, such as name, address and telephone number, as part of our regulatory duties. Your personal information may be disclosed to other State agencies or third parties in the normal course of business or as needed to comply with statutory or regulatory requirements, including Freedom of Information Act requests. Our office will appropriately secure your personal information. If you have any questions about our use or your personal information, please contact DEP's Chief Privacy Officer at depprivacyofficer@wv.gov.

WV Department of
Environmental Protection

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STATE OF WEST VIRGINIA
DEPARTMENT OF ENVIRONMENTAL PROTECTION, OFFICE OF OIL AND GAS
VOLUNTARY STATEMENT OF NO OBJECTION

Instructions to Persons Named on Page WW-6A

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Comment and Waiver Provisions

Pursuant to West Virginia Code § 22-6A-11(a), all persons described in subsection (b), section ten of this article may file written comments with the secretary as to the location or construction of the applicant's proposed well work within thirty days after the application is filed with the secretary.

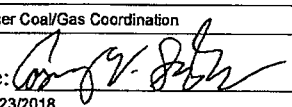
Pursuant to West Virginia Code § 22-6A-8(b) No permit may be issued less than thirty days after the filing date of the application for any well work except plugging or replugging; and no permit for plugging or replugging may be issued less than five days after the filing date of the application except a permit for plugging or replugging a dry hole: *Provided*, That if the applicant certifies that all persons entitled to notice of the application under the provisions of subsection (b), section ten of this article have been served in person or by certified mail, return receipt requested, with a copy of the well work application, including the erosion and sediment control plan, if required, and the well plat, and further files written statements of no objection by all such persons, the secretary may issue the well work permit at any time.

VOLUNTARY STATEMENT OF NO OBJECTION

I, Casey V. Saunders, hereby state that I have read the Instructions to Persons Named on Page WW-6A and the associated provisions listed above, and that I have received copies of a Notice of Application, an Application for a Well Work Permit on Form WW-6A and attachments consisting of pages one (1) through _____, including the erosion and sediment control plan, if required, and the well plat, all for proposed well work on the tract of land as follows:

State: West Virginia UTM NAD 83 Easting: 524125.443
County: Marshall Northing: 4423432.961
District: Union Public Road Access: _____
Quadrangle: _____ Generally used farm name: _____
Watershed: _____

I further state that I have no objection to the planned work described in these materials, and I have no objection to a permit being issued on those materials.

<p>*Please check the box that applies</p> <p><input type="checkbox"/> SURFACE OWNER</p> <p><input type="checkbox"/> SURFACE OWNER (Road and/or Other Disturbance)</p> <p><input type="checkbox"/> SURFACE OWNER (Impoundments/Pits)</p> <p><input checked="" type="checkbox"/> COAL OWNER OR LESSEE</p> <p><input checked="" type="checkbox"/> COAL OPERATOR</p> <p><input type="checkbox"/> WATER PURVEYOR</p> <p><input type="checkbox"/> OPERATOR OF ANY NATURAL GAS STORAGE FIELD</p>	<p>FOR EXECUTION BY A NATURAL PERSON</p> <p>Signature: _____</p> <p>Print Name: _____</p> <p>Date: _____</p>
	<p>FOR EXECUTION BY A CORPORATION, ETC.</p> <p>Company: <u>CONSOL Energy</u></p> <p>By: <u>Casey V. Saunders</u></p> <p>Its: <u>Manager Coal/Gas Coordination</u></p> <p>Signature: </p> <p>Date: <u>02/23/2018</u></p>

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Office of Oil and Gas

AUG 3 2018

WV Department of Environmental Protection



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WEST VIRGINIA DEPARTMENT OF TRANSPORTATION
Division of Highways

1900 Kanawha Boulevard East • Building Five • Room 110
Charleston, West Virginia 25305-0430 • (304) 558-3505

Thomas J. Smith, P. E.
Secretary of Transportation/
Commissioner of Highways

June 13, 2018

Jill M. Newman
Deputy Commissioner

James A. Martin, Chief
Office of Oil and Gas
Department of Environmental Protection
601 57th Street, SE
Charleston, WV 25304

Subject: DOH Permit for the Hazlett Pad A Well Site, Marshall County
Hazlett A Unit 5H

Dear Mr. Martin,

The West Virginia Division of Highways has issued Permit #06-2018-0433 for the subject site to Chevron Appalachia, LLC for access to the State Road for the well site located off of Marshall County Route 10 SLS.

The operator has signed a STATEWIDE OIL AND GAS ROAD MAINTENANCE BONDING AGREEMENT and provided the required Bond. This operator is currently in compliance with the DOH OIL AND GAS POLICY dated January 3, 2012.

Very Truly Yours,

Gary K. Clayton, P.E.
Regional Maintenance Engineer
Central Office Oil & Gas Coordinator

Cc: Mandy Fordyce
Chevron Appalachia, LLC
CH, OM, D-6
File

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4705 * 02095

Hydraulic Fracturing Fluid Additives

Supplier	Name	Purpose
Universal	7.5% HCl Acid	Acid - To open perforations
Universal	Unislick ST50	Friction Reducer for Water and Brine (Anionic)
Universal	Scale Inhibitor A	Scale Inhibitor
Universal	Iron Control A	Iron Control
Universal	Unihib G	Corrosion Inhibitor for Acid
Universal	K-Bac 1020	Biocide/Bactericide
Universal	CMHPG (Polyfrac Gel)	Gel
Universal	LEB 10X	Gel Breaker
Universal	100 Mesh White Sand	Proppant
Universal	40-70 Mesh White Sand	Proppant

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